DESCRIPTIVE DICTIONARY

OF

BRITISH MALAYA.

N. B. DENNYS, Ph.D.,

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PREFACE.

The original intention of the compiler of this work was to make arrangements for re-editing Crawfurd's valuable *Descriptive Dictionary of the Indian Archipelago*. It was, however, found that to do this in conformity with the plan adopted would be, for various reasons, impracticable, and the following pages deal only with that portion of Malaya lying within the sphere of British influence.

The volume contains about 3,000 headings. The Straits Settlements and Protected Native States are treated of at considerable length, while notices, more or less brief, are given of every town, village, river, &c., appearing in published maps, as also of many others hitherto undescribed. The various aboriginal tribes, the products of the jungle, native manners and customs, the natural history of the Peninsula and many other subjects of interest, are described or explained. Somewhat less than 140 articles are quoted, rewritten, or brought up to date, from Crawfurd's *Dictionary*, Messrs. Bradbury and Agnew having kindly given permission to that effect.

Works of Travel by many authors, the Journal of the Indian Archipelago, and the Journal of the Straits Branch R. A. S., have been freely drawn upon. Particular acknowledgments are due to the Hons. W. E. Maxwell, c.m.c., A. M. Skinner, c.m.g., F. A. Swettenham, c.m.g., H. A. O'Brien, and D. F. A. Hervey, c.m.g., to Major J. F. A. MacNair, c.m.g., Dr. T. Irvine Rowell, c.m.g., Mr. W. A. Pickering, c.m.g., Mr. C. W. Kynnersley, Mr. E. W. Birch, Mr. L. Wray, Mr. H. L. Noronha, Mr. G. Rappa, and the late Messrs. Davison, J. D. Vaughan, and N. Cantley. Very special thanks are due to Mr. A. G. Angier for numerous statistical additions and corrections, as well as for many suggestions which have materially improved the value of the work. They are scarcely less due to many others who have done much to increase our knowledge of Malayan matters, while many details have been derived from the columns of the Singapore and Penang newspapers, and will be found duly acknowledged. When practicable, special permission was obtained to utilize the information thus afforded; but it is believed that in most other cases the authority quoted is given. Enough original matter will, nevertheless, be found to prevent any supposition that the work is a mere reprint of previously accessible material.

A few articles have been inserted-notably those referring to the Independent

Native States and some of the outlying islands—which are not, strictly speaking, included in British Malaya. The information given may, however, be of use.

As to the errors and omissions which will doubtless be discovered, those most familiar with the difficulties of producing such a work will criticize it most leniently, and be most ready to recognize whatever merits it may justly claim. Every month is adding to our knowledge of Malaya, and some time must necessarily elapse before finality can be reached. The compiler has endeavoured to embody the most recent statistical returns, but in some few cases these have come to hand after the pages in which they should appear have been printed off. The offissions, however, are neither so numerous nor important as to require special notice.

The sincere thanks of the author are specially due to the gentlemen—old residents in the Straits Settlements—whose liberality has provided the means for publishing the work.

N. B. DENNYS.

Medicated

TYO

LIEUT.-GENERAL SIR ANDREW CLARKE, R.E., G.C.M.G., C.B., C.I.E.,

TO WHOSE WISE POLICY BOTH THE STRAITS SETTLEMENTS AND THE PROTECTED STATES OF THE MALAY PENINSULA

OWE SO DEEP A DEBT OF GRATITUDE.

The following abbreviations are used in this work:—

C. = Central.

Ch. = Chinese.

E. = East.

Fur. = Furlongs.

H = Hill.

I. = Island.

Imp. = Important.

Jap. = Japanese.

J. I. A. = Journal of the Indian Archipelago.

J. S. B. R. A. S. = Journal of the Straits Branch Royal Asiatic Society.

J. R. A. S. = Journal of the Royal Asiatic Society. Kw. = Kwala.

Malay G. & Dic. = Malay Grammar and Dic-

tionary.

M. = Mountain.

N. = North.

P. = Province.

R. = River.

S. = South.
T. = Town.

V = Village.

W. = West.

DESCRIPTIVE DICTIONARY

OF

BRITISH MALAYA.

[Articles marked * are wholly or in part taken from Crauford's "Dictionary of the Indian Archipelago."]

Ablution.—The Malays emulate other Mahommedans in their regard for physical purity. For this purpose, tanks are placed beside each mosque, to enable worshippers to bathe before prayer, if they have not been able to otherwise cleanse themselves. The Arabic word wuzzu is used to express religious ablution, and heds the state of defilement during which Malays cannot pray.

Aboriginal Tribes.—The wild tribes of the Peninsula and Settlements comprise the following. It must be understood that some are generic terms and some specific. Thus the word benua includes many others, but as particulars will be found under each word in its alphabetical order, it will suffice to give the terms met with in various authorities on the subject:-

Orang Beduanda Kallang.

- " Benua.
- " Besisi or Basisi.
- " Gargasi.
- "Kenaboi.
- Mintira or Mantra.
- Rayet.

Orang Sabimba.

- " Sakei or Sakai jinak.
- " Sakei or Sakai liar. " Selitar. " Semang.

- Udai.
- Utan.

The generic terms for "aborigines" are Orang buket, O. liar, and O. sakei.

Acre (relong) or orlong, equal to 13 English acres, 3 orlongs making 4 acres.

Adiantum Fern, of which the Maiden hair is a charming variety.—This is a native of the Peninsula, and was discovered by Bishop Hose to exist in Malacca. It is also found on Penang Hill.

Admiral, in Malay, is laksamana, but the term has long since been disused. Adze.—See AxE.

Agar.—The Malay name for a species of marine alga, the Fucus saccharinus of botanists; growing on the rocky shores of many of the Malayan islands, and forming a considerable article of export to China by junks. It is esculent when boiled to a jelly, and is also used by the Chinese as a vegetable glue.* Of late years it has been largely adopted in the European cuisine as a substitute for isinglass with which to make blanc-manges, jellies, &c., though wanting somewhat

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in delicacy of taste. The principal place of production is Pulo Pangkor Laut (Dindings) opposite Perak.

Agriculture.—The agriculture of the Malays (that of the Chinese is referred to below) is, strictly speaking, almost confined to one object—the cultivation of rice, of which several varieties are grown. The labour rendered necessary is confined to only two or three months of the year, immediately after the autumn rains, when the padi fields are submerged, and the task of turning in the stubble and weed of the preceding season is thus rendered easy. The planting of fruits, &c., can scarcely be termed "agriculture," the natural fertility of the soil rendering any labour unnecessary. In the Settlements and Protected States large areas are put under rice every season. In the Independent States, the clearings being smaller, operations are conducted on a more limited scale, and it is only with great difficulty that enough grain is raised to supply domestic consumption, a good deal being imported from Siam.

The following remarks by the late Mr. Logan on the agricultural capabilities of the southern portions of the Straits, apply almost equally well to the Peninsula generally :- " Although the soils of the district have not the fertility of the volcanic and calcareous soils which occur in many parts of the Indian Archipelago, they are covered with an indigenous vegetation of great vigour and luxuriance, supporting numbers of animals of different species. The hills of plutonic rock support dense and continuous forests composed of more than 200 species of trees, many of which are of great size. So long as the iron is not in such excess as to decompose the clay into stone or render it hard, those soils which contain most iron are most fertile. The purely or highly felspathic are the worst. But even felspathic soils, when intermixed with a sufficient proportion of quartz, are, in this climate, capable of producing an abundant vegetation. Although it is obvious to every observer that there is no kind of soil in the district for which nature has not yet provided plants that flourish luxuriantly in it, yet it must not be hastily concluded, as some have done, that this exuberant vegetation indicates a general fertility in the soil. It is found, on the contrary, when the native plants are destroyed and the land is employed for agriculture, that there are very few soils in which cultivated plants not indigenous to the region, but whose climatic range embraces it, will flourish spontaneously. While the cocoanut, betelnut, sago, gomuti and the numerous Malayan fruits succeed well with little care, the nutmeg and clove are stunted and almost unproductive, unless constantly cultivated and highly manured. Yet the climate is perfectly adapted for them. Place them in the rare spots where there is naturally a fertile soil, or create one artificially, and the produce is equal to that of trees in the Molucca plantations. With respect to indigenous plants, gambier, pepper and all the fruit-trees flourish on the plutonic hills, provided they are not too deficient in iron and quartz. The hills of violet shale, where they are not too sandy, are equal to the best plutonic soils—those namely in which there is a sufficient proportion of hard granules to render them friable, and sufficient iron to render them highly absorptive of water without becoming plastic. Of all the sedimentary soils, the sandstone and very arenaceous shales furnish the worst. Of the alluvial soils, the sand, particularly when it contains a mixture of vegetable matter or triturated shells, is the proper soil of the cocoanut, and the vegetable mud of the sago. When the country has been better and longer drained and cultivated, the latter soil will become a rich mould. At present it is everywhere too wet and sour to make a fertile soil. Rice is grown on some patches of it. The bluish sea mud contains good ingredients, but clay is in excess, and the animal matter in it appears to assist in rendering it hard and untractable when it is not saturated with water. Even for such a soil nature has provided plants useful to man, for the betelnut and some of the indigenous fruit-trees grow well in it with little cultivation. Although there are cultivated plants adapted to every kind of soil in the district, and it has indigenous tribes who can live exclusively on its yams, sago, fish and wild animals, it is incapable of feeding a population of the more civilized races, and the latter must always be dependent on other countries for the great necessary of life—rice."

Small patches of tobacco and sugar-cane are common, but in each case the cultivation is for domestic use only. The implements used are of the rudest nature, the plough being a rough wooden affair capable only of scratching the surface, while the harrow is equally primitive. The one tool of the Malay agriculturalist is the changkol, or large hoe, q. v. Some indication of the comparatively slight importance attached to the art of cultivation by the Malays is afforded by the fact that no generic word exists for it in the language; that used, viz., tanam, and its derivatives, meaning accurately to plant or bury.

The Chinese have, in fact, become the real agriculturalists of the Straits, comanuts, sugar, indigo, pepper, gambier, nutmeg and pine-apple being all "cultivated" by them in the full sense of the word. European enterprise has of late attempted coffee, tea, cocoa, cinchona, cocoanuts and sugar, the latter having been cultivated for many years and alone yielded results of importance. Guano, oil cake (especially the latter), lime and other fertilizers have been plentifully used on the sugar estates, and a good deal of care has been taken with cocoa, &c. The Chinese, however,

resort almost exclusively to excrement and sewerage.

Aker.—Means a root, and is constantly used to form compound words, such as A. kaluna, A. sinapo, A. tuba, &c. (Kaluna-root, &c.)

Akki or Akki Apple (Blighia sapida).—A vegetable which during growth is surrounded by a hard shell; when the kernel ripens this splits open, disclosing a yellow gelatinous seed. Fried with butter and pepper it is an acceptable addition to the table. It has been introduced into the Straits from the West Coast of Africa.

Albino.—Persons born without the colouring matter of the skin, eyes, and hair, and thus far imperfect, are occasionally to be seen in every race and tribe of the Malayan Peninsula, as they are of those of Europe, Asia, Africa, and America. The native terms are baler or sopak.

Alboquerque, Affonso.—Or Afonso Albuquerque, was the second son of Gonsalvo de Albuquerque, lord of Villaverde, and an illegitimate descendant of the royal family of Portugal. He was born in 1452. In 1503 he made his first voyage to India in the joint command of a fleet with his relative Francisco Albu-QUERQUE. Returning home in 1503, he was appointed to the command of a squadron bound for India, forming part of a fleet under the orders of Tristan da Cunha, who, proceeding himself to India, left Albuque to carry on a desultory and unprofitable warfare with the little Mahommedan States on the eastern coast of In 1508 he acquired the government of India. In 1510 he attacked and, after a first unsuccessful attempt, succeeded in capturing Goa, which has ever since continued the capital of the Portuguese possessions in India. In 1511 he undertook and achieved the conquest of Malacca—the enterprise which connects his name with the present work. His last achievement was the conquest of Ormus, soon after which he fell sick, returned to India, and died a few days after, in the sixty-third year of his age.*

Allakan Durian Tembaga.—V. in S.E. Selangor, about 5 miles from the Sungei Ujong frontier.

Alligator.—By a common error all reptiles of this family are usually termed alligators (Spanish el legarto, the lizard), but the ten species known are all American, though the discovery of a true alligator in India has recently been announced. Alligators are all fresh-water animals; the muzzle of the animal tapers roundly from the back of the jaw to the snout, and its toes are partly webbed, the outer toe being free. The canine teeth fit into pits in the upper jaw. The hind legs are without scales.

The crocodile likes brackish or salt as well as fresh water, has scales on the hind legs, its teeth fit into notches in the upper jaw, and the side of the jaw is depressed in front of the snout. See Crocodile.

Alligator or Avocado Pear.—Not indigenous. Introduced from the West Indies.

Allspice (Pimenta vulgaris).—This is exotic. Mr. Cantley, writing in December, 1886, says of a specimen in the Botanical Gardens:—"A plant of allspice raised from seed some nine years ago is now about twelve feet in height and is for the moment covered with blossom and small fruit."

• Alma Estate.—Eight miles and 3 furlongs from Butterworth, and situated in the centre of Province Wellesley, between Macham Bubo, Bukit Minyak and Tebing Tinggi. This estate, which lies two miles inland from the high road, was opened nearly 50 years ago by Mr. Robert Wilson of Penang for the purpose of growing the manioc or cassava root, here called ubi kayu, for the manufacture of tapioca, and it turned out a great success. The soil proved well adapted to the growth of the root. A head of soft water for turning the mill and washing the flour was obtained by throwing a dam across a stream running from Bukit Mertajam towards the Juru, and now there are 1,000 acres under cultivation producing a proportionate quantity of that substance. The labourers employed are nearly all Klings and Chinese. The house of the manager is situated on rising ground surrounded by magnificent trees and opposite the lake formed in consequence of the damming operation above described, and is one of the most picturesquely situated in the colony.

Almighty as distinct from "god" is rendered by Maha Kuasa, but is rather a descriptive than nominal phrase.

Almond trees abound in the Peninsula. They are called bådam (a Persian word), ketapong or los. A wild almond is commonly met with.

Alor Gajah.—A village in the Pigoh district and on the S. borders of the Naning territory, N. Malacca. Near it was situated Fort Lismore, at one time occupied by a garrison under the East India Company, but now abandoned. A Government bungalow and police station exist here, and prior to the reduction of Naning, the place was of some importance. It is about 15 miles N. of Malaccatown on the high road to the Tabu district, and was frequently mentioned by early explorers of the province.

Alor Star or Kota Star .- q. v.

Amber, so called in Malay. Known but not found in Malaya.

Amangan.—V. on the S. slope of the hills below Kwala Lumpor in S.E. Selangor.

Amok.—"Running amok" describes a species of murder-madness peculiar to the Malays. Inflamed by some real or fancied injury, or in some few cases insane, the amok runner rushes through the streets, cutting down with his sword or parang every one he can. As an illustration we quote the following: "On the 8th July, 1846, Sunan, a respectable Malay builder in Penang, ran amok in Chulia Street and Penang Road, and before he was arrested killed an old Hindu woman, a Kling, a Chinese boy, and a Kling girl about 8 years old in the arms of her father, and wounded two Hindus, three Klings, and two Chinese, of whom only two survived. On his trial it appeared that he was greatly afflicted by the loss of his wife and child, which preyed upon his mind and quite altered his appearance. A person with whom he had lived up to the 15th of June said further: 'He used to bring his child to his work; since its death he has worked for me; he often said he could

not work as he was afflicted by the loss of his child. I think he was out of his mind. He did not smoke or drink. I think he was mad.' On the morning of the amok this person met him, and asked him to work at his boat. 'He replied that he could not, he was very much afflicted.' 'He had his hands concealed under his cloth, and frequently exclaimed, Allah! Allah!' 'He daily complained of the loss of his wife and child.' On the trial Sunan declared he did not know what he was about, and persisted in this at the place of execution, adding: 'As the gentlemen say I have committed so many murders, I suppose it must be so.' The amok took place on the 8th, the trial on the 13th, and the execution on the 15th of July—all within eight days."

British rule has almost exterminated amok in the Settlements, the prospect of being hanged in cold blood causing a disinclination to run the risk. An amoker always expects to be cut down while under the influence of his simulated passion.

Ampang.—V. in E. Selangor. A little over 10 miles E.S.E. of Kwalor Lumpor.

Amulets.—See Charms.

Anak Ayer Pari.—A small tributary of the R. Sei Pari, a branch of the Kinta River, C. Perak.

Anchor,—"The Malay anchor is constructed of a piece of forked timber, the fluke being strengthened by twisted rattans binding it to the stem, while the cross-piece is formed of the long flat stone secured in the same manner. This anchor when well made holds exceedingly firm, and, owing to the expense of iron, is still almost universally used on board the small prahus."—WALLACE. The native word to anchor is berlabuan. Hence Labuan, the British Colony of that name.

Ang Mo Kio.—District in E.C. Singapore, greatly settled by Chinese.

Angin-Angin.—A weather-cock, which see.

Aniseed.—This well-known article of trade is termed Adas or jintan manis. Anjong Meandong.—V. in the Pahang Delta about $1\frac{1}{2}$ m. S.E. of the

junction of the R. Pahang and Pahang Tuah.

Ant.—S'mut or Semut in Malay. A number of varieties are found in the Peninsula, the largest being the semut temunggong, an insect about 11 inch in length, of black colour and armed with formidable forceps which will make an appreciable wound. The kongkiah is another black variety over half an inch in length and found only on the ground, as it never ascends trees. Its nest is formed in the earth, and it is mostly visible in wet weather. It frequently bites the bare feet of the natives. Next to this comes the karingga, a red ant, which, like the temunggong, bites viciously, and is remarkable for the rapidity with which it transfers itself from the branch, &c., it may happen to be on, to the person. Hundreds will thus attack one in a few seconds, in which case the only alternative is to immediately strip—an easy proceeding when within reach of a bath-room, but embarrassing when away from home. Of the anei-anei, or in Singapore semut putch, or white ant, much might be written, but its depredations are precisely those described in countless works of travel. It differs from its American congener in never building the lofty tumuli familiar to all readers of Natural History, but is none the less a nuisance. This species always attacks the butt end of wood, and never (unless the piece attacked be joined to another already perforated) commences its boring from the side. Metal shoes and a plentiful use of tar, kerosine and its other derivatives, are the only known means of repelling their attacks. The slight mounds raised by this insect burn, if properly lit, with a powerful red heat for some days. A small black ant, of which the largest specimens are only a quarter of an inch long, comes next in order. It is called semut sawa by the Malays and is apparently harmless. A smaller reddish ant, exactly resembling that at home, comes next. It is known as semut kerna. The smallest of the house pests is

the semut api, or "fire ant," the bite of which is aptly likened to the prick of a redhot needle. A yet smaller species, the semut katu, infests the skins of specimens prepared for the museum, but do no damage beyond clearing away any minute fragments of flesh left adhering in the course of preparation. These species embrace all commonly met with, but the field is yet open to exploration.

Antimony.—This metal, formerly unknown to the natives of the East, as it was to Europeans until the fifteenth century, was found for the first time in Borneo, in 1823. The ore is a sulphuret in a matrix of quartz, and at present furnishes the chief supply of Europe, being exported, from the Emporium of Singapore, to a large yearly amount.* Oxide of antimony is obtained in large quantities amongst the hills of Perak, chiefly in conjunction with veins of tin.

Antiquities, Malayan.—No remains of any archæological importance, save a few inscriptions, are to be found in the Peninsula, but an interesting sketch of those found in Java, &c., is given in N. & Q. with No. XVI (1886) of J. S. B. R. A. S., p. 88. Traces of ancient Buddhist temples are said to exist in Province Wellesley. Some of the shell mounds occurring there might be worth exploration.

Ape. - See Monkey.

Apit-Apit.—The game of draughts, much resembling our own. See Draughts. Ara Panjang.—V. on E. bank of Perak R., C. Perak.

Ara Rendang.—A small village, 9 miles N.E. of Butterworth, Province Wellesley, and close to Malakoff estate. A police station is established here. The name is applied by the natives to the district, including the estate referred to.

Arabs, Arabia.—This country has been familiarly known to the inhabitants of the Malayan islands for six centuries, the majority of them having, within that time, adopted its religion and laws, and engrafted much of its language on their own. There are many merchants and petty shopkeepers of this nationality in the Settlements.*

Arabic Language.—Malay contains numerous Arabic words, mostly altered however in form. The Arabic alphabet with the six letters of the Malays. See Crauford, Malay G. & Dic., Vol. i. p. xiii.

Areca Palm, Areca catechu (Pokoh Pinang). This is the tree which produces the well-known betel-nut (q, v.). The leaf-sheath is used to form water buckets and baskets. The tree itself is very slender and graceful, and gives its name to the Pulo Pinang, there being about three-quarter million of trees on the island. It is common throughout the Peninsula and Settlements, as also in the Archipelago and Southern India.

Argus Pheasant (Kuau) (Argus giganticus).—A native of Malacca, one of the most magnificent, though less brightly coloured than others, of the pheasant tribe. The late Mr. Whampoa of Singapore had several in confinement, but it is somewhat difficult to keep them alive in Europe. The wing coverts are beautifully marked with eyes, and the tail is of great length, requiring a very roomy cage indeed for its display.

Armadillo, the tinggiling of the Malays, is found throughout the Peninsula, and "cooked in the shell" is an attractive dish.

Arms.—In Malay sinjata, a word found in the language of all the civilized nations as far as the Philippines. The earliest weapons of the Indian islanders, after clubs, were most likely spears, for which their almost universal forests would yield a ready supply. The inhabitants of the island of Matan, scarcely exceeding an area of two leagues and a half, who defeated and slew the first circumnavigator of the globe, with h's band of sixty Spanish cavaliers, were armed with hardly any

other weapons than wooden or cane spears sharpened and hardened in the fire, with wooden bucklers. The spear is still a favourite weapon with all the Malayan tribes. The sling, in Malay ali-ali, although well known, seems never to have been much The chief missile in use before the introduction of fire-arms was a small arrow ejected from a blow-pipe by the breath, called a sumpitan, meaning the object blown through. This instrument is at present in general use by most of the wild tribes. The bow for discharging arrows is well known to all the more advanced nations of the Archipelago, but does not seem, at any time, to have been generally employed, the blow-pipe probably superseding its use, although a far less effectual The common name for it—panah,—extends over the whole of the islands. But of all weapons, the greatest favourite of the Malayan nations is the kris, the native word for a dagger or poniard. Men of all ranks wear one, and men of rank two, and even three and four when full dressed, the quality of the party being shown by the richness of the hilt, scabbard, and belt. The preference given to the kris over the more effectual sword had most probably its origin in the high price of iron in early times, and when there was no supply from abroad. In such times, a kris manufacturer—called a pande, cutler or blacksmith—was a person of distinction, as the same artificer is represented to have been in the Ossianic poems, and the names of several have been handed down by tradition. The word kris belongs equally to the Malay and Javanese, and is to be found in the languages of all the more advanced nations, expressing the same object. The sword is said to have been introduced about the year 1580, which is near 70 years after the Portuguese conquest of Malacca. Bucklers were largely used by the Malayan nations before the introduction of fire-arms, and in the Malay language there are no fewer than eight names for them, sometimes synonyms, and sometimes expressing their different forms.

BARROS enumerates the different weapons generally used by the Malays of Malacca when it was attacked by Albuquerque. "They consisted," he says, "of daggers of from two spans and a half to three spans long, straight in the blade and two-edged (the kris), bows and arrows, blow-pipes, which discharged very small arrows barbed and poisoned, with short spears for throwing, and bucklers of two kinds, the one short, and the other long enough to protect the whole body of the wearer." Barbosa says that the Malays of Malacca obtained arms from Java. "They" (the Javanese), says he, "bring many arms for sale, such as lances, bucklers, and swords (krises), having hilts wrought in marqueterie, and blades of the finest steel."—Ramusio, vol. i.

But besides the arms thus enumerated, the Portuguese and Spaniards, when they first arrived, found the most advanced of the Malayan nations in possession of fire-arms. Barros incidentally mentions the existence of match-locks in the defence of Malacca. The Portuguese had manned a captured junk with cannon, and sent her forward to batter the defences of a bridge, and this is his account of the action which took place: "As soon as the junk had passed the sand-bank and had come to an anchor, a short way from the bridge, the Moorish artillery opened a fire on her. Some guns discharged leaden balls at intervals, which passed through both sides of the vessel, doing much execution among the crew. In the heat of the action Antonio D'Abreu, the commander, was struck in the cheek from a fusil (espingardão), carrying off the greater number of his teeth." The son of Albu-QUERQUE, in his Commentaries, is still fuller on the subject of the captured artillery and the weapons of defence used by the Malays. "There were captured," says he, "3,000 pieces, of which 2,000 were of brass, and the rest of iron. Among them there was one large piece sent by the King of Calicut to the King of Malacca. All the artillery with its appurtenances were of such workmanship that it could not be excelled, even in Portugal. There were found also match-locks (espingardão), blowpipes for shooting poisoned arrows, bows and arrows, lances of Java, and divers other arms, all which created surprise in those that captured them."—Commentarios

do grande Afonso d'Albuquerque; Lisboa, 1576. The greater number most likely consisted of the small pieces called by the natives rantaka or hand-guns. Castanhed also mentions match-locks (espingardão), and while he reduces the captured cannon to 2,000, he says that they threw balls, some of stone, and some of iron covered with lead. The cannon (bombardia) were some of them of brass and some of iron. By his account, the bridge—the chief scene of combat in the storm of Malacca—was

defended by seventy-two pieces of ordnance.

The name by which fire-arms are usually called is bâdil, a general one for any missile, and mariam, which is Arabic, and in that language signifies "the Virgin Mary," which would seem to imply that the knowledge of artillery was derived by the Arabs themselves from the Christians, as without doubt it was. Smaller ordnance are called by various names, such as rantaka, lela, &c., &c., &c. The native term bûdil extends to the languages of all the more cultivated nations, although sometimes corrupted. The Arabic name mariam is also of general acceptance. The name of the match-lock is satingar, a corruption of the Portuguese espingardão, and the musket rifle is called sanapang, a corruption of the Dutch snappaan.

A knowledge of gunpowder must have been, at least, as early as that of cannon. It is not improbable that it may have been even earlier known through the Chinese, for the manufacture of fire-works, known to the Malays under the name marchun, a word of which the origin is not traceable. The principal ingredients of gunpowder are sufficiently abundant over many parts of the Archipelago, and known by native names, sandawa being the name of saltpetre, and bâlirang, or welirang, of sulphur. The names for gunpowder itself are a little singular. In

Malay it is called ubat-badil, which literally means "missile-charm."

The parties who introduced the knowledge of fire-arms among the Malayan nations cannot be mistaken. They were certainly the Mahommedans, and most probably the Arabs. Cannon were in full use by European nations for military purposes in the middle of the fourteenth century, and nearly at the same time by the Arabs of Spain, who had a frequent intercourse with their Eastern countrymen, and these, at the time, with the Oriental nations as far as China. Between the time when cannon were in general use in Europe and the first appearance of the Portuguese in Malaya, a century and a half had elapsed—ample time for the transmission of the new invention to the Malayan nations, and even to China, where also it was, most probably, first made known by the Arabs. The earliest reliable date which We possess of the use of artillery in continental India is the year 1482, when Mahommed Shah, King of Gujrat, employed cannon in a fleet during the war with pirates. In such cases the cannoniers are stated to have been Turks and Europeans. This seems to have been the case even after the arrival of Europeans; for in the great battle which secured to Babar the possession of Northern India, it is represented by the historian Farishta, that "he ordered his park of artillery to be linked together with leathern ropes made of raw hides, according to the practice of the armies of Asia Minor." On the arrival of the Portuguese on the western coast of India, they found all the maritime nations, whether under Mahommedan or Hindu rule, in possession of fire-arms, and employing them both on land and sea, and they found the same to be the case from the Arabian to the Persian Gulf. The handsomest piece of ordnance captured by them at Malacca, as has been already stated, had been a gift to the Malay prince from the King of Calicut, the Hindu prince called by the Portuguese the Zamorin. Of the actual year in which fire-arms were made known to the inhabitants of Malaya there is no record, but, considering the frequent intercourse which subsisted between them and the maritime parts of Western India, we may safely conclude that the event did not take place earlier than fifty years before the arrival of the Portuguese, that is, about the middle of the fifteenth century, or about a century after they had been in common use in Europe.

On the first arrival of the Portuguese in Malaya, the Javanese appear to have been the great manufacturers of arms of all descriptions. A regular manufacture of cutting weapons, match-locks and cannons, is still carried on by the Malays of Banjermassin in Borneo, and this with a skill surprising for their state of society. As this part of Borneo was long subject to the Javanese, it seems probable that it was this people that introduced the art. For many generations the Malays of Menangkabau have been the manufacturers of all kinds of arms for Sumatra. But the skilful manufacture of arms is by no means confined to these places.*—Condensed from Crauford's D. See also Kris, Bow, Sling, and Sumpitan.

Arrack.—An Arabic word now conventionally used by the Malays to signify "spirits." A knowledge of distillation was most probably acquired from either the Arabs or Chinese, the fermented liquor known as gilang not being obtained in this manner. The Chinese are the principal distillers in the Straits.*

Arrowroot (Maranta arundinacea), says Mr. Cantley (Report 1886), grows perfectly in the Experimental Nursery, Singapore. It is not much cultivated here except by cottagers for home consumption, but the produce is said to be very superior in quality.

Arrows (Anak damak).—J. I. A., I, 272. Seldom used now with the bow (damak), but minute arrows, about 7 inches long, are the projectiles propelled from the sumpitan, q. v.

Arsenic.—Is known by a native name, but is not a native product. It was probably brought to the islands originally from Siam and Burma, of which it is a product. Orpiment, or the sulphuret, goes under the name of warangan or barangan, and the epithet putch, or "white," is added for the white oxide. Warangan is derived from warang, which means the process of applying a compound, of which orpiment is a main ingredient, to a kris blade in order to preserve it. Arsenic is the principal poison used by the Malays for assassination, but even this very rarely, the kris being the means generally had recourse to.*

Arum.—Large and small species of arums abound, that most common being known as the babi-makan, or pig's food (though the grammatical order of the words is reversed). The flower is seldom attractive, being rather curious than beautiful.

Asahan.—V. just inside the boundary between Muar and Malacca, 5 miles W. of Mt. Ophir.

Asiatic Society, Straits Branch of.—See Journal.

Ass $(Kald\acute{e})$, known only to the Malays by its presence in other Mahommedan countries.

Astana or Istana, q. v.

Asthma (Sĕsak dada).—Is a well-known disease amongst the Malays, who gladly accept European palliatives.

Astrology.—Described by the Arabic term elmu nujum, believed in, but seldom practised by the existing races.

Attap.—Roof or thatch; but in common acceptation meaning the leaves of the nipa and other palms, which are roughly plaited so as to be used for thatch. Other substances, such as lalang grass and cocoanut leaves, are sometimes used, though much inferior in lasting qualities, and are then spoken of as "attap lalang," &c. Nipa-leaves thatch will keep in good condition for three years, but the average life of an attap roof is generally taken as five. The names of the trees from which attap is chiefly made are, besides Nipa, Attap puar, A. rumbia, A. sampit, A. sordan, and A. rajah.

Aur Gading.—A thriving V. 6 miles 1 furlong N.E. of Butterworth, P. Wellesley, and 1 mile from the 4th ferry of the Prai River: the site of a Police station. A large nutmeg plantation formerly existed here, the property of Mr. S. Heriot of Penang.

Axe or hatchet (Kapak or bliong).—The native tool is very primitive, and those of European manufacture are now chiefly used. The bliong can be altered so as to become an adze.

Ayer.—Is the Malay word for water, and sometimes for river, and consequently for a district seated on a river. Of places having this word combined with another, we have at least a score in our maps and charts, as Ayer-itam, black water or river; Ayer-dekat, near river; Ayer-besar, great river; Pulo-ayer, water island; and Pulo-we, which we write Pulo-way, having the same meaning.

Ayer Anak Sadang.—V. in N.E. Perak on the Kertang R., a small S. aff. of the Plus R.

Ayer Bamban.—Small V. on the high road in the Jus forest reserve, N. Malacca.

* Ayer Bankong.—V. at extreme E. boundary between Johol, Muar and Malacca, and N. of Mt. Ophir.

Ayer Batu.—Bay in Teluk Blangah district, S.W. Singapore. Ayer Belantei.—A swamp on the Rembau-Malacca border.

Ayer Benkong.—V. on the road between Machap and Pondok Kompas, N. Malacca.

Ayer Berendam.—V. S. of Sungei Udang district, Malacca; the site of a Police station. Situated on the high road between Malacca-town and Linggi, about $11\frac{1}{2}$ miles from the former.

Ayer Bertam.—A small V. about 2½ miles W. of Payah Rumput, Malacca.

Ayer Biru.—V. on Johore shore of Old Strait, opposite W. extremity of Pulo Ubin.

Aver Blangah.—A V. in the Sungei Pelei district, C. Malacca.

Ayer Brenggan,—A small V. a little over ½ mile S. of Ayer Panas in E.C. Malacca.

Ayer Bumben.—A small V. and Police station a little over 2 miles S. of Ayer Panas, Malacca.

Ayer Chambok.—V. on the Johol side of the boundary between that State and Malacca, on the road to Chindras.

Ayer Chantick.—V. in the Govt. reserve in Sungei Bharu Tengah district, Malacca.

Ayer Chermin.—A small V. at the most S. source of the Duyong R., Malacca. 3 miles due S. of Ayer Panas.

Ayer Dammar.—Small V. at foot of Punggor hill, Jus forest reserve, N. Malacca.

Ayer Durian.—A small V. at S.W. corner of the Jus forest reserve, N. Malacca.

Ayer Garma.—V. on the left bank of the R. Linggi, nearly opposite Niato.

Ayer Gemuru.—V. and stream \(^3\) miles S. of Tanah Merah Besar, Singapore. A foreign residence and plantation exist here.

Ayer Itam.—District, V. and R. in Lundu district, E. Penang.

Ayer Itam.—Small V. on border of Blimbing district in S.C. Malacca.

Ayer Klama.—V. on the boundary line between Malacca and Johol, 7 miles S. of Chindras.

Ayer Kubu.—A small stream flowing from the N. into the Muar R. and forming one of the boundaries between Johol and Johore.

Ayer Kuning (lit. yellow water).—A hill on the borders of Johol and Malacca reputed to yield gold.

Ayer Kuning.—Small V. in the Jus forest reserve, N. Malacca.

Ayer Langul.—V. in Tangga Batu district, Malacca, on the high road from Malacca-town to Linggi.

Ayer Lombong.—A small V. between Durian Tunggal and Machap. Police station about $2\frac{1}{2}$ miles S. of the latter.

Ayer Lombong.—Small V. 2 miles S. of Machap Police station, C. Malacca.

Ayer Ludin.—V. in Sungei Udang district, Malacca.

Ayer Mendatang.—V. on road between Merlimau and Chin-Chin, S. Malacca.

Ayer Minyak.—A small V. about 11 miles S. of Machap Police station, C. Malacca.

Ayer Molek.—A V. in Malacca on the road from the town to Ayer Panas.

Ayer Mulei.—V. 3 miles on right bank of the R. Duyong, Malacca, with which it is connected by a small stream. About 3 miles from the coast.

Ayer Nipah.—Bay in S.W. of Teluk Blangah district, Singapore.

Ayer Panas.—A V. in the neighbourhood of the old tin mines, E.C. Malacca, and celebrated for its hot springs. The road to this place branches off at right angles from the main S. road from Malacca-town to Merlimau, and at the village divides into two—one road leading to Durian Tunggal and the other to Jasin. A Government bungalow is situated at the fork, the triangular ground at its back, about $3\frac{1}{2}$ square miles, being a forest reserve.

Ayer Panas, or Ganong in Naning, the site of hot springs.

Ayer Pasir.—A small V. ½ mile S. of Machap Police station, N.C. Malacca.

Ayer Pengaga.—V. in Sungei Siput district in extreme N.W. of Malacca territory, and close to Labu China Police station.

Ayer Petei.—Small V. 1 mile S. of the boundary line between Malacca and Johol, on the road to Chindras.

Ayer Petei.—A V. in the Sungei Petei district, C. Malacca.

Ayer Prang.—Stream flowing into a W. aff. of the Kinta R. in C. Perak.

Ayer Punge.—A stream in Naning, N. Malacca.

Ayer Putch.—District just N. of Balik Pulau, W.C. Penang.

Ayer Puteh.—V. in the Sungei Bham Ulu district, N.W. Malacca.

Ayer Rajah.—District N.W. of Penang-town. A well-known residence also takes its name from the stream which gives its name to the district.

Ayer Reminia.—A small V. at S.W. corner of Jus forest reserve, N. Malacca.

Ayer Salak.—A small V. in N. of Tangga Batu district, Malacca.

Ayer Sitandu.—A small V. close to Bukit Linggi, in district of that name, N. Malacca.

Ayer Sumbah.—V. in the Sungei Bharu Tengah district, Malacca.

Ayer Tengah.— $V_{\frac{1}{2}}$ mile inside the boundary line between Malacca and Johol, on the road to Chindras.

Ayer Tengah.—V. at extreme N. point of boundary line between Malacca and Johol.

Ayer Terap.—A small V. in the Machap district, C. Malacca.

Ayer Terpin.—V. on E. bank of Jurong, in Jurong district, W. Singapore.

Ayer Udang.—A V. on the Malacca R. in the Sungei Petei district.

Turkish word for Sir, Father, or Child, and through the the Straits Settlements. It is now applied to all Straits-

the how (New). In all likelihood originally a Malay word, but introinterest the alternated languages, even into some, as the Javanese and
interest the active terms besides. It occurs frequently as the name of
interest in the interest ment probably by Malayan navigators, and from some fancied
interest in term to the animal.*

Hata Music (1st how-dowr). -This animal is a swine, and probably received in the fact that its tusks present so extraordinary an Thomas of the lower jaw project upwards on each side of the upper in the continuous boars that those of the upper jaw pass through the upper into the lower that face. The animal is fierce and dangerous, and can into the continuous with its lower tusks. The use of the upper ones is the material, though old writers assert that the babi-rusa was accustomed to the interval by them to the branches of trees. The female has no tusks. It

Litter (Namany). --These abound and reach a size to be formidable when military at the species. In the military control, as a rule, be trusted, and seem less capable of being tamed that any other autual of the same tribe.

Muching. A small V. over 2 miles from Malacca-town on the road to Batu

that Mat. Hill and V. 16 miles 4 furlongs from Butterworth, P. Wellestan the left of the road going towards Sungei Bakap. The rising ground is a repeat by small sugar-cane and fruit plantations.

budnig. V. about 4 miles E. of Prov. Wellesley frontier, $2\frac{1}{2}$ miles N. of

thugatt. Lit. a quay or landing-place: hence a ferry. It has come in Protion. Williamly to signify a small district, much as the words Ox-ford, &c., have host that primary signification and become the names of cities and counties. Thus, lingua Tuna Kechil means more than the actual ferry of Tuan Kechil, and is applied to the village proper and surrounding land.

Hagan Ayam.—A fishing village and sea ferry, 2 miles 6 furlongs from Butterwith. Province Wellesley, from which a road runs westward through Aur Gading to Amending, where the "Malakoff" sugar estate is situated. This is a large village, and there is a mosque and a Malay cemetery by the road-side. Three-quarters of a mile loyond Bagan Ayam, a private road diverges through the cocoa-nut plantation of Mr. Hogan direct to the old Police station at Teluk Remis, where there is a platform bridge across the deep but narrow sand gully which forms the bed of the final-water stream. Thirty years ago, as there was no bridge lower down, the public road, which led direct to the beach at the mouth of the stream where wheeled carriages could not cross except under peculiarly favourable circumstances, fell into allume, and could not readily be distinguished. A good bridge has now, however, human crected, and the road thoroughly restored and re-metalled. The private road louds past the remains of a substantial brick building armerly occupied by Collow, for many years Assistant Resident of the Province, but which was sold afterwards to the present proprietors of the plantation. See Teluk Remis.

Bagan Ayer Itam.—On N. bank of same name, W. Penang, just below Bukit Kechil.

Bagan Boya.—A fishing village 1 mile N. of Butterworth, P. Wellesley. The system of blats, or fishing weirs, which extends N. to the mouth of the Muda,

commences here, the coast in the neighbourhood of Butterworth being kept clear for convenience of traffic.

Bagan Dalam.—Important as the point where the steam ferry bridge crosses to Prai conveying vehicles, &c., each way about every 20 minutes. It is a suburb of Butterworth, P. Wellesley.

Bagan Datoh.—V. on S. side of embouchure of Perak R., S.W. Perak.

Bagan Jermal.—V. on N.E. Coast of Penang, about 3 miles from town.

Bagan Jermal.—A V. 1 mile 6 furlongs N. of Butterworth, P. Wellesley, chiefly occupied by fishermen. A fresh-water stream is crossed by a platform bridge, close to which is an extensive Chinese oil-boiling and pig-breeding establishment, the animals being fed with the refuse of the cocca-nuts from which the oil is made. The mouth of the stream is often closed with sand, but the water manages to escape by filtering through into the sea. On the beach immediately to the N. of this stream, and 2 miles 1 furlong from Butterworth, a large board on two pillars defines the northern limit of the Port of Penang. About 200 yards beyond the bridge, on the left, near the sea, is a dwelling-house formerly belonging to the Messrs. Brown, and occasionally occupied by members of the firm.

Bagan Nakodah Omar.--V. on S.W. coast, Selangor, about 6 miles S. of entrance to Bernam R.

Bagan Samu.—V. on N. bank of Krian R., 2 miles S.E. of Parit Buntar.

Bagan Serai.—District and ferry across the Prai R., P. Wellesley, which is here 150 yards broad. On the S. bank of the river are several brick kilns worked by Chinese. The bed of clay crosses the river a mile and a half above the ferry, where there is also a large brick-making establishment, and then runs along the N. bank of the river as far as Aur Gading, the clay improving greatly in quality at the latter spot. Bagan Serai ferry is 2 miles 6 furlongs from Butterworth, being the second from the mouth of the Prai.

Bagan Srei.—A ferry and V. about 7 miles from the entrance of the Krian R., N.W. Perak.

Bagan Tiang.—V. on the N.W. coast of Perak, $5\frac{1}{2}$ miles below Krian R.

Bagan Tuan Kechil.—Ferry place and V. in P. Wellesley, immediately N. of Butterworth, the ferry being $\frac{1}{2}$ mile from the Magistrate's house. Population 500 to 600. A large number of boats ply from here to Penang, and a regular steam launch service is also kept up, this being the principal point of communication with George-town. The inhabitants are boatmen, fishermen, Chinese and Kling shopkeepers, with clerks and interpreters attached to the Government offices.

Bahra = 3 piculs.—A Malacca weight, not given in the tables of Malay weights ordinarily published.

Bajang or Pelisit.—A malicious spirit or goblin which takes possession of people, causing sickness, and can only be driven out by exorcists.

Bajau.—V. in Tengah district, W. Singapore. A Government rest-house $\frac{1}{4}$ mile N.W.

Baju Rantei.—See Mail Armour.

Balachong.—This is the name of a condiment made of prawns, sardines, and other small fish, pounded and pickled. The proper Malay word is bâlachan. This article is of universal use as a condiment, and one of the largest articles of native consumption throughout both the Malay and Philippine Archipelago. It is not confined as a condiment to the Asiatic islanders, but is also largely used by the Burmese, the Siamese, and Cochin-Chinese. It is, indeed, in a great measure,

essentially the same article known to the Greeks and Romans under the name of garum, the produce of a Mediterranean fish.*

Balang Balang.—A weathercock, which see.

Balei Panjang.—V. and Kampong 2½ miles from Malacca-town on the road to Payah Rumput.

Bali Munkur.—A V. between Bukit Perling and Bukit Tabo in Naning.

Balik Pulau.—District and V. in S.W.C. Penang, the former having been recently placed under charge of a Magistrate, who has jurisdiction over the adjoining districts. It is reached by a somewhat difficult road from Penang-town, unsuitable for carriages.

Bambei.—V. on N. bank of Langat R., S.W. Selangor, near Langat.

Bamboo.—See Buluh.

Banana.—See PISANG and FRUITS.

Banana Fibre.—See FIBRES.

Banda Bharu.—The seat of the Residency in Perak.

Bandahara.—The title of the chief officer of State in the native territories. He has control over all matters connected with the sea, and in concurrence with the Témunggong instals a newly-elected Sultan.

Bandar Kanching.—V. in Selangor on N. bank R. of same name about 5 miles E. of Selangor R.

Bander or Bandar.—A town or large V., used in the names of places.

Bander Rawang.—V. on an E. aff. of the Selangor R., about 6 miles S.E. of the main stream, E. Selangor.

Bandong.—V. in S.E. Selangor about 4 miles N. by E. of Kwala Lumpor, lat. 3° 16′ N., long. 101° 55′ E. Hot springs exist immediately to the N.

Bangbun.—A species of Ichneumon (probably Herpestes griseus) which has a peculiar antipathy to serpents and never fails to engage and overcome one when it has the opportunity, escaping bites by its wonderful agility. It is also a splendid ratter, is easily tamed and becomes much attached to man. It is very fond of crocodiles' eggs. In colour it is brown grizzled with grey: length about 3 feet 3 inches, of which the tail is about 1 foot 6 inches. It secretes a scent like the civet, but of no commercial value. Its claws are partially retractile.*

Bangsal Tengah.—A small V. N. of Jelutong, S. Malacca.

Banian Tree.—Too well known to need description. But many may be unaware that its juice is regarded by the natives as a beneficial astringent application for sore eyes.

Barni.—See Pulo Senang.

Barok.—A tinder extracted from the *runut* tree: also used to make the base of a sumpitan arrow air-tight in the blow-pipe.

Barote.—The word applied to wooden roofing materials such as we call "shingles."

Basik.—A pepper known also as Sirih Utan, credited with medicinal properties.

Basisi.—The name applied to one of the aboriginal tribes of the Peninsula-There seems to be no specific difference between them and the Sakais, q. v.

Baskets (Bakul or Kranjang).—Are made of various materials, chiefly split bamboo, bertam, rotan kumba, langkap, &c. No particular taste is shown in their design.

Batah Babit.—V. on C. bank of Perak R., about 5 miles by river below Durian Sabatang in S.W. Perak.

Batam.—One of the largest of the many islands at the eastern end of the Straits of Malacca, and which seem almost to block up the channel between Sumatra and the Peninsula. It lies opposite to Singapore, and, with the larger island of Bintang, forms the southern side of the Straits of Singapore, the common route to and from the China and Java Sea. Batam is the Portuguese orthography of Batang, a word meaning "trunk," or "main part." The island is computed to have an area of 128 square geographical miles, and its geological formation is like that of the neighbouring countries—plutonic and sedimentary. The land is poor and little cultivated. The ruling inhabitants are Malays, but it has also a rude tribe unconverted to Mahommedanism, called Sabimba. It belongs to the prince of Johor, under the usual superiority of the Dutch. [Included here as being sighted by all vessels making Singapore Roads.]*

Batang Bijamei.—V. on E. bank of Selangor R. just above its turn N. some 25 miles from the coast.

Batang Malacca Ilir.—V. in N. border of Jus forest reserve, N. Malacca. Batang Padang.—V. at head of river of same name in S.E. Perak. Abandoned tin mines exist in the neighbourhood, and traces of gold are also found. It was formerly settled by numerous Chinese, but has declined in importance since tin mining ceased.

Batang Tiga.—Sub-district of Tangga Batu, and immediately E. of Tanjong Kling, Malacca.

Batin.—The title of the chiefs amongst the aboriginal tribes of the Peninsula, B. Onastia being the highest in rank. For full details, see Vol. I, J. I. A., pp. 273—4.

Bats.—Several species of bats are found in the Peninsula and Settlements, those attracting most attention being the frugiverous "flying foxes," q. v. An exhaustive monograph on the Asiatic Chiroptera has been published by Dr. Dobson (Taylor & Francis, London, 1876), but the details would be too long and, to the majority of readers, uninteresting, to republish in full. Three or four species are ordinarily met with within the districts treated of in this work, but they present little attraction except to naturalists, being neither venomous like snakes, nor man-eaters like tigers. Practically speaking they do not, in any way, affect the social life of residents in this part of the world. The "flying fox" is eaten by certain tribes in the Malayan Archipelago, but is not an article of diet in the Peninsula.

Battledore and Shuttlecock.—A wicker ball (raga) is played with as a shuttlecock, being struck with the heel in place of a battledore. Considerable dexterity is shown by the players.

Batu in Malay, and Watu in Javanese (a stone or a rock), is a word frequently found throughout the Archipelago in the names of places, as Batu-gade, "pawn" or "pledge rock;" Batu-titi, "bridge rocks;" Batu-bara, "live coal rock;" and Batu-mandi, "bathing rock." To complete the sense the words pulo, is to tanah, land, must generally be prefixed.

Batu Berendam.—District and V. immediately N. of Malacca-town, the latter distant from the coast about $\frac{3}{4}$ mile. Two good roads lead to the V., one starting on either side of Malacca R. A Police station is situated at their junction.

Batu Feringga.—District in N. Penang. V. of same name on N. shore.

Batu Gajah.—Jungle V. 2 miles E. of Merlimau, S.E. Malacca.

Batu Gajah.—A small V. in the Tabong district, N. Malacca.

Batu Gajah.—V. on W. bank of the Kinta R., a mile below the Raya R. joining it, C. Perak. This is the head-quarters of the Kinta district, the seat of the principal magistracy and of the Sikh Police force of the district. It is rapidly

extending, and the advent of the projected railway to Telok Anson will increase its importance. The European bungalows and public buildings stand upon high ground, a good road leading down to the river. It is in telephonic communication with the principal outlying stations and in direct telegraphic communication with Penang. Railway communication with Ipoh was completed in November, 1893.

Batu Itam.—Hill (2,278 feet) on W. side of central chain of hills, C. Penang.

Batu Kawan, Island of (16 miles 2 furlongs S. from Butterworth, Province Wellesley) comprises the estate so named and a smaller holding under native management, and is formed by an arm of the sea separating it from Bukit Tambun. The former employs 6 Eurasians, 6 Europeans, 500 Chinese, and 1,100 Klings, with their families, and has 1,000 acres under cultivation, giving an average annual outturn of 1,500 tons of sugar. Like all under similar management, it has a well-provided hospital, school, &c., while the machinery of the mill is of the most modern and improved pattern. It is reached by ferry from Bukit Tambun. The hill is about 300 feet high. Batu Kawan was a sugar-producing district some 60 years ago, or 20 years before the culture was commenced by Europeans. Like many of the most successful plantations, its soil consists mainly of reclaimed mangrove swamp, which is peculiarly suitable to sugar-cane. A good road has been made from the ferry, turning off at right angles, to reach the works. From the turn-off the main road continues for nearly a mile to the Batu Kawan Village, which is situated on a creek running into the sea to the south of the rocky point of Batu Musang, opposite Pulo Kra. There is a small Police station here, and in the neighbourhood is a chapel belonging to the Chinese Roman Catholics. The village is 17 miles 1 furlong from Butterworth.

Batu Kikir.—V. on E. bank of the Kinta R. just below the junction of the R. Raya, C. Perak.

Batu Kurau.—V. at N. source of river of same name in the Perak range, N. Perak.

Batu Lahar.-V. on the Nyalas district, N. Malacca.

Batu Lanchang.—V. 3 mile S.E. of Ayer Itam V., N. Penang.

Batu Mau.-V. in S.E. Penang, N. of Teluk Tempoyak.

Batu Pahat.—V. and district on S. side of road of same name, W. Johore. Numerous plantations exist here worked by Chinese.

Batu Pahat.—R. and settlement in Johore. Many Chinese planters reside here. It lies about 55 miles from Singapore, half way between that Settlement and Malacca.

Batu Pekarat (a.)—A small V. and hill, in the latter of which the S. source of the Sungei Batang Malacca takes its rise. The V. is on the W. edge of the Jus forest reserve, N. Malacca.

Batu Pekarat (b.)—A small V. in the Tanjong Remau district, N. Malacca.

Batu Sawa.-V. on E. bank of Johore R., 3 miles above Johore Lama.

Batu Sembilen.-V. in S.E. Penang, E. of R. Bayan Lepas.

Batu Uban.-District and V. on E. coast of Penang just below Glugor.

Batu Undan.—Hill (866 feet) between W. bank of Dinding Road and the sea, S. Dinding.

Bau (see Raga).—Game of. The wicker-work ball of the Malays is called raga, but the Portugese word bola has been adopted.

Bayan Lepas.—R. and district on S.E. corner of Penang Island. So called, according to Malay tradition, from the celebrated sea rover RAGAM having here released a tame bird called Bayan—also a V. of same name about 1 mile from S. coast of Penang.

Bear.—See Bruang.

Bêche de Mer.—See Tripang.

Bed.—The Malay bed-place (*katil* or *tempat tidor*) consists of tressel-supported planks only. Over these is laid a mat. But little covering is required, the temperature being always of summer heat.

Bedoh and Upper Bedoh.—District in extreme S.E. of Singapore, chiefly occupied by cocoa-nut plantations, with vegetable and fruit gardens. Some of the views from the high road hereabouts are pretty, owing to the inequalities of the ground. V. of same name on the beach about 1 mile E. of Tanah Merah Kechil Jetty.

Bees.—Wild bees are found in numerous localities, but no attempt has ever been made to domesticate them, though honey is much appreciated by the Malays. A very large species, incorrectly called the "carpenter beetle," bores deep cylindrical holes in woodwork, and is a considerable nuisance to house-owners. A few natives devote their time to honey collecting, and work with immense sang froid amidst clouds of angry bees, often at the height of 50 or 60 feet from the ground, cutting away the comb and lowering it by a cord to those in waiting below.

Beetles (See Entomology).—A mere catalogue of the names of the countless varieties found in the Peninsula and Settlements would occupy many pages. See Wallace's Malay Archipelago and the Catalogues of the British Museum Collections. The Malay term is kumbang.

Bekua.—V. at the foot of a hill about 4 miles S.W. by W. of Mt. Ophir in Muar.

Bell (loching or ginta).—From foreign countries only, but now familiar to most Malays.

Benista.—V. on W. bank of Patani R., N.C. Patani, just above the Pala Galena mines.

Bentree Oil.—See Oils.

Benua, or more correctly Bânuwa, is a Malay word signifying "a land," "country," or "region," that has had a wide extension, although with some modifications of sense, for in the Philippine tongues it means "a village," and in the Polynesian, "land" or "earth." The Malays, prefixing to it the word Orang, "men or people," use the compound as a generic term for all the wild tribes of the Peninsula speaking the same language as themselves, and of the same race, but who have not adopted the Mahommedan religion. The literal meaning of the phrase is "men of the land"; and it may be fairly translated in the sense in which the Malays use it—"aborigines." Such people are found from the extremity of the Peninsula up to 5° of latitude, but apparently not further north. They also exist in some of the larger islands of the Archipelago at the eastern extremity of the Straits of Malacca. Everywhere they are brown-complexioned and lank-haired, are of the same stature as the Malays, have the same features, and speak the same language; in short, are Malays in a lower state of civilization than the people known to us under that name.

Some of the Orang-banuwa dwell on the sea coast, and some in the interior, always in small independent tribes. The principal settlements are in the interior of Johore and southern portion of Pahang. Udai, Pago, Mintira, Besisi, Jakun and Sakai are all names by which they are known to the Malays, but they are more generally named from the rivers on or near which they have their residence, as Sletar, Mintira, Sabimba, and Bâsisi. The Orang-laut, "men of the sea," or seagipsies, as they have been very appropriately called, evidently belong to the same class, although some of them have embraced Mahommedanism, or passed through the form of having done so. The state of advancement of the different tribes varies, some being far more civilized than others. Some of those of the interior

practise a rude husbandry, grow rice by burning the forest for a dressing, and dibbling in the seed, cultivate some farinaceous roots, some fruits, as the banana and durian, and have fixed habitations. The only domesticated animals known to them are the dog, the cat, and common fowl. The Orang-banuwa of the interior receive their iron and clothing from the Malays, in exchange for the spontaneous products of the forest, including of late years the well-known gutta-percha. "At the time of my visit," says Mr. Logan, speaking of a tribe of Johore, "nearly every man in the country was searching for teban," that is, for the tree that produces the best of this article. In personal appearance the Johore Bânuwa bear a strong resemblance to the Malays, but can be easily distinguished from them. The head of the Banuva is somewhat smaller, the eye soft and liquid, and the general expression of the face denotes good nature and content with but slight mental energy. The hair is black and sometimes frizzled, but dry and tangled, as oil is seldom used on it. The men dress much like the Malays, but the women in general only a short sarong reaching to the knees. The ears are always pierced, and with some tribes form handy receptacles for rokok (cigars) or a piece of cloth, but earrings are worn when procurable. Amongst the very rudest a chawat or loin cloth brought up between the legs, and consisting only of terap bark, is worn by the men, and a similar piece hanging down by the women.

Much of the time of the wild races of the interior is spent in hunting and fishing. The chief object of the first is the wild hog, which abounds; and next to it various species of deer. Both are pursued with dogs and spears, but fire-arms are unknown. Ingeniously constructed traps and pit-falls are also had recourse to. The modes of taking fish, which are plentiful, are not less ingenious. In their manners the *Orang-banuwa* are superstitious, but have no mischievous customs or sanguinary usages. Generally, they are in the same state of society as the Dayaks of Borneo, but without the head-hunting, skull-hoarding habits of the latter.

From the first appearance of Europeans in the Peninsula, the existence of this wild people has been known, but they were never well and truly described until visited by Mr. Logan in 1847 and subsequent years. Barros, in his second Decade, mentions them in the following terms, as the precursors of the Malays who founded Malacca: "The habitation of the Cellates is more on the sea than on the land. On the sea, their children are born and reared without their making any settlement on the land. However, as they were hated by the people of Singapore and of the neighbouring islands, they did not return to these parts, but they came and fixed their location on the banks of a river where now stands the city of Malacca. The first settlement which they made was on a hill above the fortress, which we now hold, where they found some people of the land, half-savages in their manner of living, whose language was the proper Malay, understood by all the people, and with which, also, the Cellates were acquainted. At first there was alienation between the two tribes on account of difference in the mode of life. But through the women an accommodation was effected, and they agreed to live in one settlement, each party following that mode of life to which it had been accustomed, the one subsisting on the produce of the sea, and the other on the fruits of the earth."

The half-savages of Barros are evidently the Orang-bānuwa, and his Cellates, the sea-gipsies, the word being an obvious corruption of the Malay sālat, a strait or narrow sea, which with orang prefixed, and making "men or people of the straits," is still applied to the inhabitants of the innumerable islands which nearly choke up the eastern entrance of the Straits of Malacca. Whether the Orang-bānuwa be the aboriginal of the Peninsula, and the people from which the wide-spread Malayan nation is sprung, or settlers from another country, is a question which naturally arises. The whole Peninsula is called by the Malays themselves Tanah Malayu, or the country of the Malays, in the same way in which they call Java, Tanah Jawa, and Celebes, Tanah Bugis, the land of the Javanese, and the land of the Bugis;

and this would seem to imply that they consider it their original mother country. But this may arise from the country having, except a few scattered mountain negroes, no other inhabitants than Malays, and is, therefore, not conclusive. Had the wild people of the Peninsula been really its aboriginal inhabitants, they would most probably, like the tribes of Borneo, Sumatra, and Celebes, be found speaking many languages instead of one. As far as Malayan emigration is authentically known, it has always been, not from, but to the Peninsula. Thus, their arrival in a comparatively civilized state, with a regular form of government, and with a knowledge of letters, in the twelfth century, is stated to have been from Sumatra, and they are, in fact, at the present day, migrating from the same country and settling in the Peninsula. It is true, however, that even in the twelfth and thirteenth centuries the civilized Malays found the sea-gipsies and rude people of the interior before them in the Peninsula, so that this leaves the question of the parent country of the Malay nation still doubtful. All that can safely be asserted, then, is that Malay civilization did not originate in the Peninsula, but most likely in Sumatra. The probability is that the Malays were originally fishermen, occupying the mouths and banks of the great rivers of the eastern side of Sumatra, such as those of Palembang, Jambi, Indragiri, and Siak. Ascending these, after intermixing, as they are known to have done, with the more civilized inhabitants of Java, and reaching the rich volcanic table-lands in the valleys of the interior, they would naturally become a fixed agricultural population, and acquire that civilization and power which under the name of Menangkabau they are known to have attained. To this inland country, communicating by its rivers with the sea, both on the eastern and western sides of Sumatra, all the civilized Malay States, whether of the Peninsula or Borneo, trace their origin. From the wandering Malay fishermen, who did not partake of the civilization of the interior, might naturally proceed the Orang-laut, or gipsies, and occasional stragglers from these may have given rise to the Orang-banuwa, or rude tribes of the interior.* It is noteworthy that the Benua have a tradition of the deluge. A very full and interesting account of the Benua of Johore will be found at pp. 246 et seq. Vol. I, J. I. A., and pp. 238 et seq. Vol. II.

Bera or Brah.—A lake and river in the S. of Pahang flowing into the R. Pahang. The former is known as *Tassek Bera*, and is about 25 miles in circumference.—J. I. A., VI, 372 (where 50 miles is given).

Bera Kampong.—A settlement on the R. of that name, Pahang.

Berallah China.—A large mass of granite, 50 to 60 feet in height, and resembling a misshapen idol, at the entrance of the harbour between P. Ayer and P. Dayang, off the E. coast of Johore.

Beranang.—V. on S. bank Langat R. in S.E. Selangor.

Berhala.—V. to N. of S. entrance of Kelantan R.

Beri-beri.—A disease of obscure origin, but the same as the Kakke of Japan. The symptoms include a peculiar swelling of the limbs. The following extracts from the reports of the medical officers in the Straits give interesting particulars. Dr. Mugliston writes: "The history of every case of beri-beri in hospital has been taken with care with the following results:—The diet in most instances has been inferior in quality, and has consisted of—(a) rice, which may or may not have been of good quality; (b) salt fish, sometimes good and sometimes not; (c) fresh fish or meat very seldom; (d) salted vegetables, and occasionally fresh ones. In all cases there has been a total absence of fruit in the diet. The patients have come from all districts, malarious or not; for instance, Tanjong Pagar, Beach Road, Rochor, Tanglin, Sirangun, or Johore. Malaria, by these observations, cannot have much to do with causation of the disease. The disease has not attacked all the members of a batch of coolies living apparently under the same conditions, and on inquiry it has been found that those attacked have not eaten fruit, while other members of the batch have done so. Those enjoying a better

diet, although eating no fresh fruit, have not been attacked so soon as those who have squandered their money in gambling or opium-smoking, and who have so obtained less food. By far the majority of patients have been Chinese, who eat, in their usual diet, less nitrogenous food and fruit than do other natives, although otherwise living under precisely the same conditions. The Klings and Malays who have been treated here all stated that fruit had not been eaten by them for months. Beri-beri frequently occurs at sea amongst natives, in ships that have not obtained fresh fruit and diet for a lengthened period. I have thus been almost forced to believe in the scorbutic origin of the disease, but this belief is open to correction, as my observations have not been sufficiently prolonged. . . . These observations are quite at variance with those of Doctors Cornellissen and Sugenoya, who have recently been investigating the disease in Acheen. They conclude (vide British Medical Journal of December 5th, 1886) that:—'1. It is a contagious disease. 2. Beriberi patients infect certain localities, and persons in good health, coming from districts free from beri-beri, and settling in those infected districts, contract the disease. 3. That wooden structures retain the infectious product more than brick buildings. 4. That contagion through the means of wearing apparel had been observed.' The wards of the Hospital under my charge are of wood. The beriberi patients occupy these wards with non-beri-beri cases. The wearing apparel is not kept separate, and still not a case has occurred that could in any way be traced to fomites.'

Black beans have been introduced as a portion of the diet during the last few years, and, containing as they do a great deal more nitrogen than the equivalent amount of rice, have had probably something to do with the better general health

prevailing.

Berkuning.—V. on E. bank of Perak R. in S.E. Kedah, 3 miles S. of Padang Semei.

Bernam.—A river in extreme S.E. Perak.

Bersumpul.—A gathering of Sakais for music and dancing.

Bertam (Engeissonia triste).—The name of certain jungle plants with long straight stems having a pithy interior. The stems are split and flattened and dried, and are then used to weave a sort of basket work much used for the walls of native houses, &c. By dyeing the stems various colours, but chiefly black or red, very tasteful patterns are produced. Dinding bertam is the correct term for this plaited work, but it is conventionally termed "Bertam" only. In addition to the pokok bertam (which does not produce an edible fruit), three other plants are used for the same purpose, viz. P. kumbar, P. klubi, and P. sala, all of which furnish edible fruit. Bertam is woven in squares as large as 20×20 feet. It makes a pretty dado in foreign houses.

Besut.-V. near m. of R. Endau, N. Johore.

Betel-nut.—The fruit of the Areca Palm, a tall, graceful tree, sometimes reaching a height of 60 feet. The nuts are surrounded by a yellow tough fibre enclosed in a thickish green rind. To prepare them for use the entire fruit is split and the halves dried in the sun. When dry the nut is separated from its envelope and is sold for chewing with sirih leaf and lime. Its use communicates a blood-red colour to the lips and gums and the same hue to the saliva, which the natives eject without much regard for time or place, unless checked by regulation. Foreigners are generally puzzled to account for Malay devotion to what appears to novices a tasteless object. Value (roughly) \$1 per tree.

Betel Vine or Sirih (Chavica Betel).—Generally denominated a pepper. A leaf used to chew with betel-nut and lime. The following remarks from a recent issue of The Straits Times are worth preservation in a more permanent form:—"With the natives chewing sirih is not only serviceable to pass the time, but has certainly proved conducive to health. In this part of the world these facts

have been known for centuries, but no advantage, till recently, has been taken of its healing virtues in the interest of Western medical science. In Europe, they have so far escaped notice that hardly anything relating to the betel leaf is met with in pharmaceutical text-books. At Sourabaya, experiments and trials have resulted in the discovery of a method to separate from the betel leaf the volatile oil to which the plant owes its healing qualities. It seems that the reasons why, in Europe, hitherto, no use has been made of betel leaves for curative purposes reside chiefly in the fact that the leaves are soon liable to become damaged, and in drying altogether lose their aromatic, spicy, and stimulating odour. In this part of the world, so far as observation goes, betel leaf is used medically for sundry ends. has been outwardly and inwardly applied with some measure of success in different disorders. In headache, cough, and affections of the throat, sores and wounds, it has been found highly efficacious. In Europe, the same remedy may be turned to account by making use of the betel oil now available. Already in Germany highly satisfactory results have been achieved by prescribing it against these diseases. It has been found beneficial even against consumption. This outcome certainly affords gratification, from its increasing the resources of civilization in the medical line, and alleviating the suffering arising from the diseases it cures."

Betong.—V. on E. side of Gunong Titi Wangsa, Kedah.

Betong Kusa.—The S. pt. of Changi district, extreme E. Singapore.

Betrothal.—The Malays are as desirous of making good matches for their children as their more civilized brethren, and when they perceive a suitable person, that is, one possessing money or landed property, or who has the right of inheriting any, they solicit the hand of the favoured one for their child, and the affair is arranged by the parents to their mutual satisfaction. Children are thus affianced at a very tender age. The parents go before a priest, and in the presence of two witnesses or more the children are betrothed, and the marriage is consummated

when they arrive at maturer years.

If the girl is old enough to decide for herself, she is questioned, and if her views coincide with her father's, the latter goes to a Kali (or priest) and tells him that his daughter is anxious to engage himself to so-and-so. If the Kali approves of the match the pair appear before him on a certain day, and in the presence of witnesses the Kali says to the young man, "I have betrothed you to N., the daughter of A., and you must give him so much," and mentions the amount required by the parents of the girl for the marriage expenses, which is of course guided by circumstances. The young man replies, "I am truly affianced to N., and will pay the required amount." The Kali then asks the witnesses if they heard the man, and if they reply in the affirmative, it suffices; but if, on the contrary, they declare his reply inaudible, the whole ceremony is repeated.

Should the girl's father be alive and residing within a convenient distance,

it is indispensably necessary that he should be present at the ceremony.

After the betrothal, should it be discovered that the father was near and not present, it would be the duty of the *Kali* to insist on the ceremony being repeated in the father's presence.

If the father be more than a two days' journey distant, or if it is an unsafe road, it is not necessary for him to to be present, but the next of kin appears; and if there is none, then a friend or Wali attends and performs the father's part.

In cases where betrothal has taken place in youth, when the girl is old enough to live with her husband the second ceremony, or Nika, is performed. The husband elect is carried in procession on a platform, or artificial car, which is borne on the shoulders of men to the house of the bride. On reaching the door the latter is brought out and placed on the stage near her affianced and carried in procession back to the latter's residence. The procession is made up of musicians, flag-bearers, the relatives of both parties, and as many of the inhabitants of the same com-

pany as feel inclined to join, some on foot, others on horseback. Fire-arms and crackers are discharged as they proceed, and mirth and laughter are the order of the day.

The husband's parents provide the feast, which is partaken of on returning

from the girl's house. See MARRIAGE.

Bezoar Stone (guliga).—The concretion found in the stomachs of cattle.

Bhang.—An intoxicating liquor prepared from hemp. An overdose is said to be cured by chewing betel-nut.

Bhar.—A measure of weight. About $3\frac{1}{2}$ cwt.

Bharu.—New. A name frequently given to villages, &c. There is a Kampong Bharu in Singapore, and also in Jumpol near the R. Serêting.

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—In twelve volumes—Printed at the "Mission Press," Singapore, 1847–1862. This is a valuable series of Journals, ably edited by Mr. J. R. Logan, who is generally held to be the highest authority on all the subjects upon which he personally wrote in this Journal. Both from his pen and other contributors a good deal of information is to be obtained, particularly in Vols. I to III, respecting the physical geography of the Peninsula, as well as upon many other subjects of a scientific character. Most of the volumes in which the Journal was annually bound contain an Index.—Vol. I a very good one. A complete Index for the whole series is subjoined:-

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SHAIR BÂRÂO BÂRÂO.—The Mocking Bird Bârâo Bârâo, being exhortations

and precepts to King Solomon.

SHAIR BIDASÂRI.—The beautiful Bidasâri is discovered in a boat. The King is captivated by her attractiveness; the Queen, jealous of this, ill-treats her and sends her home in an insensible state. By recourse to supernatural means she is resuscitated during the night and thrown back into her former state during the day. The Queen believes her no longer a dangerous rival. Bedasâri in time recovers and marries the King despite the opposition of his consort.

SHAIR BUNGA.—Flowers—a poem.

SHAIR BURONG PINGEI.—An allegorical poem regarding the soul.

SHAIR CHINTA BERAHI.—Love poems.

SHAIR DAGANG.—The Stranger—a poem.

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— Hangling darmo, bevattende de regering, wonderlyke lotgevallen en krygsbedryven van den vorst Hangling darmo te Metowo Pati, tot de verheffing van zynen kleinzoon bambang gondo koesoemo tot vorst vangenoemd ryk Malawo Pati—Batavia, 1853.

—— Romo, een Javaansch gedicht, naar de bewerking van Joso Dhipoero, uitgegeven door F. Winter—Batavia, 1847.

Bidadari.—A celestial nymph. The name of a house and extensive grounds in E. Singapore owned by H.H. the Sultan of Johore.

Bidor.—V. at head of R. and foot of Mts. of same name. Some 35 years ago it had a population of about 3,000 Chinese engaged in mining, but this being abandoned, it has lost all importance.

Biduanda Kallang.—Originally the aboriginal inhabitants of Kallang in Singapore, who, upon its cession to the British, were removed by the Tumungong to the banks of the R. Pulai in S. Johore. They then numbered 100 families, but in 1847 their number was reduced to eight, and as a tribe they are now extinct. An account of them is given at pp. 299 et seq., Vol. I., J. I. A.

Bilis.—V. in the Chaban district, extreme E. of Malacca.

Billal.—The assistant priest in a mosque, who calls the people to prayers. He ranks below the Khalib or preacher, who is again below the Imam.

Binjei.—V. in the Padang Sebang district, N. Malacca.

Binturong.—One of the Ichneumon family, a native of Malacca. It has a coarse dead black fur, with the exception of the head, which is grey. The tail is thick and heavy, longer than the body and prehensile. It sleeps during the day

and is sullen in manner. It feeds on eggs, birds, rice, fruit, and vegetables. Length about 2 feet 6 inches exclusive of the tail, which is somewhat longer. In height it is from 12 to 15 inches.

Binua (Orang).—See Benua.

Bird of Paradise.—Probably the most beautiful of the feathered tribe, the burong dewata, burong supan, or sepah pûtri of the Malays. It is occasionally brought both alive and dead to Singapore by the Bugis traders, its home being in the Aru and other southern islands of the Archipelago and New Guinea. The legs of the first skins procured having been removed by the natives who killed the birds, gave rise to the idea that they were legless. Wallace's "Malay Archipelago" gives full particulars of the various species known, 18 in all, of which 11 inhabit New Guinea.

Birdlime.—The juices of gutta or india rubber trees are used for the same purpose as birdlime at home.

Birds.—See Ornithology.

Birds' Nests (edible).—The esculent nests of the Hirundo esculenta, a small dark coloured swallow with a greenish hue on the back, a bluish one on the breast, and no white mark. The nest consists of a marine fucus (seaweed) elaborated by the bird, and the Japanese are said to have discovered a means of preparing the seaweed by hand so as to exactly imitate the consistency of the nest. The nests are found throughout the Archipelago, and appear in the Straits Settlements as articles of trade. They make an excellent but somewhat tasteless soup. Java and Borneo are the chief producing centres.

Birth, Customs connected with.—Mr. J. D. Vaughan's excellent remarks on this subject in Vol. XI. of the J. I. A. render original compilation unnecessary. He says:—"The young Malay is ushered into the world, attended by those dangers that are to be found in the train of ignorance. Several months before parturition great exertions are made by the expectant parents to collect fuel, which is an indispensable part of the lying-in apparatus, together with some medicines in the shape of oils and herbs of various descriptions.

The crones that act as nurses are, as may be supposed, perfectly ignorant of the art of midwifery, and quite incapable of rendering any assistance in the event of danger. In most cases nature accomplishes the work unaided, but if any difficulty occurs, the mother or child must fall a victim to their stupidity. During labour a fire is kindled with the fuel so assiduously collected, to which the woman's person is exposed, and sometimes so closely that the heat causes a violent irritation

of the nerves, which quite unfits her for the requisite exertion.

On one occasion, a poor woman was brought to the point of death by the ignorance of the midwife, and would have died if she had not been rescued by the kind interposition of the Civil Assistant Surgeon; the excessive excitement caused by the heat was so overpowering that aberration of mind ensued, which continued for several months. When the child is born it is cleansed and swaddled from shoulder to heel, and kept so sometimes for three months. This bandage, it is believed, keeps the child well-formed, by preventing it from starting suddenly and thereby distorting its limbs.

After childbirth the mother is exposed to a roaring fire, once in every twelve hours, for an hour or more at a time. This is continued forty days, and in addition heated bricks and sand are sometimes applied to the stomach. To this barbarous practice may be attributed the emaciated and shrivelled look that all Malay women assume after bearing a few children. During the lying-in, an Imam, or priest, reads portions of the Koran in an adjoining chamber to the inmates and visitors; this is not a general custom, but is adopted only by those that are well to do

When the child is seven days old a feast is held, and in the presence of the

guests the child's head is shaved and his name announced by the Katib, or assistant priest. On the fortieth day after birth a second feast is given, and the child may be named on that day if more convenient; the wealthy generally name the child when seven days old, but the poor are often obliged to postpone the ceremony to the fortieth day, so as to get the necessary funds for the feast. On the seventh day, when the head is shaved, a tuft of hair is left on the crown to denote that the child is still unclean; this tuft is taken off on the fortieth day, and the child is considered purified, the mother bathes, and is exposed no more to fire after that day.

Babes are suckled till they are twelve or fourteen months old, and are then fed by the mother on all she eats herself. During the progress of dentition no particular care is taken of children, and no relief is afforded them when suffering. Such a recourse as cutting the gums to free the teeth is unknown. The consequence

is that about fifty per cent. die at an early age.

On noticing delicate children who were evidently suffering with their teeth, and inquiring if any remedies were afforded them, the parents have evinced the greatest unconcern on the subject. They replied that children never ail while teething, that they get their teeth easily, and that no care is required; they admit that a great number die young, but it is difficult to persuade them that teething is the cause of their illness. The writer has made inquiries and learnt that fully

half the offspring of each family perish from neglect.

When a child is too young to crawl, it is usually put in a basket, which is suspended from the rafters of the house, the mother swings it to and fro by means of a string tied thereto, or if employed, and there are other children in the house, the latter are made to do it in turns. Sometimes the mother carries her babe slung over the shoulder in a hammock or bag, when she is employed out of doors or engaged in household duties; by so doing her arms are free. A child is occasionally carried on the hip, with a leg on each side of the body; this is an Eastern custom, but it is not so common among the Malays as it is on the Continent of India.

Women are seldom seen caressing their children, but the opposite sex delight in fondling them, and may be constantly observed with their children in their

A good description of Birth Ceremonies in Perak is given in Notes and Queries with No. 16 (1885) of the Journal of the Straits Branch of the Royal Asiatic Society.

Blachang.—See Balachong.

Black Leopard.—The black leopard—Leopardus melas—is called rimau trong kasow by the Malays. It is of glossy blackness, except in particular lights, when its markings, as darker than the general colour, can be seen. It is reputed to be more dangerous than the tiger, although leopards as a rule are less apt to attack man. This is the only species of leopard found in the Peninsula, and its general appearance contradicts Mr. Woon's surmise that it is only a variety of the tiger.

Black Tiger.—A misnomer of the above.

Blair Harbour.—The channel between Tanj. Peniabong and Keban I., N. Johore.

Blakang Mati.—An island about 21 miles long, and in places 300 feet in height, lying off the S.W. face of Singapore, and forming the southern boundary of New Harbour. Various fanciful reasons are given for its name—"Behind Death." One explanation is that the southern, or, as regards Singapore, hinder, face was so unhealthy that the Malays gave it a designation signifying by onomatopæia that death was to be found behind its ridge.

Blanja.—Important V. on E. bank of Perak R., in a line with the Dinding N. frontier.

Blian or Chenaku.—A creature who, under the semblance of human form, conceals its identity as a tiger—the Malay Wehr-wolf, a belief in which is widespread in the Peninsula.

Blimbing.—A district about 9 miles N. of Malacca town, of which Krubong is the principal V. Tapioca is largely grown in the neighbourhood.

Bliong.—An axe or adze so constructed that it can be used as either at pleasure. Malay carpenters are very clever with it, and turn out work which compares favourably with that of Chinese.

Blowpipe.—See SUMPITAN.

Blukar Trusan .- V. on W. bank of R. Madek, E. Johore.

Boar, Wild.—Fierce specimens of the wild boar are to be found both in the Settlements and Peninsula, and "shooting pig" is a favourite amusement, especially in Province Wellesley.

Boats (prau or sampan, Ch.). Dug-outs are termed sågor or jalor, house-boats ketiap, while the small fishing canoe is called kôlek. The Malays are expert boat-builders, and their models are superior to those of most Western nations.

Boran Darat.—Reef of Rocks off E. face of Blakang Mati I., S. Singapore. Borolak Keping.—The N.E. point of Blakang Mati I., S. of Singapore.

Botany.—The botany of the Malay Peninsula has never been exhaustively dealt with, but scattered notices abound in most works dealing with Eastern fauna. Amongst other papers may be noted those in the J. I. A., Vol. I., pp. 7 et seq., and in Essays relating to Indo-China, Vol. II., p. 257. Mr. N. Cantley, however, had a work on the subject in preparation previous to his decease. He kindly furnished much of the information herein given under Fruit, Ferns, &c., &c.

Catalogues of the plants in the Botanical Gardens at Singapore have been issued from time to time, and much information may be gained from the Reports of the Forest Department published annually by the Government. Woods and fruits will be found noticed herein in their alphabetical places, as also plants connected with trade.

Bow and Arrows .- See ARMS.

Boya or Buaya.—Crocodile, q. v.

Boyah.—A place N. of Sengang on the Perak R.

Brapit.-V. about 7 miles W. of Kota Lama, C. Perak.

Bread Fruit (Artocarpus incisa).—Two varieties, of which one only is edible, exist in the Peninsula, and even that is held in little esteem. It resembles the celebrated product of the South Sea Island, and requires cooking to become palatable.

Breeding Pearls. - See Pearls.

Bribor .- V. on E. bank of Kinta R., 4 miles N. of Kinta, C. Perak.

Bricks (bata), are of European introduction only.

Bride and Bridegroom. - See MARRIAGE.

Brimbang Panjang.—V. on W. side of the embouchure of Perak R. in S.W. Perak.

Brimbun.—A hill about 3,300 feet high on the W. border of Ulu Muar (Negri Sembilan), forming part of the dividing range between Selangor and that State.

Bringin.—V. and District in C Malacca, Rumbia being the nearest place of importance to the former, which lies about 11 miles N. of Malacca-town.

Briso.—Settlement and hill about 11 miles S. of Bukit Putus in N. Malacca.

British.—"We ourselves and our country are called by the natives of the Malayan Islands Ingris or Inglis, a corruption, the origin of which is obvious.

The word is an adjective, and for the first, requires to be preceded by a word signifying men or people, and for the second, by one signifying land or country. The English first appeared in the Archipelago in 1602, the last year of the reign of ELIZABETH, six years after the Dutch, and 107 after the Portuguese. The first place visited by us was Achin, under Sir James Lancaster, the same commander having in 1603 visited Bantam. Owing to the great superiority of the Dutch of the seventeenth century in commercial and nautical enterprise, they expelled the Portuguese and Spaniards out of almost all their possessions in the Malay Archipelago, drove ourselves out of the Spice Islands in 1620, and from Bantam Expelled by their influence from Bantam, we and Jaratra, in Java, 1683. established ourselves in the sterile land of Bencoolen in Sumatra in 1685, our sole and humble object being to secure a share in the pepper trade. Bencoolen, with some neighbouring establishments, continued for a hundred years, or up to the foundation of Penang in 1785, to be our sole territorial possessions in the Malay Archipelago; for our other attempts at such acquisitions were ephemeral. In 1819 we founded Singapore, and in 1824 we received by convention Malacca and its territory from the Dutch, giving them Bencoolen and our other possessions in Sumatra in return."* Our present territorial possessions within the localities dealt with in this work are Penang, Province Wellesley, The Dindings, Malacca, and Singapore. The Native States Perak, Selangor, Sungei Ujong, the Negri Sembilan and Pahang are under our protection.

Brooch (*Krusang*).—This article of jewellery is made by the Malays, but is of rough design. Most of those in use are of Hindoo or Chinese workmanship. They are used to fasten the *kabaya* or short jacket at the neck.

Brooms (*Penyapu*).—These are made of the midribs of the cocoa-nut leaf, and are very effective.

Bru.—The name of a tribe inhabiting Pulo Tingi and Sibu off the E. coast of Johore. Described as very ill-favoured and filthy in their habits.

Bru.—The name of a large ape alleged to exist in the jungles on the boundary of Pahang and Kelantan. No zoologist has as yet met with it.

Bruang.—The Malayan sun-bear—the only animal of the bear species in the Peninsula. It is also known as the honey-bear, from its fondness for that sweet. It is black in colour, with the exception of a semi-lunar shaped patch of white on the breast, and a yellowish white patch on the snout and upper jaw. The fir is fine and glossy. Its feet are armed with formidable claws, and its lips and tongue are peculiarly long and flexible, all three organs adapting it to tear open and get at the apertures in old trees where the wild bees usually build. It is naturally a fruit eater, and very easily tamed, especially if caught young. It is frequently exhibited by itinerant native showmen. It is extremely destructive in plantain and cocoa-nut plantations while in a state of nature.

Bruas.—V. on N. bank of Bruas, R., Dinding Territory, about 3 miles from the coast.

Bruas.—Dist. on coast of Larut, Perak, on banks of R. of same name. Said to be the original seat of Government in Perak.

Bruk.—See Monkey.

Buah Paku.—A small palmite, the heart of which is much used as a vegetable by the Malays. Its fruit resembles a pine-apple in external appearance.

Buah Tandok.—A curious nut, shaped like the upper head and horns of a buffalo. It is sometimes called the Water Caltrop, being the root of an aquatic plant.

Buaya or **Boya.**—Crocodile (q. v.).

Bubur.—A mixture of sago, cocoa-nut milk and scrapings, and a coarse

sugar known as gula Malacca. A favourite dish with most European children, and some of their older relatives also, at times. The Malays greatly esteem it.

Buddha.—The name of this Indian deity, either in this its most frequent form, or as Gautama or Sakya, or any other shape, is not found in any of the living languages of Malaya. The nearest approach to it in form is the Sanskrit word Buda, "old or ancient," which is a naturalized one in Javanese. No Buddhist temple, properly so called, exists in British Malaya, but Chinese temples, nominally Buddhistic, are of course frequently met with. The reader curious on such subjects may be referred to Dr. Eitel's "Three Lectures on Buddhism" (Hongkong, China Mail Office, 1873).

Buffalo (more generally called the water-buffalo).—The Bos bubalus of naturalists. (Kerbau in Malay.) The same useful, powerful, ugly, sluggish, and unwieldy animal which exists in all the warm countries of Asia, and which was introduced into Greece, Egypt, and Southern Italy in the middle ages. It is only, however, within ten or twelve degrees of the equator that it is found of great size, strength, and vigour. Compared with that of the Malayan countries, the buffalo of Southern Italy is certainly an inferior animal, and that of Northern India even a puny one. The buffalo is the principal beast of draught and burden throughout Malaya, the ox being chiefly reserved for the tillage of dry upland grounds. The buffalo is larger and more powerful than the ox, but much slower and with less capacity of enduring toil. The flesh of this semi-aquatic animal is coarse, and its milk poor in quality, compared with that of the cow. Its courage is indomitable, and, united to its great strength, makes it an overmatch for the royal tiger. It has a repugnance to strangers, but with its friends is thoroughly docile. I have seen a boy of ten years of age part two enraged bulls with a switch, mount that which was his own by one of its horns, and ride home on it. The domestic buffalo is very scantily covered with hair, the colour of the skin appearing through it. It is either black, flesh-coloured, or white, without any other variety, the black in nine cases out of ten predominating, and being considered, perhaps without much foundation, preferable to the white. Whenever the buffalo is found in the domestic state, it is also found in the wild one; and this makes it exceedingly difficult to determine whether this animal be a native of the Archipelago, or a domesticated stranger. Naturalists, I know not on what ground, have come to the latter conclusion, and the natives of the country seem to entertain the same opinion, for they call all buffaloes found in the forest by an epithet which implies this, and which in Malay is jalang, meaning "stray" or "vagabond." The names given to the animal, however, afford no warranty for this conclusion. With one exception, they are native, and not traceable to any foreign tongue.* The Malay name is Kerbo or Kerbau, and this with very slight variations extends over, at least, ten different languages of the Archipelago and Philippines. It is a penal offence in the Straits Settlements to lead or drive a buffalo without a wooden guard across the horns so as to prevent the animal from ripping. The wound inflicted by an enraged buffalo is fearful. The victim is generally gored in the thigh, the femoral artery being ripped open, and death of course ensues. Four cases of death from this cause occurred in Province Wellesley from January, 1886, to May, 1887.

Buffalo-head Nut.—The root of an aquatic plant resembling a pair of buffalo-horns in shape, and very common in the Peninsula. (See BUAH TANDOK).

Bugis.—The name given by the Malays to the dominant people of Celebes, who call themselves Wugi, of which, no doubt, it is a corruption. As constant visitors to Singapore and occasional settlers in the Peninsula, they demand notice, and we therefore quote Crawfurd's account in full. The native country of the Bugis is the south-western limb of Celebes. The Macassar, or Mangkasara, nation occupying the most southerly part of this peninsula, borders the Bugis to the south, and the Mandar nation to the north. Like the Malays, they are, for the

most part, a maritime people, and it may be suspected that the original seat of their civilization was the shores of the interior lake Labayo, or Tâparang-danao, a collection of navigable water said to be about 25 miles in length, surrounded by fertile land, at present well cultivated and peopled.

The people who speak the Bugis language are, at present, divided into many small states, and seem never to have been united under one government. Several of these little states are united into confederations for general purposes. Each state is under the government of its own prince, elected by the chiefs of the tribe from the members of a family in which the office is hereditary, and women are not excluded from the choice. The princes so elected form a council, which must be unanimous for the decision of all matters of common concern. The confederacy of Boni consists of eight princes, and that of Waju of no fewer than forty.

The Bugis are among the most advanced people of the Archipelago. They have long possessed all the domesticated animals, and cultivated the useful plants known to the civilized inhabitants of the more westerly islands. They understand the working of the useful metals, the rearing of cotton, and the manufacture of cloth from it. They had framed a native calendar, although they had no epoch. The year of the calendar is solar, consisting of 365 days, and divided into 12 months, each with a native name. It commences with the 16th day of May of our time; eight of its months containing 30 days, three of them 31, and one 32. But above all, they possessed the art of writing, having invented an alphabet which expresses with adequate precision the native sounds of their own language, a language that is softer than the Malay, for even its liquids do not coalesce with other consonants, and every word must end either in a vowel, an aspirate, or the soft nasal ng.

The Bugis, to judge by their language, would seem to have been indebted to the Malays and Javanese for a large amount of their civilization. Thus the names of cultivated plants and domesticated animals are, for the most part, taken from the languages of these people; so are the names of the metals, terms connected with the useful arts, navigation, numeration, and even law and religion.

It is remarkable that the Bugis, now the most enterprising of all the native tribes of the Archipelago, are never mentioned by the earlier European writers. Thus Barbosa, who describes the Javanese, the natives of the Coromandel coast, and the Chinese whom he met at Malacca, never alludes to the Bugis, who, had they existed there in his time, could hardly have failed to attract his attention, were it only for the very peculiar build of their vessels. Barros' enumeration of the people trading to Malacca is even more full than that of Barbosa, for he adds to his list the Peguans and the Japanese, but he makes no allusion to the Bugis. The inference is, that this people were unknown as traders in the beginning of the sixteenth century, and that the commercial enterprise by which they are now distinguished is of comparatively recent origin. Even their native country, according to BARROS, was not discovered until 1525, and when that happened, the country, instead of being considered by the Portuguese as one great island, was thought to be an aggregation of many islets, the people of which were thought to be in a very rude state—clothed in the bark of trees, and unacquainted with all the metals except gold.

The first distinct notice we have of the Bugis is derived from native authority, and this assigns the year 1366 to the commencement of the reign of one of their princes. Their early commercial enterprises do not seem to have extended beyond the neighbouring Spice Islands. In the native annals of the state of Malacca, they and the people of Macassar are represented as harassing the trade of Malacca by their piracies in the time of a prince called Munsur Shah, whose reign began in the year 1374. Even the name of the piratical leader, Kraing Samerlak, is given, which proves, however, that he was not of the Bugis, but of the Macassar nation, which had acquired notoriety before it. No traces whatever of the Hindu religion, in the

shape of temples, images, or inscriptions, such as exist in Java and Sumatra, have been discovered in the country of the Bugis, or in any other part of Celebes. Their language, however, shows that the people speaking it had been slightly tinctured with Hinduism, but no more. It contains a considerable number of theological terms, palpably enough Sanskrit, but identical with those contained in the Malay and Javanese, and obviously introduced with other words of these languages.

Of all the more advanced nations of the Archipelago, the Bugis were the latest converts to Mahommedanism. Even the Macassar nation, although in this respect in advance of them, did not adopt it until as late as 1605, or 94 years after the arrival of the Portuguese, and even a few years subsequent to that of the Dutch and English. It was this people, at the time the most potent in Celebes, that by force of arms enforced the Mahommedan religion on the Bugis about the year 1640. It was, most probably, the adoption of the new religion that moved the Bugis, as it did the Arabs, although in a different direction, to action, and which in the sequel has made them what they now are, at once the bravest men and the most enterpris-

ing merchants and navigators of the Archipelago.

The enterprising character of the Bugis belongs more especially to the tribes which go under the common name of Waju. The trade of this people extends, at present, to every country of the Archipelago, from Sumatra to New Guinea. They are, in fact, the carriers of the internal trade, and now what the Malays and Javanow were on the arrival of the Europeans. The exports from the eastern ports of the Archipelage to the western are chiefly composed of cotton fabrics of their own manufacture, of gold-dust, holothurion, esculent roots, tortoise-shell, pearl shells, rice from Java and Bali, and, of late years, tobacco and coffee. From the European emporia they take back, to be distributed far and wide, the produce and manufactures of Europe and India. The Bugis are not only traders, but also settlers in many of the countries with which they carry on trade. The largest number of such settlers are probably on the western, and especially on the eastern coast of Borneo, on the strait which divides this island from their own country. On the large rivers of Pasir and Coti there are supposed to be about 1,600 families of them, in a state nearly independent of the Malay princes. The Waju Bugis have also established themselves in the territories of Mandar and Kaili in their own island, and the Bugis of Boni formed a colony in the little island of Bonirati, between Celebes and Floris. In the European settlement they form considerable communities, living in separate quarters, and preserving their own manners and language. Thus in Singapore, by the census of 1849, they were found to number 2,269.

Altogether, the number of the Bugis' praus, usually known by the name of Padewakan, carrying on foreign trade, is thought not to be short of 800, of the burden of about 50 tons each. In their navigation they use charts and compasses, the former from European originals, with the names in Bugis characters, and the last made for them by the Chinese of Batavia. The account which Mr. Marsden gives of this people as he saw them at Bencoolen, above 80 years ago, is worth quoting. "The Macassar and Bugis people," says he, "who come annually in their praus from Celebes to trade at Sumatra are looked up to by the inhabitants as their superiors in manners. The Malays affect to copy their style of dress, and frequent allusions to the feats and achievements of these people are made in their songs. Their reputation for courage, which certainly surpasses that of all other people in the eastern seas, acquires for them this flattering distinction. They also derive part of the respect paid them from the richness of the cargoes they import, and the spirit with which they spend the produce in gaming, cock-fighting, and opium-smoking."—History of Sumatra, page 209.

A few years ago, a Bugis Chief of Perak married Inchi Maida of that State. The lady is very popular with foreigners, and gave us ready aid when needed during

the disturbances.

Bukho Kang.—District S. of Mandai, N.W. Singapore, 11 to 12 miles from town.

Bukit, in Malay, is "a hill or mountain," and equivalent to Gunung in Javanese. Both words are of very frequent occurrence in the names of places.

Bukit Ampar.—A hill in the Tabu district, N. Malacca.

Bukit Arong.—Hill close to Risang Point, N. Johore.

Bukit Assahan.—Hill on S. side of Bernam R., 3 miles S. of Bernam, Sengor.

Bukit Ayer.—A small hill $\frac{1}{2}$ mile from the coast in the Sungei Bharu Tengah district, Malacca, on the short cut between Penkalan Balak and Ayer Berendang.

Bukit Ayer.—A hill close to the main road from Linggi to Malacca on the Sungei Bharu Tengah district.

Bukit Badak.—A hill on the frontier of Pahang and Johol.

Bukit Bakau.—Hill on N. bank of Pahang R., nearly N. of Cheno, C. Pahang.

Buikt Balucham.—640 feet high, in E. Selangor, about 8 miles E.S.E. of Kwala Lumpor.

Bukit Bandol.—Hill range in S. portion of Terachi, one of the Negri Sembilan.

Bukit Banian.—A hill $\frac{1}{2}$ mile from Bukit Putus, just inside frontier line between Malacca and Rembau.

Bukit Batu.—Hill 6 miles N.N.W. of Kwala Lumpor Selangor. Limestone caves exist in it. Height 1,515 feet, lat. 3° $2\frac{1}{2}$ ′ $19\frac{1}{2}$ ″ N., long. 101° $52\frac{1}{2}$ ″ E.

Bukit Batu Atap.—Hill in N.C. Pahang, 4 miles W.S.W. of Gunong Talian.

Bukit Batu Pahat.—Hill on the dividing range between Selangor and Pahang. The Selangor R. rises close by.

Bukit Batu Paliat.—Hill on the dividing range between Selangor and Pahang, close to Ulu Selangor on N.E. of that State.

Bukit Batu Riawat.—A hill on the frontier of Pahang and Johol.

Bukit Bemban.—Hill on W. bank of Linggi R., Sungei Ujong, opposite Niato.

Bukit Berapit.—Hill and pass on the road from the mouth of the Larut R. to Kwala Kangsa, Perak.

Bukit Besar.—Name of a hill in N. Patani, 10 miles S. of the coast.

Bukit Bharu.—Small V. 3 miles N.N.E. of Malacca-town.

Bukit Brembang.—Hill in S. Malacaa about \(\frac{1}{4} \) mile from W. bank of R. Duyong and \(4 \frac{1}{4} \) miles from the coast.

Bukit Bruang.—Hill in the Batu Berendam district, S. Malacca.

Bukit Bulan -Hill in E. Johore, S. by W. of the source of the R. Madek.

Bukit Cana.—Hill just below Jelutong in the Batu Berendam district, S. Malacca.

Bukit Chai (3,600 feet).—Hill 9 miles S.W. of Kwala Kangsa in C. Perak.

Bukit Champakian.—Hill on N. bank of Pahang R., 6 miles E. of R. Soui.

Bukit Changgan.—Hill on N. bank of Bernam R., S.E. Perak.

Bukit Chermn.—Hill and small V. on the Duyong R., Malacca, a little over 3 miles S.W. of Ayer Panas. Also hill in Singapore.

Bukit Chimundong. -Hill 3,000 feet high in C. Johore near the supposed source of the It. Kahang.

Bukit China. The hill to the N. of Malacca-town occupied as a cemetery by the Chinese.

Bukit China, Hill and V. on W. bank of Johore R., 5 miles N.W. of Johns Imma.

Bukit Dakuku. Hill 14 miles S.W. of Kwala Lumpor in Selangor.

Bukit Dalong. A hill in the Gading Forest reserve, N. Central Malacca.

Bukit Damar Itam. Hill in the Bayan Lepas district, S.E. Penang.

Bukit Doh. A hill in W. Muar, about 3 miles from the Kessang R., 5 miles S.W. of Mt. Ophir.

Bukit Dulang Dulang. Hill in Sclangor, about 8 miles N.W. by W. of Kwala Lampor, lat. 3 10' N., long., 101° 50' E.

Bukit Duri, Hill 10 miles S, of Pahang R, in C. Pahang. R. of same name rises in it.

Bukit Duri. Hill on W. bank of Pahang R., between Gnau and Cheno, C. Pahang.

Bukit Duyong. A hill 11 miles W. of the river of that name and 31 miles from the count

Hill I Mloarpo, Hill to miles S. of Kwala Lumpor and just N. of the bantudary between Schanger and Sungei Ujong.

Bukit Elmbeh. On N. face of Blakang Mati Id., S. of Singapore.

Bukit Gadong. Small V. about 3 miles E. of Durian Tunggal, C. Mahacaa, in the old tin-mining district.

Bukit Gadong.—A hill at Tanjong Kling, Malacca, about 4 mile from the those nument hungalow.

Bukit Gahan.—A hill in the Tabu district, N. Malacca, about 2½ miles from the Bendan frontier.

Bukit Gajah Mati.—Hill on coast of Sungei Ujong at Kwala Lukut.

Bukit Gakang.—A hill in the Sungei Bharu Tengah district, in Malacca, about I mile from the beach.

Bukit Gambir.—Hill between Jelutong and Glugor districts, E. Penang.

Bukit Ganong.—A hill in Naning, N. Malacca.

Bukit Gantang.—Hill S. of Taipeng, Perak, and distant about 5 miles.

Bukit Gasing.—Hill on W. bank of Klang R., about 9 miles S.W. of Kwala Lumper.

Bukit Gayang (3,857 feet).—One of the hills in the Bukit Panjang Hange, N. Perak.

Bukit Gemuruh.—Hill in S. Penang to N. of point of same name.

Bukit Gondol,—Hill 31 miles N.E. of Malacca-town.

Bukit Gumaleh.—Hill in lat. 2° 58' N. and long. 101° 31' E. in S.E. Selangor.

Bukit Guy.—Hill on S. bank of Klang R., about 9 miles E. of Daman Sura, Selangor.

Bukit Indra Muda.—A pretty hill about 6 miles from Butterworth, P. Wellesley, and close to Bukit Merah (q. v.). It is the site of a village, and much fruit is grown in the vicinity.

Bukit Jakas.—Hill on W. side of Sembrong R., just below its turn E. in N. Johore.

Bukit Jalalang.—In Naning, so called from its abounding in a small shrub the leaves of which sting the hand slightly.

Bukit Java.—Hill about 6 miles from the mouth of the R. Klang, on the S. bank.

Bukit Jelutong.—A hill of low elevation owned by Mr. Noordin of Penang, on the S. bank of the Prai R., about 43 miles from Butterworth, P. Wellesley.

Bukit Jelutong.—Hill on N. side of Bernam R., S.E. Perak.

Bukit Jelutong.—Hill on W. side of Selangor R. after its turn S. in N. Selangor.

Bukit Jelutong.—Hill on the border between Rembau and Malacca.

Bukit Jernah.—The principal Mt. in N. Kedah, lat. 6° 31' N. and long. 100° 35' E.

Bukit Jerom.—Hill 200 feet high on the coast of Selangor, 14 miles N. of the entrance of the Klang R.

Bukit Jetty.—Hill about 8 miles from the mouth of the Klang R., close to Klang, on the S. bank.

Bukit Jugra.—Hill in S.W. Selangor, on S. side of Langat R., where it flows into the Jugra R. According to the Admiralty Chart, this is Parcelar Hill, which is, however, shown as a separate elevation on Langat I., 8 miles W. on the S. A. S. map.

Bukit Jurak.—Small hill in E. bank of R. Endau, close to a stream of same name, N.E. Johore.

Bukit Kaboh.—Hill in C. Pahang on the N. bank of Pahang R. where it turns E. just W. of Cheno.

Bukit Kachang.—932 feet high, $7\frac{1}{2}$ miles S.E. of Kwala Lumpor, Selangor.

Bukit Kajang.—Hill and tapioca plantation in S. Malacca, about $5\frac{1}{2}$ miles from the coast.

Bukit Kakusan.—A hill in the Padang Sebang (Naning) district, N. Malacca.

Bukit Kalang.—Hill in the Kalang district, on the E. border of Chasseriau Estate, Singapore.

Bukit Kali.—Hill on N. bank of upper stream of Selangor R. in extreme E. of the State.

Bukit Kalu.—Small hill on W. bank of Duyong R. about $3\frac{\pi}{4}$ miles from the coast of Malacca.

Bukit Kamandu.—V. at E. edge of Bukit Linggi forest reserve, N. Malacca.

Bukit Kamuning.—Hill on W. side of a N. turn of the Klang R., about 8 miles E. of Klang.

Bukit Kamuning.—Hill 2 miles N. of Selangor R., about 10 miles from the coast.

Bukit Kanching.—Hill (800 feet) near source of R. of same name (q. v.) in Selangor E. The range is said to reach 840 feet.

Bukit Kayu Arang.—A small hill in the Government reserve, Sungei Bharu Tengah district, Malacca.

Bukit Kechil.—Small V. on the Muar side of the R. Chohong (Kessang), forming the boundary between Muar and Malacca. It is about 2 miles from Chinchin in our own territory.

Bukit Kech il.—Hill in S.E. Penang, S. side of Sungei Nipah.

Bukit Kechil.-Hill in Ayer Puteh district, W. Penang.

Bukit Kechil,—Hill (300 feet) on W. coast of Penang, on N. bank of Sungei Pinang.

Bukit Kedi.—Hill in extreme W. portion of Sungei Ujong. Bukit Keluar.—Hill on N. side of Bernam R., S.E. Perak.

Bukit Kendok.—Hill about 2 miles S. of the Pahang frontier in N.C. Johore.

Bukit Kenta,-Hill on N. side of Bernam R., S.E. Perak.

Bukit Kepong.—Hill and V. on E. bank of Muar R., Johore, opposite Tras Labis Island.

Bukit Kledang.—Hill 11 miles E. of Merlimau, S.E. Malacca.

Bukit Kledang.—A hill in the Sungei Bharu Ilar district, in N.W. Malacca.

Bukit Kramat.—Hill on W. side of Linggi R., 3 miles N.W. of Rantau, Sungei Ujong.

Bukit Kriang.-A hill 2,000 feet high in the N. of Jelebu.

Bukit Kribon (982 feet high).—About 9 miles S. of Kwala Lumpor in S.E. Selangor.

Bukit Kringga.—A hill (3,812 feet) of the Bukit Panjang range in N.

Bukit Kritow Sinjang.—Hill on E. side of Pahang R. at its bend N. in C. Pahang.

Bukit Kuan.-Hill on E. side of Madek R., E. Johore.

Bukit Kuda.—Hill on N. bank of Klang R., opposite Klang, Selangor.

Bukit Kuda Mati.—Hill in C. Johol, Negri Sembilan.

Bukit Kuklin,-Hill at head of R. of same name, N.E. Selangor.

Bukit Kuwan,-Hill 4 miles N.E. of Malacca-town.

Bukit Lada.—A hill in the Melakek district of Malacca, about 21 miles N.W. of the town.

Bukit Ladang.—A hill on the borders of Johol and Malacca; one of the seven gold-producing hills in that neighbourhood.

Bukit Laksamana.—Hill to W. of Western Hill, Penang.

Bukit Lalow.—Hill close to one of the sources of the Klang R., in Selangor, about 4 miles N. of Kwala Lumpor.

Bukit Langkap.—Hill on E. side of R. Endau in N.E. Johore.

Bukit Larang.—Hill in the Umbei district, S. Malacca, about 21 miles from the coast.

Bukit Lintang.—Hill lying a little over 5 miles due E.of Malacca-town, about $2\frac{1}{2}$ miles from the coast.

Bukit Lintang.—Hill in the Lundu district, W. Malacca.

Bukit Lonchong.—Hill about 2 miles N.W. of Kajang in S.E. part of Selangor.

Bukit Lungga.—Hill in W. Johore, source of R. of same name, and 5 miles from Lungga V.

Bukit Lunjul.-Hill range in Terachi, one of the Negri Sembilan.

Bukit Machamapi.—Hill just inside the Pahang S. boundary line, about 2 miles N. of Segamat R.

Bukit Mahang.—In extreme N. of Perak, one of the Perak range, R. and V. of same name at foot. Supposed frontier of Kedah just N.

Bukit Mahminah.—A hill in the Juru district, P. Wellesley.

Bukit Mandi.—V., Police Station and Government Bungalow, 12½ miles from town in Mandi district, N.W. Singapore.

Bukit Manis.—Hill in the Kru district, Rembau, just inside the boundary line from Malacca.

Bukit Marachet.—Hill in Naning territory, Malacca, not marked in the Government maps.

Bukit Merah.—A hill of red sandstone about 400 feet high, about 4 miles from Butterworth, P. Wellesley, on the Kubang Semang road. It forms part of the property of Mr. Noordin of Penang, and is precipitous on its N. side, but cultivated on the southern slope. The hill is crowned with a substantial house, giving a clear view over a great portion of the Province.

Bukit Merbiling.—Hill on the W. boundary point between Selangor and Sungei Ujong, S. Selangor.

Bukit Merinang.—Hill 205 feet high, 6 miles from the coast and 2 miles from N. bank of Klang R., Selangor.

Bukit Mertajam.—Hill and V. in the Central district of P. Wellesley, 9 miles 5 furlongs from Butterworth. The village lies close to the foot of the hill, and is well shaded by fruit-trees of all sizes. There are a good many shops here kept by Chinese, and a number of other Chinese are employed growing fruits or spices, but the Malays are about ten times more numerous. There are also a number of Klings. The daily markets are well attended during the fruit season, as dealers come all the way from Penang. They generally land at Kwala Prai, and come by the new road, or "Jalan Bharu," which is nearly direct, the distance being only six miles. A district magistrate resides in the village.

There is a road leading to the southward from Mertajam towards the Alma Estate, which has only been completed within the last few years. It has since been continued to Macham Bubu, near the boundary, where a tin mine was opened, the speculators being Chinese merchants of Penang. The speculation, however, was not a success.

Bukit Minyak.—A small hill N. of the Government Reserve in Sungei Bharu Tengah district, Malacca; also a hospital station in Province Wellesley.

Bukit Muar.—Hill about 2 miles from the coast and 5 miles from S.E. of the entrance of the Muar R. in that State.

Bukit Mugi.—One of the bill ranges in Naning territory not marked in Government maps.

Bukit Muriang.—A hill on the W. borders of Muar, near Chaban, Malacca.

Bukit Musiam.—See North Hummock.

Bukit Naksa.—One of the hills in S.E. Kedah joining the Gunong Titi Wangsa.

Bukit Nior.—A hill in the S.W. corner of Pahang.

Bukit Niwang.—Hill in N.W. Sungei Ujong.

Bukit Pagan.—Hill at the confluence of the R. Kurut and Chendariang with the Kinta, S.C. Perak.

Bukit Pago.—A hill on E. side of Muar R. close to Panchor, W. Johore.

Bukit Pajam.—Hill in N. Sungei Ujong, 7 miles E. of Pantay.

Bukit Panas.—A hill in the Ayer Pah Abas district, Malacca.

Bukit Panchor.—A small range of hills in the Malacca Pindah district, C. Malacca.

Bukit Panglor.—Hill in S.W. Pahang, about 10 miles N. of Segamat.

Bukit Panjang.-Hill in N. of Bukit Timah district, Singapore.

Bukit Panjang.—Range in N. Perak forming the E. of the two chains running N. in that State.

Bukit Pasir Panjang.—Hill in S.W. Penang. V. of same name on coast at foot.

Bukit Pataling.—Hill on W. bank of Klang R., about 10 miles S.W. of Kwala Lumpor, Selangor. Tin mines exist just S. of it.

Bukit Payong.—Hill about 17 miles E. of Gunong Jerei, N. Kedah.

Bukit Payong.—In Naning, N. Malacca,

Bukit Payong.—Hill 7 mile W. of Kota Lama, C. Perak, one of the Perak range.

Bukit Penah Panjang.—Hill in E.C. Johore about 7 miles S.W. of the source of the R. Madek.

Bukit Penera—(1,150 feet). ½ mile S.E. of Mt. Elvira, C. Penang.

Bukit Pengkalan.—Hill and V. near one of the sources of the Duyong R., Malacca about 2½ miles S.W. of Ayer Panas.

Bukit Peninjau.—Hill and V. at S. extremity of forest reserve E. of Sungei Bharu Ilir district, N.W. Malacca,

Bukit Penyabong.—Hill in S.C. Johore, one of a series between the Madek and Lenggin R.

Bukit Pesisik.—Hill N. of Johore R. between the Seluang and Pesisik Rivers, S. Johore.

Bukit Piata.—Hill in extreme W. of Singapore I., 3 mile N. of Tanjong Merawang.

Bukit Piatu.—A small V. about 3 miles from Malacca-town, bearing N.E.

Bukit Plabang.—A hill in the Tabu district, N. Malacca, about 23 miles from the Rembau frontier.

Bukit Plandok.—Hill in extreme S. of Selangor on frontier of Sungei Ujong.

Bukit Punggor.—See Punggor.

Bukit Pupur.—Hill on E. bank of Lenggin R., S.E. Johore.

Bukit Putus.—Hill in the Jelebu range between Terachi and Sungei Ujong.

Bukit Putus.—Hill on the boundary line between Malacca and Johol, between Kwala Sungor and Ayer Tengah.

Bukit Putus.-Hill on S. side of Muar R., in Enas territory, Negri Sembilan.

Bukit Rambei.—A small V. 5 miles N.W. of Malacca-town.

Bukit Ruminta.—A hill 1 mile S. of Bukit Putus in N. part of Malacca Territory.

Bukit Sabukor.—Hill just N. of Priggit and nearly 3 miles N. of Malaccatown.

Bukit Samalau.—Small hill on W. bank of R. Duyong just below Kwala Gapam.

Bukit Santi.—645 feet high, in S. Johore.

Bukit Sapam,-A small V. in the Padang Sebang district, N. Malacca.

Bukit Sapetang (South Mound on the Adm. Chart).—Hill about 10 miles from the coast and § mile S. of Kurau R. in N.W. Perak.

Bukit Segamat.—Hill on the boundary line between Johore and Pahang-25 miles from Segamat.

Bukit Seginting.—Small V. in the Durian Tunggal district, C. Malacea.

Bukit Selosa.—At extreme W. end of Blakang Mati I., S. of Singapore.

Bukit Senoh,—A hill in S.W. corner of Pahang.

Bukit Sepang.—Hill in N. Sungei Ujong, 4 miles W. of Pantay.

Bukit Sera Pono.—Hill in N. of Blakang Mati I., S. of Singapore.

Bukit Serdang.—Hill E. of R. of the same name, S.W. Kedah; at or near the boundary line with Perak.

Bukit Sidinan.—Small V. in the Jus forest reserve, N. Malacca.

Bukit Sigari.—Hill just S. of Telok Sera, N. Dinding Territory.

Bukit Sigari.—Hill 9 miles from the coast, W. Perak, opposite mouth of Jarum Mas R. Marked as Tulu Saggar or False Dinding on Adm. Chart.

Bukit Sikari.—Hill about 3 miles E. of Muar R. about 10 miles from the coast in W. Johore.

Bukit Silunchu.—Hill on S. Johore 2 miles N. of the Selat Tambrau.

Bukit Sinandong.—V. and tapioca plantation in the Durian Tunggal district, C. Malacca, and about 2 miles from the Police station at the same village.

Bukit Singgi.—District in N. Malacca S. of Jus, and forming part of the forest reserve. V. of the same name just S. of high road from Pondok Kompas to Nyalas.

Bukit Sogor.—Hill on E. side of Linggi R. about 3 miles N.W. of Rantau, Sungei Ujong.

Bukit Sudu.—Hill in N. Sungei Ujong 2 miles above Pantay.

Bukit Sungei Pinang.—Hill on S. bank of W. River of that name about 2 miles from the W. shore of the island.

Bukit Tabong.—A hill on the borders of Malacca and Johol reputed, like Chendras and Ganunshi, to produce gold.

Bukit Talang.—Hill 1 mile N. of Selangor R. about 9 miles from the coast.

Bukit Tambun.—Hill 3 miles W. of Perak R. about 3 mile N. of Kota
Lama, C. Perak.

Bukit Tambun.—The most important village as to size and population in Province Wellesley, being exactly 15 miles S. of Butterworth. There are nearly 1,000 inhabitants, including many Chinese and Kling shopkeepers. The village consists of a single street running round the northern base of Tambun hill, having a salt-water creek into which runs the Junjong river, navigable by large boats, parallel with the road. The Inspector of Police of the southern division of the Province resides here in the upper storey of a commodious Police station. The Magistrate in charge of the district holds a Court of Police and Requests at Bukit Tambun. Beyond the village the road skirts the foot of the hill to the Bukit Tambun Ferry across the Junjong river to Batu Kawan, the river being about 150 yards across. There is more traffic at this ferry than at any other in the Province, more especially of foot-passengers. There is also a large traffic of passengers and produce by boat to and from Penang, two steam launches (the fares by which are 35 cents 1st class and 15 cents 2nd class) leaving each place daily. The creek is much infested by crocodiles. Bukit Tambun derives additional importance from being the chief highway to the S. of the Province, and a large number of two-wheeled hack gharries are always plying for hire.

Bukit Tampoi.—A V. in the N. Central district of Mak, Malacca.

Bukit Tampurong.—A hill the S. of a small chain in the Tabu district, N. Malacca.

Bukit Tanggah.—Hill in the Jelebu range between Sungei Ujong and Ulu Muar, the source of the Muar river, 3,300 feet high.

Bukit Tanjong.—A hill in the Chabau district, E. Malacca.

Bukit Tebakar.—Hill and small village in forest reserve, E. Sungei Siput district, N.W. of Malacca.

Bukit Tebakar.—A hill in the Ayer Pah Abas district, Malacca.

Bukit Telenteng.-Hill in N. bank of Lenggin R., S.C. Johore.

Bukit Telok Duri.—Hill on E. side of Gunong Titi Wangsa range, Kedah.

Bukit Teluk Pachat.—Hill about 14 miles from W. coast of Penang, not far from E. bank of Sungei Gagah, W. Penang.

Bukit Tengah.—Hill on the N. boundary of Sungei Ujong just S. of Bt. Bruang in Selangor.

Bukit Tengah.—A village of some importance 6 miles 5 furlongs from Butterworth, P. Wellesley. To the left, about 100 yards from the high road, is the main entrance of the Golden Grove Sugar Estate, at one time the property of the Rt. Hon. E. Horsman, M.P., and still owned by his representatives. The village consists of Chinese and Kling shops on either side of the road which runs through the centre of the Golden Grove Estate. A substantial Police station, and the residence of the Magistrate in charge of the central division, stands at the S. end.

Bukit Terap.—Hill in W. Johore in the Jakun country, 20 miles N. of Batu Pahat.

Bukit Terunka.—In S. Kedah, just N. of the supposed boundary between Perak and Kedah.

Bukit Tial.—Small V. about $1\frac{1}{4}$ miles E. of Duyong R., and $2\frac{1}{8}$ miles S.W. of Ayer Panas, E.C. Malacca.

Bukit Tiga.—Hill just below Linggi, S. Sungei Ujong.

Bukit Tiga Puloh Tigah.—A portion of the Perak range in N. Perak, running N.N.W. from Kota Tampan.

Bukit Tigi.—Hill about 4 mile W. of R. Duyong, Malacca, about 7 miles from the coast.

Bukit Timah.—Hill of a range in N. Penang, a little over 1 mile N. of Government Hill Bungalow, Penang.

Bukit Timah.—Divided into two districts E. and W. The former includes the hill which is the highest elevation on the Island of Singapore, variously estimated at 500 to 540 feet above the sea-level. A Government bungalow, accessible by a good cart road of not very steep grade, affording good accommodation, exists on the top of the hill, whence a good view of the island generally is obtainable. West Bukit Timah has numerous plantations but no villages. The Police station is situated on the high road from town at the 7 mile stone. A Government bungalow is close by.

Bukit Tinggi.—A hill in S.W. extremity of Pahang.

Bukit Tinggi.—A hill in Sungei Bharu Tengah district, Malacca.

Bukit To Kanga,—A hill occupied as trigonometrical station S. of Sungei Juru in P. Wellesley.

Bukit Trek.-Hill about 4 miles N. of the R. Lenggin in E.C. Johore.

Bukit Trokil.—A small I., about 7 miles from the coast of Kelantan, 140 feet high.

Bukit Tunggal.—A hill in Malacca not far from Alor Gajah. This is also the name of a residence in Singapore on the road between Bukit Timah and Thompson Road.

Bukit Ulu Bin.—(3,072 feet.) One of the Bt. Panjang range, N. Perak.

Bukit Ulu Chepah.—(3,816 feet.) One of the Bt. Panjang range, N. Perak.

Bukit Ulu Selangor.—Hill in the dividing range between Selangor and Pahang, near the source of R. of same name, in extreme E. of the State.

Bukit Ulu Tulang.—Hill in N.W. Sungei Ujong.

Bukit Undong.—A small V. about a mile from Rumbia, C. Malacca.

Buloh Serua.—V. on W. bank of Bernam R., $1\frac{1}{2}$ miles below Changkat Ramu, S. Perak.

Buluh (Bamboo—See Woods).—The uses of the bamboo are so numerous that several pages might be occupied in their simple indication. There are many varieties, the handsomest being of a bright yellow with vertical green stripes. A pretty sort furnishes the handles of Chinese pencils. It is alleged that jungle fires are sometimes caused by the constant rubbing together by the wind of two or more trees which have grown so as to cross each other. The large hollow joints are used to carry water and toddy.

The striped bamboo (Bambusa vulgaris var. striata), the Hedge bamboo (B. Nana), the yellow bamboo (B. vulgaris var. aurea), and the common bamboo (B. vulgaris), are cultivated in the Singapore Botanic Gardens, the plants having been introduced from India and China. They are, however, indigenous to the Peninsula.

The Male Bamboo (Dendrocalamus strictus) and the Prickly Bamboo (D. spinosus), have been introduced into the Singapore Botanic Gardens from the East Indies.

The countless uses of the bamboo from flooring to paper-stuff have been too often described to make repetition useful. A recent writer computed that over 360 articles of daily use or ornament were made from bamboo in the various countries where it abounds.

Buluh Ribut or B. Perindu (Storm or plaintive bamboo).—A bamboo which by means of perpendicular slits cut above each joint and placed so as to catch the wind becomes a sort of gigantic Æolian harp. The effect is most pleasing, the larger holes giving a deep organ tone which the stringed instrument cannot furnish. By an ingenious contrivance similar to the tail fan of a windmill the apertures are always kept facing the wind. One of these bamboos is in the Raffles Museum.

Buluh Timiang.—A species of bamboo used to make sumpitans; a very light and fine-grained variety.

Bund, The.—An embankment on the south side of the Muda River, N. of Province Wellesley, made for the protection of the northern padi lands from floods durings heavy rains. A tax is collected by Government on every animal passing over the Bund, and an annual sum is spent on maintaining its efficiency.

Bunga-Mas.—The flowers wrought in gold, presented by certain semi-independent Malay States to Siam as tribute. They are beautifully worked.

Bunga Tanjong.—A small V. in the Tabu district, N. Malacca.

Bunga Tanjong.—A sweet-scented star-shaped flower, used by native women to ornament their hair. The Klings in the Settlements and Peninsula offer them in chaplets at the shrines of their gods.

Bunga Tanjong.—Small V. on road between Pulau and Briso, S. of Tabu district, N. Malacca.

Bungarus Fasciatus (*Ular puchok*).—One of the venomous snakes common in the Settlements and Peninsula. It is handsomely marked with alternate rings of bright yellow and black, and frequents swampy ground. Only one death from its bite has been recorded during the past ten years.

Bungkwang. - See Mangkwang.

Burial Customs.—See Funerals.

Butterflies .- See Entomology.

Butterworth, Hon. Col. C. B.—Governor of the Straits Settlements, 1847-1851. Col. Butterworth gave great encouragement to the foundation of the Journal of the Indian Archipelago. J. I. A., I., iii.

Butterworth.—The principal settlement of Province Wellesley, where the heads of the various departments mostly reside. It is situated on the beach of Bagan Tuan Kechil. The chief Police Station, Hospital, Post Office, and Public Works Office of the province are located here, the situation being convenient for access to Penang. It is connected by telegraph with Penang and Perak, and with the out-stations in the province by telephone. The place has been much improved under recent administrations, a new sea-wall and bathing-house, with improved buildings for housing the Police and other officials having been recently completed or put in hand. It takes its name from Col. Butterworth, Governor S. S. in 1847.

Byram Estate (Province Wellesley).—27 miles by road from Butterworth. This is the most westerly of the cluster of three estates N. of S. Krian, and, like the others, is under sugar-cane, 700 acres being now cultivated.

Cajeput, Oil of.—Corrupted from Kayu puteh, a tree which yields a green oil valuable as an embrocation for rheumatism, &c. See Oils.

Calamus.—The scientific name of the class of plants which botanists have agreed to consider as belonging to the family of palms, although in appearance more like rank grasses—popularly "canes and rattans." These abound in all the forests of Malaya, particularly in low and swampy lands, which they contribute by their density and numerous prickles to render nearly impenetrable. They vary in size from a few lines to a couple of inches in diameter, and creeping along the ground or climbing trees, they often extend to the length of several hundred yards. By the natives they are used for almost every purpose of cordage. The greater number of those exported are the produce of Sumatra and Borneo. The Malays, with a generic name for the whole family, distinguish the different kinds, which are probably distinct species, by adding an epithet to them. The general name is rotan, of which the European rattan is an obvious corruption. It is thought to be derived from the verb rawat, which in Malay means "to pare or trim," in reference to the process by which the canes are prepared for use.

Caledonia Estate.—23 miles from Butterworth, P. Wellesley, by the old road, but about $21\frac{1}{2}$ by the new cut. It is the most N. of the three estates (the other two being Victoria and Byram) owned in this neighbourhood by residents at home. It has very good machinery, and the usual hospital, school, &c., for the coolies and children. Some 1,162 acres are under sugar-cane.

Cali. - See KALI.

Caltrop (ranjau).—Small pointed irons or bamboos partly inserted in the ground and planted round stockades or in ditches when attack is expected. Their points are sometimes poisoned, and they are very effective against a bare-footed enemy. See Ranjau.

Camel.—This quadruped, fitted for the dry sands of the desert, is wholly unsuited to the humid climate and forest-clad lands of the Peninsula. It is in fact unknown to the natives, except by its Sanskrit name *Unta*, just as is the case with the lion.

Camphor.—A drug procured from the Laurus camphora by soaking the branches, leaves and chips in water, which becomes saturated with the gum. This latter is then allowed to coagulate. It is then placed in an iron vessel with fine

earth, over which a second vessel is tightly luted, and heat being applied the camphor sublimes into the upper vessel. Camphor-trees abound in the dense jungle of the interior, and those who search for it abstain from certain kinds of food, eat a little earth, and use a special dialect known as pantang kapor, or camphor language (q. v.). Camphor is not collected by the Bernam tribes on the western side of the Pensinula. That sent to market is generally very crude and requires refining for medical and other purposes. The wood is generally imported from China, want of facilities for transport preventing the Malays from bringing it to the coast.

Regarding Formosa and Sumatra camphor Mr. Cantley writes as follows:—
"Camphora (Camphora officinarum), or Formosa camphor, is not of much interest to Straits people so far as its cultivation is concerned, the climate being unsuitable for its proper growth. It nevertheless grows fairly well in Singapore.

SUMATRA CAMPHOR (Dryobalanops aromatica), also known as Borneo Camphor, is sparingly found on the Peninsula; and its importance in the afforestation of the Settlements is not overlooked. Private enterprise will hardly ever successfully cultivate the plant, owing to the time which is required to elapse between first outlay and first income.

ASIATIC CAMPHOE (Cinnamomum camphora) has been introduced from E. Asia into the Singapore Botanic Gardens."

Camphor Language (Pantang Kapor).—An artificial dialect used by camphor hunters; e. g., for wood, instead of kayu, they say chué; for sakit, sick, binto, &c. In many cases the words substituted describe some quality of the object referred to, e. g., "grass fruit" for "rice," "far-sounding "for "gun," &c. It is believed that no camphor will be found if care be not taken to use the pantang kapor. See J. I. A., Vol. i., p. 263.

Campong.—See Kampong (K. being the initial Malay letter).

Cane.—See Malacca Cane.

Canoe (Kolek).—These vary in length from 8 to 15 feet, and are hollowed out from one piece of wood. Kayu pinak is preferred, as it will last about 20 years. A canoe from 12 to 15 feet in length will carry 400 to 530 gantangs, and requires two men to manage it. Its value is from 10 to 12 dollars, a shorter canoe fetching 7 or 8 dollars. See Boats.

Caoutchouc.—Two trees yielding the India-rubber of commerce have been found in the Peninsula and British Settlements, viz., Gutta Rambong and Gutta Singarip. They do not, however, exist in sufficient quantities to allow the gum to be an article of trade, though it is said to be occasionally mixed with gutta percha, which is largely dealt in. J. S. B. R. A. S., No. 1, p. 107. The Panama rubber (Castelloa elastica) has been introduced into the Singapore Botanic Gardens from Moreton Bay.

Car, Cart, Chariot.—The name, in Malay, where foreign influence has not penetrated, for a car or cart for ordinary use, is pâd-ati. Wheel-carriages are hardly in use among the up-country Malays, for the boat takes their place; and even with the agricultural nations they are little used, except where European power has been established. For a carriage for luxury or hire, the terms used are kreta and rata, both Sanskrit. In Malayan romances we frequently read of a particular carriage of this description; and the Portuguese historian, Castagneda, vol. iii., p. 94, has described one taken or rather destroyed at the capture of Malacca. His account of it is as follows, and it will give the reader some notion of the kind of barbaric pomp in which a Malay prince indulged three centuries and a half ago:—"There was also set on fire a great wooden house placed on a car, which had thirty wheels, every one of them equal in size to the end of a hogshead. This chariot was made by command of the King of Malacca, in order to con-

vey in procession through the city the King of Pam (Pahang), to whom he had given one of his daughters in marriage. He had prepared a great festival for the nuptials, and this chariot was one of the contrivances for the purpose. It was hung with silk inside, and adorned with banners without. Vol. iii., p. 194.*

Carbuncle (gemâla), known to the Malays, but not found in the Peninsula.

It is not particularly esteemed as a gem.

Cards (Kertus skopong).—The Malays are fond of card games, but few Europeans have taken the trouble to understand or describe them. Mr. W. MAXWELL, C.M.G., contributed the following description of daun tiga lei to the Notes and Queries of the J. S. B. R. A. S. It refers to the game in question as played in Perak :-

Hearts	 	Lěkoh.	King		***	Raja.
Diamonds	 ***	Retin.	Queen			Bandahara.
Clubs	 ***	Kalalawar.	Knave	***		Pékah.
Spades	 	Sakopong.	Ace	***		Såt.

To shuffle, Kiyat, mengiyat.

To deal, Membawa.

To cut, Kerat.

To sweep the board, make every one pay, Mengelong.

Three cards are dealt out to each player. The highest hand counting by pips is that which contains the greatest number of pips after the tens are deducted. Thus a knave, ten and nine is a good hand.

The best hand is three aces, Sát tiga.

The next best is three court-cards, Kuda; naik kuda.

The next is nine. The next is eight.

All these four hands are known as terus.

A hand of three threes is really a good hand, being nine, but it is considered a propitiation of good luck to throw it down (without exposing it) and announce that one is buta, in the hopes of getting good luck afterwards.

Each player makes two stakes-kapala and ekor. They may be of equal

value, or the ekor may be of greater value than the kapala.

The kapala must not be of greater value than the ekor; that is called tual ka-ujong (tual=bĕrat).

Or there may be a single stake only, which is called podul. Betting between players is called sorong, or tuwi, or sorong tuwi.

A pool, tuwi tengah.

The ekor stake is only paid to the dealer if he holds one of the hands called terus, and if a smaller hand is held by a player, then the dealer takes both kapala and ekor (mengelong).

A player who holds thirty exactly (except when he has three court-cards,

kuda) is said to be out (buta).

Any one except the player on the right of the dealer may cut. The player who cuts looks at the bottom card of those that he lifts, and if he thinks it is a lucky cut he accepts it and puts down the card he has lifted (pengerat).

The dealer then puts the rest of the pack on top of the cut and in his turn lifts

a portion of the pack (pengangkat) and looks at the bottom card.

There are all sorts of names for different cards and combinations of cards of various degrees of luck, and these are quoted by the cutter and dealer, each declaring his confidence in the luck coming to him by reason of the cutting or lifting of a particular card.

··· { Tiang ampat penghulu chĕlong, Chukup dengan gambala-nia, Five of clubs

Nine of diamonds	•••	•••	Bunga kachang raja budiman
Ten of clubs			(Gagak sa-kawan raja di-hilir. { Singgah makan pedindang masak. Masak pun lalu muda pun lalu.
Ace of diamonds if cut	,	•••	Buntut kris Raja Bandahara.
Do. if in the hands of t	he de	aler	{ Anak yatim jalan sa'orang. ``` { Satu pun tidak marabahaya.
Two of diamonds	•••		Semut ginting Che Amat pelak.
Two of hearts		•••	Batang jamban.
Six is an unlucky card	•••	•••	Daun anam jahanam.
Nine of hearts	•••	•••	Hari panas kubang ber-ayer.

A player does not hastily look at his three cards and learn his fate at once, but he prolongs the excitement by holding his cards tight together and looking alternately at the outside ones and last of all at the middle one, sliding out the latter between the two others little by little. Thus it is left uncertain for some time whether a card is an eight or a seven, a nine or a ten.

A man to whom a court-card, an eight and an ace is dealt (if the eight is in the middle), on finding that he has eleven by the two outside ones, says, for instance, Handak kaki tiga, and then commences to slide out the middle card, hoping that it is going to be an eight, or at all events a seven (three pips on each side). This particular hand is called lang siput, because it is certain to carry off something.

A man who has just held a winning hand will say, in expressing a hope of continued good luck, "Teman handak pisang sarabu, sudah sa-batang sa-batang pula." (The plantain called sarabu is one which puts out fruit from every stem of the perdu about the same time, or one immediately after another.)

Carimon Islands, in Malay, Pulo Krimun, the name of two islands called by navigators the Great and Little Carimon; situated towards the eastern extremity of the Straits of Malacca. Mr. Crawfurd says:—"The smaller island is about 2 miles in length, and high land throughout, the highest part about 500 feet above the level of the sea. The larger island is about 12 miles in length and 5 in breadth, and its most elevated part rises to 2,000 feet. Both are of granitic formation, and the smaller island, and probably both, contain ores of tin. In a visit which I made to the Little Carimon in 1824, I procured the finest specimen of alluvial tin that I have ever seen, a round mass of about 15 pounds weight, which had been very little rolled, for the surface was covered with perfect crystals of the oxide. The smaller island is uninhabited, but the larger has a population of about 400 Malay fishermen. Both form part of the Dutch territories."

Cashew Apple (Anacardium occidentale.)—The Janggus of the Malays. It is singular, owing to the nut growing on the outside of the fruit. This nut contains a most acrid oil, which burns freely, and causes irritation if brought in contact with the mouth or any portion of the mucous membrane. The fruit itself is of pleasant flavour, but does not attract much attention. It is said to have been originally introduced from the West Indies.

Cassia (Dyer's).—See Dyes.

Castor Oil (Minyak jarah).—See Oils.

Casuarina Tree.—This is common throughout the Peninsula and is not unpicturesque, resembling as it does the well-known fir. The wood, however, is practically useless, except for burning, and its brittle nature renders it a somewhat unsafe ornament to grounds in the immediate vicinity of a house. It flourishes in a sandy soil.

Cat.—The domestic cat of the Malays has the same form, colour, and habits as the European, except in one respect, that the tail seldom exceeds three

or four inches in length, and always ends in a kind of crook, a peculiarity, however, not confined to it, for the same characteristic belongs to the Burmese cat. The origin of the Malayan domestic cat is equally obscure with that of the European. It is well known to all the civilized inhabitants. Its most common name throughout Malaya, with slight corruptions, is kuching, but sometimes it takes its name from its crv "meaou."*

Cat, Wild.—This has not been described as an inhabitant of the Peninsula by any writer so far as I can ascertain, but in Province Wellesley I saw a female and two kittens caught in the vicinity which were unmistakably specimens of the true felis catus. One great distinction between the wild and tame cat is that the former has a tail somewhat larger at the tip than at the base, while that of the domestic cat tapers. The markings are: ground-colour sandy grey with dark streaks, tigerwise, at right angles to the spine. Slight markings on the leg. The marks decrease in depth of colour as they approach the belly.

Catty.—See KATI.

Caves.—Some vast caves were discovered by Mr. Syers, Superintendent of Police, Selangor, near Kwala Lumpor in that State, during March 1879. They contain thousands of tons of guano. A description is given in No. 3 (1879) Journal of the Straits Branch of the Royal Asiatic Society, p. 116.

Limestone caves also exist at Beserah in Jalor, Patani, at Kota Glanggi or Klanggi, Pahang, which is the centre of a district possessing many similar natural formations, and at Ipoh in Kinta, Perak. A full account of several caves

is given in No. 9 J. S. B. R. A. S., 1882, p. 153 et seq.

Cayenne Pepper (Capsicum annuum). Chabei in Malay.—No pepper from this plant seems to be made in the Straits, but chillies of all kinds grow freely. The value of chillies is about 45 shillings per hhd. in London. They are generally called lada china by the Malays.

Cemeteries (Kubor) are distinguished by small narrow wooden head boards at the end of each grave. In the case of priests, sultans, or other

important personages, tombs of some pretensions are erected.

Census.—See Population.

Centipedes (halipan) are found in Malaya as in most tropical countries.

The largest specimens killed have come from Penang Hill.

Chabau.—District and V. in extreme E. of Malacca, the latter on the road to Nyalas and about 3 miles N. of Chin Chin Police station.

Chain Armour.—See Mail Armour.

Chameleon (těnggtling), found in the Peninsula and adjacent islands, but in no particular way differing from the more Western species.

Champaka.—The name of a flowering tree giving a beautiful jessaminescented flower. There are two varieties, yellow and white.

Champakien.—V. on S. Bank of Pahang R., 3 miles beyond the delta.

Champla.—A game resembling our "heads and tails," except that the coins are thrown against a stone in place of into the air.

Chanang Rotan.—A wicker ball used in a game resembling rounders.

Chan Chu Kang.—V. and Police station, 9 miles from Singapore; a Government bungalow exists here having good accommodation, and the stream of the river has been embanked and covered over so as to form an excellent bathing-place.

Chandriang.—Imp. V. in E.C. Perak at the head of a river of same name.

Chandrong Klubi.—V. at S. extremity of W. range of hills, C. Perak, about 8 miles W.S.W. of Blanja.

Chandu.—Prepared opium. See OPIUM.

Changi.—The W. district of Singapore, V. of same name (q. v.).

Changi.—The principal Government bungalow, V., and Police station in E. Singapore. The bungalow is well built and commodious and a good bathing-house is attached to the grounds.

Changkat.—A hill, rising ground.

Changkat Batak.—V. about 5 miles from the coast of Perak, opposite Pasir Itam I., at the mouth of Jarum Mas R.

Changkat Dungla.—A place on the elephant track to Kinta, in Perak.

Changkat Kledang.—V. N. of Caledonia Estate, Province Wellesley, 19 miles 6 furlongs from Butterworth. It is one of the trigonometrical stations of the Province.

Changkat Lela.—V. in S.E. Perak about 7 miles N. of bank of Bernam R., and 4 miles from Slim.

Changkat Ramu.—Hill on W. bank of Bernam R. at its bend S. 3 miles W. of R. Slim.

Changkat Serdang.—V. at head of R. Sapetang, W.C. Perak coast.

Changkol.—The hoe with which all agricultural and planting work is performed by Klings, Malays, and Chinese in the Settlements and Peninsula. A long or short handle is fitted according to the work to be done.

Charcoal (Arang Kayu) is universally used for firing. In the native states the destruction of valuable trees became so common that prohibitive measures were taken restricting the manufacture to timber of but little use for building purposes—more especially in the tin-mining districts where it is used to smelt the ore.

Charms and Amulets (Tangkal).—These are much resorted to by the Malays, written charms being especially popular. A common charm consists of the tiger's claw or whisker, both of which are supposed to possess peculiar efficacy. A singular instance of agreement between old English, Chinese, and Malayan superstition under this head occurred recently in P. Wellesley, where a man was charged with having buried a waxen figure, stuck all over with pins, at the door sill of the complainant's house, with the intention of causing her to suffer pain in all the places where pins had penetrated the effigy. He was found guilty of conduct calculated to cause a breach of the peace; but the complainant was privately remonstrated with as to the absurdity of attaching any importance to the act. It was, however, without avail. Interesting details regarding this belief are given in the "Folklore of China," pp. 82, 83. The Agmara Indians of N. America have a similar belief. Major McNair states that incantations were resorted to for three successive nights to cause the death of the late Mr. Birch.

A substance supposed to possess magical powers is the Chula—the name given to hard horns or hornlike parts of animals. (See also Invocations and Hantu.)

Amulets are also formed of pieces of kunyit, banglé, and other substances

Amulets are also formed of pieces of kunyit, banglé, and other substances strung on a piece of terap bark, and bound round the neck, wrists, or waist. They are preservatives against demons, bad winds, and other evils generally. The chinkwi, a flower at a "wishing rock" in Klang, is reputed to possess the power of making the opposite sex follow and love the possessor.

Chasseriau Estate.—A large plantation situated between the E. Bukit Timah, Upper Kalang, and Upper Toa Payoh district, Singapore. Coffee, cocoanuts and tapioca.

Chator, Main.—The usual Malay word for chess, which is, however, in

some districts called main gajah, "the game of elephant." The game resembles our own, the following being the pieces:—

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Check is sah, and checkmate mat. A chess-board is papan chator.

Chawat.—The strip of cloth passing between the legs and fastened round the waist worn by the Malayan aboriginal tribes, as by the Hindus. It is often formed of terap bark, which is simply beaten out to obtain the fibre. Amongst a sub-family of the Mentira—the Udai, who inhabit the Muar tributaries—the females wear the chawat in the same way as the males.

Chedong Dua.-V. on N. bank of R. Sembrong, N. Johore.

Chenai.—District in N. Patani.

Chenaku or Blian.—The Sakei name for a man who is in reality a tiger (answering to the Wehr Wolf of German superstition). A belief in lycanthropy is widespread amongst both Malays and aborigines.

Chendia Bemban.-V. at the source of R. Madik in E. Johore.

Chengkal Bintang.—V. and hill in S. bank of Bernam R. just above its junction with the Slim R., N. Selangor.

Chengkal Bintang.—Hill and V., S. bank of Bernam R., 2 miles W. of Kwala Sempang, N. Selangor.

Cheno or Chuno.—A V. on the Pahang R., where it turns S. towards Jempol.

Cheno.—Imp. V. on S. bank of R. Pahang just beyond its turn E. in C. Pahang; about 4 miles N.N.E. of Gnau.

Cheras.—A. V. about 3 miles N.E. of Kajang in the S.E. corner of Selangor.

Chess (Chator or main gajah.)—"The game of chess is supposed to have been an invention of the Hindus, and, through them, to have been made known to the Malayan nations. This opinion, however, is not supported by the terms of the game in the Malay language. Had it been received directly from the Hindus, these terms, as in other cases, would have been wholly Sanskrit. They are not so, for some of them are Persian, some native, and one belongs to the Telinga; while those that are Sanskrit are but words long naturalized in other departments of the insular languages. It seems probable that the Malays, who alone are familiar with the game, borrowed it in comparatively modern times from the Mahommedans of the Coromandel Coast, who themselves had learnt it, directly or indirectly, from the Persians."* See Chator.

Chichak.—A lizard, of which numerous varieties are found in the Peninsula. The commonest is the little house-lizard, much liked from its fondness for mosquitoes, and which utters a cry like tuk-tuk as it scampers joyously over the walls and ceilings. The Malays call it chichak tegor. Like most of its family, it has the capability of reproducing the tail should that become detached by accident or when attacked. But in nearly all cases two tails or a bifurcated appendage takes the place of the missing member. The compiler has ascertained this to be a fact by personal experiment.

Chigar Gala.—V. on E. bank of Perak R. just below Kw. Plus, N. Perak.

Chigukantoh.—V. at a point on coast of C. Dinding marked Tanjong

Hantu on the Adm. Chart.

Chiko. - See FRUITS.

China (Chinese).—This word, which in the Malayan languages, in conformity to its practice in all such cases, is an adjective, is pronounced as an Italian would pronounce it. When the country is alluded to, the Sanskrit word negri, or the native one, benua, are required. It is difficult to determine from what source the Malay Archipelago have derived a word now so familiar to them. They may have received it from the Persian and Arabian merchants who passed through the Archipelago on their way to China, as early as the ninth and tenth centuries, or it may be the Malayan pronunciation of the word Tsin, the ancient name of China, north of the Yang-tse-kiang, received directly from the Chinese themselves.

That an early intercourse existed between China and the islands of the Asiatic Archipelago is certain, but there is, at the same time, no ground for ascribing a very remote antiquity to it. Ancient Chinese coins have been discovered in various parts of the Archipelago; and as these, with the exception of those of Java, are known to have been the only coined money of the Archipelago before the arrival of Europeans, they are sufficient to prove the existence of the intercourse. Thus several such coins were dug up in 1827 from the ruins of the ancient Malay settlement of Singapore, said to have been founded in 1160, and destroyed by the Javanese in 1252 of Christ. These coins have been deposited in the Museum of the Royal Asiatic Society, and bear the names of emperors whose deaths correspond with the years of our time, 967, 1067, and 1085. Besides this evidence, which carries us back to the tenth century, Chinese porcelain of antique forms—no longer manufactured—has either been dug up or found preserved as heirlooms. The wild aborigines of Borneo, for example, preserve many of the latter description; and it is hardly necessary to add that the natives of the Archipelago are ignorant of the manufacture of porcelain, but that it now forms, and at all ascertained times has formed, a main object of the export trade of the Chinese. In 1844, a singular discovery of pottery, glazed porcelain vases, was made in Java, amidst the relics of antiquity in a mountain towards the eastern end of the island, at an elevation of 9,000 feet above the level of the sea, which could hardly be other than Chinese. The name of the place in which the vases were found, some of them broken and some entire, is Argapura, a word partly Javanese and partly Sanskrit, and importing mountain palace or city.

Such testimony is unquestionably far more satisfactory than anything that can be gleaned from the literary records of the Chinese, which, however, are not wholly silent on the subject of the intercourse between China and the islands of the Archipelago. In 1815 there were given to me, by a highly intelligent Creole Chinese of Java, whose family had been for several generations settled in the island, a volume printed at Pekin, in the reign of the Emperor Kanghi, which contained some curious notices on the question. This work, now in the library of the British Museum, attributes the first intercourse with a country, supposed to be Java, to an era corresponding with the year of Christ 421. After a long interval, it states that it was renewed in the year 964; a period, it will be observed, corresponding with the date of the earliest coins already alluded to, and, respecting such coins, it makes the following curious and instructive remark:—"In this traffic they use the money of China, but of coinage older than the present times,

and the coin bears a value double what it does in China."

When the Portuguese first made their appearance in the waters of the Archipelago, they found the Chinese carrying on trade with its emporia much in the same way as they do at the present day. Albuquerque, when he took Malacca, found their junks lying in the roads; and Barbosa's statement, which evidently refers to the condition of Malacca before its conquest, is so detailed and authentic as to be well worth quoting. "There assemble," says he, "at the above city many other merchants, Moor and Gentile strangers, in order to traffic with the ships of China, which have two masts. These ships bring hither great quantities of silk in hanks (raw silk), and many vessels of porcelain, damasked silks, brocades, and

satins of various colours. They bring also coloured silk, much iron, saltpetre, fine silver, many pearls, large and small baskets, gilt fans, and incense. On the other hand, they take in return for these things, pepper, incense, cloths of Cambay, grained cloths (panni di grano), saffron, raw and prepared, coral, many cloths of Pulicat of painted (printed) cotton, cinnabar, quicksilver, amfiam (opium), and other merchandise, with drugs of Cambay, among which there is one which we know not, but which they call pauchou (puchuk), and another which they call

cachou (Cutch, terra-japonica)."

It deserves, however, to be noticed, that while there is abundant evidence of the trade and shipping of the Chinese, there is none whatever of their settlement in Malaysia. Barros specifies the different nations who were settled in Malacca under the Malay government—Javanese, Siamese, Peguans, natives of Bengal, Coromandel, Gujrat, Arabia, and Persia; but he makes no mention of the Chinese as settlers. Barbosa's account of the persons and manners of the Chinese is taken from his account of China, given to him by others, and not from his own personal observation, which would have been the case had he seen them as settlers. It is wonderfully accurate, considering that it is derived from native authority. "Respecting," says he, "what is at present to be written, I have my information from four different persons (Moors and Gentiles), men worthy of credit and great merchants, who had been many times in the country of China." After giving a very graphic account of the Chinese and their arts, which includes their speaking a language like German, that is, a guttural one, and their wearing shoes and stockings like the Germans and other inhabitants of cold countries, he adds: "They are also great navigators, who go to sea in great ships, which they called giunchi (Malay jung, a trading vessel), of two masts, and built in a fashion different from ours. The sails are of matting, and also the ropes. There are many pirates and robbers among the islands and ports of China, notwithstanding which the Chinese go to Malacca, and carry thither iron, saltpetre, and the like."-Barbosa in Ramusio.*

The emigrants from China are all from the four maritime provinces of the empire—Kwangtung, Fokien, Chekiang, and Kiangnan. Four-fifths of the whole number come from Amoy and Swatow, and about a tenth part from Canton, the emigrants from the two more northerly provinces forming but a very small fraction. Nearly all the emigrants consist of the labouring classes—fishermen, artisans, and common day-labourers. They usually arrive at their places of destination in great poverty, and are obliged to mortgage their labour to their resident countrymen in

consideration of their passage-money.

Chinese emigration differs in two material respects from all other emigration—that it consists mainly of adult males, to the exclusion of women and children, and that it never embraces either the upper or middle classes. The settlers, whenever it is in their power, form connections with the native women of the country; and hence has arisen a mixed race, numerous in the older Settlements, known to the Malays under the name of Peranakan China, literally, "Chinese of the womb," that is, Chinese by native mothers. These intermarrying, either among themselves or with native Chinese, a race of quadroons, and almost of creoles, has sprung up, differing from the original Chinese—perhaps somewhat less energetic, but always possessed of more local knowledge. From the nature of emigration, the proportion of males to females is always great. In Singapore the males are to the females in the proportion of five to one. The result, of course, is that the increase of the Chinese population by natural means is very slow. The entire Chinese population of the Straits Settlements was in 1881 as follows:—Singapore, 72,571 males and 14,195 females; Penang and Province Wellesley, 55,313 males and 12,507 females; Malacca, 15,721 males and 4,020 females; total, 143,605 males, 30,722 females: grand total, 174,327. The total number in the Peninsula is probably 220,000.

tained; but some notion of its amount may be formed from the number which lands in Singapore. This, on an average of years, is about 100,000, of whom about one-fourth settle in the island, the majority being sent on to Penang or dispersed among the neighbouring States. The number that return yearly to China from the same port is about 70,000, most of them resorting to it from neighbouring countries for the convenience of a passage.

As the Chinese are, next to Europeans—and indeed, in many respects, before them—the most active and valuable agents in developing the resources of the Archipelago, it will be convenient to give some account of their employment. Here is an enumeration of them in Singapore, furnished by an intelligent chief of their nation, in reply to queries put by the indefatigable editor of the Journal of the Indian Archipelago:—"The different trades and professions of the Chinese in Singapore are: schoolmasters, writers, cashiers, shopkeepers, apothecaries, coffinmakers, grocers, goldsmiths, silversmiths, tinsmiths, blacksmiths, dyers, tailors, barbers, shoemakers, basket-makers, fishermen, sawyers, boat-builders, cabinet-makers, architects, masons, lime and brick burners, sailors, ferrymen, sago manufacturers, distillers of spirits, cultivators and manufacturers of gambier and of sugar, cultivators of pepper and of nutmegs, vendors of cakes and fruits, porters, play-actors, fortune-tellers, idle vagabonds (who have no work, and of whom there are not a few), beggars, and, nightly, there are those villains, the thieves."

To this list must be added the general merchants and the parties engaged in the farming of all the branches of the public revenue, the last a department entirely in their own hands, and from which their superior skill and knowledge excludes all competitors. In the less populous parts of the Archipelago, such as the British Settlements, they may be said to occupy the largest part of the field of common labour, while in the more populous, as Java, their industry is generally restricted to what may be called skilled labour, as the manufacture of sugar and indice and the distillation of spirits.

indigo, and the distillation of spirits.

China Grass.—See Fibres.

Chinchielo.—A sambal made of shrimps.

Chinchin.—V. in district of same name in extreme E. of Malacca. Numerous tin mines exist in the vicinity, and a Police station at Pulau is within 1/2 mile. The V. is about 11/4 miles W. of the boundary line between Muar and Malacca formed by the Sungei Chohong, a portion of the R. Kessang.

Chinderong Dangloh.—V. on W. bank of Kinta R., 3 miles below the junction with it of the Raya R., C. Perak.

Chindras.—A V. in S. Johore, Negri Sembilan, the locality being auriferous. Some 18 years ago a company was formed to work gold at Chindras, but the difficulties of transport proved too great, and it came to nothing. Some seven hills in the immediate neighbourhood show traces of gold in fair quantities.

Chinese Lantern (Abutilon indica).—A plant introduced into the Singapore Botanic Gardens from the East Indies.

Ching.-V. about 5 miles N. of Malacca-town, on the high road to Tabu.

Chipan.—A cutting instrument mentioned in Malay annals, but no longer a vernacular word.

Chirana Petei or Puteh.—A small V. in the Tabu district, N. Malacca. A hot spring lies near it, and tin is found in the neighbourhood.

Chitty.—The name of a Madrassee caste whose members are, as a rule, money-lenders. The absence of any legislation respecting interest enables them to impose exorbitant rates, and the poorer classes suffer severely from their extortions. The well-to-do have less excuse for falling into their hands. They are most unfavourably looked upon, but there are, of course, good as well as bad amongst them, and more than one instance of generosity has been exhibited by men sup-

posed to invariably exact the uttermost farthing from their debtors. Their heads are kept close shaved, and their dress consists of a single cloth, with which they drape themselves sufficiently to meet police requirements.

Choa Chu Kang.-V. on Bri R., W. Singapore, Tengah district.

Chobong.—V. in Rembau, Negri Sembilan, about 6 miles N.W. of Sri Bulema.

Chocolate (Theobroma cacao).—The following remarks on this product appear in Mr. N. Cantley's Report on the Botanical Gardens, Singapore, for 1886:

—"Some plants of Chocolate which stood for some years leaf-eaten, extremities of the branches dead, and looking in a dying state, had, on the land coming under the control of the Forest Department, a number of Dadup trees planted among them for experiment. The Dadup trees have now grown to about twenty-five feet in height, and their branches having nearly met, the solar rays are prevented from striking the Chocolate plants directly.

"The result has been that the latter have thrown off their lethargy and started into determined competition for light with the *Dadups*, and have grown remarkably; the insects have given up attacking the leaves, and robust health has returned to them, but on other plantations where the plants have had shade from their infancy

they have mostly died."

The Chocolate plant has proved very capricious in the Straits, whole plantations going off without any apparent cause, except the attacks of leaf-insects, while here and there a solitary plant will for many years survive its fellows and go on bearing heavy crops of fruit. It has been said that animals or plants located in large numbers together are liable to epidemic disease, which loses its grasp only after the individuals are thinned down to health-permitting numbers. There is doubtless such a law in nature. What seems required is a knowledge of how far one can safely go without danger of calling its working into activity.

Chondong.-V. on S. side of Muar R., Gemunchi, Negri Sembilan.

Christianity.—It does not appear that any converts were made in the Peninsula until the conquest of Malacca by Albuquerque, when the Portuguese, during their dominion of 130 years, made a considerable number. At present but few natives profess Christianity, Roman Catholic converts forming the vast majority. Most arrivals from Europe are Protestants, the large Eurasian population belonging to the Roman Catholic Church. In the Native States, the Christian religion is almost unknown. See Missions.

Chu Chu Kang.-V. on Kranji R., W. Singapore.

Chuchu Kendei.—Hairpins of gold or silver, sometimes very well made, and worn by well-to-do Malay women.

Chula Naga.—(Lit. the Snake's Horns), called the Dragon's Horns or Asses' Ears in maps and charts. See Pulo Tioman.

Chumar.—A mining district in Perak, between Matang Padang and Jancore. Settled chiefly by Chinese who work the surface tin.

Chunkul Permuli.—V. on W. side of a hill, 3,194 feet, just S. of the Kampar district, S.C. Perak.

Chuno.—Village. See Cheno.

Chupak.—A quart measure. See Weights and Measures.

Chupa Rock.—Just below Tanjong Sarong, the W. extremity of Blakang Mati I., S. of Singapore.

Cicada (Riang riang).—Several species exist, including the largest known. Their strident noise is overpowering and most annoying to invalids. The bodies measure about 3 inches in length.

Cinchona (Cinchona saccirubia).—Experiments in the cultivation of this tree appear to be fairly successful, but too short a time has elapsed since they were commenced to speak positively. In Java it proved a most profitable cultivation, the bark selling at even better prices than South American.

Cinnamon. (Cinnamonum zeylandicum).—The kayu-manis, or sweet wood, of the Malays. The true cinnamon of Ceylon is certainly not a native plant of any part of Malaya, nor are the cinnamons of Cochin-China and China. Most of the large islands, however, produce one, or perhaps several species, with little aroma, and consequently of little value. A cinnamon of this description is produced in Java, Sumatra, Borneo, and Luzon, but is described as most abundant in Mindanao, Of late years, however, the cinnamon of Ceylon has been cultivated in the British Settlements in the Straits of Malacca, and as the climate is suitable, and the plant a hardy one, requiring but a moderate fertility of soil, it should seem to be one of the exotics most likely to succeed. Moderate success only, however, has attended the attempts to cultivate the tree in Singapore and other portions of the Straits Settlements. Specimens of the Wild Cinnamon (C. iners) above referred to are in cultivation at the Singapore Botanic Gardens.

Circumcision (sanat).—This rite was introduced with the conversion of the Malays to Mahommedanism, and is confined to males. It generally takes place from 10 to 15 days after birth, and the name which the infant is to bear for life is bestowed on it.

Citron (Limau kerbau) (Citrus medica).—Several kinds of citron are found in the Peninsula, but the fruit is seldom offered for sale. It was originally a Persian fruit.

Civet.—In Malay this perfume is known by the native name of rasé, but the Sanskrit one kasturi, and the Arabic zabad, corrupted jābad, are also used as synonyms. The article is produced by two distinct species of Viverra, rasé and zibetha, which are kept in a half domesticated state for the purpose of yielding it. The first is a native of Java, and the last of the other large islands. The natives of rank are great consumers of this perfume, not generally acceptable to Europeans.

Claymore.—A district of Singapore embracing the portion occupied by Government House and other important European dwelling sites in the vicinity. The word is no longer used locally, but still retains its place upon the map.

See Rassi and Delundung.*

Clogs.—The Malay clog is kept to the foot by a knobbed peg which passes between the big and second toes. It is made of a white light wood.

Cloth has been woven from time immemorial in Malaya, but the introduction of foreign goods has materially diminished the manufacture. That used for sarongs is largely imported from Celebes (Bugis) and Palembang in Sumatra. It is doubtful if any large looms are employed on the western side of the Peninsula. See article on dress, which contains several details regarding the materials used.

Clove (Bunga chingkih) (Caryophillum aromaticum).—The cultivation of the clove has so long been looked upon as a thing of the past in the Peninsula and Straits Settlements, that the fact of its being a regular article of export from Penang will be new to many. Both in that island and in Province Wellesley, it is cultivated with success, but the trees are much shorter lived than in the Dutch possessions. The Penang product commands a slightly higher price in the market than its rivals. Mr. Cantley says (Report, 1886):—"The clove-trees raised from Singapore-grown seed and planted in the Tanglin Nursery look remarkably healthy, both in swampy ground and on the hill-sides. They could hardly succeed better anywhere than they are doing."

Clown.—As elsewhere stated, almost the only form of stage-play common amongst the Malays is the puppet show. Plays are, however, sometimes given, and the clown is then almost always a member of the troupe. He is called pran.

Coal (Arang tanah).—Has been frequently found in the Peninsula, but never in paying quantities, and all used in the Settlements are imported. A vein of anthracite, in conjunction with imperfect plumbago, was discovered by Col. Low at Pearl's Hill, Singapore, in 1846, but it did not exist in a workable amount. Traces of coal were also found in the reclamation cuttings at the same port in 1883.

Cobra di Capello (Naja tripudians).—The Ular tedong of the Malays. Four varieties of this deadly snake are found in the Peninsula and Settlements, viz., that with an ocellated mark on the back of the neck; a second with slight white marks at the edge of the hood and one (or two) white patches under the neck; a third all black; and the fourth brown. Their eggs are frequently found in decayed bamboos. None of the "spectacled" varieties are found, and those named are all referred to the same species, though I should be inclined to say they deserve distinguishing names. All cobras have three scales behind the eyes. Fortunately they never bite unless trodden on or otherwise annoyed. Two or three deaths only from cobra bite have taken place in the Settlements during the past ten years. See Hamadryad.

Cock (Ayam jantan).—One species of the genus Gallus is found in the wild state in the Peninsula. Nearly everywhere, even among the rudest tribes, the common fowl is found in the domestic state, and in this condition bears a close resemblance to the species called by naturalists Gallus bankiva, which is the sole one of the Malay Peninsula. Most likely, this is the origin of the domestic bird of the Asiatic Archipelago. The names by which it is known in the native languages are the only clue to the history of its introduction and dissemination. In Malay it is called ayam, equivalent to our own word "fowl," but specially applied to the domestic bird when used without an epithet. The wild bird is expressed by

adding the Malay word utan, meaning "forest."

The Malay domestic cock is of the true game breed, full of courage, but inferior in size to the game cock of Continental India, which is larger than our own, and more powerful. Indeed, among the Malayan nations, there is no distinction, as with us, into game and dunghill fowls, all being of the first description. It, moreover, as to colour, sports less than with us. The Gallus bankiva, or the imagined variety of it called the Malay gigantic cock, is supposed by M. TEMMINCK, who is followed by other naturalists, to be the source from which our European poultry are derived. This Malay gigantic cock I have never seen, nor do I believe that any such native variety exists. Neither does it seem to me reasonable to fancy that our poultry is derived from any Malay breed whatsoever, seeing that in the remote antiquity in which it was introduced into Europe, no communication whatever is ascertained to have existed, direct or indirect, between Europe and the Asiatic Archipelago. The introduction of the common fowl into Europe is beyond the reach of all record, even in Greece. It is faithfully represented on the walls of ancient Etruscan tombs, and, even among the rude inhabitants of Britain, it was found nearly 2,000 years ago. All that is pretty well ascertained is, that it never existed in the wild state in Europe or in Africa, or in any part of Asia west of Hindustan. Most of the advanced nations of the Asiatic Islands are gamblers, and the favourite shape which gaming takes with them is cock-fighting, the only material exception being the Javanese. The passion for cock-fighting is impressed on the very language of the Malays. Thus there is a specific name for cock-fighting, one for the natural spur of the cock, and another for the artificial; two names for the comb, three for the crow, two for a cock-pit, and one for a professional cockfighter.*

Cock-fighting.-This has long been a favourite amusement with the

Malays, but is prohibited by law in the British possessions. Spurs are used called golok or taji (q. v.), and the cock-pit is galanggang. The matches are conducted in the same way as was common at home in bygone years. The following curious ceremony relating to training the birds for fighting is related by the Abbé Favre:—

"Opium having been prepared, and a pipe, a candle, and all the other necessaries to smoke having been brought in, the king took the head of the cock, passed his beak twice through the flame of the lamp, after which he made the animal walk six or seven steps, which was repeated six or seven times; this preliminary ceremony being ended, he dipped his fingers in the oil of the lamp, and rubbed the cock under the wings and upon the back, and then immediately commenced smoking opium: having inhaled the smoke of the drug in the ordinary manner, he blew it into the beak, the ears and upon every part of the body of the poor animal, which, though accustomed to that exercise, appeared not to take any peculiar pleasure in it. This being finished, the same ceremony began a second, and finally a third time, after which the cock was carried carefully to his ordinary place, and left there to pass the night under the influence of opium. The desire I had to sleep on account of my indisposition made me see with satisfaction the end of this tedious ceremony. It appears that the way of bringing up cocks, by smoking opium, is much used by those of the Malays who are fond of cock-fighting."

Cockles.—These abound on the coast of the Peninsula. In the Muda district, Province Wellesley, enormous mounds of cockle-shells, 20 to 30 feet high, exist. How they came there is a puzzle.

Cockroach (*Lipas*) Blatta Orientalis.—This disgusting insect is found in large quantities in rice and sugar godowns, and in Malaya reaches from $1\frac{1}{2}$ to 2 inches in length. It is omnivorous, and will eat calomel with as much apparent relish and impunity as boots and shoes, paper, &c. Nothing has yet been discovered which will exterminate them, except killing them in detail. As a rule the houses at the Straits Settlements are far less troubled with them than those of Hongkong.

Cockup.—Probably a corruption of the name ikan kakap, a species of perch.

Cocoa (Cacao).—Not indigenous to the Peninsula. Cocoa-trees have been cultivated with some success in a few plantations, but no striking success has as yet rewarded the cultivators' efforts.

Cocoa-nut.—The tree, par excellence, of Malaya. It is too well known to need description, vast plantations existing throughout the Peninsula and British Settlements. The trees are infested by two species of beetles which do immense damage, whole tracts of trees having, in places, been destroyed. The Malay words for cocoa-nut are klapa and nyok, the latter being used in the Northern Native States.

A rare variety bears a nut, the flesh of which is red in place of white. Cocoanut in its dried state is known as coprah (q. v.).

Cocoa-nut Beetles (Kumbang)—are two varieties of Coleopterous insects—the Rhinoceros beetle, Oryctes nasicornis, and Calandra palmarum, a weevil belonging to the section Chynchophora and family Curculionidæ. The perfect beetle only of Oryctes nasicornis, attacks the cocoa-nut palm, the eggs being deposited and the grubs or larva hatched in paddy husk, paddy straw, cattle manure, stable litter, sugar-came megas, dead cocoa-nut-trees, or any other refuse or litter of a similar nature, where the grubs remain until they become perfect beetles, when they make their way out at night and fly to the nearest cocoa-nut-trees to make their attack. After alighting on a tree, the beetle makes for the butt end of the leaf on which it is, and bores through this towards the centre of the tree, passing through other leaves young and not unfolded, flower-stalks and

spathes, till it reaches the central shoot, where it feeds on the cabbage. If left undisturbed, or the tree is often attacked, it is sure to die. The only remedy is to extract the beetle by thrusting a stout iron barbed needle into the hole it has formed, transfixing it and dragging it out. It is, however, a hopeless struggle to contend against this beetle if there are any breeding-places left undisturbed anywhere within a mile of a cocoa-nut plantation. All refuse, rubbish, or dead trees should be burned or buried at sufficient depth to prevent the beetle making use of them as breeding-places. Considering the great increase in numbers of this beetle during the last few years, and the great damage it has done to valuable property, Government should make stringent regulations for the destruction of this pest, and take precautions to prevent its breeding, or it may reach such numbers as to defy all hopes of its ravages being kept within bounds.

Calandra Palmarum. It is the larva or grub of this beetle which does harm to the cocoa-nut-tree. Its habits, &c., are not well known, but it is thought that the perfect beetle does no harm to the tree, merely flying from tree to tree to deposit its eggs in suitable places, probably in the crown of the tree between the young leaves. The grub eats out the heart of the tree near the middle shoot until it arrives at a certain age, when it bores its way to the outside and makes for itself a cocoon of cocoa-nut fibres, from which it emerges as a perfect beetle after a certain time, and flies away to deposit its eggs on other trees and thus spread destruction. It is not usually so numerous or harmful as Oryctes nasicornus.

Cocoa-nut Oil.—The following notice of this article of local trade is

of interest. It is quoted from the Indian Engineer :-

"The importation of palm and cocoa-nut oils added an important variety to the list of soaps, particularly of toilet soaps, the former being a useful and pleasant material, improving all soaps into which it enters; which cannot, however, be said of cocoa-nut oil, as it retains a rancid odour which it seems impossible to remove, and which is to most people objectionable, so that it should be used sparingly. On the other hand, it has many good qualities, giving the soap a fine appearance, and in use giving a copious lather. It has also properties peculiar to itself; thus, it saponifies only in strong lyes, and will dissolve in salt water, and is often called 'marine soap.' It will also retain a large percentage of water without impairing its solidity or appearance. These properties it in some degree imparts to other soaps to which it may be added, and it has the means of much sophistication and adulteration, which has given to purchasers an idea of inferior quality, yet to some it is a favourite because of the richness of its lather."

Cocoa-nut Pearls.—The following remarks concerning these peculiar

accretions are extracted from Nature:-

"During my recent travels," Dr. Sydney Hickson writes to a scientific contemporary, "I was frequently asked by the Dutch planters, and others, if I had ever seen a 'cocoa-nut stone.' These stones are said to be rarely found (1 in 2,000 or more) in the perisperm of the cocoa-nut, and when found are kept by the natives as a charm against disease and evil spirits. This story of the cocoa-nut stone was so constantly told me, and in every case without any variation in its details, that I made every effort before leaving to obtain some specimens, and eventually succeeded in obtaining two.

"One of these is nearly a perfect sphere, 14 mm. in diameter, and the other, rather smaller in size, is irregularly pear-shaped. In both specimens the surface is worn nearly smooth by friction. The spherical one I have had cut into two halves, but I can find no concentric or other markings on the polished cut surfaces.

"Dr. Kimmins has kindly submitted one half to a careful chemical analysis, and finds that it consists of pure carbonate of lime without any trace of other salts or vegetable tissue.

"I should be very glad if any of your readers could inform me if there are any

of these stones in any of the Museums, or if there is any evidence beyond mere hearsay of their existence in the perisperm of the cocoa-nut."

On this letter Mr. THISELTON DYER makes the following remarks:—"Dr. HICKSON'S account of the calcareous concretions occasionally found in the central hollow (filled with fluid—the so-called 'milk') of the endosperm of the seed of the cocoa-nut is extremely interesting. It appears to me a phenomenon of the same order as tabasheer, to which I recently drew attention in *Nature*.

"The circumstances of the occurrence of these stones or 'pearls' are in many respects parallel to those which attend the formation of tabasheer. In both cases, mineral matter in palpable masses is withdrawn from solution in considerable volumes of fluid contained in tolerably large cavities in living plants—and in both instances they are Monocotyledons.

"In the case of the cocoa-nut pearls the material is calcium carbonate, and this is well known to concrete in a peculiar manner from solutions in which organic matter is also present.

"In my note on tabasheer I referred to the reported occurrence of mineral concretions in the wood of various tropical Dicotyledonous trees. Tabasheer is too well known to be pooh-poohed; but some of my scientific friends expressed a polite incredulity as to the other cases. I learn, however, from Prof. Judd, F.R.S., that he has obtained a specimen of apatite found in cutting up a mass of teak-wood. The occurrence of this mineral under these circumstances has long been recorded; but I have never had the good fortune to see a specimen."—Quoted from the Singapore Free Press.

Cocos Islands.—Two groups of islands are known by this name. That best known consists of four islands on the western coast of Sumatra, but does not come within the scope of this work. The other group of the same name, lying some 800 miles S.W. by S. of Singapore in lat. 11° 40′ S. long. 97° 10′ E., is more correctly known as the Keeling Group, but is locally known as the Cocos-Keeling Group. Until 1886 it was attached to the Ceylon Government, but does not appear to have ever been visited by any official from that Colony. In March, 1886, it was proclaimed an appanage of the Straits Settlements. The following account of the island is condensed from the Report made by Mr. E. W. Birch, who, in August, 1885, was sent there by the Straits Government:—

"In obedience to the instructions of His Excellency, I embarked on board H.M.S. Espoir, Lieutenant Commander Horace R. Adams, R.N., on the 10th of August. The weather was fine until daylight on the 20th, when we experienced sharp showers of rain. The wind fell with the rain, and so getting up steam again we pushed on and reached the Cocos Islands at 10.30 a.m.

"We entered by the channel between Horsburgh Island (on the right) and Direction Island (on the left), and, after steaming slowly for about a quarter of a mile into the lagoon, anchored in smooth water of between five and six fathoms. Ships drawing not more than twenty feet of water can easily enter and occupy this anchorage, which has a coral and sandy bottom and affords good holding ground.

"The islands present a much larger appearance than a cursory glance at the chart or the perusal of Forres' book ('A Naturalist's Wanderings in the Eastern Archipelago') lead one to expect. I cannot better describe their general appearance than by borrowing from the language of the Rev. E. C. Spicer, a naturalist whose researches Captain Adams was able to further by giving him a passage from Batavia to the islands:—'The group of coral islands, called the Cocos, form a roughly broken circle nearly approaching the horse-shoe shape common to coral atolls. The islands are of varying size, some being from one to seven miles in length and others a few hundred yards, while the smallest are simply mounds of coral sand crowned by a few cocoa-nut palms. They are connected under very shallow water by the hard cement rock on which they rest, and which is formed by

the disintegration, through the blows of the heavy surf, of an enormous quantity of corals and marine shells. Outside the islands and nearly all round the group a natural barrier protects the lagoon, and seaward of this bar there is a sudden slope into very deep water. The appearance of the exterior and of the interior of the islands is strikingly different. Towards the ocean the heavy surf breaks over the jagged rocks and washes large pieces ashore. The interior shores are quietly washed by a clear green shallow sea, and the smooth sandy beach forms a pleasant contrast to the green vegetation above it. The circle of the islands bounds a lagoon for the most part of very shallow water with pits of varying depth. The land is evidently rising and, at some distant time, will form a circular island surrounded by a crater-like edge. The resemblance of the whole to a giant crater is very striking.'

"The islands are over twenty in number, they are for the most part very narrow and, without any exception, are thickly planted with cocoa-nut palms. The beach is covered with pumice stone which was washed ashore some five months or so after the Krakatao eruption in August, 1883. The sand is the whitest and finest I have ever seen, and under the microscope shows the most minute shelly particles. The clearness and buoyancy of the water in the lagoom makes seabathing very pleasant, and, though sharks are said to abound, no accident has ever

occurred.

"Immediately after the Espoir was brought to anchor, Mr. Charles Ross, who, in the absence of his elder brother, Mr. George Ross, is in charge of the islands, called on us. He was accompanied by a cousin, Mr. William Ross. I briefly explained the object of our visit, and Mr. Charles Ross repeatedly assured me that he and the other members of the family would be happy to render every assistance towards my inquiries. From the earnestness of his manner it was clear to me that our visit was a source of unmixed pleasure to him. He and some of the family at first thought that war had broken out, and that therefore a man-of-war visited them, but when I told them that the head of the family had applied at home for a grant, Mr. Charles Ross at once explained that the laying of a telegraph cable from Batavia was their dream, and that they wished for definite relations with the British Government for the purposes of the cable. He corroborated his brother's statement that some old title-deeds were lost in a great fire that occurred in the island many years back, but I was never able to obtain from them any description of what the old deeds referred to consisted.

"The Ross family is one that shows no signs of being likely to die out. They are a remarkably healthy-looking lot, and the brothers are fine muscular men of more than ordinary physique. The hard out-of-door life they lead is in itself healthy. They have been well educated and are quick and intelligent. They can turn their hands to any kind of work, and take much trouble in teaching the people every description of handicraft. Their manners are extremely courteous, and what they call their 'rough hospitality' is unbounded and thoroughly

cordial.

"The history of the islands, as I gathered it chiefly from Neh Basir, the

oldest inhabitant, now in his eightieth year, is as follows :-

"The Raja of Bandjer made a present of the old man's mother (together with a number of other people, about two hundred in all) to Alexander Hare. Neh Basir's father was left behind in Bandjer, but his mother accompanied Hare to Malacca, and there Neh Basir was born. After a stay of a few years in Malacca, Hare left with all his people, wandered over Borneo and Java, going finally to Bencoolen. In 1820, when Sir Stamford Raffles was Governor of Bencoolen, Hare made up his mind to go to the Cape, and, as it was necessary that he should take his followers there as freemen, he procured for all of them certificates of emancipation from slavery. Those of Neh Basir and of a girl, Daphne, who afterwards became his wife, I have seen, and attach a fac-simile of his certificate.

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After a stay of nearly seven years at the Cape, Hare and his followers came over to the Cocos Islands in 1827, and found them quite uninhabited. In the meantime, i.e., in 1825, the original Ross, the grandfather of the present proprietor, had come to these same islands, and finding them unoccupied had returned home to Scotland to induce people to come out and colonize them. When he returned in 1827, he found that Hare was there. Curiously enough, Hare had been brought there in a ship commanded by Ross's own brother, viz., the Melpomene, in which vessel Hare had a large share. The two factions lived on bad terms with each other, and though many of Ross's colonists left the place owing to its being already occupied, the Ross influence exceeded that of the Hare. Hare, an idle man of most eccentric habits, was gradually deserted by his followers, who, headed by Neh Baste, went over to Ross. Finally Hare left the islands and, it is said, came to Singapore to die.

"In 1854 Ross died and was succeeded by his son, J. G. CLUNIES-Ross. The islands, which had been from time to time called at by ships of various nationalities, received a formal visit early in 1857 from H.M.S. Juno. Captain Freemantle then took possession of the group in the name of the British Government and appointed J. G. C. Ross to be Superintendent. The Juno remained some three months, and the incidents of her visit are strongly imprinted on the memories of some of the Islanders. Before she left, a Russian man-of-war called in and saluted the English flag. I was so fortunate as to come across certain documents, of which I attach copies, which clearly show what was done at the time. In 1862 a terrible cyclone devastated the islands. In 1864 H.M.S. Serpent, a surveying ship, called there. In 1871 Mr. J. G. C. Ross died, and his eldest son, the present Superintendent, succeeded him. In 1875 another cyclone occurred. It was terrible in its fury. It killed the cocoa-nut trees on most of the islands and destroyed the houses of the people and many of the brick buildings and factories of the Ross family. Three aneroids went past the lowest mark and stuck, the mercurials being dashed against the wall and broken.

"It is admitted that before 1857 the Dutch flag was flown on Cocos vessels trading with Batavia, and in one of his letters Mr. J. G. C. Ross states that he was a naturalized subject of the Netherlands, but no one will admit that the flag of Holland has ever been hoisted on the islands themselves. The Ross family distinctly assured me that no other flag than that of England had ever been flown by them since 1857. This is corroborated by the older inhabitants. The inclinations of the family are decidedly British, and there is no reason to suppose that their assurances, in this respect, are open to the suspicion of a doubt.

"The population of the islands is divided into two classes:—(a) Cocos-born Malays; and (b) imported coolies from Bantam (Java).

"The Census Statistics of past years were taken to Europe by George Ross, but the following figures for 1874, 1880, and 1885 will show that the population is on the increase. It is the policy of the Ross family to reduce gradually the number of imported coolies, but they encourage the permanent settlement of these coolies in the Islands.

			Cocos-born.		Bantamese	.	Total.
1874	•••	•••	 292		198		49 0
1880	•••	•••	 310	•••	125	•••	435
1885		•••	 377		139		516

In former years the coolies were convicts sent over for work in the Cocos by the Dutch authorities, but they were a turbulent set of men, and the last of them were sent away in 1875. This accounts for the falling off in the Bantamese population shown in the returns for 1880.

[&]quot;The present population may be summarized as follows:—

Cocos-born. Married Widowed Unmarried Children					Male. 63 8 20 104	•••	63 11 4 104 182
Bantamese.					Male.		Female.
Married	•••	•••	•••		30	•••	30
Widowed	•••	•••	•••	•	2	•••	5
Unmarried	•••	•••		•••	15	•••	1
Children	•••	•••	•••		29	•••	27
					76		63
				1			

The registration of Births, Deaths, and Marriages is compulsory. All births and deaths must be notified to the head of the Ross family within twenty-four hours, and any failure to do so is punishable with a fine. In the case of marriages it is obligatory on the married couple to go immediately after the celebration of the marriage in the mosque, to the office of the Ross's. They are accompanied by their parents, by the elders of the village, and by the Chief Priest, and the entry having been made in the register, is attested by the Priest and by a member of the Ross family. Divorces are also taken note of, an endorsement being made opposite to the marriage entry.

"There have been one hundred and fifty-eight births since the 1st of January, 1880. Of these, eighty-five were the births of boys and seventy-three of girls.

"In the same period there have been fifty-seven deaths, thirty-three being males and twenty-four females. It is worthy of note that of the number of deaths no less than thirty-five resulted from beri-beri. An epidemic in 1883—4 carried off

twenty-four people.

"There have been ninety-one marriages since 1855, of which number twenty-three have taken place since the 1st of January, 1880. Marriages are celebrated in accordance with Mahommedan law. Amongst Malays in our parts of the Peninsula, it is customary for the parents to arrange the marriages of their children, but at the Cocos the European custom is imitated, each man being at liberty to make his own choice. If the woman gives him any ground to hope that his attentions are not displeasing to her, it is customary for him to make some little ornament or article for use with his own hands and present it to her. The usual present made is a little comb made of tortoise-shell and worn in the back hair. One pretty little girl was in possession of eight combs so presented to her. She presented us with two of them which had been given to her by lovers who had since proved faithless. No man is allowed more than one wife.

"Divorces are by mutual consent, and are obtainable in the forms prescribed by

Mahommedan law. Only two have taken place since 1855.

"The exports of the place are copra, cocoa-nuts, cocoa-nut oil, beche-de-mer, and mengkudu (a bark used for dyeing purposes). Cocos copra is said to command the highest price of any placed on the market, and the people attribute this fact to their patience in waiting till the nut falls from the palm instead of plucking it. From October, 1882, to the end of 1884, 1,527 tons were exported, at an average price of £19 per ton. The actual quantity of nuts used to make up this quantity was close upon eleven millions.

"Cocoa-nuts are also exported to Batavia and elsewhere at the rate of nearly £118s. per thousand. During 1883 and 1884 half a million were so exported.

"Cocoa-nut oil is manufactured in three qualities:—(a) hand-made cold-drawn; (b) hand-made cooked; and (c) machine-made oil. The first quality (a) commands a price varying from £31 to £31 10s. per ton; the second quality fetches from £30 15s. to £31 per ton; and the inferior quality (c) from £29 to £30 a ton. In all, of all three qualities, about two thousand five hundred piculs are exported annually. Eighteen piculs (Dutch) equal one ton.

"Bêche-de-mer has not been shipped for some years, but the seas abound in it, and, on the return of Mr. George Ross, it is expected that the trade in this respect will be re-opened. The average price in former years was about £1 17s. 6d.

per picul.

"The price of mengkudu is said to vary very much. The last shipment fetched

about £2 per picul. About sixty tons are exported annually.

"All produce for the European market is called for once a year by a chartered vessel. Produce for Batavia is sent up in the family schooners. Cocoa-nuts are sent to Batavia, cocoa-nut oil to London and Batavia, copra generally to Hamburg, once

to Liverpool and once to Lisbon.

"All provisions are obtained from Batavia, one of the Cocos schooners making a trip for this purpose once a month. The imports include rice, sugar, flour, tea, coffee, tobacco, sago, pepper, gambier, gum benjamin, green peas, clothes, and turmeric. These stores are all kept by the Ross family, and are sold to the natives on any day of the week that the people ask for them, except on Saturdays and Sundays. Anything special that the people ask for is ordered and sold to them. This year, for the first time, the Ross family tried the experiment of getting out a shipment of stores, &c., for the Islands from London. They did so to the extent of £5,000 worth. The invoices had not yet arrived, and the goods were not yet unpacked, but the shipment contains clothing, house and cooking utensils, crockery, cutlery, glass, mechanics' tools, guns, fishing-rods and tackle, and all manner of articles of use.

"The principal imported article of consumption is, of course, rice. This is served out to the people every Monday. It is calculated that each individual consumes one pound per diem, and each family is allowed to buy to that extent. Sometimes the schooner may be delayed by stress of weather or other causes and then the supply of rice may fall short. Whenever this happens (which it is said very rarely to do, but which was unfortunately the case when I was at the Cocos), the rice is served out sparingly, and each person can only buy half the allowance, but then he is only compelled to work three days a week, all extra work at such times earning extra pay. The measures used for meting ou the rice are made out of and called 'bamboos.' One bamboo may be taken to be the equivalent of one pound.

"Five bamboos of rice are worth $R^{\frac{1}{2}}$ in copper.

"Seven bamboos a week is the quantity allotted to Bantamese coolies according to their contracts.

"Ten bamboos (the largest measure) = R. 1 in copper.

"A rupee in copper, i.e., Cocos currency, is taken to be equal to two-thirds of

a silver rupee.

"The surrounding seas literally teem with fish, and the natives are most expert boatmen and fishermen. They use the large and the small nets known to Malays in the Straits, namely, the jaring and jala, but their chief skill lies in harpooning. It is very rare to see a man miss a shot with the harpoon, the accuracy with which they throw being little short of marvellous. On one occasion two or three of us were wading through coral shoals on our way out to a boat anchored in deeper water when a largish fish suddenly darted past us, and quick as thought a Cocos man who was walking by me went after it. The chase was exciting. We could see the flashes of the fish as it darted backwards and forwards and as it turned baulked by the man, who kept on cutting it off at angles. Finally, it went through

a mass of sea-weed, and we had made up our minds that it had escaped, when the man hurled his harpoon and returned with his prize—a fat 'beard-fish,' so called from the fact of its having two barbs hanging from its lower jaw. Green fishing is exciting work, some of the large green fish making great play. A member of our party caught one of these fish which weighed exactly thirty pounds. The parrot fish, of a beautiful greenish-blue colour, abounds, and there are fine varieties of the red and grey mullet.

"No fishing stakes or weirs are allowed-a useful regulation, which gives the

poor man an equal chance with his richer neighbour.

"As I have said before, all the islands are thickly planted with cocoa-nuts. In the Settlement and West Islands the space between the trees is kept clear, and the appearance is more that of a plantation, but in the other islands all the nuts, leaves and rubbish are allowed to accumulate. Two or three times a year a working party goes over, picks up and husks all the nuts, and then leaves the refuse, sometimes burning it. The rotting away of all this rubbish, which is assisted by the working of small ants, forms a good manure for the trees. In some of the islands a regular undergrowth grows up, and in some, such as Direction Islands, the wild and very sweet papaw grows luxuriantly.

sweet papaw grows luxuriantly.

"The cocoa-nut trees are not stepped (monkey-laddered) here as they are everywhere else. The fruit has a very thick husk, the nut itself being small and in some cases quite diminutive. The kernel is very thick, and though the nut does not give

much water it can produce more copra and oil than much larger nuts.

"The nuts assume all sorts of fantastic shapes, the most remarkable being the horned cocoa-nuts, which have excrescences like ram's horns growing outside the husk, The branching palms on West Islands are very remarkable.

"The natives draw sugar from the palm, but no toddy is allowed to be made by them for their own use; it used to be, but it led to much drunkenness, and Mr.

George Ross had to forbid its manufacture.

"Soap is made by placing ashes on a perforated board, and by pouring on water which dissolves the potash causing it to trickle through. It is then mixed with cocoa-nut oil, is tested by hand and boiled till it becomes thick, when it is cooled down in a pan."

"Vinegar is also made. It is merely toddy put into a bottle, corked down and

left to stand for a fortnight.

"The Cocos process of making bread is very simple. The flour is placed in a large tray, salt is sprinkled over it, and toddy of two kinds (sweet and bitter) is added in small quantities by means of a ladle. All is well mixed, and in a good sticky state, is beaten on a table sprinkled over with flour; it is then raised in both hands high above the head and banged down over and over again on the table, and when well beaten is put into moulds. At the end of three hours from the time the process commenced, it is placed in the oven and baked.

"Since 1874 eighteen ships from Australia have called for water, which is put on board at a charge of ten shillings per ton. In 1879 four of these ships came in, but as a rule only one calls in each year. The last ship that called arrived on the 17th of July, 1884. The Islanders can put about forty tons of water on board a ship in a day. They used to have a flume eighty yards long with cast iron pipes running from Settlement Island into the sea to carry the water, but it was destroyed

in the 1875 hurricane and has not been repaired since.

"The Bantamese coolies are engaged by the Ross Agent in Batavia, and they

receive what is called a Sea-pass to enable them to proceed to the Cocos.

"Their engagements are for such terms as they agree to, generally for ten years, but in a few cases they have engaged for three years only. They receive an allowance of seven bamboos of rice a week, firewood, cocoa-nut oil, salt, and medicines free. They are allowed small plots of land and get the materials to build in the same way as the Cocos-born. They may take cocoa-nuts for their own use from

South Island at any time between noon on Saturday and sunset on Sunday, and they may fish wherever they like. Their pay is Rs. 10 a month for nutting, and they must for this husk four hundred nuts a day. For other work they are paid Rs. 8 a month. Three Bantamese have been registered as naturalized Cocos men, having expressed their determination never to leave the islands. Four others have been in the islands for over twenty years. Seventeen more have lived there for more than fifteen years. Thus it will be seen that no less than twenty-four men out of a total of forty-seven have over-stayed the terms of their engagements. It is not at all uncommon for them when their agreements have expired to go back to their country with a free passage and to again return on the same terms.

"There are actually forty-two able-bodied coolies at work, and of these fourteen have credit balances with the Ross family ranging from 20 to 254 guilders. The above facts establish pretty clearly the conclusion that the Bantamese may be looked upon as likely to become permanent settlers. When once married they

generally make up their minds to stay in the islands with their families.

"The matrimonial customs of the Bantamese are peculiar. They have to send to Batavia for wives, whom in many cases they have not known before they come to the islands. No Cocos-born will intermarry with the Bantamese, or 'coolie' as they are called, so when a coolie wants a wife, he goes to the Ross family and asks that one may be imported from Batavia. In some cases, when the men have a good credit balance lodged with the Ross's, they take an advance and go and choose their wives. As a general rule, however, the Ross's send to their agents for the women in such number as they are required, and on the arrival of the schooner with the women, the applicants for wives make their choice, and, after celebrating the marriage, make the necessary entry in the register. Their private life is not so moral as that of the Cocos-born, but there is not much serious crime. Eleven years ago some of them made off with one of the island schooners, but they were recaptured. None of that gang are here now. Fifteen years ago one of them killed his wife and was sent to Batavia for punishment by the Dutch authorities.

"I had a long quiet talk with their Penghulu, Satipan, who first came here in 1868, returned to Batavia in 1880, and came back to the islands after a short absence. He is in every way contented, and has no complaint to make either on

his own account or that of any of his people.

"The currency of the place is paper money, stamped notes of sheepskin signed by the head of the Ross family. They are of six values, viz., \(\frac{1}{2}\) Rupee, \(\frac{1}{2}\) Rupee,

R. 1, Rs. 2, Rs. 3, and Rs. 5.

"The wages paid for labour are at different rates in guilders, some of which are as follows:—A trained blacksmith f12.50 a week; a carpenter from f4 to f7.50; a mason f6; coxswains of boats and overseers f6; boatmen f3.50; nutters, who must collect and deliver the nut husked, f1 for every five hundred cocoanuts. Bantamese contract coolies, able-bodied men working at nutting, f10 a month; second class or weak coolies f8 a month. Washing is done at the rate of f1 for twelve pieces.

"From inquiries made amongst the natives, I take these rates of wages to be

put at the maximum rate.

"The records kept of thermometer readings for 1874 give the following

losalus .	Te	Lowest mperat		Highest mperature.	i	Lowest Temperature.			Highest Temperature.	
January	•••	77	•••	87	July	•••	74		. 85	
February	•••	75	•••	88	August	•••	74		85	
March	•••	77	•••	86	September		72		86	
April	•••	74	•••	84	October		76		86	
Мау	•••	76	•••	86	November		76		86	
June	•••	75	•••	85	December		74		86	
				[8	37]					

"The barometer varied as follows in 1884:-

January	•••	29.89	to	29.98	July	 29.85	to	29.98
February	•••	29.79	,,	29.97	August	 29.85	,,	29.98
$\mathbf{March} \dots$	•••	29.68	,,	29.93	September	 29.82	,,	30.00
April		29.65	,,	29.90	October	 29.00	,,	29.99
May		29.70	,,	29.98	November	 29.00	,,	29.92
June		29.80		29.98	December	 29.74		29.99

"It is easy to believe that the islands are most salubrious, and the statistics prove this. The only diseases feared are beri-beri and dropsy, and the former is much dreaded. The outbreak of 1883-84 was caused, it is supposed, by the clearing of one of the islands, and the only treatment found to be efficacious is to send the sufferers to the North Keeling Island, where they are well cared for and put under a course of drinking a certain mineral water, in which they have great faith. The North Keeling Island is looked upon as the sanatorium of the place. I attach a copy of the analysis, made by the Dutch medical authorities, of this mineral water, and I have brought a small cask full of the water with a view to its being

analyzed by our medical authorities.

"The south-east monsoon is considered the coolest and healthiest time of the year in the Cocos, the months of June, July, and August being considered the best. They are accompanied by fresh breezes and frequent rains, and, if the weather that we experienced is a criterion of what they get every year at this time, I can only describe it as delightful. September, October, and November are very dry. Winds very variable, and beri-beri and diarrhea are feared during these months. December, January, and February are looked upon as the cyclone months; they are very stormy and treacherous (especially December), fine days being followed by ugly weather and vice versā. Thunder and lightning with violent gusts of wind and heavy showers make the people very anxious about their shipping and boats, and the cocoa-nuts suffer to an appreciable extent. The weather experienced in March, April, and May is said to be much the same as that of September, October, and November, but sickness is not so much dreaded in the earlier as in the later months.

"I visited the Guard House, which is just outside Ross's house. It is a sort of Police Station, but there is no proper Police Force in the islands. Every night watchmen are placed over the Settlement. For this purpose the village is divided into three divisions, and there is a bell in every division which is rung to turn the different watches. These watches begin at 6 p.m. and last till 6 a.m. Each watch lasts for three hours, and the first watch, i.e., that which is on guard from 6 to 9 p.m., also takes the last watch, i.e., that from 3 to 6 a.m. The duties of the watch are to go round from one end of the village to the other and to check the watches of each division, to examine all boats at anchorage, to inspect all house-fires, and put out all fires in kitchens. Lights are allowed in houses, and, in fact, the coolies (Bantamese) never sleep without lights, but no kitchen fires are allowed except in cases of sickness, which are at once reported by the watchmen to the Doctor who goes to see the cases.

"In the Guard House public notices are posted. There is one warning people against stealing boat sails or any articles from their neighbours' boats or houses, or from receiving any stolen property. The penalty for offending in this direction is laid down as follows:—For the first offence \$25, for the second offence \$50, for the third offence deportation, to be accompanied by a letter to Batavia branding

the offender as a disreputable character (tanda yang bangsat).

"There was also a notice laying down certain sanitary regulations rendered necessary by ravages of beri-beri. All houses and gardens are to be kept clean, and everything is to be buried deep and at some distance away from the sea-beach. An Inspector is to go round and examine the premises of the people, and if they

are found to be dirty they are forthwith to be cleansed and all expenses incurred thereby are recoverable from the occupiers. There is also a further penalty calculated in proportion to the state of dirt in which the premises are found to be.

"The Cocos-born men are fine specimens of Malays; being muscular and hardy. They are great at boating and fishing, and they are not as indolent as our Straits Malays, being, as they are, compelled to do a certain amount of work. The women are a remarkably nice-looking lot, dressing well and carrying themselves

"In Mrs. Ross's house the servants are all girls, and are called 'Baboos.' They are six in number. Two are cooks, and four look after the children and wait at table. There are also two sempstresses. They are Cocos-born, and are taken on when quite little children and taught. They move about noiselessly and are most attentive. When they marry they leave the service of their employers. Many of the natives eat with knife, fork, and spoon. They have mattresses and curtained beds spotlessly clean; they spread white tablecloths on their tables, use a brush and comb, have little ornaments for their tables, and decorate the insides of their houses with cuttings from illustrated papers and cartoons from Vanity Fair. It is left very much to the women to attend to the arrangement of the insides of the houses and to the cooking. The houses are, taken all round, much better built than Malay houses in the Straits. They are built nearer the ground, the foundations are thick cocoa-nut stems, the sides are made of the mid-ribs of the fronds of cocoa-nuts and the roofs of the fronds themselves. The whole appearance is one of great compactness and neatness, and the most striking feature is the great tidiness in trimming the insides of the roofs; this presents a most finished

"The language spoken here differs in many words from the Malay of the Straits. The people sometimes failed to grasp a word or two when I spoke to them, or vice versa, but it was quite simple to make oneself understood, and any word that was strange to them was easily made intelligible by a little explanation. I attach a small glossary showing the principal differences I came across. I am sorry there was not time to pay more attention to the subject. A curious custom, I have not met with elsewhere, obtains amongst these islanders. When a man becomes the father of a son, he is no longer called by his own name, but is familiarly known by that of his eldest son, with the prefix 'Pa' added to it. Thus the Chief Priest, whose own name is Sama, has a son named Satli, and is now

always called PA-SATLI.

"Each native of the place is allowed to build a house and get the materials free so far as the cocoa-nut tree provides these materials. Cocoa-nut oil and firewood are also given gratis. Each person is allowed a plot of ground 100×20 yards, and all cocoa-nut trees inside the ring-fence they put up are theirs. Each family may take cocoa-nuts for their own use free from charge at any time between noon on Saturday and sunset on Sunday from any of the islands except Horsburgh and West Islands and part of South Island. They may fish anywhere they like.

"Poultry is of course plentiful, all the people keeping fowls and ducks. They do not, however, strike one as thriving particularly well, with the exception of those kept by some of the Ross family. These latter are crossed with some Dorking

fowls brought out from home and make a good breed.

"One noticeable thing is an affection from which most of the fowls suffer. Malays would at once explain it by saying they were 'sakit angin' (sick from the air), and no doubt this is the case. Their walk is of the most groggy kind, and I fancy the strong breeze always blowing over the island has a good deal to do with it, exercising, as it must do, a baneful influence over young chickens.

"In some of the islands fowls have been turned loose and have become quite

wild. In Direction Island, for instance, there are about 200 fowls so turned out.

Some little thatched huts are built for them to roost in, and cocoa-nut-leaved baskets are provided for their nests. They are very shy and wild, fly like pheasants,

and have regular breeding seasons.

"In Horsburgh Island there are some 30 or 40 deer. They were originally brought from Java and Sumatra, and the Ross family amuse themselves by shooting them now and again. They are stalked, not driven. When hard pressed, they will take willingly to the water, and in some cases have been known to swim out to the barrier, which is some considerable distance from the island. They greatly resemble the Sambur deer met with in the Straits.

"There are about thirty sheep on Settlement Island; they belong to the natives, who are very loth to part with them. We succeeded in buying one for

seven rupees.

"Turtle are brought every trip of the schooner, which puts in to some islands out of Batavia, where the crew are landed to catch them. They are kept in the turtle-pond on West Island, being preserved there for the use of the Ross family. In Horsburgh Island there are also a few rabbits imported by the Ross family; and landrail, a very pretty grey and brown speckled species, abound. They run very fast, fly if pressed, and afford much the same sort of shooting as quail. Jungle fowl are found on most of the larger islands.

"Forbes gives a full account of the sea-birds which are found in great number on the Islands. He accurately describes their extraordinary habits. The two most interesting are, without doubt, the large frigate-birds and the beautiful little white tern. In North Keeling Island they are knocked down by the islanders (who make regular trips there in fair weather to get sea-birds) with a long pole and a long

brass chain at the end of it.

"There are no snakes in the islands, and centipedes, scorpions, and tarantulas

are but rarely met with.

"Little or no vegetable gardening is done either by the Ross family or the natives, and this is, to say the least, surprising, as the soil and climate are good, and as vegetables would so pleasantly relieve the monotony of food in the Cocos. Pumpkins grow well and everywhere. There are not many fruit-trees in the islands, and what there are are common to the Straits, such as bananas, papaws and guavas. There is one specimen of banana which, as the Ross's told me, is peculiar to the Cocos. I have not tasted it elsewhere, and it is a very good plantain of medium size with a very thick skin. There are some fig-trees in the garden of Ross's house. They do well, and their fruit was most enjoyable. Unfortunately for us, they are not common to the Straits.

"A species of orange-tree with a very small berry, some trees of which in the Malacca Stadt House enclosure are known to many of us, is found in great quantity on Settlement Island. Most of the hedges are made entirely of it, and a capital

hedge it makes.

"The rose and honeysuckle are much cared for, and the latter grows very luxuriantly. There are not many flowers, but some of the Oriental flowers found in every garden in the East, such as the *Hibiscus* and *Four-o'clock* flower, are of course met with.

"On the way from the village to the Ross's house there are numerous very fine

trees of casuarina planted by the grandfather of the present family.

"The useful woods of the islands are twelve in number. They may be described as follows:—

1. Klåpa Cocoa-nut. 2. Nibong A palm.

3. Mengkudu Bark used for dyeing purposes.

4. Kčmuning. 5. Jambu Rosea jambosa.

6. Melati Utan.				
7. Latchi		•••	•••	Makes good furniture.
8. Nyamplong.				G
9. Waru			•••	Rope is made from the bark.
10. Grongang)				∫A kind of ironwood, used for
11. Grongang	•••	•••	•••	boat-building.
12. Kâyu Bûrong	•••	•••	• • • •	Very heavy, and sinks in water.

"To give an idea of the extent of some of the smaller islands and some description of those that have not been mentioned in the earlier portions of this report, I will mention two walks I undertook. In the first walk, as Mark Twain would say, I made use of a small Rob Roy canoe, a beautiful little boat built by one of the Ross's in watertight compartments and cased in cork; but on the second occasion there was no possibility of using the canoe as the water was so shallow for a long way out into the lagoon that I had to walk and wade all the way. We landed from the Espoir at the nearest end of Direction Island (Pulau Tikus, i.e., Mouse Island) and walked through the island. It is about $1\frac{1}{2}$ miles long and is over 1 mile broad in some parts. The barrier comes close up to the back of the island, and the surf breaks with great force over the bar at the further end, forming a deep and wide pool between it and the lagoon. We paddled over into shallow water and then poled along, keeping quite close to the barrier. The sandy bottom was simply littered with beche-de-mer of all sizes and colourings. We saw several fish, and one of the two boatmen harpooned one in the most marvellous manner. He must have been a big fellow, for his struggles shook the harpoon about with a fair amount of violence. Finally he shook it off and got away. In a small canoe it is not reassuring to have two men standing up, one poling and the other throwing harpoons at fish, but these men went through these feats without unsteadying the boat. We passed alongside Pulau Pasir (Sand Island), a tiny islet with five cocoanut trees on it, and landed and went over Pulau Bras (Rice Island), marked on the Chart 'Prison Island.' It is quite round and is covered with white sand, evidently silted over some large rocks, as the sand is over thirty feet high in some places. There are some forty cocoa-nut trees growing on it. At the back is a large barrier of coral, inside the great bar, and the beach is simply covered with pumice. We next went to Pulau Gangsa (Goose Island), marked on the Chart 'Alison or Burial Island.' There we landed, and my companion made some sketches illustrating the mode of burial customary with these islanders. We then crossed over to Settlement Island (Pulau Nonia, Married Woman Id.) This ended the first walk, in the course of which we must have covered five miles.

"The next day we sent our canoe on to South Island, and we walked through the following islands and islets, wading through the intervening patches of sea and coral beds. We started at 8 A.M. and did not complete our journey till 1.30, having gone fully 11 miles. All the islands were covered with cocoa-nuts, and are in their order:—(1) Pulau Kechil (small); (2) Pulau Ampang (weir); (3) Pulau Blêkoh (crane); (4) Pulau Kembang (flower); (5) Pulau Bangka (a man's name); (6) Pulau Pandang (a palm-tree); (7) Pulau Gray; (8) Pulau Siput (shell); (9) Pulau Jembâtan (bridge); (10) Pulau Labu (pumpkin); (11) Pulau Bundar (round); and (12) Ujong Pulau D'Kat (the nearest extremity), which adjoins South Island. All these islands are gradually becoming connected.

"It was a source of much disappointment to me that we were unable to visit North Keeling Island, which is the largest of the islands, and which is said to contain much that is of interest. It is some fifteen miles to the northward. The Ross's would not pilot us over at first, as they said the surf was breaking very heavily at the time, and during the last two or three days of our stay I was laid up and unable to make an attempt.

"I made it a point to hold conversations with the principal natives upon the

subject of the administration of the islands. It was as difficult to find out from them what one wanted to know as it is to find out anything from a Malay. It was only by dint of making repeated guesses and by finally guessing right, that I elicited anything. From only one native did I hear any serious grumbling, and the impression that I formed of him as being a discontented man was afterwards confirmed by some stories that were told me of his disappointment at not being made the head Penghulu. At the same time his grievances in some respects were not imaginary, and are pretty generally shared in by the other islanders. They include the following points :-

(a) The high price charged for all provisions.

(b) The rate of exchange at which paper money is converted into silver.

(c) The non-existence of any small shops in the islands.

(d) The prohibition placed on all correspondence with people outside the islands.

(e) The want of education.

I was assured that all provisions were charged for at very dear prices, and that purchasers could get nearly twice as much for their money in Batavia. No petty shopkeepers are allowed by the Ross family, but the natives are very anxious to get them. At present the question of money and of buying and selling provisions is an absolute monopoly. The Ross family have the game entirely in their own hands, the money used would not be received in payment or be exchanged by any one except by the Ross's themselves, and no vessels would be allowed to go and sell provisions or stores at the island; if they did very few would be able to buy of them, and even those to a very small extent, as none other but hard cash would be accepted in payment. Of course I pointed out that the Ross's must make some profit, that it was their schooners, with a well-paid crew, that made the voyages to get provisions, that it was their money laid out in buying the stores, and that they ran all the risks: but at the same time I could not close my eyes to the arguments of the natives that it was hard on them to make a double profit out of them, first by charging high prices, and secondly by depreciating their money. One instance was cited to me more than once, viz., that of a man who, when he left the islands to settle elsewhere, had saved Rs. 2,000, and, when he exchanged it for silver, only received from Mr. Ross Rs. 1,339, or so.

"The not allowing the natives to correspond with the outside world is not, I think, fair. No doubt it is done to prevent the holding out to the islanders of inducements to leave the Cocos, but it might be done away with. The Ross's schooners are the only mail vessels, and so again they are masters of the situation. I was told by one of the family that the natives could write to whomsoever they liked, but the complaints made to me on the point were so numerous that I am

satisfied there is some ground for them.

"Formerly there was a system of education, but when the last schoolmasters left it ceased. It is essential that education should be introduced. There are two hundred and sixty children in the islands, and the Chief Priest finds it difficult to get the people to pay the attention to the observances of the Mahommedan law and religion which is so diligently paid by most Malays. It is clearly the result of their not having been educated. It would be well if the services of a good Malay teacher could be placed at the disposal of the Ross family.

"On the last morning of our stay, a very interesting ceremony took place, Mr. Spicer baptizing Mrs. George Ross, Mrs. Edwin Ross, and eight children.

"On the 28th, having completed my inquiries, we left the Cocos Islands in H.M.S. Espoir to return to Singapore. Before doing so I wrote a letter to Mr. CHARLES Ross, and it was signed jointly by Captain Adams and myself, thanking him and the other members of the family for the extreme kindness and courtesy extended to us during the whole of our visit. Nothing was left undone by any of them that could have been done to help to make my inquiries as searching as possible.

"Captain Adams took some twenty photographic views and groups.

"(Sd.) Ernest Woodford Birch, "Second Assistant Colonial Secretary, S. S.

"SINGAPORE, 15th September, 1885."

We may add to the foregoing that the tree-climbing crab (Burgas latro), commonly known as the Robber Crab, and supposed to be indigenous only to the Seychelles, is found in these islands, two or three fine specimens having been brought back by Mr. Birch.

Coffee (Kahua).—Both the Arabian and Liberian plants have been cultivated in the British possessions, the latter being most successful, although the sanguine hopes entertained some years ago have in few cases been verified. Coffee is still upon its trial, although it undoubtedly thrives in certain localities. Johore and Sungei Ujong have been tried, as also Selangor and Perak. The following notes on the different varieties appeared in Mr. N. Cantley's Report:—

"Arabian Coffee (Coffee arabica.)—The Arabian coffee planted in the Nursery looks healthy, but grows slowly. Hybridization may probably re-establish

it in cultivation.

"Bengal Coffee lengalense).—The growth made by Bengal coffee does not look promising; the plants are still small, however, and may not show their true character.

"LIBERIAN COFFEE (Coffea liberica), from W. Africa, is becoming an established product of the Straits, but its proper cultivation is far from being properly understood. Drainage is too little attended to by some; others, by starting the plant in very rich compost, change the character of the roots to an extent that unsuits them for penetration of the natural soil. When these errors and some others get corrected, the adaptability of the plant for cultivation here will then show itself in Plants of this coffee are under various treatment in the its true character. Experimental Nursery, but it would be premature at present to detail these. I may state, however, that the plant will not bear manuring in the ordinary way when in fruit; manure should therefore be applied in liquid form, or as top dressing, when given to encourage the swelling of the berries. When the soil is disturbed around the plant when in fruit, a large number of the berries wither and die, owing to the destruction of rootlets in the manuring process, and which renders the act a loss instead of a gain.

"Marogogepie,' and very favourably reported on some little time ago by the Brazilian Minister of Agriculture, were received from Kew during the year and have grown with less vigour than the Liberian kind, but with almost double that of Arabian coffee (Coffea arabica). The leaves are somewhat larger than the Arabian kind, so that the plant seems from its growth to approach an intermediate form between Coffea liberica and Coffea arabica, and is not as yet affected by the disease. Should it prove as well adapted to our soil as Coffea liberica does, keep free from disease, and have a distinct cropping season, it will no doubt supersede all other kinds in the Straits. The plants in the Singapore Botanic Gardens came

originally from Mexico."

Coffin (*Long*).—The Malay coffin is an oblong box without bottom, which is removed when the corpse is placed in the grave.

Compass (Paduman).—The compass, for nautical purposes, is, at present, used by the principal native traders of Malaya. In the Malay languages, the name for the magnet, and for the compass and its divisions, are almost exclusively native

words. That for the magnet is batu-brani, or besi-brani, literally "powerful stone," or "powerful iron." The compass is called pandoman or paduman, a word, of which the Javanese word dom, "a needle," seems to be the radical part, the compound signifying "place of the needle," or "object with a needle." The Malay compass is divided into sixteen parts, twelve of which are multiples of the four cardinal points. For the cardinal points the different nations have native terms; but for nautical purposes, those of the Malay language are used throughout.*

Conchology.—Malayan conchology has by no means received all the attention it deserves. And although men like Drs. Archer and Hungerford have done much to exploit the rich hunting grounds of the Peninsula waters, they have done but little to communicate their discoveries to the public. Singapore is a well recognized "shell collecting centre." Although most of the shells usually seen are of well-known types, there must be many species yet new to science. The large majority of those offered for sale are brought thither by Celebes and other traders, and the tyro has to guard against imposition, the edges of imperfect specimens

being carefully ground away so as to delude the unwary.

It would, of course, be impossible to do more in the space at command than give a sketch of the principal families represented. We shall, however, mention those which even the casual visitors may acquire with a little trouble. Beginning with the NAUTILUS, both N. pompilius and N. umbilicatus are met with. Of MUREX a large variety offers, the delicate M. tennispina being often obtainable in perfection. Purpura, Triton, Ranella, Fusus, Fulgar, Buccinum, Eburna, and Nassa, all occur amongst the specimens offered. Fine examples are obtainable of Mela and Voluta. Two or three very handsome MITRA are at times met with, as also Marginella. Oliva abound. Of the remaining principal orders, Columbella, Terebra, Pleurotoma, Conus, and Stromeus (both these latter in great variety), CYPREA, CASSIS, DOLIUM, and OMISTUS are constantly found. Solarium, and at times the delicate Janthina, or violet snail, can be got, as also specimens of Tur-RITELLA, LITTORINA, CERITHIUM, POTAMIDES, and AMPULLARIA. Of NERITAS there is no end of varieties, the rocks around Singapore at low water being covered with brilliantly coloured specimens. Neritina, Turbo, Trochus, Haliotis, Fissurella, PATELLA, and BULLA close this portion of the list, which omits, however, many but sparsely represented.

Of CYCLOSTOMA, HELIX, and BULIMUS no great variety exists, and it is probable that the united species found in the Peninsula do not amount to over forty in number; Dr. Trail, in 1847, reported finding twenty-three species in Singapore, several kinds of Helix and Cyclostoma inhabiting the depths of the forest. Bivalves abound in every portion of the coast, from the large Tridacna, Chama, and Arba to the less imposing Mytilus, Venus, Cardium, Solen, &c. Very handsome specimens of Spondylus, Pecten, and Ostrea, with large Pinna, may conclude the list of bivalves. We must not omit to mention that the curious-looking Asper-

GILLUM is a Malayan habitant.

A list of all the shells known to exist in Singapore and its vicinity in 1847 will be found on pp. 239 et seq. of Vol. I. J. I. A. No very large additions have been made to it since, but Lamarck's classification therein adopted is now seldom adhered to.

Cone Hill .- See SEAL, BLUFF.

Coney Island.— $7\frac{1}{4}$ miles S.W. by W. of W. harbour entrance, Singapore. The site of the Raffles Lighthouse (q, v).

Consumption (Batok kring).—By no means unknown to, but not so prevalent as might be expected amongst, the Malays in view of the damp nature of their habitations.

Copper.-No ores of this metal have been found in the localities dealt with

in this work, though they exist in other portions of the Malayan Archipelago. The Malay word tembaga is derived from the Hindus.

Copra.—The interior of the cocoa-nut divested of the shell and dried. It furnishes a clear oil used both for cooking and burning.

Coral Reefs.—In 1848 a respected medical man in Singapore devoted considerable time and trouble to writing a series of articles in the J. I. A. to prove that these were a special cause of fever. He certainly adduced numerous facts in support of his theory, but the question has passed out of the region of practical hygienics, many of the localities he referred to having become free from febrile diseases to any marked extent, despite the continued existence of the reefs. It may, we think, be conceded that they increased the chances of illness when combined with other fever-producing causes; but there is not sufficient evidence to show that, independently of other causes, they are now likely to produce attacks.

Corals.—Beautiful varieties of coral exist in the Malayan waters, and large quantities are constantly on sale at Singapore for reasonable prices. A monograph on this subject has yet to be written. Lovers of the beautiful in Nature can spend a pleasant hour or two by visiting at low water the Cyrene Shoal, and other coral banks in the neighbourhood of Singapore. The coral animals display the most brilliant colours, conjoined with immense variety of form, and present a scene of extreme beauty.

Coral is much used by the Malays for burning into lime.

Correspondence between personages of Royal rank in Malaya is a matter of much ceremony. A priest is usually selected to write the document, the tenor of which is agreed upon in council, and to this the Rajah's seal is attached in different positions according to the rank of the party addressed. A messenger whose importance is decided by the same considerations is then chosen, and one or more prahus or elephants (according to the passage by sea or land) is prepared. The letter is brought out and ceremoniously deposited with its bearer, music and banners accompanying it. A similar ceremony obtains at the place of destination, boats or elephants being sent (after notice) to receive the document.*

Cosmetics.—These, though plentifully used by the Chinese members of the fair sex in Malayan countries, are but little availed of by Malayan beauties. A preparation of rice dust, called bedah, is sometimes used as a whitening powder, and bottles of a preparation imported from Arabia, and known as mai, furnish a darkening liquid applied to the eyes. Generally speaking, however, the use of cosmetics amongst the Malays is rare. Amongst the Chinese the well-known articles of native toilet are used in Malaya as in China itself. According to Dr. Williams (Middle Kingdom, Vol. II, p. 41), white paint, rouge, and charred sticks form the articles of toilet used by Chinese belles. Henna is grown and occasionally used by those of Arab descent.

Cotton is not indigenous to the Peninsula, its place being taken by a large deciduous tree known as the *kabu*, or cotton-tree. The shrub has, however, been introduced and was planted by two American planters near Bukit Mertajam in P. Wellesley, and by the Hon. J. M. Vermont, now manager of Batu Kawan Estate. The soil was not, however, found sufficiently suitable to justify further experiments. Its native name is *kapas*. Kapas Bengali=Indian cotton. See Fibres.

Cotton-tree.—The pods of this tree produce a cotton equally good looking with the tree cotton, but too short in staple to be of commercial value. It is com-

monly used for stuffing beds, cushions, &c.

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Cowry Shell's.—The Cypra moneta of naturalists, is found throughout Malaya in considerable quantity, but the cowry seems never to have been used for money among the Indian islanders as it has immemorially been by the Hindus. The Malay name, however, is Sanskrit—beya—and is also one of the synonyms which express duty, impost, or toll.

Coyan.—A measure of capacity applied to boats. A coyan is about 2 tons.

Crab (Ketam or Kepiting).—Several hundred species, mostly of small size, exist, but no scientific catalogue has as yet been published.

Creepers.—Numerous flowering plants of this description abound in the Malayan jungle, several species of convolvulus being included. The most striking of these is one known locally as the "Morning glory." Other handsome plants are the "Butterworth" and "Moon flowers" (flowering only at night). Aristolochias

(imported from Borneo) flourish well.

Crocodile.—For the distinctions between this reptile and the alligator, see the latter. The crocodile inhabits both fresh and salt (or at least brackish) water. The species common in the Malay Peninsula is the Crocodilus porosus, or Indian crocodile. The Gavial or Gangetic crocodile is said to be found there also, and I purchased the skull of one killed in Singapore, but whether native or imported I could never get satisfactory evidence. The ears and throat of the crocodile are closed by automatic valves when under water. The eggs are about the same size as those of a goose and resemble thin porcelain in look and hardness. Several deaths occur annually from these creatures. A Government reward is given for their destruction according to size, in the British and Protected Territories.

Three varieties are recognized by the Malays—the buaya gouro, buaya katak, and buaya tembaga. They are usually captured with live bait, such as a fowl, beneath whose wing a large hook is attached by ligatures. An untwisted rope made of gamuty palm fibres (which get between the reptile's teeth and so cannot be bitten through) is attached to the hook and made fast at the other end to a tree, the fowl being picketed to a peg on the bank. The crocodile swallows the fowl whole and, after attempting to swim away, is usually hauled ashore by those watching him, and at once despatched. The buaya katak, or "frog crocodile," is considered the most ferocious, but there is little to choose between the three varieties. The most attractive bait, according to native ideas, for shooting crocodiles, is a long used mosquito curtain from a woman's bed. Dipped into the water at the end of a pole it is certain to attract any reptile in the vicinity and so afford a good shot to those on watch for it.

In Perak the following names are given to the teeth of the crocodile:-

The front teeth kâil sĕlúang.
The middle teeth apa dâia.
The back teeth charik kapan.

The kail seluang is a small fish-hook which is used without a bait for catching the seluang, a small fish rather larger than a sardine, a fish it somewhat resembles. Men seized by these teeth only have, so say the natives, a fair chance of escape. Apa dâia may be translated "What power?" i.e., "How can I?" A man seized by these teeth, though escape is said to be still possible, has very little chance. Charik kapan may be translated "tear off (a strip of white cloth for) the shroud. All's up." The pointed stick, with bait attached, to attract the reptile, is called pūkang. If it catches the jaws rightly they cannot be closed, and the reptile falls an easy prey to the hunter. (N. & Q., with No. 17 J. S. B. R. A. S.)

Croton Oil.—See On.s.

Crotons.—This beautiful family of plants flourishes as well in the Straits Settlements as in its native habitat, which is almost exclusively the South Sea Islands. Some 70 or 80 species are now cultivated, adding much to the beauty of lawns and gardens. Not being indigeneous, we must refer readers to other works for lists of the species introduced. Oddly enough, until a few years ago, when the plant was placed in the Botanical Gardens at Singapore, only one specimen of Croton tiglium, which produces the well-known oil of medicine, was known to exist in the Colony—at the Pauper Hospital—and this was accidentally destroyed. During

1883, a rage for crotons sprang up in Siam, and buyers offered as much as \$100 for choice plants. Even now handsome varieties occasionally fetch good prices at auction.

Crow (Gagak).—The Malayan species differs in no way from the familiar bird at home.

Crustacea.—No part of the world produces crustacea in greater abundance than the coast of Malaya, and a large field is here opened to the naturalist—one, too, as yet unexplored. The genuine name of crabs in Malay is këtam, and of lobsters udang galah, but the term udang is also applied to shrimps, prawns, and a large number of yet undescribed species partially mailed and of sizes varying from an inch to a couple of feet in length. Of crabs alone, the writer has seen some 200 varieties, and nothing short of a monograph would do justice to the subject. Many species are beautifully marked, and when mounted and varnished form attractive additions to a museum. Two handsomely marked species of lobster are known respectively as udang and udang rimau. Certain sorts are known as belangkas, keronchak, mumong, &c. The cray-fish is, by the way, unknown in this part of the world.

Cubebs (Piper Cubebs).—As with most matters relating to experimental cultivation, I am indebted to Mr. Cantley for the following remarks:—"Experiments with cubebs on a small scale seem to show that the plant prefers a shady moist situation. Plants exposed to the full sun grow much more slowly. The cultivation of cubeb plants does not receive the amount of attention in the Straits it deserves. The crop pays well, but for the present the monopoly of its cultivation remains in the hands of the Dutch, through apparently no other reason than a want of enterprise on the part of planters on this side of the water. In Johore the plant grows remarkably well, bearing heavy crops of fruit, but details of its cultivation as practised in Java are still a desideratum."

Currency and Exchange of the Straits Settlements.—Prior to 1867, when the Colony was an Indian Dependency, accounts were kept in Government and Sicca rupees, and Spanish dollars and cents. After the Government of the Settlements was transferred to the Colonial Office (April, 1867) it was enacted by Ordinance No. IV. of that year, that the dollars issued by H.M. Mint at Hongkong, the silver dollars of Spain, Mexico, Peru and Bolivia should be the only legal tender within the Colony and its dependencies. In January, 1874, the American trade dollar and the Japanese dollar (or Yen) were added to the above list.

The following table will give an idea of the relative qualities of the principal coins included above:—

			Average weight in grains.	Parts Pure Silver.	Parts Alloy.
Hongkong Dollar			416	900	100
Old Mexican Dollar	•••		4161	898	102
New Mexican Dollar		•••	417	898	102
Japanese Yen	•••		416	900	100
American Trade Dollar			420	900	100

The Hongkong dollar is no longer coined, and is only occasionally met with in any quantity in the Straits; the Carolus (Spanish) dollar is even more rare, and, together with the American trade dollar command such premia as to almost exclude them from every-day commercial transactions. Mexicans and Yen are commonly used throughout the Colony, but the former being at a premium of a

Saus and Islands the Yen is not

Sugarore. on 30th November, 1886, unanimously

British dollar, weighing 416 grains and of 900 parts

which inficulties pointed out by financiers at Home, especially in the control with the capable of supplying necessary requirements of the control with the present condition of things, the adoption of the above resolution and the control with the present condition of the Government, for the present at any rate.

The subsidiary coins, consisting of silver 50-cent, 20-cent, 10-cent, and 5-cent constructions are manufactured at Home, and are legal tender to the extent of two follars. Copper coins representing 1-cent, \frac{1}{2}-cent, and \frac{1}{4}-cent pieces, and from the same source, are legal tender to the extent of one dollar only.

Of the local Banks, the two having note issues are the Chartered Bank of India, Australasia, and China and the Hongkong and Shanghai Banking Corporation, with excether a total amount in circulation of about \$7,500,000 throughout the Settlements. Against this, a reserve of coin has to be maintained of at least one-third.

It would be impossible to follow the many fluctuations which have occurred in the gold value of the dollar during the last few years, resulting in a decline to below 2/3. The silver question is at this moment under careful consideration by the Government; a strong party is in favour of a British dollar.

Ourry.—As in India, the curry forms a standard dish amongst the Malays. One of the principal ingredients in a "Straits curry" is cocoa-nut milk mixed with the scraped nut into a pulp. Turmeric is largely used, and the pods of the moringatree form a common ingredient. Two sorts of curry, known as "black" and "white," usually appear at foreign tables, but the intermediate varieties are too infinite for detailed description. The generic name in Malay is gult.

Custard Apple (Anona reticulata).—Usually regarded as indigenous to the Peninsula. Very good specimens are obtainable during the season, the best being found in the North of the Peninsula. It is the buah nona of the Malays. The specimens in the Singapore Botanic Gardens were obtained from the West Indies.

Cutaneous Affections.—Cleanliness is much neglected amongst the Malays, and it is not usual to bathe children as a regular custom; their diet is also entirely neglected. The consequence is that unwholesome food and the dirt they are allowed to revel in induces an eruption of boils or small cancers called puru, which spreads over the whole body, rendering the children most loathsome objects. The opinion that dirt and unwholesome food causes puru is derived from the natives themselves. Some medical men come to a different conclusion, and impute the disease to syphilis in the parents. This is contraverted by the fact that children of the healthiest are afflicted by the disease, and but few escape. These cancers are seldom noticed, and medicine is rarely applied to them; the general belief is that the disease must have its course and nothing will cure it; some apply iron rust and lime-juice heated, but very little faith is placed in the remedy. Calomel has been tried in several cases, and it proved an infallible cure.

The disease is probably contagious, and many children contract it from their

companions. It is singular that, without any remedies, the cancers gradually disappear as maturity advances, leaving their victims scarred for life.

Few Malays are to be found with clear skins. Puru sometimes leaves white scars, and when very deep set cramps the fingers and toes and renders them useless,

giving the afflicted a leprous appearance.

Malays were greatly prejudiced against vaccination; and although apothecaries are sent to each district annually to perform the operation, but few brought their children forward. Matters have somewhat mended in this respect, however, of late years. [J. D. Vaughan in J. I. A., Vol. XI.]

Another disease, called *sopa*, resembles leprosy, and is probably a species of that disease. It seldom spreads over the body, but is confined to the palms of the

hands and soles of the feet. It is not considered contagious.

A loathsome disease called *korap* is very prevalent among fishermen. It spreads over the whole body, and presents a scaly appearance; it appears of an irritating nature, for those afflicted incessantly scratch themselves, and when the scales fall off the disease is considered infectious. Exposure to sea-water, and diet, which consists principally of salt fish, mollusca and blubber, may conduce to the disease.

Itch, or kudis, is not common.

Leprosy and elephantiasis are rare; when they do occur, the afflicted are not put aside, but their neighbours and relatives associate with them as intimately as ever, and no bad results occur.

Cuttle-fish.—This is a common object in the native markets, Chinese being almost the only buyers. It is eaten both fresh and dried. In the latter case the ink-bag is cut away, and all impurities having been removed by water, the animal is submitted to pressure and then dried in the sun. Bundles of one catty each are tied up and placed in cases holding ten catties or more each for export. Octopi and Calamaries are reputed to attain an immense size in Malayan waters.

Cyrene Shoal.—Shoal in the fairway of vessels making Singapore from the N. and W. It presents a brilliant appearance at low water, being covered with live corals and shells, many of the most brilliant colours. It is a favourite hunting ground for conchologists.

Dadap.—A beautiful flowering tree used in coffee plantations to shelter the young plants: flower a brilliant scarlet.

Dahl (Cajanus indicus).—A sort of small bean which is the principal diet of Kling coolies. It grows well in the Straits, but as yet has always been imported by estate managers from India.

Dammar.—A resin produced by certain large forest trees (dammara), chiefly meranti, merawan, and balow. It sometimes exudes so as to form lumps, either on the trunk or beneath the surface, to the weight of ten or twenty pounds. Incisions are also made in the bark whence the gum is collected. It is pounded up and filled into palm sheath tubes called upei, about 18 inches long, which are sold at a low rate as torches. In some parts of the Peninsula it furnishes the only means of artificial light. A very clear and transparent dammar known as mata-kuching is obtained from the chengal tree and is used in making incense.

Damansarah.—Imp. V. and Police station on the N. bank of Klang R., 7 to 8 miles above the Klang Residency, Selangor.

Danau.—Small V. just below the bend of the Endau R., N. at its junction with the Sembrong, N.E. Johore.

Danau Serah.—V. on W. bank of Johore R., about 8 miles from Johore Lama.

Dancing.—See NAUTCH.

Dato Dalong, Kramat of.—In Naning territory, N. Malacca. Much regarded by the natives, who make pilgrimages thereto.

Dato Kramat.-V. on S.W. outskirts of Penang-town.

Daun Tiga Lei.—A Malay game of cards. Each player has three cards dealt him; the aces count best, then the court cards. Nine is next best, ten being omitted, and so on. A full description is given in the J. S. B. R. A. S. sub voce, for reference.

Dayang.-A maid of honour, attendant at a palace.

Dea. - A hill in Jumpol, Negri Sembilan (not marked in map S. A. S.).

Dea.—The name of a hill between Pila, in Rembau, and Johol.

Debt-Slavery.—This still exists in the Native States, though much modified where British influence has been in the ascendant. The debtor lives with his creditor, who is bound to clothe and feed him, but the results of his labour—whether money, fruit, building, or anything else—enure to the creditor. A debt by a married man binds his wife and children; and in like manner, if a debtor marry, the husband or wife become extra securities for the bond. Debt-slaves are on the whole well treated, but in cases of desertion considerable brutality has often been evinced.

Deer.—Two large, and four species of small, deer are found in the Peninsula, besides the babi rusa or "hog-deer," which, however, is not a member of the same order. The large species are: the sambur (Rosa aristotelis), a rather savage animal, larger than our own red deer; and the axis (A. maculata) or spotted deer. Of the small or Moschine species, the kijang is the largest; next to this comes the napuh; the third in size is the lanak; and the smallest is the pelandok or true pigmy deer.

Deer-catching.—"This pastime," (says Mr. Vaughan in Vol. XI., J. I. A., whose remarks we quote in full), "is one the Malay delights in. After a rainy night, deer may be easily traced to their lair by their foot-prints, and as they remain stationary by day the hunters have ample time to arrange their apparatus. When the hiding-place is discovered, all the young men of the kampong assemble, and the following ceremony is performed before they sally out on the expedition. Six or eight coils of rattan rope about an inch in diameter are placed on a triangle formed with three rice-pounders, and the oldest of the company, usually an experienced sportsman, places a cocoa-nut shell filled with burning incense in the centre, and taking sprigs of three bushes, viz., the jellatang, sapunie and sambon plants (these, it is supposed, possess extraordinary virtues), he walks mysteriously round the coils, beating them with the sprigs, and erewhile mutters some gibberish, which, if possessing any meaning, the sage keeps wisely to himself. During the ceremony, the youths of the village look on with becoming gravity and admiration. It is believed that the absence of this ceremony would render the expedition unsuccessful, the deer would prove too strong for the ropes, and the wood demons frustrate their sport by placing insurmountable obstacles in their way. Much faith appears to be placed in the ceremony. Each coil referred to above is sixty to seventy fathoms long, and to the rope running nooses, made also of rattan rope, are attached about three feet apart from each other. On reaching the thicket wherein the deer are concealed, stakes are driven into the ground a few feet apart in a straight line, the coils are then opened out and the rope attached to the stakes, two or three feet above ground, with the nooses hanging down, and two of the party conceal themselves near the stakes armed with knives for the purpose of despatching the deer when entangled in the nooses. The remainder of the hunters arrange themselves on the opposite side of the thicket and advance towards it shouting and yelling at the top of their voices. The deer, startled from their rest, spring to their feet and naturally flee from the noise towards the nooses, and in a short time are entangled in them. As they struggle to escape, the concealed hunters rush out and

despatch them. Occasionally the fight is prolonged till the major party arrives, and then the noble creatures soon fall beneath the spears and knives of their assailants. The animal is divided between the sportsmen. The writer has often partaken of a tit-bit, but never relished the flesh, it being generally too fresh. A breed of deer has spread over Penang from a tame herd that one of the former Governors released on his leaving the island."

Delendung.—A small species of civet found in Malacca. Its graceful appearance has gained it the scientific name of Linsang gracilis. It is not common, and the following account of it is from Wood's Natural History:—"The general colour of the fur is a moderately deep grey, and upon the back are four very large saddle-shaped stripes of an exceedingly dark and rich brown, extremely broad on the spine and becoming very narrow on the ribs. Along the sides run two rows or chains of similarly coloured markings. The lower band extends from the cheeks to the flanks. The legs are finely spotted, and the tail is covered with alternate rings of grey and dark brown. The creature has been termed prionodon or 'sawtoothed' on account of its curiously shaped teeth, which present a jagged or saw-like appearance. It is destitute of scent pouches."

Demam.—Fever. The commonest form is that called *Demam kapiallu* by the Malays, equivalent to the Java or jungle fever of medicine. This is indigenous, but very few cases occur amongst Europeans unless they have unduly exposed themselves to malaria. Practically this disease does not obtain amongst the foreign population.

Demam Kora.—Intermittent fever. Not uncommon, but seldom fatal.

Dendeng.—The Malay name for the jerked beef of commerce, that is, of animal muscular fibre, preserved by drying in the sun, nearly the only mode of curing flesh practised. Dendeng is made of the flesh of deer, oxen, and buffaloes, and by the Chinese of that of the wild hog. It is a considerable article of native trade.

Desa.—"This word, taken from the Sanskrit, signifies 'the country,' as distinguished from 'the town,' or rather from the seat of government, and it is also a synonym for a 'village.' It occurs, not infrequently, in the names of places."

Devil, The (iblis).—The Mahommedan spirit of evil.

Diamond.—In Malay, intan; found only in Borneo, and consequently an article of trade alone in the Peninsula.

Dibble.—This is usually represented by a pointed stick which serves sufficiently well for the purpose of planting rice, &c.

Dili.—V. on the R. Tukun, a petty W. affluent of R. Kinta, C. Perak.

Dinding.—A partition or wall. Dinding bertam, the woven bertam or reed of which the walls of Malay huts and houses are often formed.

Dindings, The.—A group of islands, of which Pulo Pangkor, the largest, and Little Dinding are the chief, and a strip of land on the Peninsula, about 22 miles in extreme length by 10 in width, and situated on the Perak coast about 80 miles from Penang in lat. 4° 20′ N., long. 100° 40′ E., is thus named. It was nominally under the Perak administration till 1886, when it was transferred to that of the Straits Settlements. The accounts of Revenue and Expenditure are incorporated with those of Penang. There is a police force of 28 individuals under a European Inspector, and a public hospital. Pepper, padi, and tapioca are the chief products. Tin, though existing, has not yet been found in paying quantities, but may be after exploration. Communication with the outer world is as yet irregular and unsatisfactory, but a small steamer professes to run regularly from Penang. Turtle is abundant on the coast.

Pulo Pangkor was held by the Dutch from 1670 to 1690, when they occupied Malacca. The ruins of their fort and factory still exist close to the shore.

The following is an account of the Dinding Island published by DAMPIER, the

well-known navigator, in 1688 :-

"This is a small island lying so nigh the main that ships passing by cannot know it to be an island. It is pretty high land, well watered with brooks. The mould is blackish, deep and fat in the lower ground, but the hills are somewhat rocky, yet in general very woody. The trees are of divers sorts, many of which are good timber, and large enough for any use. Here are also some good for masts and yards; they being naturally light, yet tough and serviceable. There is good riding on the east side, between the island and the main. You may come in with the sea breeze and out with a land wind, there is water enough, and a secure harbour.

"The Dutch, who are the only inhabitants, have a fort on the east side, close by the sea, in a bending of the island, which makes a small cove for ships to anchor in. The fort is built four-square, without flankers or bastions, like a house; every square is about ten or twelve yards. The walls are of a good thickness, made of stone, and carried up to a good height, of about thirty feet, and covered overhead like a dwelling-house. There may be about twelve or fourteen guns in it, some looking out at every square. These guns are mounted on a strong platform, made within the walls, about sixteen feet high; and there are steps on the outside to ascend to the door that opens to the platform, there being no other way into the fort. Here is a Governor and about twenty or thirty soldiers, who all lodge in the fort. The soldiers have their lodging in the platform among the guns, but the Governor has a fair chamber above it, where he lies with some of the officers. About a hundred yards from the fort, on the bay by the sea, there is a low timbered house, where the Governor abides all the daytime. In this house there were two or three rooms for their use, but the chiefest was the Governor's dining-room. This fronted to the sea, and the end of it looked towards the fort. There were two large windows of about seven or eight feet square; the lower part of them about four or five feet from the ground. These windows were to be left open all the day to let in the refreshing breeze, but in the night, when the Governor withdrew to the fort, they were closed with strong shutters, and the doors made fast till the next day. The continent of Malacca, opposite to the island, is pretty low champion land, clothed with lofty woods; and right against the bay where the Dutch fort stands, there is a navigable river for small craft.

"The product of the country thereabouts, besides rice and other eatables, is tutenag, a sort of tin; I think coarser than ours. The natives are Malayan, who, as I have always observed, are bold and treacherous; yet the trading people are

affable and courteous to merchants.

"These are in all respects, as to their religion, custom, and manner of living, like other Malayans. Whether they are governed by a king or raja, or what other manner of government they live under, I know not. They have canoes and boats of their own, and in these they fish and traffic among themselves: but the tin trade is that which has formerly drawn merchant strangers thither. But, though the country might probably yield great quantities of this metal, and the natives are not only inclinable, but very desirous to trade with strangers, yet are they now restrained by the Dutch, who have monopolized that trade to themselves. It was probably for the lucre of this trade that the Dutch built the fort on the island; but this not wholly answering their ends, by reason of the distance about it and the river's mouth, which is about 4 or 5 miles, they have also a guard-ship commonly lying here, and a sloop with 20 or 30 armed men, to hinder other nations from this trade. For this tutenag or tin is a valuable commodity in the Bay of Bengal, and here purchased reasonably, by giving other commodities in exchange: neither is this commodity peculiarly found hereabouts, but farther northerly also

on the coast; and particularly in the kingdom of Queda there is much of it. The Dutch also commonly keep a guard-ship, and have made some fruitless essays to bring that prince and his subjects to trade only with them; but here, over against Pulo Dinding, no strangers dare approach to trade; neither may any ship come in hither but with consent of the Dutch."

Diseases.—In the Malay language the same words express disease and pain. The most frequent word in the Malay language for this purpose is sakit. The ordinary diseases to which the natives of Malaya are subject, are those arising from malaria, namely, fevers—remittent and intermittent—and dysentery. epidemics are small-pox, measles, hooping-cough, and Asiatic cholera. The last was introduced in 1820, three years after its first appearance in Bengal. This, therefore, they owe to ourselves, as more than three centuries ago they did syphilis to the Portuguese and Spaniards The Turkish pest has never reached them, any more than it has other countries east of Persia. Cholera appears in a milder form than it does on the Continent of India, and strong remedies resorted to immediately on being attacked seldom fail to cure. On its appearance, Government distributes medicines throughout the country. A pill prepared by a former Civil Surgeon of Penang (Dr. J. Rose) proved eminently successful, and few cases of death occurred wherein it was administered; the failures may be attributed to the prejudice Malays entertain against spirituous liquors; strong stimulants were ordered to be given with the pills, and when patients refused to drink them they invariably perished, but all those that conquered their objection and drank the stimulants recovered; the pills were placed at all the police stations and a correct account kept of the number of cases attended to and the number of those that recovered or died; one out of ten was about the number that died. Leprosy, the disease of filth and barbarism, is common to them as to other Asiatic nations. Inflammatory diseases, and tubercular ones, are less frequent than in temperate and cold regions, but the inhabitants are by no means exempt from them. Diseases of the skin are very frequent, more especially among the fish-eaters of the coasts. In the mountainous parts of the country, goitres are to be seen, and this, too, close to the equator, and in countries where there is no snow.

In so far as concerns their native inhabitants, there is no reason to believe that the Peninsula generally, is in climate less salubrious than other parts of the world. Every place that is tolerably dry, and, above all, well-ventilated, is healthy; while localities even when dry, but not well-ventilated, are sure to be unhealthy. The town of Singapore, although a part of it is built in a salt marsh and on the level of the sea, is as salubrious as any tropical country, because thoroughly ventilated by land and sea-breezes, by the north-eastern monsoon, and by occasional squalls from the west.

Divi-divi.—See Dyes.

Divination.—A practice precisely analogous to the Sortes Virgilianae, "pricking the bible," &c. is resorted to by the Malays. A Koran or a book containing a selection of sentences and words is taken, and the would-be diviner cuts into it with a kris. The sentence marked by the kris point is interpreted to suit the wants and wishes of the party interested.

Diving.—The Malays are excellent divers. Major McNair, in his "Perak and the Malays," relates an instance of a man actually nailing a sheet of copper to a ship's bottom, coming to the surface after driving each nail, his movements below being visible through the clear water. Whether this story be apocryphal or not, the diving fraternity are remarkably clever in recovering articles lost overboard. At Singapore a number of Malay youngsters surround in-coming and out-going steamers offering to dive for coins, and are very dexterous in securing them before they reach the bottom.

Divorce (Telak or Cherei).—As in all Mahommedan countries, divorce in

Malaya is easy. Informing the wife three times at intervals of two or three days that she is divorced (this affords her time to consult her friends and call witnesses if she chooses) is sufficient. But if a man desires to divorce her instanter, he must solemnly pronounce her so nine times before two or more credible witnesses. If there be due cause the husband can recover the isi kawin, or dowry, and expenses from her family, and such cases are frequently brought into our courts, though it does not appear that magistrates have any jurisdiction beyond that which custom has supplied.

Mr. Vaughan, in Vol. XI. J. I. A., has the following remarks:—" If a man is dissatisfied with his wife and wishes to put her away, he has only to tell her so, using the word telak, or divorce, at the same time in the presence of witnesses."

Should the man change his mind after giving the telak once or twice, the wife is not at liberty to leave him, but should he repeat the word three times the separation must take place, and they must not reside together again unless the woman be married and divorced from another man, or left a widow.

Words are not necessary to a divorce: it is sufficient for the husband to give the wife three articles of a similar nature, such as, three cents or three pieces of wood, three pebbles or three lumps of earth, and the divorce is rendered as binding

as if written or spoken.

Three months and ten days is the period allowed for a man to consider the subject, after giving the telak less than three times. At the end of that time, should he have changed his mind, he may take his wife back, in the presence of

witnesses. If he does not, she is at liberty to marry again.

The case of the woman is far different: if she be inclined to leave her husband the process is not quite so simple if the man object. Should be object to give telak, she is obliged to go to the Kali and sue for a divorce. The Kali issues his summons for the husband to attend, and she is forced to state her reasons for seeking a separation and prove them before he can divorce them. Three causes are considered justifiable reasons for sanctioning a divorce :-

First:—Ill-treatment on the husband's part towards the wife. Second:—If the husband refuses to support the wife; and

Lastly:—If the man is an imbecile and incapable.

All these charges must be substantiated before the Kali, and as those individuals are sometimes not over-scrupulous, a few dollars effect the woman's

Divorces are so easily accomplished, that the most abominable licentiousness is promoted, and the fine feelings that characterize the union of the sexes under

the Christian dispensation are unknown."

Amongst the Chinese, divorces according to native customs may take place for barrenness, adultery, refusing to serve parents-in-law, excessive loquacity, theft, jealousy, or chronic disease, such as leprosy-all on the part of the woman. There are, however, three exceptions in her favour:-first, if she have mourned three years for a father or mother-in-law; second, if the husband was poor when he married and has become rich; and, third, if the woman's parents have died since her marriage, so that she has no home to return to. In case of her deserting her husband, she may receive 100 blows with a rod and be sold or given away to another; if she elopes and marries another man, she may be strangled. Divorces, however, are rare amongst the Chinese of the Peninsula and Straits.

Doctor (Dúkun or Bomo).—No skilled physicians exist in Malaya, the socalled individuals being on a par with the witch-doctors of history.

Dog.—The dog is found in Malaya, in the half-domestic state in which it is seen in every country of the East, except China, Tonquin, Cochin-China, and the islands of the Pacific, in which it is kept for food. Some of the rudest tribes alone use it in hunting. It is the same prick-eared cur as in other Asiatic countries, varying a good deal in colour—not much in size or shape—never becoming wild, but always the common scavenger of every town and village. Its origin is as obscure as in other parts of the world. As the wolf, the fox, and the jackal do not exist in any part of the Archipelago, it cannot, locally at least, have sprung from any of these. There is, however, one species of wild dog in Sumatra, the Malay Peninsula, Borneo, and Java, which some naturalists have called the Canis sumatrensis, and others Canis rutilans; and from this the half-domesticated dog may have sprung, although there is certainly no evidence that it has done so. At the same time, there is none that points to a foreign origin. A wild dog exist in Napal, and a variety of it in some of the southern parts of Continental India—the Canis prinzevus; and this seems by far the most likely to have formed the stock from which not only the half-domesticated dog of Malaya, as well as those of Hindustan itself and the neighbouring countries have sprung, but even all varieties of the European dog.*

Dollar.—See Currency.

Dragon-flies (Bilalang garum) of brilliant colours are found throughout the Peninsula.

Drama (Main mayong, generally Wayang).—The more advanced of the nations of the Archipelago have the rudiments of a drama, the origin of which, it is certain, from the terms connected with it, and from its subjects, was in Java. There exists, however, no written dramatic performance in the form of a dialogue; and, indeed, the actors do not, except occasionally a few sentences, speak at all, so that the plays are really pantomimes. A practised artist, called the d'alang, reads the story before the audience, which the performers act in pantomime. Men perform both male and female parts, and usually in masks. Jesters or drolls (badud and bañol) are introduced on the stage without any observance as to time or subject; and a band of music, consisting of the usual staccato instruments, which make a wild and plaintive music, is played throughout the performance.

Another kind of acting substitutes a sort of puppets for living actors; these puppets consist of pieces of leather richly painted and gilt, and always representing the same personages, celebrities of ancient story. They are put in motion behind a screen of white cloth, having a lamp behind, so as to resemble the figures from a magic lantern. The same master of the revels, the d'alang, moves the figures, and furnishes the dialogue or story, something after the manner of Punch. Of all these performances, the buffoonery is by far the best part. [The above remarks, condensed from Crawfurd, apply to the majority of the native plays exhibited, though of late years Malays have given performances which do not owe their birthplace to Java.]

The Chinese reproduce the plays common in China. The dialogue is in a high falsetto, and generally in an archaic dialect not understood by either performers or listeners. Farces, however, are in the vernacular. The dresses are extremely gorgeous and of high value. The stage has no accessories, and is partly occupied by the musicians, who make a deafening noise with cymbal and drum, varied by that of ear-splitting flageolets and flutes. These performances are often paid for by wealthy men, as a treat to the neighbourhood, the stage being erected on some convenient plot of ground. The Klings appear to have no theatricals, properly so called. See THEATRICALS.

Draughts (Apit-apit, chatoo, or dăm).—Both draughts and chess are termed main chator, and the draught game much resembles our own. Unlike the Chinese, however, the lower class Malays seldom indulge in games of this sort.

Dress.—A mere outline of this subject will suffice to give the reader a general notion of it. In the hot climate of the Asiatic islands, the trees of the forest most probably furnished the raw materials of the first scanty clothing of its inhabitants, and that would consist of a mere covering for the loins. The fibrous

inner bark of some trees furnishes, even at present, among the more civilized races, a main portion of the dress of the poorer classes. Cotton, however, has immemorially formed the staple of the clothing of all the more advanced races. Silk was found to form a portion of the dress of the upper classes on the first arrival of Europeans, imported, wrought or raw, from China; and since a direct intercourse with Europe, woollen cloths have been made use of to a very consider-

able extent by the same classes.

Among the more civilized nations, the most important portion of dress is that which covers the lower portion of the body, and this is the same for both sexes. It consists of a short web of cloth of silk or cotton, or a mixture of the two, sewn at the sides, and forming a sack open at both ends. Its usual Malay name-sarong -which literally signifies a case or sheath, has reference to its use. This is loosely secured by tucking the upper end into its own folds, or by a girdle. This kind of petticoat forms generally the only dress of the male sex of the working classes, and within doors of all classes; and on this account we find the early Portuguese writers always representing the Indian islanders as "going naked from the waist upwards." The dress for the upper portion of the body consists of a jacket coming below the hips, called in Malay baju, and the classes in easier circumstances wear under it a tight vest with a single row of buttons. The head is always bare with the women, but the men cover it with a small handkerchief—saputangan, literally "hand-wiper." This is evidently an imitation of the turban, the Persian name for which—dastre—is only known to the learned. The Javanese, indeed, down even to the arrival of the Portuguese, seem to have used no head-dress, for Barbosa informs us that the people of this nation, whom he met at Malacca, "wore nothing on the head, but had their hair either arranged with art, or cropped." Trousers are occasionally used under the sarong by the richer classes, and this portion of dress, like the imitation of the turban, seems to have been borrowed from the Arabs, as is implied by its Arabian name—sarual—corrupted

Such is, generally, the dress of the more advanced nations of the Malayan Archipelago; but there are some distinctions of national costume, which consist chiefly in the manner of wearing the head-handkerchief, and in the pattern of the cloth of which the dress is made.* Thus far Crawfurd. But as the subject of dress seems deserving of rather more notice than he has accorded it, the following

extracts from an article in the J. I. A. are added :-

"The sarong may be said to be the gown, in its simplest form, that is, of the same width throughout and divested of all the additions from the waist upwards. From being nearly as long as the person, it forms in itself a complete envelope, as its name indicates, and is with the women, and often with the men, the only article of dress worn in the house and kampong on ordinary occasions. It forms also the sleeping dress of both sexes. In early morning the men may be seen standing in the serambi half torpid from the cold, with the arms folded in the sarong which hangs down to the feet, leaving nothing visible but the head and neck, which are drawn down upon it. In the middle of the day, and generally when not in deshabille, it is worn fastened at the waist, the operation of a moment. In adjusting it, it is extended by the hand in front and to the left till it embraces the person closely behind. It is then made to meet at the left haunch, so as to enfold the body tightly, and the top of the remaining or loose half is gathered together into a knot, in front, over which the border of the part next the person is drawn so as to confine it firmly. The lower end hangs to about the middle of the calf. The women fasten it in a different manner. When in deshabille, they generally wear it puckered and fastened immediately below the armpits, and reaching to the ankle. At night it is worn either loose or wrapped round the whole person, including the head, according as the weather is close or chilly. Such are the modes in which the sarong is worn in and about the house. We must pass to

the other articles of dress before we can explain how it is worn abroad, or when visitors are received.

Cotton sarongs of the best quality, observes Mr. Swettenham, are imported from Celebes, and are known as sarong Bugis. Kaiü batak are the "painted" cotton sarongs of Java, made by "stopping out" the pattern with wax. The sarong plekat, a commoner sort, is imported from Coromandel. Silk sarongs come from Palembang, Mentoh, and Basu Bara, in Sumatra, Borneo, Tringganu, and Kelantan, Singapore and Penang also producing them. Those made in Singapore are called Kain mastoli, while those woven with silk and gold thread are termed Kain sungkit. A sarong of one piece of cloth is called sa'lêrang, a join much diminishing its value, in which case it is called berkampol. When first dyed it is known as malau kopi, but otherwise as malau lechi.

The next portion of the men's dress is the selúar or sluar, which is a kind of trousers or drawers, wide at the top, where it is fastened round the waist by a running string or tali seluar, and closer at the legs, where it extends to about a hand's breadth below the knees. It is invariably worn abroad and frequently at home. It is made of a thicker and stronger cloth than the sarong. There are several kinds of the common seluar, such as the seluar Ache, or Achenese sluar, seluar Arab, &c. The Chinese wide and loose trousers, seluar China, when of silk, seluar lochuăn, are sometimes worn. A less common seluar is one which reaches the ankle, seluar gadoh, much worn by the Malays of Singapore, or Orang Silat; it is wide at the feet. The proper long trousers, seluar panjang, narrow at the feet, are much used by the orang Sia' or Malays of Sia' in Sumatra. They are sometimes buttoned at the feet. Another, the seluar pendé, terminates about the middle of the thigh, and is little

used save by the Bugis, most of whom wear it exclusively.

The bajú is a jacket of which there are several varieties. The baju sikat, which is the most common, reaches to the waist, is loose, open and without button in front, has sleeves terminating a hand's breadth above the wrist, and a nia, or collar, two to three inches in height. The baju chari Linga has sleeves fitting closely to the arm, reaching to the wrist and with a loose slit cuff reaching to the knuckles. The baju pesa sabla' or baju tutop imam, is similar to the last, but has an additional piece on the right, which buttons over the left side, by five or six buttons of cloth, stone or gold, according to the means and taste of the wearer. It is always buttoned close. The baju tangan kanching is a long gown reaching to the ankle, open in front and with buttons at the cuff, as the name implies. It is only worn by old men when they attend the mosque, or on occasions of ceremony. The baju bastrob is a vest or shirt worn beneath the proper baju, fastened in front by a row of buttons of gold, jewels, &c., and without collar or sleeves. The use of this vest is chiefly confined to persons of wealth and station. The baju ayit kurang is in the form of a shift, that is without any opening in front, save a small slit at the throat to admit of the head passing through, and which is fastened with a button. It has sleeves but no collar. The baju kurong bila tiga has three indentations in the collar. The kurong chikah mungsang has a stiff collar with buttons. It is much worn in Kedah, but in Singapore by a few of the principal Malays only. The baju ta bětangăn or baju poco resembles the baju ayit save in being sleeveless, and having a band within the slit at the breast where it is fastened, thus allowing the sides of the slit to remain When the sleeve terminates at the elbow it is called baju munyit. In both, a triangular piece projects over the shoulder. The baju haskat has a wide additional piece of cloth on each side; one of these lappets is fastened by a row of strings within the other below the armpit on the right side, and the other fastened in a similar manner over the preceding on the left side below the armpit. It has a collar about two fingers' breadth broad. This baju is much worn by the Malays of Malacca, who appear to have adopted it from the Klings, as in other Malay countries it is not generally used. It is sometimes made without sleeves, when it is called baskăt ta betangăn. The baju sadaria is a loose jacket with a small collar, a row of numerous small buttons or knots of thread, wide sleeves with cuffs reaching to the knuckles, braided at all the edges and embroidered, sometimes with silk or gold thread, on the breast and cuffs. This baju is also sometimes made sleeveless. The baju pindipun or bërsinjab is the name given to any of the open bajus when the borders are lined with silk.

The baju sadaria has a pocket, which the other bajus properly want, but the Malacca Malays have pockets in all their jackets save the kurong. A peculiar kind of pouch or purse, simbilet, about a foot long and two inches broad with a slit in the middle, is much used, chiefly for conveying money and gold, by the Malays of Muar and Padang and by the Sumatran people in the Peninsula, but occasionally also by other Malays. It has a loop at one end, and a string ending in a button at the

other, by which it is fastened round the waist.

The selvar, sarong and baju are the essential parts of the Malayan costume, and common to all. When the seluar is worn, the sarong is generally shortened, so as to expose the ends of the seluar. At other times one side is tucked up and thrown over the right or left shoulder, leaving the other hanging on the opposite side to the knee (slepang), or it is folded on the breast and left hanging down the back, in the fashion of a plaid or shawl (samperkan). Penghulus, and other men of some station, assert their claims to respect by wearing it in a peculiar manner, that is, gathered in folds at each side, which are made to project (kain kambang), when at one side only (manchong serong). In the omba beralun, which is a female fashion, the folds are made to stand out still more and in front, so as in walking to assume the billowy motion which the name indicates. When it is desired to have the arms and legs entirely disengaged, as on a journey, the sarong is gathered up and folded round the waist. It also enables the Malay to bathe so as to perform his ablutions effectually without any exposure of the person. A dry sarong is then thrown over the wet one, which is dexterously slipped off without coming in contact with the other. The sarong is thus the most convenient and convertible of all garments, forming, as occasion may require, dressing, bathing, or sleeping gown, kilt, plaid, shawl, girdle, and, as will appear, head-dress.

A general but not an essential article of dress is the bangkong, a waist-cloth or sash of cotton or silk, from 9 to 14 feet long, which is folded round the waist, the

ends being concealed.

The head-dress is a justar or kerchief about two feet to four feet broad, which is folded as a small turban. In front, above the brow, it is folded neatly so as to have the appearance of a fillet, the ends crossing and being adjusted and fastened behind. One end is left loose and lying over the crown of the head. In the palmy days of Malacca and Johore the same attention was probably given to the manner of wearing the kerchief which it still receives at some existing Malay courts, such as that of Sia'. Few Malays in Malacca and Singapore are now acquainted with these fashions, and it would perhaps be difficult to find Malays, not immediate followers of the families of the Sultan and Temenggong, who could explain their names. The Panglima's mode is called bila mumbang juntei krah, and is generally used by the Temenggong. Two corners are freed from the folds; one is brought forward and concealed between the fillet and the brow, and the other is made to project like a horn or tuft. When both horns are concealed it is called klongsong bunga, which is Tuanku Alli's favourite mode. The gulong gua has a single corner introduced between the fold and the forehead, and pulled down an inch or two over the brow. The gitong pideh has the loose end neatly arranged so as to cover the head like a rumpled cloth cap. The lang minyonsong angin has two projecting tufts and one of the ends hanging down behind towards one shoulder. The dayang pulang pangil is the gitong pideh reversed so that the fillet is behind. All these modes require the kerchief to be starched, or rather stiffened with kanji, to give them full effect. The skull-cap, kopia or songko, is worn by some. The thick and stiff varieties are kopia Arab or alfia of silk, kopia Surati of cotton, kopia Batawi of

gold thread, kopia Bilabas with alternate stripes of different colours, kopia sudu sudu with a raised border behind, and kopia rotan made entirely of rattan. The thin kinds are the kopia blanga, similar in shape to the preceding, and the kopia kape kape, which covers the whole head, leaving only the face exposed. The kopia Bugis is thicker than these but soft, being made either of the pith of the risam plant, or of tangsi from China. Both are dyed black, and the latter has a border of silver foil. The turban (sirban, tirban) is only worn by hajis and old persons.

The saputangan siri, or siri handkerchief, is held in the hand and sometimes thrown over the shoulder. In one corner a simpolan, or gidibong siri, or piece of cloth, is tied, which contains a tepa siri, a small box holding siri, a small receptacle for tobacco, generally made of pandan leaf, and the tampat kap ran or pekaporan, a small brass cup, but often merely a leaf, containing moist lime. The sibe, which is longer than the saputangan, is worn on the shoulder by hajis, and occasionally by others

A kind of very small handkerchief, or yellow cloth used by the attendants of kings, is called *kain wali*, and a long one *titampān*. The *salampei* is a yellow hand-kerchief, sometimes ornamented with gold, which the great officers of state wear thrown over the shoulder at royal feasts, burials, &c.

The chapal or kaus are sandals used by the wealthier and more respectable men, but unknown to the poorer. The cheinilla are an antique kind of slipper

only worn by a few on days of ceremony.

With the exception to be mentioned, the only distinction between the dress of the higher and wealthier and the lower classes consists in the difference of quality in the materials. The form of the different articles is the same for all, and has remained so from time immemorial. A Malay who now varied the form of any

article would be encountered by universal astonishment and ridicule.

The materials of dress vary according to the means and taste of the wearer, and there is no prejudice against the use of any kind of cloth whatever. The favourite sarong is the Bugis, which is stronger, finer, and more expensive than the manufactures of other countries. It is always striped and according to different patterns, in both respects resembling the Scotch tartan. It is not dyed, but woven of threads of different colours. The darker are preferred, and the most tastefully coloured is considered to be a mixture of a fine black and white, which is the most rare and expensive of all, from the difficulty of procuring a fine black colour. A sarong in which red predominates is the favourite dress of the great mass. The sarong pălekat is the finest and thinnest of all the sarong cloths, and its colours are also the most beautiful. Its use is principally confined to women. The ordinary material is cotton, but silk sarongs are common, although they are only worn on full-dress days. They are very seldom worn by men. The most choice and expensive are made of cloth either wrought entirely of gold thread (songket), or having it inwoven in stripes, flowers, &c. (betabor) all over, or merely at one end (bekapala). Cotton cloth sarongs are sometimes adorned with flowers of gold-leaf, applied to them with gum (bepirada mas or tilipo). Sarongs manufactured in Europe are now extensively used from their cheapness, although they are very inferior in strength and beauty to those made in the Archipelago. The baju is commonly of white cotton cloth of various degrees of quality and texture. But coloured chintzes, black cloth, &c. are in much use. Those who can afford it, and many of the young nobility whenever they appear in public, wear bajus of woollen cloth, velvet, and other fine materials on great days. Their bajus are also frequently embroidered with gold thread or made of cloth of gold. Those worn by brides and bridegrooms, and on festive days by children, are sometimes ornamented with flowers made of solid gold, which are sewed on (balu berpakankan mas o. berbunga mas).

In Malayan countries the use of certain kinds of cloth, either universally or within certain limits, is confined to the royal family, and prohibited, under severe

penalties, to all others. The crime of wearing yellow cloth, unless with the express license of the Raja, is punishable with death. Within the precincts of the court it is unlawful to wear cloth of a fine texture, such as muslin, without a similar license, and the breach of the law subjects the wearer to a fine, or to have the cloth torn from his person and be driven out ignominiously. The Malay historian of Malacca relates that after Sultan Mahomed had embraced Islamism, he established many rules for maintaining the dignity of the Malacca court, and defining its ceremonies and usages. It was he who first made Ordinances respecting yellow things (kakuningan) prohibited. The people were not allowed to wear them, not even a handkerchief, nor were they allowed to make of this colour fringes to the hangings of a room, or large pillow-cases, or mattresses, or any envelope, or any kind of manufactured articles or house ornaments, or anything else whatever, save sarongs,

bajus, and dustars.

Dress of Women.—The women, in addition to the sarong, wear a baju similar to the baju ayit, but reaching lower. This is much used by the Malays of Singapore. In Malacca the baju kurong is worn. It reaches to a little above the ankle. Its cuffs are fastened with buttons of gold and sometimes of diamonds. It is of black cotton cloth, but when in full dress this is exchanged for a silk one, of which the colour varies. The baju jipun is generally made of chintz and is open in front. It is fastened over the breast by two and occasionally three brooches (krosang), in the form and material of which the wearers show their wealth and taste. They are generally of gold, one being round, with flowers embossed (bunga tauto) on the surface or cut in (bunga pahat), the other (krosang ati ati) shaped like the leaf of the ati ati plant, and also adorned with flowers. Instead of the surface being wrought into flowers, it is sometimes studded with diamonds. Breast-pins are rare, and as the name (păspin) indicates, of very modern use. The under-vest, or bodice not quilted (choli joli), is an Indian article of dress very rarely used by Malay women.

Pockets are not used by women, but some have, on the left side of the waist, an imitation on a small scale of the *ompau* universally worn by Bugis men, and

which is similar to the sporran of the Scottish Highlander.

The head-dress, or slendang, is a piece of coloured cloth, about nine feet long and three feet broad, folded on itself and thrown over the head and shoulders, two corners being drawn in front on one side of the shoulder, and there held by the hand on that side, so as, when pulled tight over the face, to conceal it entirely, while the other hand is interposed on the other side between the face and the cloth, and constantly employed in keeping it open, to the extent which the lady considers proper. The young, when walking in a public place, leave only a sufficient opening for the eyes; the old are less scrupulous, and leave the greater part of the face exposed. A sarong is very often substituted for the slendang.

Ladies' shoes are unknown to proper Malayan habits, but in many places the

kasut kodo, or slipper, often embroidered, is worn.

The ornaments of the female dress, in addition to the brooches already mentioned, are the chucho or pacha sanggol, or hair-pins of gold, by which the hair is fastened when folded on the head in the shape of a shell, as it generally is. The head is usually a globe, leaf or flower-shaped, but there sometimes rise from it a number of spiral stalks of gold wire supporting flowers and leaves, which tremble on the slightest motion of the head, whence this ornament is called chucho, sanggol begintär. Jewels are often set in the centres of the flowers. The folds of the hair are also sometimes studded with golden nails, paku paku, or paku sanggol, the heads, which alone are visible, being neatly figured and the body being generally of silver. In Naning the hair-pin has a large head, and is called chucho kundăi. The glossy black hair of the Malayan girl is sometimes further adorned by the bunga sunting, a thin zone of gold, two to three inches in length, supporting a row of flowers similar to those of the chucho sanggol begintär.

The tali pinding is a band or cincture, by which the sarong is fastened round the waist. It is about two inches thick, made of cloth, silver, or gold, and fastened in front with the pinding, a large clasp of silver or gold, some inches in breadth. It is sometimes, when of metal, made in links, and sometimes in one piece, very fine and flexible.

The krabu are small earrings of gold, sometimes with a diamond set in them. A larger kind is called subang; when the krabu has several diamonds or other stones it is kunang kunang sakabun. Before marriage and the birth of the first child, anting anting, or pendants of gold—called tauge when loop-shaped, and chinchin when ring-shaped—are suspended from the krabu. Solid pendants, orlet, sometimes of diamonds, are worn by those who can afford them on great occasions, such as marriages.

Four rings of gold are generally worn on the left hand, two on the little finger and two on the next. These rings have sometimes diamonds. Bracelets, gilang tangan or pitam, of gold are frequently but not generally worn, and armlets, ponto, are seldom seen save on the persons of brides. A handkerchief held in the hand

completes the costume of the fair sex.

At the toilet, combs, generally of Chinese manufacture, and cocoa-nut oil, are the only articles used. Cosmetics are very rarely resorted to, save in the families of royal and noble persons, and although the men occasionally use rose-water, rose oil, chindana oil, majmo oil, &c., the women never do so. Flowers, such as the rose, champaka, and kanangga, are occasionally, but very rarely, worn in the hair. Their use is generally considered to denote an unbecoming manifestation of vanity or desire to attract attention. It is, however, a custom much in vogue with the Sakeis.

Dress of Children.—The dress of children is similar to that of their elders. Until the age of about five years they wear the barut (a large bandage). Until this age the children of the poor in country parts often run about naked, the females having a small heart shaped plate of silver or gold, called chaping, fastened by a string where the sculptor, from a similar motive, sometimes places a leaf. Little silver globules with grains inside, karonchong, are sometimes fastened by a string round the ankles, and make a tinkling sound when the children are in motion.

They are disused at the age of two or three years.

On holidays and days of ceremony the children are gaily dressed. The boys wear little skull-caps ornamented with golden flowers, and the girls the kopia berekor, which hangs down behind the kolur, which is similar to the kopia. From their necks are suspended, by silken or velvet strings or ribbons, gold buttons, doko or broad pieces of gold with ornaments, those of the girls being crescent-shaped, and those of the boys with an irregular curved margin, tangkal, or amulets, small pieces of gold, square-shaped for boys and crescent-shaped for girls. The gimpei are small round pieces of gold suspended by gold chains. Bracelets are worn—thin and flat for the girls, and round for the boys. The kuku harimau (tiger's claws) is a small piece of gold into which the points of two tiger's claws are fixed, the ends being shod with gold. The mane are gold beads worn at the wrist. Earrings and pendants, and bangles or anklets, gilang kaki, of silver, adorn the girls.

Drugs.—A large number of plants are supposed to have therapeutic virtues, but the subject has not yet been dealt with by European scientists. Drugs with metallic bases are almost unknown, but certain poisons, animal, vegetable and mineral, are familiar.

Drum (Gendang, rebana; great drum used only on special occasions naubat). **Malayan** drums are of simple design, with no means of tightening the heads. The **rebana** has only one face, and the gendang either one or two. They are more correctly tambourines.

Duck.—A species of duck has been immemorially domesticated by the more civilized nations of the Archipelago, but the bird is unknown to the ruder. Of the

time or manner in which it was first introduced, it is impossible to form any reasonable conjecture. The name for the domestic duck in Malay is *itek*. That it is not derived from any native wild species is certain, since no large wild duck exists in the western islands of the Archipelago; and, indeed, no wild duck at all except a teal, called by the Malays *mâliwis*, the *Anas arcuata*, or *dendroygna* of naturalists, a bird that is sometimes kept in tealeries, but has not been, and is probably not capable of being domesticated. The Malay name for the domestic duck, it may be remarked, extends to the cultivated languages of Celebes and the Philippine islands, from which it may be conjectured that, like the common fowl, the dog, hog, and buffalo, it was introduced into Celebes and the Philippines by the Malayan nations, who are so well known to have frequented them immemorially as traders.*

Dugong.—The Helicore dugong of naturalists, is an inhabitant of the shallow seas of Malaysia, but it is not numerous, or at least is not often caught by the fishermen. It is the duyong of the Malays, which naturalists, mistaking a j or y for a g, have corrupted into dugong. During my residence in Singapore, a few were taken in the neighbouring shallow seas, and I can testify that the flesh of this herbivorous mammifer is greatly superior to that of the green turtle.*

Duku.—A round fruit about the size of a lime, and containing a sweetish firm pulp in lobes like a mangosteen. It is generally liked by Europeans.

Duraka Juru.—A V. about 4³ miles from Butterworth, Province Wellesley, on the Bukit Tengah road.

Durian.—(See also Fruits.) The durian grows on a large and lofty forest tree, somewhat resembling an elm in its general character, but with a more smooth and scaly bark. The fruit is round or slightly oval, about the size of a large cocoanut, of a green colour, and covered all over with short stout spines, the bases of which touch each other, and are consequently somewhat hexagonal, while the points are very strong and sharp. It is so completely armed, that if the stalk is broken off, it is a difficult matter to lift one from the ground. The outer rind is so thick and tough, that from whatever height it may fall it is never broken. From the base to the apex five very faint lines may be seen, over which the spines arch a little; these are the sutures of the carpels, and show where the fruit may be divided with a heavy knife and a strong hand. The five cells are satiny white within, and are each filled with an oval mass of cream-coloured pulp, imbedded in which are two or three seeds about the size of chestnuts. This pulp is the eatable part and its consistence and flavour are indescribable. A rich butter-like custard highly flavoured with almonds gives the best general idea of it, but intermingled with it come wafts of flavour that call to mind cream-cheese, onion-sauce, brown sherry, and other incongruities. Then there is a rich glutinous smoothness in the pulp which nothing else possesses, but which adds to its delicacy. It is neither acid, nor sweet, nor juicy, yet one feels the want of none of these qualities, for it is perfect as it is. It produces no nausea or other bad effect, and the more you eat of it, the less you feel inclined to stop. In fact to eat durians is a new sensation, worth a voyage to the east to experience. When the fruit is ripe, it falls off itself, and the only way to eat durians in perfection is to get them as they fall; and the smell is then less overpowering. When unripe, it makes a very good vegetable if cooked, and it is also eaten by the Dayaks raw. In a good fruit season, large quantities are preserved salted, in jars, and bamboos, and kept the year round, when it acquires a most disgusting odour to Europeans, but the Dayaks appreciate it highly as a relish with their rice. There are in the forest two varieties of wild durians with much smaller fruits, one of them orange-coloured inside; and these are probably the origin of the large fine durians, which are never found wild. It would not, perhaps, be correct to say that the durian is the best of all fruits, because it cannot supply the place of the sub-acid juicy kinds, such as the orange, grape, mango, and mangosteen, whose refreshing and cooling qualities are so wholesome

and grateful; but as producing a food of the most exquisite flavour, it is unsurpassed. If I had to fix on two only, as representing the perfection of the two classes, I should certainly choose the durian and the orange as the king and queen of fruits. The durian is, however, sometimes dangerous. When the fruit begins to ripen it falls daily and almost hourly, and accidents not unfrequently happen to persons walking or working under the trees. When a durian strikes a man in its fall, it produces a dreadful wound, the strong spines tearing open the flesh, while the blow itself is very heavy; but from this very circumstance death rarely ensues, the copious effusion of blood preventing the inflammation which might otherwise take place. The old traveller Linschott, writing in 1599, says:—"It is of such an excellent taste that it surpasses in flavour all the other fruits of the world, according to those who have tasted it." And Doctor Paludanus adds:—"This fruit is of a hot and humid nature. To those not used to it, it seems at first to smell like rotten onions, but immediately they have tasted it they prefer it to all other food. The natives give it honourable titles, exalt it and make verses on it." When brought into the house, the smell is often so offensive that some persons can never bear to taste it.—Quoted from Wallace's "Malay Archipelago."

Elephants, tigers, and rhinoceroses are said to be extremely fond of this fruit, the hard shell offering no difficulty to their formidable jaws. The Peninsula Malays aver that the best durians come from Sungei Bakap in Province Wellesley.

Durian Daun.—V. in Malacca $1\frac{1}{2}$ miles from Sungei Bharu in the Sungei Bharu Ulu district.

Durian Sabatang.—Imp. V. in S. Perak at the junction of the Batang Padang and Bidor Rivers. It was the residence of the Laxamana, but has ceased to be of importance since the founding of T. Anson.

Durian Tunggal.—Important V. in district of same name, C. Malacca, the site of a Police station. The V. lies on the high road from Malacca to Machap, in the centre of numerous tapicca estates, and just outside the W. edge of the old tinmining district, about 10 miles from Malacca. An affluent of the Malacca river flows through the V.

Durian Tunggal.—District in C. Malacca with V. of the same name. A tin mine was opened here in 1840 by Mr. Westerhout and a Chinaman, but it is no longer worked.

Dusun.—In Malay means a village; and also the country distinguished from the town. It is the native synonym of the Sanskrit D'esa.

Dusun Datoh.—V. on W. bank of Perak R., C. Perak, just S. of Teluk Prang.

Dusun Kapar.—V. on the boundary line between Pulau Sebang district, N. Malacca, and Kru district, S. of Rembau.

Dutch.—The Dutch intercourse with the Peninsula proper was confined to the establishment of factories in Perak, Kedah and Junk Ceylon and the capture and occupation of Malacca in 1641, which with some vicissitudes continued until its final cession to us in 1825. The best account of Dutch enterprise in these places is probably to be found in Newbold's "Political and Statistical Account of the British Settlements in the Straits of Malacca." Particulars are given under the heads of "Malay Peninsula," "Malacca," &c.

Dyes.—Foreign dyes have so largely superseded native products that the latter are scarcely met with in places where foreign influence extends. Red, blue, yellow, brown and black are obtained from various leaves, barks and roots. For red, the barks of the tengah, kamudu, samah, bakoro, nyiri and betut, and the root of the mengkudu are used; for blue, nila, or indigo, and daun tarom; for yellow, the seeds of the saga serong (boiled), or the chips of the kayu kudrang; for brown,

mangrove bark; and for black (which is in reality only an intense blue), the leaves of the tarom.

The following remarks under this head are quoted from Mr. N. Cantley's Report

for 1886 :-

"Indigo (Indigofera tinctoria).—Not yet under cultivation by Europeans here, but largely cultivated by Chinese. The plant succeeds equally well on hill

and swamp.

"DIVI-DIVI (Cosalpinia coriaria) is a new product for the Straits. The plant has shown satisfactory growth. At the late flower show, Mr. Allen exhibited some pods from plants grown on his estate, and which seem quite equal to Indian produce. Its cultivation will no doubt be found profitable.

"Arnorto (Bixa orallina) has found apparently a congenial home in the Straits, and grows with all the vigour of its native habitat. It yields abundance of dye

which might surely be profitably utilized.

"Dyers' Cassia (Cassia auriculata).—This plant is quite at home in Singapore soil, and its profitable cultivation is believed to be possible. It was introduced from the East Indies.

"Other Dyes.—Among other unutilized dyes, the growth of which leaves nothing to be desired, may be mentioned Casalpinia sappan, Fibraurea tinctoria, Henna, Phytotacca, &c."

Eagle (Raja wali).—A species is known in Malaya, but is more probably allied to the condor.

Earring (Anting anting, or subang), worn as with us, generally of silver, but sometimes of a gold and copper alloy.

Earthquake (Gempa).—The Malay Peninsula is happily exempt from earthquake visitations, although Dutch Malaya is perhaps more liable to them than any other portion of the earth's surface. See Volcano.

Ebony (Kayu arang) is found in the Peninsula, but is not an article of trade.

Eclipse.—The names for an eclipse of the sun or the moon are all that is known about eclipses by the Malays. The word for an eclipse is the Sanskrit one, gerhana. An eclipse of the sun is, therefore, called gerhana-mata-ari, and of the moon gerhana-bulan, in Malay. But eclipses of both luminaries represent them as "sick," and so we have sakit-mata-ari and sakit-bulan, "sickness of the sun," and "sickness of the moon." An eclipse of the moon is also expressed by the native phrase bulan-makan-rauh,—the moon eaten by the dragon. The word rauh is Sanskrit, and the name of a monster supposed to aim at devouring the moon. During the eclipse, the rice-stampers are clattered in their mortars, in order to frighten the monster from his meditated mischief.*

Egg-plant (Brinjal Kong), largely grown, and generally procurable in the markets.

Elaps.—The most formidable venomous snake known, found in the Settlements and Peninsula. See Hamadryad.

Elephant (Gajah) (the name of the animal and of the bishop in chess).—
The elephant is found in abundance, in the wild state, in the Malay Peninsula, especially towards its northern portion. Whether the elephant of the Malay Peninsula be the same with the Sumatran, or with the common Asiatic, or whether it be different from either, is a point which has not been ascertained.

Both the elephant of Sumatra and of the Peninsula are, says Chawfurd, like the Asiatic species, and as the African once was, amenable to domestication. In the northern States of the Malay Peninsula, more especially in Kedah, they are, in fact, domesticated and employed as beasts of burden; and in Sumatra they were once tamed and used by the kings of Achin for parade. From both countries they

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are occasionally caught, tamed, and exported by the Telingas to the Coromandel coast. For the purposes of court ceremonies or for war, the elephant was found by the Europeans, on their first arrival in the Archipelago, in places where they no longer exist. Thus, at the capture of Malacca, the king and his son, each on their elephants carrying a wooden tower, charged the Portuguese, and in the pursuit of the fugitive king after the capture, mention is made by the Portuguese historians of the taking of seven elephants. Till about 40 years ago elephants still roamed in the Malacca jungle. But about that time they disappeared, having apparently found their way to the as yet undisturbed jungle of N. Johore and Pahang.

It seems highly probable that the natives of the Archipelago were ignorant of the art of taming the elephant until instructed by the Hindus. This is to be inferred, not only from the prevalence of Sanskrit names for the elephant itself, but from matters connected with its domestication. The usual name in Malay is the Sanskrit one, gajah; and, indeed, adds Mr. Crawfurd, it was long before that I myself found out that it had a native one. This is beram, although now obsolete. Among the terms connected with the domestication of the elephant that are taken from the Sanskrit, are the elephant-driver, or attendant, gabala-gajah, literally "elephant groom," balanggu, the fetters, and kusa, the driving-crook. The names of the tusks of the decoy elephant, and of the elephant trap, are, however, pure Malay. The animal is now found wild almost exclusively in Kedah, but a good many are employed in Perak and the adjoining States. Mr. W. E. Maxwell, C.M.G., in a contribution to Notes & Queries S. B. R. A. S., 1885, makes the following remarks:—

The use of the elephant has, however, diminished in the Peninsula, and is likely further to diminish as the country is opened up, unless the Indian system of stabling the tamed animals and feeding them in captivity is adopted, instead of the Malay practice of turning them out when not wanted for work, to shift for themselves in the jungle, simply hobbled by the forclegs like donkeys on an English common. This, of course, means destruction to crops of sugar-cane and Indian corn if there be any within reach, and becomes an intolerable nuisance in cultivated districts. Under Malay rule, elephants were in use in Malacca, and D'ALBUQUERQUE describes the King of Malacca in 1511 as fighting on an elephant in defence of his town. In Province Wellesley, too, when it was part of Kedah, and even after the cession, before roads were made, these useful animals were formerly employed. But

in both these provinces elephants have long ceased to be seen.

In Kedah, Patani, and in parts of Perak, elephants are still valuable, and indeed an indispensable means of transport, and the natives of these States possess a good deal of information, some of it reduced to writing in small treatises, on the subject of the trapping and taming of elephants and their treatment in health and disease. Travelling at different times in the first and last of the three states above-named, I have noted down the words of command used by elephant-drivers, and now subjoin them. The majority of them are not Malay, but may be corrupted Siamese. The words used in Kedah and Perak are not the same.

He further adds the following vocabulary of the words of command used in driving elephants:—

Perak.

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Tee-tee
                    Stand still! Keep quiet!
Tuhuh-tuhuh
                    Go back! Move backwards!
Dee-dee ...
                    Come close! (Used in calling the elephant.)
              . ...
Hee-hee ...
                    Go on!
               •••
Umbû
                    Go to the right!
               •••
Klong
                    Go to the left!
               •••
Kohoi-kohoi
                   Go slowly!
               •••
                    Go carefully! (Used where the road is slippery, or going down
Chên
                        a steep bank, or through a deep swamp.)
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Rabak	•••	•••	Feel!
Kwét	•••	•••	Pull down! (Used in directing the elephant to remove any stick or branch obstructing the path.)
Onk	•••	•••	Push! (Used in ordering the elephant to push down a perpendicular obstacle, as a post, or tree, or stump.)
Hoh-hoh	•••	••••	Stop!
Riap	•••	•••	Approach! (Used in ordering an elephant to go alongside of a Malay house or <i>pëlantar</i> . He will bring his head
			close if riap is said. For the hind-quarters the order
			is Riap buntut.)
Terum	•••	•••	Kneel down!
Terum p	nan	•••	Kneel down lower!
Tah	•••	•••	Get up!
Paha'mb		••	Keep clear of timber on the right!
Paha kl	mg	•••	Keep clear of timber on the left!
Chelút	•••	•••	Let the howdah slip off! (The gambala is on the ground.) At this word of command the animal lowers his hind
			quarters and lets the rengka slip over his tail.
Tú-i	•••	:••	(Employed to make the elephant stop switching his tail and striking the occupants of the rengka with it.)
Cheng	•••	•••	Put the right foot into the hobbles (sengkăla).
Cherot	•••	•••	Same for the left foot.
Chang	•••	•••	Lift the foot! (To have the sengkăla taken off.)
Tee-tee	•••	•••	Don't! (Used when the elephant takes up water or saliva in his trunk and sprinkles his sides with it.)
San	•••	•••	Let go! (Used when the animal squeezes the gambala's legs with its ears, behind which he sits.)
Guling	•••	•••	Roll! (in the water). An elephant being bathed will roll when told to do so, and will get up when bangket or tah is
			said.
Kot, kot,	kot	•••	(Used in driving an elephant home if, when the gambala has found him, he is too dirty and muddy to be ridden. He
			will go straight home in front of his gambala at this word of command.)
Riang-ri	iang	•••	Let go! (Used when an elephant, objecting to have the tali rat (rattan rope passing under the belly) fastened, puts up one of his forelegs and presses it against his body to pre- vent the rope from being pulled tight.)

Kedah.

Elephant Hill.—A limestone hill in Kedah containing a stalactite cave, the roof being about 70 feet high. Many of the stalactites are of grotesque form, and when struck emit a sonorous tone. The floor is covered with bat's dung. Many of the side passages are as yet unexplored. It is known to the natives as Gunong Geriyang.

Elephants, Speed of.—It does not appear that the fastest elephants in the Peninsula, at the *usual* rate of speed, exceed $2\frac{1}{2}$ miles per hour. They can, however, go at a trot which tries a horse to keep pace with.

Elephantiasis (*Unsut*).—This abhorrent-looking disease, whereby the lower limbs become unnaturally distorted to elephantine dimensions, is by no means uncommon in the Peninsula, but is found amongst Asiatics only, and more frequently amongst Klings than Malays. It is accounted a species of leprosy, and, like that disease, is as yet incurable. It sometimes, but rarely, attacks other portions of the body.

Emigration.—Strictly speaking, there is no emigration from the Peninsula, though, for legal purposes, Chinese who arrive at Singapore and pass on to Penang or the Dutch territories are accounted emigrants and protected by stringent legislation.

Enas or **Inas**, now one of the small Negri Sembilan lying on the N. border of Johol, a Mt. of the same name being included in its area. Curiously enough the name does not appear on any published maps, and the only reference to the locality I have been able to find is an account of a tour from Malacca to Pahang by Mr. Charles Gray in 1827. It is specifically referred to in Mr. Lister's report on the Negri Sembilan (q, v).

Enggar.—V. on E. bank of Perak R. 4 miles N. of Kota Lama, N.C. Perak.

Entomology.—Although numerous works treat of the entomology of the Malay Archipelago, no monograph has appeared dealing with that of the Peninsula and British Possessions only. Wallace mentions collecting 700 species of beetles (including 130 kinds of Longicorns) in Singapore alone. There would appear to be still a large field for research, although the more magnificent species of Coleoptera, &c., are to be found in most cabinets. Amongst the Hemiptera, fine specimens are found of the Fulgoride, or lantern flies, Cicadide, and Cimicide, or tree bugs, which are most brilliantly coloured. Of the Neuroptera, the Mantide and Libellulide are the most prominent, while the Termitide, or white ants, abound here as in most tropical countries. The Termes bellicosus, however, which builds the large hills, common in South America, is unknown. Of the Coleoptera, very fine examples abound, that which attracts most attention being the cocca-nut beetle, which plays immense havoc with the trees, and, on well-managed plantations, engages the services of several "beetle-catchers," who find continuous employment throughout the year. Another pest is the sugar-cane beetle. The most prominent of the order of Hymenoptera are the boring bees, who bore long cylindrical holes into timber to form a nest, each individual occupying its own hole. The female, which is nearly twice the size of the male, has no sting.

Of the LEPIDOPTERA (Kupu kupu), one order has been specially dealt with in Mr. DISTANT'S work upon the Rhopalocera of the Peninsula. The HETEROCERA, or moths, have yet to be described. Various species of Sphingidæ (Sphynx moths) abound. Of Myriapoda, the sub-order Chilopoda is formidably represented by enormous centipedes, sometimes reaching ten inches in length. Arachnidæ are well exemplified by brilliantly coloured field spiders, and a species of Mygale which feeds on the larger insects or small birds, while the Scorpionidæ are large and venomous. Several insects are referred to at length in their alphabetical places.

Entozoa.—A common complaint amongst the Malays, who use a decoction of the male pomegranate-tree as a vermifuge.

Epiphites, or creepers, abound in the Malayan jungles, and consist, in humorous cases, of fragrant orchidaces of singular and beautiful forms.

Era.—There is no evidence to show that the Malays had any era, native or foreign, before their adoption of the Hejira. They seem, however, to have had a solar year, and to have reckoned in it by the reigns of their kings, the number of years of each reign being always specified in their annals. Thus, although the Malays of Malacea did not adopt the religion of Mahommed until the year of Christ 1276, we find them alleging themselves to have founded Singapore in 1160, and giving various intermediate dates, which they could only have arrived at by reckning backwards, with the duration of their princes' reigns as their guide, unless, indeed, which is not improbable, that the era alluded to was that of Salivana, borrowed from Java.*

Eulo. -V. on S.E. shore of Kelantan about 8 miles N. of entrance of Tringganu It.

Exchange. - See Currency and Exchange.

Executions amongst the Malays are thus carried out. The condemned person is made to stand up with the shoulder bare. The executioner with his kris stands behind him, and at a given signal places a small wad of cotton-wool between the shoulder blade and collar bone. The point of the kris is placed upon this, and with a sudden jerk the weapon is driven downwards direct into the heart. Death is of course instantaneous. The object of the cotton-wool is to absorb the small quantity of blood which spurts from the wound.

Exotics.—A list of exotics cultivated in the Singapore Botanical Gardens, many of which are also to be found in private gardens, is given in Mr. Cantley's "List of the Principal Economic Plants in the Forest Experimental Nurseries," for 1886. As the question is so often put—"Is this or that indigenous?" the list will be found useful.

False Merbukit.—(Marked Berbukit in the Admiralty Chart). 432 feet high, the S. extremity of a chain of hills in S.E. Johore, about 8 miles N.N.W. of Point Romania.

False Parcelar.—Hill 936 feet high, 5 miles from the coast of Selangor, about $12\frac{1}{3}$ miles N.W. of Klang.

Faria Y Sousa.—"This Portuguese writer was born in 1590, and died in 1649. The work which connects him with the history of the Asiatic Archipelago is his 'Asia Portuguesa,' which is the Portuguese history of India from its commencement in 1497, to its virtual termination in 1649. This work is posthumous, and written in Spanish. It is a hasty compilation, of which neither the facts nor reasonings are reliable; and the author is, in every way, greatly inferior to the earlier historians—Barros, Couto, and Castanheda—who lived nearer the most important events, and had better sources of information. There is an English translation of the 'Asia Portuguesa,' dedicated to the Princess of Modena, second wife of James the Second."*

Fasts, Feasts, and Festivals (Malayan).—The Malays being Mahommedans, they observe the same dates as their co-religionists elsewhere.

RAMTHAN, OR MONTH OF ABSTINENCE (Bálan Puâsa).—This is the month specially set apart each year by the followers of Mahomet for religious abstinence. From the morning after the new moon (of Ramthan) is observed until the first appearance of the next new moon (Shawal), the various members of the body must be kept in rigorous prohibition. The fast begins daily from the time the light borders the eastern horizon and lasts till the stars are clearly observed in the

heavens in the evening; and to taste food or drink, to swallow spittle or to bathe during these hours would be to render the sacred ordinance null and void.

FEAST OF BREAKING OF FAST (*Hâri Râya*).—This Feast is celebrated on the 1st day of the month Shawal, which is the month following Ramthan. Mussulmans on this day are required to bathe, put on new clothes and give alms, according to their circumstances. During the day they attend prayers at the mosques, after which they give themselves up to pleasure and rejoicing.

which they give themselves up to pleasure and rejoicing.

FEAST OF THE SACRIFICE (Hāri Rāya Hadji).—This Feast is held on the 10th day of the month Zil Hayjah, in honour, it is said, of Abraham's intending to offer up Ismail, who, according to the Mohammedan creed, was chosen as the offer-

ing to the Almighty, and not Isaac.

The offering thus made is commemorated annually by the sacrifice of cows, sheep, goats, and other animals. It is the belief of the Mohammedan that animals sacrificed at the Feast will be present to give assistance in the perilous trial which awaits every soul after death, viz., the passage of the bridge Al Sirat which spans (according to the Koran) the abyss of Hell, and is represented to be finer than a hair and sharper than the edge of a sword. The path, though beset with many obstacles, will be crossed over with ease and safety by the faithful, but the wicked will miss the narrow footing and plunge into the fathomless gulf that yawns beneath them.

There are other fasts and festivals observed by strict Mohammedans throughout the year, but the foregoing are those of any importance. They are not made pretexts for holidays when in European employ, nor does even the observance of these above noted in any way interfere with domestic arrangements so far as

European masters are concerned.

Ferns.—Few natural orders of plants are better represented within the districts embraced by this work than that of the Ferns. Many species are indigenous to either the Settlements or Peninsula, which, in this respect, compare favourably with almost any other area under our influence. The following list has very kindly been placed at my disposal by Mr. N. Cantley, the Superintendent of the Singapore Botanical Gardens, and has been retained in the published form for two reasons. Firstly, the Malays have but few specific names for plants of this family. "Pokoh Paku," or the "nail plant," is the generic term applied to all, and but few vernacular names distinguish between the large number of specimens found. Secondly, the English names are equally few, and offer but little guide to the would-be collector. It has, therefore, been judged best to print the list in the form so generously furnished, forming as it does a portion of a forthcoming work on the Malayan Flora:—

Scie	STIFIC NAM	Œ.	•	En	GLISH NAME		ORIGINAL HABITAT,
	mia altera		•••	•••	 	•••	Penang, rare.
Alsophila		•••	•••	•••	Tree Fern	•••	S. S. and Native States.
"	glauca	•••	•••	•••	"	•••	Penang and Sclangor.
19	gigantea	•••	•••	•••	,,	•••	Gunong Sonoy, Perak.
,,	ornata	•••	•••		,,		_
"	comosa				,,		S. S. and Native States.
"	glabra	•••	•••	•••	"	•••	Penang, rare; Gunong Bubu,
							Perak.
**	albo-setace	88.	•••	•••	,,	•••	_
"	commutate	в	•••	•••	11	•••	Mount Ophir and Gunong Bubu, Perak.
,,	contamina	ns	•••		,,		· -
**	Kingii	•••	•••		,,	•••	Perak (new species).
Adiantun	ı Parishii	•••		1	Maiden Hair		Perak Hills.
,,	capillus v	enires	•••		"		Johore.
31	caudatum	١			"		Low's Pass, Perak; Penang.
"	æthiopicu		•••	•••	"		Penang.
	lunulatur			•••			
"	faballulat		•••		"	•••	Penang.
99		um	••		,,,	•••	Tonang.
				[I	.19]		

Scien	TIPIC NAME.		E	GLISH NAM	Ε.	ORIGINAL HABITAT.
Asplenium	subavenium			Spleen Wort		Straits generally.
,,	longissimum			"	•••	"
,,	Wightianum			,,	•••	91
,,	tenerum	•••		,,	•••	— <u>— </u>
,,	falcatum	•••	•••	**	•••	Straits generally.
,,	normale	•••		,,	•••	Gunong Kebon, Perak.
,,	elongatum	•••	•••	**	•••	_
,,	vilcanicim	•••	•••	**	•••	-
"	lunulatum	•••	•••	**	•••	_
,,	hirtum	•••	•••	**	•••	<u>=</u>
,,	macrophyllum va		nhwllum	**	• • •	<u>-</u>
"	tenuifolium			**	•••	<u> </u>
,,	paradoxum	•••		**	•••	Singapore.
**	caudatum	•••	•••	"	•••	,,
,,	speciosum			"		**
,,	unilaterale			,,	•••	**
,,	heterocarpum		•••	,,	•••	Perak.
,,	resectum	•••		"	•••	-
,,	tuncatum			,,	•••	Penang.
,,,	nitidum	•••		**		"
,,	elongatum	•••	•••	,,		_
,,	bulbiferum		•••	**	•••	Penang
,	Belangeri			**	•••	***
	naclocarpum	•••	•••		•••	_ ".
	repanophyllum	•••	•••	•••	•••	Perak
Anisogoniu	m cordifolium	•••	•••	•••	•••	Sungei Liang, Perak.
,,	decussatum	•••	•••	•••	•••	<u> </u>
"	lineolatum	•••	•••	•••	•••	Straits, in moist places.
A otin contori	esculentum dichetema	•••	•••	•••	•••	Poneng "
Aspidium v	s dichotama	• • • •	•••	Shield Fern	•••	Penang. Straits generally.
	ngaporianum	•••			• • •	• •
.,	emibissinnatum	•••	•••	"		**
	ubtriphyllum	•••	•••	,,	•••	"
	ariolosum		•••	,,	•••	**
	olymorphium		•••	"	•••	"
	ecurrens			"		
Acrostichur	n aureum			Paku Laut	•••	Straits, in tidal streams.
,,	auritum			,,		· -
11	Norisii			"		_
Antrophyru	ım reticulatum	•••		Cave Fern	• • • •	Gunong Riam, Perak.
,,	immersum			**		
"	angustatum	• • •	•••	,,	•••	Gunong Riam, Perak.
"	Cumingii	••	• • • •	"	•••	_
	plantagonium		•••	"	• • •	Penang.
Angioptoris		•••	•••	•••	•••	Bukit Timah, Singapore.
Branca insi		• • •	•••	•••	•••	Penang.
Blochnum		•••	••	•	••	Straits generally.
	oriontale Vinlaveonianum	• • •	•••	••	•••	**
Cynthon Br	Finlaysonianum unonis	•••	•••	••	•••	Penang.
	kori	•••	•••	•••		Gunong Kebon, Perak.
Cibotium H		•••		•••	•••	Singapore, Perak.
Challantho			•••	•••	•••	——————————————————————————————————————
11	fragilia	•••		•••		_
	varions		•••	•••		
11	argentia		•••	•••	•••	_
9	farlnosa		•••	•••	•••	
Camptoria		• • •	•••	•••	•••	Straits generally.
	patons .	•••	•••	TT 773	•••	Malacca.
Caratoplari	i thalistroides	•••	•••	Horn Fern	•••	Common in ditches and marshes.
Diaglana as	pidioipes					marsnes. Malay Islands.
Parmatault		•••		•••	•••	Straits and Perak.
Davallia tri		•••	Ha	re's-foot Fer	n	Perak, Penang.
	• •			20]		
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SCIENTIFIC NAM	Œ.		En	GLISH NAME.		Original Habitat.
Davallia tricomanoio	des	•••	Ha	re's-foot Fer	n	_
,, solida			•••	,,	•••	Straits generally.
,, elegans			••	,,	•••	"
" Griffithian			••	,,	•••	**
,, epiphylla ,, ghaerophyl			••	**	•••	•••
" moluccan			•••	"		=
,, divaricata				,,	•••	Straits generally.
,, Lorrainii	•••			"	•••	"
,, bullata			••	**	•••	"
,, elegans var			••	1)	•••	Ctroits some well-
Diplazium pallidum subserrat			•••	"	•••	Straits generally.
,, subserrat			•••	•••	•••))))
,, porrectui				•••	•••	"
,, bantame				•••		,,
,, lanceum			••	•••	•••	1)
,, syivaticu			••	•••	•••	,,
,, prescoitie			•••	•••	•••	Perak.
,, speciosur			•••	•••	•••	Straits generally.
" japonicu			•••	•••	•••	orana generany.
" sorzogone						"
" latifoliun	<u>a</u>		•••	•••	•••	**
polypodio	oides		•••	•••	•••	Perak.
Didymochlæna lunu	lata	•••	•••	•••	•••	Thaipeng, Perak, and Gunong Bubu.
Dictyopteris Barberi						Peninsula.
" polycar			•••	•••	•••	1 chinisula.
,, heteros			•••	•••	•••	,,
,, difform			•••	•••	•••	Klian Kinding, Perak.
Dipteris Horsfieldii	•••	··· ·	••	•••	•••	Singapore.
" bifurcatus		•••	••	••	•••	Gunong Bubu, Perak.
,, Lobbi Drynaria coronans	•••		•••	•••	•••	Mount Ophir.
	•••		•••	•••	•••	Penang Hill.
,, spiendens			•••	•••	•••	"
,, Linnæi	•••		•••	•••	•••	"
" rigidula		··· •	••	••••	•	_ ,,
" quercifolia			•••	•••	•••	Penang.
Drymoglossium pilos			•••	•••	•••	Straits generally.
Elaphoglossum confe			•••	•••	•••	Penang.
" Norr			•••	•••		,,
Gleichenia circinata				Paku Rawan		Mount Ophir, Gunong Bubu.
" longissim	a			,,	•••	<u>-</u>
,, hirta	•••	··· .		,,	•••	
,, vestita			•••	,,	•••	Ctuaita gamanalla
,, dichotom ,, glauca			•••	,,	•••	Straits generally. Penang.
,, grauca ,, linearis	•••		•••	"	•••	Penang and Perak.
,, Norrisii	•••		•••	"		Malacca.
,, flagellaris				,,	•••	Straits generally.
,, vulcanica				,,	•••	Gunong Kebon, Perak.
geniemblebiene mell		· · · ·	•••	**	•••	
Goniophlebium moll	e uriculatur		••	•••	•••	Penang.
• • • • • • • • • • • • • • • • • • • •	icosum		•••	•••		"
Goniopteris frolifera			•••	•••	•••	Gunong Bubu, Perak.
Gymnopteris subrepa			••	•••	•••	Penang.
" repand			••	•••	•••	,,
" spicata			•••	Oals Flam	•••	,,
" quercif " Linnæs			•••	Oak Fern	•••	,,
Hymenophyllum jav			•	Filmy Fern	•••	Bukit Timah, Singapore.
	ithii		•••		•••	Penang and Singapore.
				21]		
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Sc	ENTIFIC N.	AME.		Eng	LISH NAI	ME.	ORIGINAL HABITAT.
Hymen	ophyllum l	Nusii	•••	•••		•••	Penang and Singapore.
-		xertum	•••	•••	•••	•••	- 1 T
		parvifoliu Blumcan		•••	•••	•••	Straits and Perak.
Humat	a heteroph		ш	•••	•••	•••	Penang.
,,	angustate		•••	•••	•••	•••	"
,,	parallela	•••	•••	•••	•••	•••	_, " _
Margid	podata ictyum Fin	leveenie	***	•••	•••	•••	Singapore, Penang. Penang.
	ithostachys				•••	•••	Gunong Bubu, Mount Ophir,
			•••				and Malacca.
	ssia aosculi		•••	•••	•••	•••	Perak.
	togia parvu nodos		•••	•••	•••	•••	Singapore.
"		a nophyllo	idos	•••	•••	•••	Singapore.
"	immo		•••	•••	•••	•••	Straits generally.
Lindsa	ya cultrata		•••	•••	•••	•••	"
*1	adantiol		•••	•••	•••	•••	91
11	trapezife pootinat		•••	•••	•••	•••	**
"	ropons		•••	•••	•••	•••	"
.,	нсåndon	s	•••	•••	•••	•••	11
**	canooa	•••	•••	•••	•••	•••	11
11	rigida divorgon		•••	•••	•••	•••	**
"	tonora		•••	•••	•••	•••	"
.,	lanugine		•••	•••	•••	•••	,,
11	obtusa	•••	•••	•••	•••		 ,,
**	ooneinn Walkers		•••	•••	•••	•••	Perak. Singapore.
Litobre	anioni aidoc			•••	•••	•••	Straits generally.
11	*********		•••	•••	•••	•••	Peninsula.
	a coniifolia	•••	•••	•••	•••	•••	Straits generally.
**	hirtipos	•••	•••	•••	•••	•••	**
11	vicos cron ata	•••	•••	•••	•••	•••	Perak. "
"	orannifolia		•••	•••	•••	•••	Straits generally.
	ochthodor	s	•••	•••	•••	•••	"
**	funcipon	•••	•••	• • •	•••	•••	**
**	Hyrmatics Himrha		•••	•••	•••	•••	"
**	onloaratu		•••	•••	•••		Sungei Liang, Perak.
,,	gracilosco	ns	•••	•••	•••	•••	Straits generally.
11	immorsa	•••	•••	***	•••	•••	**
"	oronata Blumoi	•••	•••	•••	•••	•••	"
"	flacoida	•••	•••	•••	•••	•••	Perak.
"	dinnoota	•••	•••	••	•••	•••	"
	aplondons		•••	•••	•••	•••	"
"	Boryana tenericau	 lis	••	•••	•••	•••	"
Loxogi	amme invo		•••	•••	•••	•••	Penang.
	, avor		•••	•••	•••	•••	n
Lygodi	um circina	tum Lailinm	•••	•••	•••	•••	Straits generally.
***	micropi dichotu	m	•••	•••	•••	•••	,,
"	nonnda:		•••	•••	•••	•••	"
	floxuom	um	•••	•••	•••	•••	"
Lygodi	um Japonie		•••	•••	•••	•••	Waterfall Danana
Matani	polysta a pootinata		•••	•••	•••	•••	Waterfall, Penang. Mount Ophir, Gunong Bubu,
17 1 50 p7 1 3 1	ne functions	•	•••	•••	• • •	•••	Perak.
Miteral	opla plunat	a	•••	•••	•••	•••	Penang.
**	ntrigen		••	•••	•••	•••	Straits generally.
11	mjreitit)	(192) (192) VAV. T	olypodioi	ina	•••	•••	"
11	-fr-1111		I tourou	г 1 9		•••	**

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South	IFIC NAME.		Eng	LISH NAME	ō.	Original Habitat.
	platyphylla hirta var. spelunc	aa	•••	•••	•••	=
Mesochlæn		~ 		•••	•••	Straits, in ditches.
	triphyllum	•••	•••	•••	•••	Penang.
"	salicifolium			•••	•••	,,
	simplix	•••	•••	•••	•••	. ,,,
Nephrodiur	n aridum	•••	•••	•••	•••	Straits generally.
**	costatum	•••	•••	•••	•••	**
**	arbuscula	•••	•••	•••	•••	**
**	pennigerum	•••	•••	•••	•••	**
,,	crinipes urophyllum	•••	•••	•••	•••	**
"	truncatum	•••	•••	•••	•••	***
,,	brachyodon	•••		•••	•••	"
"	sakayense		•••	•••		Gunong Kebon, Perak.
"	extensum	••	•••	•••		,, ,,
"	cucullatum		•••	•••	•••	"
"	molle	•••	•••		•••	"
"	unitum	•••	•••	•••	•••	"
,,	pteroides	•••	•••	. ***	•••	75-1
**	sagenoides	•••	,	 Tala 171	•••	Malaya.
"	filax-mas	•••		Iale Fern	•••	"
,,	melanocaulum multijugum	•••	•••	•••	•••	**
"	glandulosum	•••	•••	•••	•••	**
"	amboynense		•••	•••	•••	,,
,,	abortinum	•••		•••	•••	"
,,	hispidulum		•••	•••	•••	,,
,,	singaporean	•••	•••	•••	•••	**
**	fastum		•••	•••	•••	"
,,	subtriphyllum	•••	•••	•••	•••	"
,,	semi-bi-pinnatu	m	•••	•••	•••	"
"	polymorp	•••	•••	•••	•••	,,
"	vareolosum pachyphyllum	•••	•••	•••	•••	"
"	circularum		•••	•••		**
Nepheolepi	s exaltata	•••	•••			Straits generally.
,,	volubilis	•••	•••	•••	•••	"
"	ramosa	•••		•••	•••	,,
	cordifolia	•••	•••		•••	***
Niphobolus		•••	•••	•••	•••	,,
**	acrostichoides	•••	•••	•••	•••	**
**	lingua	•••	•••	•••	•••	Danana"
"	fissus stigmosus	•••	•••	•••	•••	Penang. Gunong Bubu, Perak.
***	penangianus	•••		•••		Penang.
Oleandra V		• • • • • • • • • • • • • • • • • • • •		•••	•••	Gunong Gerai.
	umingii	•••	•••	•••	•••	"
,, m	usæfolia			•••	•••	
Onychium		•••		. ::-		Everywhere common.
Osmunda ja	svanica	•••		loyal Fern		Peninsula.
	ım vulgatum	•••	Snake	s Tongue I	rern	Straits generally.
**	reticulatum pendulum	•••	•••	•••	•••	"
Prosaptia c	ontigue	••	•••	• • •	•••	Penang."
	imersoni	•••	•••	•••	•••	, , , , , , , , , , , , , , , , , , ,
Pelles falc			•••	•••	•••	Straits generally.
", sera	iifolia	•••	•••	•••	•••	"
Pteris longi		•••		•••	•••	,,
,, creti		•••	•••	•••	•••	Singapore.
,, pellu	·	•••	•••	•••	•••	Penang.
وامماء	ormis	•••	•••	•••	•••	Malacca.
	phousiæ pinnata	•••	•••	••	•••	"
	pinnata Iriaurita	•••	•••	•••	•••	Gunong Bubu, Perak.
,, quad		•••	•••	•••	•••	" "
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Scient	TIFIC NAME.	English Name.			ē.	ORIGINAL HABITAT.		
Pteris long	ipinula			•••		Sungei Ujong.		
	nima		•••	Brake Fern	•••	Everywhere.		
,, escu	lenta	•••	•••	•••	•••	Common in ditches.		
Plagiogyria	pyonophylla	•••	•••	•••	•••	Peninsula.		
Polystichu:	m semicordatum	•••	•••	•••	•••	Penang.		
"	biaristatum	•••	•••	•••	•••	"		
. "· ·	aculeatum	•••	•••	•••	•••	T. " . TT::: T		
Piecenemia	membranifolia	•••	•••	•••	•••	Limestone Hill, Perak.		
**	membranacea	•••	•••	• • •	•••	"		
Dhogontori	leuzeana	•••	•••	•••	•••	Peninsula.		
	s erubescens distans	•••	•••	•••	•••			
"	punctata	•••	•••	•••	•••	,,		
"	ornata		•••	•••		"		
,,	subdigitata	•••	•••	•••		"		
,,	auriculata	•••	•••	•••	•••	"		
	n subevenosum		•••	•••	•••	Penang.		
,,	hirtellum		•••		•••	,,		
"	sersilifolium	•••	•••	•••	•••	"		
,,	repandum	•••	•••	•••	•••	,,		
,,	decorum	•••	•••	•••	•••	"		
11	cucullatum	•••	•••	•••	•••			
**	munatum	•••	•••	•••	•••			
**	subfalcatum	•••	•••	••	••	Cumana Vahar Davel		
"	subpinnatifidum	•••	•••	•••	•••	Gunong Kebon, Perak.		
"	Khasyanum	•••	•••	•••	•••	"		
"	obliquatum fuscatum	•••	•••	•••	•••	" "		
"	venulosum	•••	•••	•••	•••	" _ "		
"	tamariscinum	•••	•••	•••	•••			
"	subdigitatum				•••	_		
Pleopeltis			•••	•••	•••			
	linearis	•••	•••	•••		Peninsula.		
"	stenophyll a	•••			•••	Malacca, Perak.		
	sinuosa	•••		•••	•••	Straits generally.		
"	longifolia	•••	•••	•••	•••	Islands.		
,,	superficiale	•••	•••	•••	•••	Gunong Kebon, Perak.		
	angustata	•••	•••	•••	•••	Singapore.		
	punctata	•••	•••	•••	•••	Malacca.		
"	Morgani	•••	•••	•••	•••	Techangkat Kebon, Perak		
	musæfolia					(new species). Malacca.		
• • • • • • • • • • • • • • • • • • • •	macrochasmum	•••	•••	•••	•••	Gunong Kebon, Perak.		
.,	pteropus			•••	•••	Penang.		
	phymatodes	•••	•••	•••	•••	Common everywhere.		
• • • • • • • • • • • • • • • • • • • •	longissima	••		•••	•••	Malay Islands.		
• • • • • • • • • • • • • • • • • • • •	nigrescens	•••	•••	•••	•••	Penang.		
• • • • • • • • • • • • • • • • • • • •	dilatata	•••		•••	•••	Penang and Singapore.		
"	palmata	•••	•••	••		"		
,,	lamarioides	••	•••	•••	•••	Gunong Bubu, Perak.		
,,	incurvatum	•••	•••	•••	•••	"		
• • • • • • • • • • • • • • • • • • • •	irioides	•••	•••	•••	•••	Si		
	singaporiana insigno	•••	•••	•••	•••	Singapore.		
	insigne	•••	•••	•••	•••			
Polybotrys	abbo-squamatum appendiculata an	d vars.	•••	•••	•••	Penang.		
Photinont	eris rigida		•••	•••	•••			
	drynarioides	•••	•••	•••	•••))))		
Platyceriu	m Wallichii	•••		•••	•••	Straits generally.		
,,	biforme		F	Elk's Horn Fe	rn	,,		
	grande	•••	•••	•••	•••			
Schizolam	a davalloides	•••	•••	•••	•••	Balik Pulau, Penang.		
,,	cordata	•••	•••	•••	•••	Straits generally.		
**	Gueriniana	•••	•••	•••	•••	11		
"	ensifolia	•••	•••	•••	•••	11		
"	heterophyll a	•••			•••	**		
	•			[124]				

Scientific Name.		Eng	LISH NAM	ne.	Original	Навітат.
Stenolama chiensis			•••		Straits gener	allv.
Syngramme Wallichii		•••			Penang.	·
,, alismæfolia	•••		•••		Singapore.	
fraxinea		•••		••	Penang.	
, laureania	•••	•••	•••	•••	Sungei Ujon	ø.
Selliguea caudiformis		•••	•••		Straits gener	
allintian	•••	•••		•••	•	
Tool	•••		•••	•••	"	
Maingari	•••	•••	•••	•••	**	
Hamiltoniana	•••	•••	•••	•••	,,	
nemete	•••	•••	•••	•••	" _	_
mambranasas	•••	•••	•••	•••	_	-
ma ananhalla	•••	•••	•••	•••	_	
Stenochlæna sorbifolia	•••	•••	•••	•••	Danana	-
To luntro	•••	•••	•••	•••	Penang.	
Oakinna malaasaa	•••	•••	•••	•••	Otwoite memor	.a. 11
dimitata	•••	•••	•••	•••	Straits gener	any.
1901 4	•••	•••	•••	•••	11	
,,	•••		Till	•••	Straits and 1	In
Trichomanes parvulum	•••	F1	lmy Fern	•••	Straits and I	erak.
,, digitatum	•••	•••	•••	•••	1)):	1
,, pallidum	•••	•••	•••	•••))):	1
,, bipunctatum	•••	•••	•••	•••	a."	
" pluma	•••	•••	•••	••	Gunong Bub	u, Perak.
,, pyxidiferum	••.	•••	•••	•••	**	**
,, javanicum	•••	•••	•••	•••	"	11
" obscurum	•••	•••	•••	•••	"	"
" rigidum	•••	•••	••	•••	**	"
", muscoides	•••	 .		•••	~. ·	
Thamnopteris nidus	•••	Birds	'-nest Fer	n	Straits gener	ally.
" phyllitidis	•••		**	•••	"	
", musæfolia	•••	•••	"	•••		_
Tænitis blechnoides	•••	•••	•••	•••	Common eve	rywhere.
Tittaria elongata	•••	•••	•••	•••	Singapore.	
,, lineata	•••	•••	•••	•••	,,	
,, faleata	•••	•••	•••	•••	,,	
,, blechnoides		•••	•••	•••		
,, scolopendrina	•••	•••	•••	•••	Penang.	

Fibres.—The following, copied by permission from the Report of the Superintendent of the Singapore Botanical Gardens for 1886, will give a good idea of the fibres, indigenous or introduced, which have been experimented with at Singapore. Although many of these are used for domestic purposes, none have as yet become articles of trade:—

MAURITIUS HEMP (Furcrea gigantea) continues to grow with great vigour in the Nurseries, and several thousand plants have been disposed of to planters for trial. The price realized for good fibre is about £28 per ton in London, and if the fibre can be prepared here at 5 cents per pound, its profitable cultivation is no doubt possible.

Manila Hemp (Musa textilis) grows well. When first planted it takes longer to send up suckers than the common banana does, but once established it grows freely. In Manila, on good soil, the plantations are renewed only after a period of about 20 years. The present market value of the fibre is from £30 to £40 per ton in London, and as labour is about equally as cheap in the Straits as in Manila, the plant is no doubt capable of profitable cultivation in favourable localities.

SUNN HEMP (*Crotalaria juncea*).—Common in a wild state all over the Settlements, and grows well in ordinary soil. Some attempt to utilize the plant should be made, as the fibre commands a good price in the market.

PENGUIN HEMP (Bromelia sylvestris) grows with remarkable vigour. It is one of the pine-apple tribe, but the leaves are much longer than those of the pine-apple plant. It succeeds best under the treatment pine-apples require.

RHEA or CHINA GRASS (Boehmeria nivea) grows well in rich moist soils, and

now that a simple process for the extraction of the fibre from the wood by steaming has been hit upon, its manufacture, considering the high price obtained for the fibre, is worthy of careful trial, especially on land where sugar cultivation has ceased to be remunerative, and where the ground is not marshy.

PLANTAIN and BANANA FIBRE (Musa sapintum).—The common plantain or banana yields a good fibre worth about £15 a ton. I observed when in Selangor a wild banana which grew there with great luxuriance; in appearance the plant looked very like Musa textilis, and it is probable it will be found to yield a very good marketable fibre. From the Kew Gardens Bulletin of April last I learn that in Jamaica a red banana produces fibre worth £25 per ton; the plant is probably the same as the red banana of the Straits.

LALANG (Imperatia Kanigii).—Lalang has been found to produce good papermaking material, but as the grass had to be transported to England in bales, only the longest grass containing stout fibrous stems was found to pay. The land that will support grass of such a robust nature, will also grow more valuable crops. The quantity of material available for paper-making in the Straits, including bamboos, pine-apple leaves, wood, &c., would seem to warrant the establishment here of a permanent paper factory.

PINE-APPLE FIBRE (Ananassa sativa).—In reference to pine-apple fibre, Mr. Morris, writing in the Kew Bulletin, already referred to, observes as follows:-"Although not much at present in commercial use, the fibre has a future of considerable importance before it. It is finer and stronger than that yielded by any other plant. A beautiful fabric known as Piña cloth is made from it. A rope of

pine-apple fibre \(\frac{3}{4}\) inch in circumference bore a strain of 57 cwt."

MUDAR FIBRE (Calotropis gigantea).—Plants of Mudar have been in demand during the past year. The plant on hand is apparently the white variety, and grows very freely in almost any soil. The downy substance contained in the follicles or seed pods is the part most valued, but the stem also yields a fibre which is said to be superior to the common Calotropis, which by branching more is less valuable. The plant also yields a gutta. The juice of ten average plants is said to yield about a pound of gutta.

Cotton (Gossypium arboreum).—Cotton is found to do well on alluvial deposits on the plains and also on hills up to an elevation of about 2,000 feet as a first crop after the removal of virgin forest, but the soil of the Straits generally is unsuited

for the cultivation of cotton, being too clayey and retentive.

Карок (Eriodendron anfractuosum).—The cultivation of Kapok is attracting much attention. The plant is of rapid growth and succeeds well on ordinary soils. Its cultivation in the Straits can hardly fail to be profitable under good management.

Indian Hemp (Cannabis sativa) grows, but shows no hope of profitable production, the fibre being five times shorter than it naturally is when grown in a

congenial climate.

OTHER FIBRES.—The following fibre-producing plants are also found to grow well in the Straits:-American aloe, Hibiscus of sorts, Bowstring hemp of sorts, Cus-cus, Palm and Pandan fibres, and numerous plants belonging to the Urticacee. Verbenacea, and Malvacea families. Jute has not been tried, the seed requisitioned not having arrived in time.

Fighting Dress.—The fighting jacket of the Malays usually has no sleeves. One kind is properly embroidered with pious words or sentences, and is called kalambu rasul Allah, "the Prophet's bed-curtain." It is supposed to protect the wearer from danger. Another kind is known as leher baju, because it is made of forty-four remnants left in cutting out the necks of forty-four ordinary jackets. These patches must be sewn together by seven maidens on seven consecutive Fridays, and the jacket thus made will be peliyas, or invulnerable.—N. & Q. with No. 15, J. S. B. R. A. S.

Fire.—Procuring fire by friction is an accomplishment as common to the Malay as the North American Indian. The process is, however, slightly different. While the latter resorts to circular friction, the Malay cuts a notch on the convex surface of a bamboo, across which he rapidly rubs another piece cut to a sharp edge. A fine powder is rubbed away and this ignites. Bamboo is also used as a flint with tinder. The all-pervading match, however, is alone used in all districts under foreign influence.

Firefles (Klip klip) abound, and the bushes bordering the rivers are often beautifully illuminated by their light. They appear to in all respects resemble the American insect.

Fish and Fisheries.—There are assuredly no seas in the world more abundant in esculent fish than those of the Asiatic Archipelago, and a few of them are of excellent flavour. The fish of rivers and lakes, although, perhaps, less abundant and of very inferior quality, are of importance in some of the islands. Fish constitutes the chief animal aliment of all the inhabitants, and everywhere of those of the sea-coast who are by profession fishermen. The greatest plenty of fish, and also the best quality of it, is found in the comparatively shallow seas bordering the granitic and sedimentary formations, and the least abundant in the deep seas close to the volcanic. Among the best fisheries are those of the eastern coast of

the Malay Peninsula and those of the entire Straits of Malacca.

The variety of fish which is found may be judged by a fact respecting the Ichthyology of the island of Celebes. The learned Dr. BLEEKER, the Director of the Batavia Society of Arts and Sciences, has named and described no fewer than 108 species belonging to that island, and yet expresses himself satisfied that he has not described above one-eighth part of the whole number which exists. Out of the 108 species so described, it was found that 64 only were common to Celebes and Java. A people who have derived from the sea or river a main portion of their sustenance from their first existence, may well be expected to have acquired some skill in the capture of fish, and fishing is indeed the art in which the greater number of them excel the most. Fish are caught by them by hook and line, by a great variety of nets, by weirs and traps, by spearing, and by stupefying those of rivers by narcotic juices, of which that from the tuba root is the best known. Notwithstanding their long experience, the Chinese excel them even in their own waters, and are the constructors and owners of all the weirs on a large scale which are so frequent on the banks in the neighbourhood of European settlements, and in which are caught the greatest quantity and best quality of fish. The taking of the mother-of-pearl oyster, the pearl-oyster in a few places, of the holothurion or tripang, and of the shell tortoise, form valuable branches of the Malayan fisheries.

The following is a list of the fish actually known to the Malays of the coast, with their scientific names, largely taken from the valuable list of fish exhibits compiled by Dr. Rowell for the Exhibition of the Colonies and India, 1886. It will be observed that, in many cases, the same Malay word is applied to different species. The numbers following "Cant." refer to the pages of Cantor's "Malayan Fishes," on which descriptions will be found. "Sp." prefixed shows that Cantor does not describe the individual fish named but others of the same species only:—

MALAY NAME.

SCIENTIFIC NAME.

Tkan Anjang Anjang		Scolopsis ghanam Pristipoma operculare Channa orientalis Ophiocephalus punctatus Ophiocephalus striatus Electropicus	 Sp. Cant. 81. Sp. Cant. 72. Sp. Cant. 83. Sp. Cant. 92. Sp. Cant. 115
, Aruan Tâsek , Badah <i>or</i> Bunga Ayer	•••	Elacate nigra	 Sp. Cant. 115. Sp. Cant. 304.

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1	MALAY NAME.			SCIENTI	FIC NAME.	,		
Ikan	Bāji Bāji	•••		Platycephal	lus macrac	anthus	•••	Sp. Cant. 37.
"	Baji Baji	•••	•••	Platycepha	lus puncta	tus	•••	Sp. Cant. 37.
,,	Baji Baji	•••	•••	Platycepha		ılatus	•••	Sp. Cant. 37.
71	Banau	•••	•••	Stemirham		•••	•••	D
17	Bandang	•••	•••	Megalops cu		•••	•••	Page 20, No. 77.
"	Barat Barat	•••		Triacanthu			•••	,, 23, ,, 173.
**	Batu Barau Barau	•••	•••	Crenidens s Priacanthu	TO 1 T. 22		•••	Sp. Cant. 80.
"	Bandan	•••	•••	Chrysophry		•••	•••	Page 21, No. 109.
"	Bawal Chermin					•••	•••	Cant. 140.
,,	Bâwal Bâtu (Po		•••	•••		•••	•••	
,,	Bawal Putch or	White Po	m-					
		•••	•••	•••	•••	•••	•••	
17	Bawal Tumbok	•••	•••		•••	•••	•••	Cant. 139.
,,	Bâwal Hitam	•••	•••	Stromatens	_	•••	•••	Cant. 139, 140.
"		•••	•••	Julis lunari		•••	•••	Sp. Cant. 236.
"	Bechok Bechok	•••	•••	Novacula ru Platyglosus		•••	•••	_
"	Belalang	•••	•••	Excestus n	.=		•••	Sp. Cant. 250.
"	Belânak	•••	•••	Mugil balar		•••	•••	Sp. Cant. 93.
"	Belilbus		•••	Teuthis ora		•••	•••	Sp. Cant. 207.
"	Belontok	•••	•••	Gobius virid			•••	Sp. Cant. 179.
"	Belanak	•••	•••	Mugil cann		•••	•••	Sp. Cant. 93.
"	Belidah	•••	•••	Notapterus	kapirat	••	•••	· _
"	Belodok Karang	3	•••	Platyglosus		ri	•••	_
"	Biji Nangka	•••	•••	Upeneoides	tragula	•••	•••	-
"	Blut (eel)	•••	•••	Cillaga Mag				O- O 00
"	D	•••	•••	Sillago Mac		•••	•••	Sp. Cant. 20.
"	Bôna Kâyu	•••	•••	Platax teirs		•••	•••	Cant. 168. Page 21, No. 93.
"	Buaya	•••	•••	Gastrotokeu		-	•••	Sp. Cant. 120.
"	Bûchok			Seolopsis ci				Sp. Cant. 81.
"	Bummaloh or B	Sombay I		-		•••	•••	Cant. 273.
,,	Bunga Ayer or 1		•••		•••	•••	• · •	Cant. 304.
,,	Buntal	•••	••	Tetrodon ob	longus	•••	•••	Cant. 380.
,,	Buntal Bâtu	•••	•••	Ostracion co		•••	• • •	_
"	Buntal Belang		•••	Tetrodon lin			•••	C
**	Buntal Börek Buntal China	•••	•••	Tetrodon in Tetrodon st			•••	Cant. 373.
"	Buntal Kumbar	 nø	•••			•••	•••	Cant. 365.
"	Buntal Landak		•••	Dioden stist		•••	•••	Sp. Cant. 371.
"	Buntal Landak			Dioden mad		•••)	
,,	Buntal Panjang		•••	Dioden mad		•••	}	Cant. 369.
"	Buntal Pisang	•••	•••	Tetrodon lu	naris	•••		Cant. 378.
,,	Chelek Mata	•••	•••	Pristipoma	maculatu	m.	•••	
,,	Chopit Karang	•••	•••	Platyglosus		18	•••	~ ~
"	Daeng Belang	•••	•••	Caranx com		•••	•••	Sp. Cant. 123.
"	Daun Bāru Dolah	•••	•••	Drepane pu		•••	••	Cant. 162.
**	Delah Delah Karang	•••	•••	Cœsio pings Cœsio chrys		•••	•••	_
,,	Dingkis	•••		Teuthis nas	4H-4-	•••	•••	Sp. Cant. 207.
"	Dûri	•••	•••	Arino sagor		•••	•••	Sp. Cant. 256.
,,	TALL Marian	•••	•••	Arius nengs		• • •		_
"	Engor Engor	•••	•••	Macrones E		•••	•••	_
>>	Garagaji	•••	•••		•••	•••	•••	Cant. 407.
,,	Gedabang	•••	•••	Psettus arg	enteus	•••	•••	Sp. Cant. 173.
"	Gelamah Panja	-	•••	Otolithus as		•••	• • •	Cant. 71.
> 2	Gerut Gerut	•••	•••	Pristipoma			•••	Sp. Cant. 72.
**	Gelam Gorammi	•••	•••	Psammoper	_	прір	•••	Cant. 88.
"	Grisi	•••	•••	Pentapus p	 aradiseus	•••	•••	——
"	Guddimi	•••	•••			•••	•••	Cant. 119.
"	Gulama		•••			•••		Cant. 71.
"	Gerut Gerut	•••	•••	Pristipoma			•••	Sp. Cant. 72.
,,	Haruan	•••			•••	•••	•••	Cant. 83–92.
,,	Hijau	•••	•••	Gamphosus	notostign	18.	•••	 .
				[128]				

1	Malay Name.			Scientific Name			
Tken	Inggu			Amphiphrion frenatu			Sp. Cant. 82.
		•••	••			•••	
"	Inggu	•••	•••	Amphiphrion percula		•••	Sp. Cant. 82.
"	Inggu	•••	•••	Amphiphrion sebae	•••	•••	Sp. Cant. 82.
"	Inggu	•••	•••	Pempheris mangula		•••	Sp. Cant. 175.
"	Inggu	•••	•••	Pomacentrus albofaci		•••	Sp. Cant. 241.
"	Inggu	•••	•••	Pomacentrus trimacu	11 8. tus	•••	Sp. Cant. 241.
**	Inggu Kiling	•••	•••	Psendoscarus niger	•••	••	a
,,	Inggu	•••	•••	Pterois miles	•••	•••	Cant. 42.
"	Inggu	•••	•••	Pterois Russellii	•••	•••	Sp. Cant. 41.
"	Inggu Karang	•••	•••	Stolocentrum sextria		•••	~ ~
**	Inggu Bombin	•••	•••	Stolacanthus messole		•••	Sp. Cant. 164.
"	Jalu	•••	•••	Lutianus dodecacant	hus	•••	
,,	Jarang Gigi	•••	•••	*** ***	•••	•••	Cant. 57, 60 & 23.
,,	Jāru Jāru		•••	Caranx boops		•••	Sp. Cant. 123.
"	Jebong	•••	•••	Balistes stellatus	•••		Sp. Cant. 344.
,,,	Jenahak		•••	Lutianus Roseus (Re	d Mullet)		_
,,,	Jumpong		• .	Cheilissus chlorurus			_
"	Jumpol	•••				•••	Cant. 96.
"	Kachang	•••	•••	Sphyræna acutipinnis	3	•••	Sp. Cant. 20.
"	Kalui	•••		Ophromenus olfax	•••		Cant. 88.
	Karong Karong			Therapon puta			Cant. 19.
"	Kawan		•••	Dangila burmanica		•••	
"	Kelaban	•••	•••		•••	•••	
"		•••	•••	Labeo nandina Parbua kalua	•••	••	_
**	Kelah	•••	•••	Barbus kolus	•••	•••	
99	Kelah	•••	•••	Barbus strachyi	•••	•••	_
"	Kelat	•••	•••	Psendoscarus chrysor	oma	•••	G . G
"	Keli, Cat-fish	•••	•••	Clarias majur	•••	••	Sp. Cant. 262.
"	Kepan Laut	•••	•••	Clyphidodon notatus	•••	•••	-
**	Kerek	•••	•••	Barbus Neilii	•••	•••	_
"	Kerek Gedabang	g	•••	Equila edentula	•••	•••	Cant. 148.
"	Kerong Kerong		•••	Sebastes stoliczkœ	•••	•••	_
,,	Kerang Kerang	•••	•••	Therapon quadrilinea	tus	•••	Sp. Cant. 19.
"	Kertak Lantei	•••	•••	Lethrinus nebulosus			·
"	Kertak Lantei		•••	Synagris japomeus			_
"	Kertakok	•••	•••	Batrachus grunnieus			Cant. 205.
"	Kerusu	•••	•••	Monacanthus monoce	eros	•••	Sp. Cant. 347.
	77 - 4	•••	•••	Holacanthus annular			Cant. 164.
"	Ketarap	•••	•••	Psendoscarus ghobba			
"	Kis			Scolopssis margaritife		•••	Sp. Cant. 81.
"	Kitang	•••	•••	Seatophagus argus		•••	Cant. 164.
"	See also		••			•••	Cant. 207-8-9.
			••	Serranus diacanthus	•••	•••	
"	Krapu	•••	•••	Serranus malabariens		•••	Sp. Cant. 7.
"	Krapu Kayu	•••	•••	Serranus salmoides		•••	
"	Krapu Lilin	•••	•••	<u> </u>	•••	•••	Sp. Cant. 7.
"	Krisi	•••	•••	Synagris notatus	•••	•••	C- C-+ 01
"	Krisi Bali	•••	•••	Scolopsis bilineatus	•••	•••	Sp. Cant. 81.
**		•••	•••	Anacanthus scriptus		•••	Sp. Cant. 422.
"	Krosok		•••	Monacanthus choirce		•••	Sp. Cant. 347.
"	Kuda Kuda Aye	r Betina	•••	Hippocampus guttula	tus	•••	Sp. Cant. 388.
**		•••	•••	m41-1	•••	•••	Cant. 29.
"		•••	•••	Teuthis margaritifer	•••	•••	Sp. Cant. 207.
**	•	•••	•••			•••	Sp. Cant. 55.
,,	Lomah	•••	•••	Thynnichthys sanakh	al	•••	
,,	Lampam	•••	•••	Barbus jerdoni	•••	• • •	_
"	Lasah	•••	•••		•••	• • •	Cant. 191.
"	T ~~			Histiophorus gladius		•••	
"	T T		•••	Trichiurus savala		•••	Cant. 115.
"	Lebus	•••		Iluthis concatenata		•••	Cant. 208.
	T		•••	Antennarius mummif			Sp. Cant. 202.
"	Tames	••		Synnancidrum morrio		•••	
,,	Tamu Daniana		•••	Pelor didactylum			_
"	Table	•••	•••	•		•••	Cant. 191.
**	Lidah	•••	•••			•••	Cant. 222.
"			•••	Symantype orientalia	•••	•••	Sp. Cant. 222.
"	Lidah Lidah Ba		•••	Synaptura orientalis		•••	
**	Lidah Lidah Ba	•	•••	Cynoglossus elongatus		•••	Sp. Cant. 233.
**	Lingka Karang	•••	•••	Cheilinus fasciatus	•••	•••	
				[129]			K

	MALAY NAME.			SCIENTIFIC NAME.		
Ikan	Lidah Lidah Li	ımpur		Synaptura commersomana		Cant. 222.
11	Lisah		•••		• • •	Cant. 191.
,,	Lobung Kuning	;	•••	Gobius tentacularis	•••	Sp. Cant. 179.
"	_ 0	•••	•••	Chœrops oligacanthus	•••	
,,	Logu	•••	•••	Myripristis murdjan	•••	G 4 . 07 4
. "	Luli	•••	•••	35	•••	Cant. 274.
,,	Malong	•••	•••	Murænesox telabon	•••	Cant. 316.
**	Manah Sabong		•••	Ostracion lubicus	•••	Sp. Cant. 365.
**,	Mas Merah Merah (the best	figh in	the	The common name of Ikan Je	 me_	Cant. 305.
,,	market)			hak or Red Mullet		
	Nior Nior	•••	•••	Trachynotus ovatus		Sp. Cant. 120.
"	Pandan		•••	Gerres abbereviatus	•••	Sp. Cant. 55.
"	Parang Parang		•••			Cant. 277.
"	DA. ! D 34	•••	•••	Trajgon sephen		Cant. 429.
,,	Pari Daun	•••				Cant. 436.
"	Pâri Kilawar	• . •	•••		•	Cant. 432-3.
,,	Pâri Kulbas	•••	•••			Cant. 417-19.
,,	Pâri Kulbas Lir	nchin			•••	Cant. 420.
,,	Pàri Lang	•••	• • •	Aetobatis marinari	•••	Cant. 435.
**	Pâri Lâlat	•••	•••	Trygon narnak	•••	Cant. 423-4.
,,	Pari Pari Paus	•••	•••	Dicerobatis	•••	Cant. 438.
"	Patong		, ;·· ,	Selundia Sykesii	•••	_
,,				out so classed by the Malays.		Caust 01
"	Pechah Priuk	•••	•••	Scolopsis vosmeri	•••	Cant. 81.
,,	Pinang Pinang		•••	Chetodon octofasciatus	•••	Sp. Cant. 156.
,,	T) TT .	•••	•••	Chelmon rostratus	•••	Cant. 158.
"	Potong Darma	•••	•••	(Siamese) Lobotes auctorum	•.	Cant. 86. Sp. Cant. 80.
,,	Puchuk		•••		•••	Cant. 113-115.
,,	Durland.	•••	•••	Percis pulchella	•••	Sp. Cant. 1.
"	D 3	•••	•••	Seriolicthus bipinnulatus	•••	- Cart. 1.
"	Pûput		•••	Opisthopterus tartoor		
"	Damana	•••	•••	Mugil Bleekeri	•••	Sp. Cant. 93.
,,	Rombing Karan		•••	Holacanthus nicobariensis	•••	Sp. Cant. 164.
,,	Rombong Romb			Lutianus sabae		_
,,	Rong	•••	•••	Labeo cœruleus	• • •	_
,,		•••	•••	Echeneis naucrates	•••	Cant. 199.
,,		•••	•••	<u></u>	•••	Cant. 176.
,,		•••	•••	Laleo boggu	•••	C
,,		•••	•••	Caranux armatus	•••	Cant. 131.
"		•••	•••	••• ••• •••	•••	Cant. 57.
,,	Salangan	•••	•••		•••	Cant. 26.
,,	Salanghi Saliup	•••	•••	Chorinemus moadetta	•••	Cant. 26.
,,	Saludu	•••	•••		•••	Sp. Cant. 117. Cant. 258.
"	Samunka	•••	•••	Apogon franatus	•••	Sp. Cant. 2.
"	Sebarau		•••	Barbus stexastichus	•••	
"	Seblah	•••	•••		•••	Cant. 214-216.
,,	Selar Karang	•••	•••	Caranx gymnostchrides	•••	Sp. Cant. 123,
,,	Seludu	•••		Arius gagora	•••	Sp. Cant. 256.
"	Semarum	•••	•••	Centropogon	•••	_
,,	Semarum Karai	ng	•••	Synanca verrucosa	•••	Sp. Cant. 47.
,,		••.	•••	Plotosus canias		Sp. Cant. 264.
**	Sembilang Karo	ng	•••	*** *** ··· • · · · · · · · · · · · · ·	••	Cant. 264-5.
"	Senangin		•••	Otholithus maculatus	•••	Cant. 62.
"	Senderang Sand		•••	Plectropoma maculatum	•••	Comb 00
"		•••	•••	Lobotes surinamenis	•••	Cant. 80.
**	Serkut Siah Siah	•••	•••	Cirrhites fasciatus	•••	-
"	Siakap Hidong l	 Ruđeh	•••	Deploprion difasciatus	•••	Cant. 10.
"	Siakap Karang		•••	Cromileptis altivelis Lates calcarifer	•••	Sp. Cant. 1.
"	Olama T	· • •	•••	Ophiocephalus micrapeltes	•••	Cant. 92.
"	Oimmon hi		••		•••	Cant. 26.
"	Commonda	•••		Toxotes jaculotor	•••	Cant. 176.
,,	C	•••			•••	Cant. 258.

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1	MALAY NAME.			Sci	ENTIE	TC NAME	•		
Ikan	Sutu	•••		Amphi	syle s	cutata			Cant. 213.
"	Talang		•••	Chorin	emus	toloo			Cant. 119.
"	Talang Raya						•••	•••	Cant. 118.
"	Talang Saluy			Chorin	emus	hyan			Cant. 118.
,,	Tambah		•••	Strom	ateus	niger			Cant. 139.
"	Tambarek	•••	•••	•••					Cant. 67.
"	Tamban					ke s a rdine	es)		Cant. 287.
,,	Tamban Betel	•••	•••	·					Cant. 294.
,,	Tamban Nipis	•••				•••		•••	Cant. 294.
,,	Tamban Bulat	•••		(Prepa	red li	ke sardine	es)	•••	Cant. 286.
27	Tampok Tampo	k		Gerres	oblon	gus		•••	Sp. Cant. 55.
,,	Tanda Tanda		•••	Lutiar	ius sil	a.vo	•••	•••	· —
,,	Tangiri			•••	··· .		•••	•••	Cant. 108-110.
,,	Tangiri Papasi		•••		·	•••		•••	Cant. 112.
,,	Tebal Bibir Sun	gei	•••	Diagra	mma	crassispin	au m		Sp. Cant. 77.
,,	Telan Pasir	•••	•••	Trypai	uchen	a vagina			Cant. 190.
"	Telan Rumput	···· •	•••			s cineras	cens		Sp. Cant. 174.
"	Temalek		•••	Barbu	s for			•••	•
••	Tembri			Seiœn	a glau	cus			Sp. Cant. 56.
"	Temenggalan		•••	Barbu	s burr	nanicus		•••	·
"	Temperas	•••		Barbu				•••	
"	Tengiri Batang					nmeronii		•••	Cant. 108.
"	Terubok			Clupes					Sp. Cant. 276.
"	Terubok Darat			Labes					• –
,,	Tilan	•••		Masta	cembe	lus arma	tus		
,,	Timum Timum		•••	Lutiar	ius lir	neolatus	•••	•••	_
11	Todah			Belone	chor	an	•••	•••	Cant. 246.
"	Todah Pendek		• • •					•••	Cant. 248.
"	Tripang		•••	Sarus	ludier	18	•		Cant. 269-267.
,,	Truboh	•••	•••		•••	•••	•••		Cant. 299.
"	Tumbul-Mas	•••	•••			unnina			Sp. Cant. 106.
"	Ubi	•••	•••				•••		Cant. 21.
,,	Ular		•••		•••	•••	•••	•••	Cant. 316.
"	Unggar	•••	•••	Lutiar	ius a r	gentimac	ulatus		_
"	Yu (shark)			•••		·		••.	Cant. 399.
,,	Yu Banjar		•••	Triæno	odon o	oletusus	•••	•••	
,,	Yu Belangkas	•••	•••	Chilos	eylliu	m trispul	are indic	us	Sp. Cant. 393-4.
,,	Yu Belangkas		•••	Lamn	a Spal	llanranii		•••	·
"	Yu Belangkas	•••		Rhync	hobat	us ancylo	stomus	•••	Sp. Cant. 412.
**	Yu Bengkong To	andoh Pa	n-	•		•			-
	jang		•••	Lyger	a Blo	chii	•••	•••	Cant. 404.
,,	Yu Bengkong Ta	ndoh Per	ndek	Lyger	a dla	leus	•••	•••	Sp. Cant. 401.
,,	Yu Cheekak	•••	•••	Stegos	toma.	tigrium		•••	Sp. Cant. 396.
,,	Yu Kaik Kaik	•••		Rhino	batus	thouini		•••	Cant. 415.
"	Yu Kaik Kaik			Rhync	hobat	us djedde	usis		Cant. 412.
"	Yu Pandak		•••			rmoratur		•••	Cant. 891.
"	Yu Rimau	•••	•••			Rayneri			
,,	Yu Todak		•••	Pristis			•••	•••	Sp. Cant. 407.
"	Yu Toke				-		•••	•••	Cant. 393-7.
••									

Fishing.—As Cantor truly observed over forty years ago, the Malay is more a born fisherman than the Chinaman, though the latter makes up by ceaseless work for the less skill he brings to bear upon his employment. The fishmongers are almost invariably Chinese. A beach sale of fish here is very like that held at home. There is a good deal of chaffering as to prices, but on the whole the business is got through quickly. The daily surplus of fish is cured by the fishmongers with salt. The larger fish are gutted, washed, and placed in layers in casks, with salt between each layer. After 24 or 48 hours, they are taken out and dried in the sun. The very small fish, together with the fluid in which the larger fishes have been cured, are sold for manure to the spice and cocoa-nut planters, who have a high opinion of their usefulness in this respect. The following is a vocabulary of words used by fishermen, and not to be found in most dictionaries:—

Malay.		English.	Description and Use.
Alei Buaya			Crocodile or alligator hook, made of wood, inserted into the bait, generally a fowl,
Ampang		Fishing net	duck or dog. For all kinds of fish. The net is stretched
	•••		from side to side. The under part is pegged in the mud at low ebb. The whole net is laid down flat and covered with sand or coral to conceal the same. Stakes are driven at intervals of 30 feet into the mud, and attached to net, having cords tied to upper part of net. At high water the said cords are pulled up to raise the net, and fish are caught at low tide.
Bintor Chachak	•••	Casting net	Bait attached to middle horizontal cord, to which is tied a signal cord to show the presence of fish. The net consists of two pieces, which open when dropped to the bottom, and close with fish inside when hauled up by perpendicular cord. The net is about 100 fathoms long.
Bintor Champak	•••	Casting net	For catching crabs. Having bait and float, Bait generally of pieces of dog-fish.
Bubu	•••	Fishing trap	Employed to catch fish in very deep water by sinking it to the bottom with a weight, having a line and float attached to show its position on the surface. Sometimes supplied with bait, but oftener without. Hauled up generally at low tide. Fish are taken out by drawing through the mouthpiece.
Chandat	•••	Fishing line and hook	k For daybam, a species of fish.
Grogoh		Fishing trap	This double-faced fish trap is generally used for catching fresh-water fish.
Jala Anak Ikan	•••	Casting net	For catching small fish, prawns, and shrimps in shallow water. A net about 7 cubits long.
Jala Rambang	•••	Casting net	Called rambang because it is generally used or thrown at random in about 2 fathoms water. The net is about 7 cubits long.
Jala Tamban		Casting net	Generally employed for catching a species of fish called tamban. The net is about 9 cubits long.
Jalor		Canoe	Employed when out fishing with nets.
Jaring Anak Ikan		Fishing net	For catching small fish.
Jërmal		Fishing stake	
Joran	(Fishing rod [183	For small fish.

MALAY	·•	English.	DESCRIPTION AND USE.
Joran Sentak		Fishing rod	Self-acting rod and line for fresh-water fish. The line has a catch. The rod is stuck upright in the mud. Opposite, at a short distance, is the peg for the catch. When fish pull at the bait the catch detaches and the rod springs back.
Kail Anak Ikan		Fishing line and hook	For small fish.
Kail Londa		Fishing line and hook	
Kail Parang or	Fenggiri .	Fishing line and hook	For species of fish called parang and tenggiri.
Kail Püpüt		Fishing line and hook	Line and hook with float for puput (a fish which generally floats on the surface).
Kail Sĕla		Fishing line and hook	For a species of fish called sčla.
Kail Todak		Fishing line and hook	For a species of fish called todak.
Kelang Besar		Large fishing stakes	This large fish trap is a permanent structure, and is in general use among the Malays for catching all kinds of fish. It is usually constructed of stakes and rattan, and consists of four compartments. When fish pass through each into the last compartment they cannot get out again, and this is scooped out at low water, the fishermen descending to the surface of the water by ladders on the side of the trap. The position of the kelang (fishing stakes) is generally at right angles with the shore, i.e., with its head projecting into the sea.
Kelang Kechil		Small fishing stakes	
Kisah or Brupa		Shrimp or prawn net	Worked by two men in shallow water.
Kolek		Canoe	Employed when out fishing with nets.
Lukah		Fish trap	This trap is generally placed in the channel of small streams with its mouth against the current.
Lukah Darat		Fish trap	For fresh-water fishing.
Lukah Laut		Fish trap	For salt-water fishing.
Pengachar			"Attractor" used for catching the small octopus (krita) by trailing it in 1 to 3 feet muddy water along the edges of rocks and reefs during the north monsoon. The krita takes hold of it and will not release it, until captured by the operator.
Plontang Püpüt	•••	Fishing line and hook	Float and hook for a fish called <i>puput</i> . A number at a time are thrown on the water in slack tide. The fisherman watches the floats in a boat and easily knows when fish take bait, and are caught.
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MALA	Y.		English.		DESCRIPTION AND USE.		
Půkat			A seine net				
Rawa			Prawn net				
Rawai		•••	Fish snare or fish	ing net	A number of hooks tied with short lines attached to the middle part of sharp pointed pieces of nibong. The hook is directly under the short point. A long piece of cord is used to tie together the heads of the pieces at intervals generally of about 2 feet. Thus prepared the cord is stretched taut between two stakes, the hooks being at the height of one to two inches above the mud, and supplied with bait. The sharp points prevent the fish from getting away by moving forward, and when it moves backwards the hook catches as usual.		
Sampan Geben	g		Fishing boat	•••	Large sampan used for fishing with nets.		
Sampang Penjaring			Fishing boat	•••	Employed when out fishing with net, and angling.		
Semblang	•••				For large fish.		
Serampang	•••		Harpoon	•••	For large fish.		
Ditto	•••		Harpoon		For small fish.		
Serubang			Harpoon	•••	Used for sticking the fish called puput, a sort of sea-pike, with the aid of a torch light, held over the side of a boat, it being the habit of this fish to make for any light in large numbers.		
Sondong	•••	•••	Shrimp or prawn	net	.Worked by one man.		
Suruet	·		Dugong harpoon		Employed for the same purpose as Tempuling.		
Tangkol		•••	Fishing net		Employed for catching fish as they pass along. This contrivance consists of one large net, nearly square, laid down flat; two ropes attached to each end of the further side are stretched in opposite directions so as to be in line with the further side of the net tied at certain points to the said ropes. When fish pass over the net the ropes are simultaneously drawn up, the net is thereby raised above the water, or with only the middle of it touching the water. The fish are then taken out.		
Tanjol	•••		Fishing rod		For catching prawns in 3 to 5 feet clear slack water on a sandy beach, by applying the hook to the eye of the prawn and giving the tanjol a sharp jerk. The operator has to wade stealthily in the water.		

	MAL	AY.		Engl	ISH.		Description and Use.		
Tempuling		••• •••		Dugong harpoon			The point is so arranged as to become de tached from the handle when it ha struck the object aimed at, being retained by a cord attached to it.		
Topang	•••	•••	•••				For drawing out and catching the krita, a small species of octopus. The rattan is made at one end to hold the bait, which is let down into the hole of the krita, the bait being generally of crab; when the krita catches hold of the bait the rattan is drawn out, and the krita following the bait to the mouth of its hole, is hoisted out with the Topang.		
Truban				Fishing trap			Fish are caught in this trap when they enter it and come in contact with the cords which retain the catch outside. The trap-door has a heavy weight attached to it, and it therefore descends and closes rapidly.		
Tuas							This trap is also a permanent structure, constructed in 4 to 5 fathoms water. The position of the mouth or front is against the rising tide. Fish are only caught when seen passing by the man watching on the building, who, on the fish entering the receptacle, raises the trap by winding the rope which sustains it round the cylindrical bar made for the purpose.		
Twah			•••	Fish trap			For fresh-water fishing; the usual size of the trap is about 4 feet by 3 feet. The fish being unable to turn round when it has once entered the trap, is taken out by opening the end.		

Fish Roe.—The roe of the *ikan truboh* forms an article of considerable trade. The fish abounds in Singapore, Penang, &c., but the spawning ground is on the Sumatran coast, whence most of the article is imported. It is first thoroughly salted and then dried. It is then packed between layers of salt for export. It is much liked by both Europeans and natives. In the market it appears in the shape of two lobes forming an oblong body about 6 inches long, 2 inches in breadth by ‡ of an inch in depth, of a deep amber colour.

Fishing Stakes.—Blat or Jermal in Malay. The Chinese word kelang has also passed into the vernacular. These consist of rattan screens arranged in such a way that the fish are driven into its enclosures, from which they cannot escape. Each enclosure is arrow-shaped, the last being the narrowest. Each blat is required by law to show a light at its outer extremity by night.

Flamboyant.—This gorgeously flowering tree—Poinciana regia—was, so far as can be learned, originally introduced from Madagascar by way of India, but is so common in the Straits Settlements as to make most people believe it indigenous. Its brilliant red and yellow blossoms make it a most conspicuous

and ornamental tree. Mr. Dunman, late Inspector-General of Police at Singapore, is credited with having introduced it into that island.

Flying Dragon.—This pretty reptile (*Draco volans*) is often met with, and deserves all the praise given it in natural histories for beauty of markings. The wings, or prolonged membranes which act as wings, are strengthened by slender processes from the first six false ribs, and in reality act as parachutes much as do those of the flying lemur, &c. The reptile is perfectly harmless, and can be handled with impunity. One out of the two specimens seen by the compiler was caught down his back, having jumped from a tree and alighted between the collar of his coat and the flesh. It was figured and described in No. 9, p. 162, of the J. S. B. R. A. S. for June, 1882.

Flying Fox (Pteropus rubicollis).—The Malay kalong or klawei. This is a large species of bat which has acquired its name from its fox-coloured fur and the vulpine character of the head. Ordinary specimens measure from 2 to 3 feet from tip to tip of the wings, but they have been found measuring over 5 feet. They fly in a steady line, and do immense damage to fruit plantations. The mat bags so often seen enclosing jack and other fruit are intended as protection against these animals.

Flying foxes are, according to Wallace, eaten by the people of the Island of Balchian in the Dutch Archipelago, but, possessing as they do a strong foxy

flavour, are not so used by the Malays.

Flying Lemur (Galeopithicus volaris).—This is one of the insectivora, and by means of a membrane surrounding the body it is able to make oblique downward flights through the air. It is of a sluggish nature by day. In colour it is olive, or brown, mottled with irregular whitish spots and blotches closely resembling the colour of mottled bark. It is extremely hard to kill. It is mentioned in some natural histories as the Colugo, and is so called by the Malays.

Flying Lizard .- See FLYING DRAGON.

Football.—A game played with a rattan ball (raga), hollow, and about 6 inches in diameter. It is kept up with the heel, knee, or any part of the body except the hand. It has to be thrown beyond the circle of players to score to the sender.

Folklore, Malay.—A very good sketch of this subject is given by Mr. Maxwell in No. 7, J. S. B. R. A. S. (1881), p. 11, but the details given might obviously be added to immensely by any one with the necessary time and knowledge at his disposal. It would be impossible to give even a short précis that would be of service in the limits at disposal, and readers must be referred to the article itself, which is worded in the writer's usual interesting style. See also Charms, Divinations, &c.

Fort Lismore.—The European name of a small fort at Alor Gaja in Malacca formerly occupied by a Sepoy guard. The road thither was made by convict labour in 1835. The name no longer appears on the maps, and the fort has become a ruin.

Frogs (Kodok).—As with many other departments of natural history, the batrachians of Malaya have as yet received scant attention at the hands of scientists, and no complete list exists of the various species found in the Peninsula. The eatable frog—Rana esculenta—is said to be found, but is not, as in Hongkong, an article of European diet. Tree-frogs are found in large numbers. Bull-frogs are also common.

Frog, Flying (Katak betong).—This was first noticed by Wallace, and has enormously developed feet with webs between, so that, when expanded, they present a surface larger than that of the body. The so-called flying is, of course, only a

prolonged leap, but the membranes in question appear to act like parachutes and extend the leap to an extent which almost assumes the appearance of flying. It is occasionally met with in the Peninsula.

Fruits.—A total list of some 63 "fruits" has been compiled as indigenous to the Malay Peninsula. Some of these, however, are repugnant to Europeans and seldom touched by Malays. The following catalogue will be found to include all which are likely to come under the notice of the ordinary resident or visitor:—

Almond		Bådam, ketapong, los.	Mango		Buah mangga or pauh.
Banana		Pisang.	Mangostun		,, manggis.
Blimbing	•••	_	Mata kuding	•••	<i>"</i> _ 66
,, buloh			Melon	•••	Tambikei.
,, saga			Nam-nam	•••	
Bread fruit	•••	Sûkun.	Nutmeg	•••	Buah pala.
Cashew		Jambu monyat.	Nuts		,, kras kulit.
Citron		Limau karbau.	Nanka		,,
Cocos-nut		Klapa.	Orange		Limau manis.
Custard apple		Buah srikâya.	Plantain	•••	Pisang besar.
Chiko			Pomegranate	•••	Buah delima.
	large		Papaw		Papaya.
jack fruit)			Polesan	•••	r upuju.
Duku	•••		Pumpkin	•••	Labu manis.
Durian		_	Persimmon		Edou Manis.
Wie.	•••	Anjir.	Pine-apple	•••	Anana.
Grenadilla		(Imported).	Rambei	•••	
Conne	•••	Jambu.	Rambootan	•••	
Grana		Buah anggor.	Rambustin	•••	
Tack fronit	•••	Chempidars.	C	•••	Durian blanda.
Tember	•••	Onempidars.	Compan 1	•••	Durian Dianua.
Tammad	•••		Mammama	•••	
Times	•••	Limau asin.	Tarren	•••	_
Lomon	•••	Ironaa	таггар	•••	
Demon	• • •	,, kapas.	•		

Some sixty-three varieties of the banana and plantain are described by botanists, many having distinct names in Malay, e.g., pisang mas, p. rajah, &c. Most of the above fruits are in season twice a year.

Funerals.—The funerals of the Malays, like those of other nations converted to Islamism, are in conformity to the usage of the Mahommedans. The body, within twenty-four hours after death, is buried in a shroud, and the word which expresses this simple ceremony literally signifies to place in the earth, and is the same which means to plant or put seed in the ground—tanam. At the bottom of the grave on one side there is a lateral excavation to receive the body. A simple mound marks the grave, without monumental stone or tomb, except in the case of kings and reputed saints, the tombs of the latter being considered holy under the Arabic name of kramat, or sacred. The cemeteries of the Peninsula Malays are usually enclosed with a fence, and strike the eye as remarkable owing to the close proximity of the stakes which mark the abiding-place of each body—as, directly the dead may be presumed to have returned to dust, a fresh burial takes place within the same or an overlapping area.

Mr. J. D. VAUGHAN gives the following in a paper which appeared in Vol. XI. of the J. I. A.:—

"There is not much ceremony connected with the burial of the dead. When a Malay dies, the priest and his attendants are sent for; the latter wash the body and clothe it with a change of clean linen. Cotton is laid over the face, and camphor is sprinkled over the body and thrust into the ears and nostrils, and some is put on the eyelids. White cotton cloth some yards longer than the corpse is folded in six or seven folds and laid under the body, the arms are crossed over the breast, the left usually under the right; the body is then rolled up in the cloth, and a knot is tied a little beyond the head, and another beyond the feet; another piece of cloth is tied round the waist over all. Coffins are seldom used; the body is

placed in the grave, and a plank is laid over the body diagonally, so as to shelter the latter from the earth. The grave must be dug north and south, so that the body may be laid on its side with the face towards Mecca. After the grave is filled a wooden post is put into the ground at each end, to mark the spot; the priest reads the funeral service and exhortation called *talkin* and the service concludes. Three days after death a feast is held, and again on the seventh, fourteenth, fortieth and hundredth days. Before the body is removed from the house, the priest reads the Koran, and this duty is continued daily for seven days."

The subjoined account was taken down from the lips of an inhabitant of Province Wellesley:—"Notice being given to the relatives of the deceased, the body is placed in a coffin (kranak) of pulai or jelutong wood, and this, covered with a telkong or white pall, is borne to the grave by six or eight bearers, women as well as men following as mourners. Flowers are generally placed on the pall. Carriages are never used. An Alim or priest meets the procession and reads a talkin or prayer at the grave, followed by a portion of the Koran. Those present cast earth upon the coffin as with us. The corpse is always dressed in white. A meal of bread, wine, &c. is provided for the friends present before starting for the kramat, or graveyard. After the grave is filled in, two small, skittle-shaped posts, called netran, are placed at the head and foot. Corpse-bearers are termed orang

yang angkat naja (or in Singapore maiat)."

The following account of the burial of a leading Malay, from the Singapore Free Press of September 1st, 1887, will give a fair idea of the ceremonies usually observed :- "The interment took place at 4 P.M. in the ground of the Mosque at Kubu. Several Government officials were present. The general European population and Chinese Towkays were well represented, and thousands of Malays, of course, thronged the mosque and its environments. A cup of tea and biscuits were offered to visitors, and a white cotton sash, tied with coloured ribbon, was given to them as a badge of mourning. At the time fixed for the ceremony, a large drum, which is suspended in front of the mosque, was violently beaten, and the corpse was borne slowly from the interior of the mosque to the place appointed for burial. The body was enshrouded in white cloth, placed upon a small bier and covered with a wooden cover of lattice-work in the shape of a coffin, upon which was placed a coloured woollen cloth and a network of flowers stitched to thin strips of bamboo. The grave was a wide one, and after a certain depth had been reached, a further narrow excavation had been made, leaving a ridge all round for standing room. The body, tied in the white covering only, was handed in and placed on its side without the narrow excavation on the bare earth, and lumps of clay were used to keep it in posi-tion. Then what might be described as a coffin (long, the Malays call it) without a bottom was placed over it, with the lower edge resting on the ridge. Some prayers were said, and the Malays near responded whilst pressing small pieces of earth to their lips. A wooden cover was then put over the coffin without a bottom and the earth filled in. During this time small cannon placed in the background were fired at intervals. Then followed prayers and feasting, and the same will be carried on almost continuously for forty days."

Fuchsia.—Almost every attempt to introduce this has failed. Some fifteen years ago, however, some very excellent blossoms were exhibited at the annual flower show, but the success has never been repeated.

Gading.—A district in the N. centre of Malacca, consisting chiefly of Government forest reserve, about 18 miles from the town.

Gading.—Tapioca plantation and V. about $2\frac{1}{2}$ m. N.E. of Durian Tunggal, C. Malacca. This must not be confounded with the Gading district, which lies in a direct line $6\frac{1}{2}$ m. N.W.

Gadong.—A village on the border of Rambau on the road from Naning in N.W. Malacca.

Gajah Mati.—A V. in the Sungei Petei district, C. Malacca.

Galangal.—The root of alpinia galanga. Imported chiefly from China, though many species of alpinia abound in the Peninsula. The original habitat of alpinia galanga is the East Indies.

Galena.—Galena mines exist in Patani and the Dindings, and the product of the former is remarkably good. It has also been discovered in Malacca and Perak.

Gamălan.—A Javanese word often used by Malays to signify a band of musical instruments.

Gambier, or Terra japonica (Uncaria gambir), is obtained principally from the Straits Settlements. The planters grow it in connection with pepper, as the refuse of the gambier makes an excellent manure for the pepper plant. Gambier is in the form of blocks or cubes, of a light brown colour. The extract in many cases resembles a red earth, and, as imported to England in its rough state, is very much adulterated, sticks, stones, and large quantities of elephants' dung being mixed with it in the manufacture. If this variety of tannin could be obtained with greater purity, it would fetch a higher price in English commerce, from its greater value to the tanner. The extract is obtained by boiling the leaves, small branches, and pieces of wood of the tree in water, evaporating the liquid to an extract. With the better kind of extract, which goes technically by the name of "Cube Gambier," more care is taken in the preparation, and in order to ensure consistency, starch is mixed with it, or some kind of farina, to consolidate it, and dry it more easily. It is cut into the form of cubes about an inch-and-a-half square before drying. The variety of gambier which is called the "Block," ranges in value from £15 to £20 per ton, and the best cube from £25 to £35 per ton. This tanners' material is not only used by tanners, but in a variety of different manufactures in England, and is used by dyers and brewers to add to other extracts. -(New Commercial Plants and Drugs.)

The gambier plant is a stout, climbing plant, a native of the countries bordering on the Straits of Malacca, and especially of the numerous islands at their eastern end. There would appear to be two species employed:—(1) The Uncaria gambir, Roxb.—the Nauclea gambir of Hunter. (2) Uncaria acida, Hunt. cultivation and manufacture seem to have been commenced at Singapore in 1819, and it rapidly extended, until there were about 600 or 800 plantations; but, owing to a scarcity of fuel, without an abundant supply of which manufacture is impossible, and labour becoming also dear, they were reduced to about 400 in 1850, and in 1866 the cultivation was fast disappearing on the island. It rallied, however, in view of a larger and cheaper supply of labour, and the constantly increasing demand for extract by European importers. In 1870 the total export from Singapore was 34,550 tons, and in 1871, 34,248 tons. Somewhat less than half this amount was produced in Singapore itself, the balance being derived from Rhio and the adjacent islands of the Archipelago, that of Bintang being the largest contributor. About the same proportions between supply and total export have since been maintained. The export to Great Britain in 1881 fell somewhat short of 26,000 tons, but has since increased. The total quantity exported to all

countries from Singapore during 1892 was 56,303 tons.

The Pharmacographia gives the following description of the manufacture:—The plant is propagated either by seeds or cuttings, but the latter are preferred. At the expiration of fourteen months the first cutting of the branches, with the leaves on, is made. The plantations are often formed in clearings of the jungle, where they last for a few years, and are then abandoned, owing to the impoverishment of the

soil and the irrepressible growth of the lalang grass (Imperata Kanigii, Beauv.), which is more difficult to eradicate than even primeval jungle. It has been found profitable to combine with the cultivation of gambier that of pepper, for which the boiled leaves of the gambier form an excellent manure. The gambier plants are allowed to grow from 8 to 10 feet high, and as their foliage is always in season, each plant is stripped three or four times in the year. The apparatus and all that belongs to the manufacture of the extract are of the most primitive description. A shallow cast-iron pan, about 3 feet across, is built into an earthen fireplace. Water is poured into the pan, a fire is kindled, and the leaves and young shoots, freshly plucked, are scattered in and boiled for about an hour. At the end of that time they are thrown into a capacious steeping trough, the lower end of which projects into the pan, and squeezed with the hand so that the absorbed liquor may run back into the boiler. The decoction is then evaporated to the consistency of a syrup, and baled out into buckets. When sufficiently cool, it is subjected to a curious treatment. Instead of simply stirring it round, the workman pushes a stick of soft wood in a sloping direction into every bucket, and placing two such buckets before him, he works a stick up and down in each. The liquor thickens round the stick, and the thickened portion being constantly rubbed off, while at the same time the whole is in motion, it gradually sets into a mass, a result which the workman affirms would never be produced by simply stirring round. Though we are not prepared to concur in the workman's opinion, it is reasonable to suppose that his manner of treating the liquor favours the crystallization of the substance in a more concrete form than it might otherwise assume. The thickened mass, which is said by another writer to resemble soft, yellowish clay, is now placed in shallow, square boxes, and when somewhat hardened, is cut into tubes and dried in the shade. The leaves are boiled a second time, and finally washed in water. which water is saved for another operation. A plantation with five or six labourers contains on an average 70,000 to 80,000 shrubs, and yields from 50 to 60 lbs. of gambier daily.

A refined quality is manufactured for chewing. Various sorts are in the market, e.g., Gambir Siak from Pontianak, and Gambir paku from Landau, Siam. The first named is that cultivated in the Settlements and Peninsula. It fetches

from \$22 to \$26 per picul.

Gambling.—In Malay, Judi. All the more advanced nations of the Asiatic Archipelago are greatly addicted to gaming, the passion for which is very far from being confined to the nations that have adopted the Mahommedan religion; for the Hindus of Bali and Lomboc, and the Christians of the Philippines are as great gamblers as the Malays, and greater than the Javanese. Cock-fighting, except in the British possessions, where it has been prohibited, is everywhere the normal shape which it takes; but card-playing, and other games, have been acquired from the Chinese, who are themselves even more determined gamblers than any of the native nations. Amongst the Chinese, the principal games are Poh and Chap-ji-ki. The former is played with a die placed in a square brass box fitting it accurately, which in turn slides into a brass cover. The lower end of the box is bevelled, and the die having been inserted, the box is spun on a board or mat marked with a diagonal cross. The faces of the die are coloured red and white, and the stakes having been placed on the mat, those opposite the red portion of the die when it ceases spinning, are the winners.

Chap-ji-ki is a game of cards, in which the player turning up a card answering

to the bank receives ten times his stake.

Game-cock (Ayam såbong).—See Cock.

Games.—The Malays indulge in but few games, the most popular being one in which a wicker ball (raga) is kept up with the heels as in the Chinese shuttle-cock. Nearly all their other amusements take a gambling form. Amongst the

Chinese, chess (q. v.), draughts, kite-flying, marbles, top-spinning, shuttlecock, and other games resembling our own, are in vogue. See Cards.

Gamuty Palm.—A common tree, the black fibres of which are used for making ropes, cordage, &c. The open strands used in catching crocodiles are made of this substance.

Gangsa.—Small V. on the high road, about $3\frac{1}{2}$ miles S. of Durian Tunggal, Malacca, in N. of Batu Berendam district.

Ganja or Bhang.—An intoxicating extract of hemp.

Ganong Ayer Panas.—A thermal spring in Naning. The temperature of the water is 110°, and it rises from a bed of hot soft mud. About 10,000 cubic feet are discharged daily.

Ganong Bukit.—A hill in Naning at the foot of which lies a swampy plain.

Ganong Kache.—A plain at the foot of Bukit Ganong, Padang Sebang, in Naning territory, Malacca.

Gantang.—A Malay gallon=4 chupaks, which are now by law 4 Imperial quarts.

Gantong Lambei.—V. on E. bank of R. Madus, near its source in E. Johore.

Gapam.—V. on the Duyong R., S. Malacca, about $7\frac{1}{2}$ miles N.E. of Malacca. Tin used formerly to be mined in the neighbourhood.

Gardinia.—A favourite plant with the Malays, and supposed to be a native of the Peninsula. It flourishes well in these latitudes.

Gargassi, Orang.—A wild tribe in Kedah, probably the same as that known in other parts of the Peninsula as Orang Sakai-liar.

Garnet.—The term iakut is applied to both the garnet and the white sapphire. Both are exotic, but frequently met with amongst the Malays.

Garroo Wood (Kayu Gharu).—Decayed Lignum Aloes, Agala wood, Eagle wood and Calambak of commerce. When burned it gives a powerful aromatic odour, and is used to scent joss sticks. It seems rather to melt than ignite when fire is applied. Malacca furnishes a moderate supply, but this will always be restricted, as, until decayed, the wood is of no value for scenting purposes.

Garuda or Gurda.—A mythological bird mentioned by Malay romancists as being invoked for the purpose of desolating a country. It is generally represented as a burong lang, or kite, with a long beak, two heads, and four talons. Its size is so prodigious that when it flies its shadow covers an entire country. The myth is originally Hindu. Compare the Arabian Rokh. The figure of this bird is frequently painted on the paper kites of the Malays.

Gating Repong.—V. in extreme S.E. of Selangor.

Gecko.—A family of lizards so named from the cry of its most conspicuous member. Most naturalists apply the term to all the wall lizards (which embrace 50 genera and 200 species) abounding throughout the warmer countries of the world. The true Gecko is found in Java and Siam, but I have not met with it in the Peninsula. Its family is, however, largely represented. See Chichak.

Gelam Tree.—The Gelam tree is of the Myrtacca family, and attains a height of about 45 feet, and a girth of 5 to 6 feet at the base. It has a few upright and contorted branches, innumerable twigs with a liberal diffusion of dark green almond-shaped leaves; the latter, when bruised in the hand, emit a strong aromatic odour not unlike cajeput oil. The tree is indigenous to Malacca, and, as far as can be ascertained, it cannot be found in the other Settlements; but a few hundred young plants have been introduced into Singapore from Malacca for roadside planting,

for which purpose they are very suitable. They make splendid avenues when planted alongside roads crossing fresh-water swamps or paddy-fields. The water becomes discoloured by tannin from the fallen leaves. The natives make a decoction from the leaves which is very astringent and assumes the colour of a strong tea. It is said to be a specific administered in cases of diarrhea and dysentery. The bark is extremely light, buoyant, soft and pithlike, about $\frac{3}{8}$ of an inch thick, overlying the wood in thin white and light brown layers of the thickness of tissue paper interlarded with woody fibre and white powder. Like the Quercus suber, or cork-tree, it regularly sheds its bark and acquires a fresh coat. The natives use it instead of oakum for caulking the seams of their boats. The wood is used as poles and putlogs for scaffolding, the construction of fishing stakes, and for fuel. The tree thrives and abounds in Malacca in the inland marshes and outlying lands, and as fast as they are felled seedlings spring up to take their place.

Gelang.—District on E. side of Singapore town, of which Tanjong Rû is the most W. point. It lies south of the high road to Changi and is much affected by tanners, &c.

Gelegak Nasi.—A kind of shining worm supposed to frequent tin mines and to make a bubbling noise.

Gemencheh.—State, V. and R. formerly part of Johol, but now one of the Negri Sembilan; the river, a tributary of the Muar. Gold was discovered here about 1768, and small quantities were worked by the Malays. From 1807 to 1824 the mine was steadily worked, but the Naning war caused a stoppage. It was again worked from 1833 to 1840, and again deserted till 1844. But little, however, has been done since then. The Chindras gold mine is one of seven in proximity to Gemencheh.

Genting.—District in S.W. Penang, between Pondok Upeh and Pulau Betong.

Geology.—Notices of the geology of the Peninsula, &c., will be found under the names of the places dealt with.

George Town.—The proper name of the capital of Penang I. It is, however, described under the word "Penang," the name of George Town having fallen into disuse.

Gielong.-V. on N. bank of Pahang R., 3 miles E. of Cheno, C. Pahang.

Gilengan Buaya.—V. on S. bank of Bernam R., N. Selangor, about 19 miles from its mouth.

Gingelly Oil.—See Ons.

Ginger.—Imported almost exclusively from China for use in medicines sold by Chinese druggists. Regarding this root, Mr. Cantley gives the following notes (Report, 1886):—

"Ginger (Zingiber officinale).—Ginger grows satisfactorily; low prices only prevent its cultivation being freely developed. It is, however, an exhausting crop, soon wearing out the land in which it is planted in the absence of liberal manuring.

"Chinese Ginger (Zingiber sp.).—Some plants of this species, which produces the well-known preserved ginger of the shops, were received during the year from the Royal Gardens, Kew. It has grown well, but shows no sign of flowering. It is believed to be an entirely new species, but this cannot be determined in the absence of flowers."

Ginting .- V. on W. coast of Tioman I.

Glugor or Gelugor.—A district on E. coast of Penang, so called from the prevalence there of a tree bearing an acid fruit which is cut in slices and used in curries. Gnau.—V. on E. bank of R. Pahang, just below its turn E. in C. Pahang.

Goa Kepah.—A V. on the S. bank of the Muda R., in extreme N. of Province Wellesley, and 17 miles from Butterworth. A good many Chinese are here, employed in sawing timber and burning lime from shells. The timber is floated down from the interior, as there are very few trees besides fruit-trees near the banks of the lower parts of the river, and the material for the lime is obtained from an artifical mound of cockle shells containing several thousand tons, which lies a quarter of an hour's walk inland. The lime-burners have been working the mounds for many years, and have not yet removed the contents. The Malays, who have no tradition as to its origin, considered it to be a natural deposit until lately, when the discovery of human remains near the lower part of the centre of the mound showed it to be an artificial construction. In fact the mound consists of pure cockle shells, without the slightest admixture of other shells or of any foreign matter, and it appears as if the fish had been taken out before the shells were thrown on the heap, where they now form a concrete which has to be broken with a pick-axe, owing to the partial crystallization of the edges causing the shells to adhere to each other. Had the mound been subjected to pressure, as would have been the case had it been submerged a few fathoms under the sea, it would have become a mass of compact limestone, as it is evidently of great antiquity. the nature of the remains, the origin of the mound is attributed to the Semanys, an Oriental Negro people, of whom broken tribes still exist in the neighbourhood. There are two other mounds at Goa Guppa that have not yet been interfered with, one of which is about the same size as that worked by the Chinese, but the other is considerably larger, and appears to be a cluster of mounds joined together. The lime made from the shells is of excellent quality, and is all carried to Penang in large Chinese cargo-boats.

Goan Bengkong.—V. in Chabau district, E. Malacca.

Goan Dalam.—V. in the Chabau district, E. Malacca.

Goat.—The domestic goat, a small animal kept for its flesh, but not for its milk except by foreigners, is pretty generally distributed over Malaya; but its origin is as obscure here as in other countries. In Malay it has two nameskambing and bebek, the last being oddly enough the name for the domestic duck in Javanese. The first Malay name extends as far as the Philippines, and the second has also a wide currency; either the one or the other being nearly the only names in the other languages of the Archipelago. The names now given are native words, and through them, therefore, a foreign origin for the goat cannot be traced. In Sumatra and the Malay Peninsula there exists a species of antelope, the Antilopa sumatrensis, a denizen of the deepest recesses of the mountain forests: but CRAWFURD does not think this likely to be the source of the domestic goat, although the Malays have no other name for it than "the wild goat," kambing-utan, and, notwithstanding its native names, it seems more probable that the Hindus brought it from Southern India, than that it is indigenous. In Singapore the chief owners of goat flocks are Hindus, especially those who were sent thither as convicts after the Indian Mutiny. Conventionally the word kambing is applied to both goats and sheep. The Malayan goat is by no means a large specimen of the breed.

Gobek Tembaga.—Used by aged people and those who have lost their teeth to pound betel-nut before chewing it.

Godown.—A storehouse, corruption of the Malay gedong.

Gold.—The metal, in sufficient abundance to be worked, is found in the Malay Peninsula. Gold is believed to be under the care and in the gift of a dewa, or god, and its search is therefore unhallowed, for the miners must conciliate the dewa, by prayers and offerings, and carefully abstain from pronouncing the name

of God or performing any act of worship. Any acknowledgment of the sovereignty of Allah offends the dewa, who immediately "hides the gold" or renders it invisible. At some of the great limbongan mas or gold pits in the Malay States of the interior, any allusion to the Deity subjects the unwitting miner to a penalty which is imposed by the Penghulu. The qualities of the gold vary greatly in the same country. The finest gold brought to market is that of the principality of Pahang, on the eastern side of the Malay Peninsula, which brings a higher price than even that of Australia by better than three per cent. The gold is all obtained by washing, and the metal has never been worked, and scarcely even traced to the original veins. It is mostly in the form of powder or dust—the mas-urai of the Malays, literally "loose or disintegrated gold." Now and then lumps of considerable size are found, but, compared to the nuggets of California and Australia, mere pebbles.

Attempts have been made to estimate the total quantity of gold produced, but all estimates, from the nature of things, can be no better than conjectures. Mr. Logan estimates the total produce of the Malay Peninsula at no more than 20,000

ounces. See also LEDANG, CHINDRAS, RAUB and PENJOM.

Golo or Golah.—A small common description of kris. The Golo Rembau is one of the best known.

Golok.—A bill-hook. The steel spur affixed to a fighting-cock's heel, also ealled taji (q. v.). In Perak the name of a chopping-knife, in Rembau a dagger.

Gong.—The Chinese instrument so called. Familiar to the Malays, but of foreign origin.

Goose.—Not indigenous, and domesticated in Malay countries with great difficulty. Of late years, however, they have been plentifully bred, and can be obtained in most of the British Settlements. The Malayan word angsa is Sanskrit, pointing to the bird's Hindu origin.

Gopeng .- An important V. in East Kinta, State of Perak, and the seat of a Magistracy and hospital. It is the tin-mining centre of the district, and will shortly be connected by rail with Teluk Anson.

Government.—The native Governments are all officered on much the same plan. We subjoin a list of the Chiefs in Perak, which will give a fair idea of those of the Native States generally :-

The constitutional body of the country, when all the offices are filled up,

consists of the following persons:-

I. The Sultan. II. The Raja Muda ... or heir apparent. III. Four Nobles of the 1st class, viz. :-1. The Raja Bendahara ... Prime Minister. 2. The Temenggong ... Chief Magistrate. 3. The Orang Raga Besar ... Keeper of the Privy Purse. ... Chief Adviser. 4. The Tunku Mantri IV. Eight Nobles of the 2nd class, viz.:-... { Commander of the land and sea forces. 1. The Maharaja Lela ... High Admiral. 2. The Laksamana (Harbour Master and Collector o 3. Shahbandar ... { Customs.

4. The Datoh Sadika Raja. ...) District Officers on either bank of 5. The Penglima Guntar ...

6. The Penglima Bukit Gantong
7. The Datoh Shakgor or Sagah... Head of the river boats.
8. The Imam Paduka Tuan ... Chief priest.

V. Sixteen Nobles of the 3rd class, viz.:— The Sri Maharaja Lela.

 ${2 \atop to 16.}$ Not ascertained.

In the smaller States there are less officials by far. There is no title of Temenggong now in Johore, and the Tunku Mantri is called Datch Mantri. Differences of title also obtain with the other ranks, the administration being assimilated to the English model. The principal Officers of State in the Territory are thus given :-

Five Unkus, relations of the Sultan (Princes).

The Datoh Mantri.

The Tuan Hakim.

The Mufti.

The Datoh Bintara Luar.

The Datoh Bintara Dalam.

The Commissioner of Police.

The Engineer and Surveyor.

The Superintendent of Public Works.

The Imam.

Two additional Members.

A Clerk of Council.

These constitute the Council of State, which unites executive and legislative functions. There are also various other heads of departments. It will be seen that this is a compromise between the Malay and British organization.

The local Directory contains such full information regarding the Government

of the Settlements that it is needless to repeat it in these pages.

Government Hill, Penang (2,500 feet).—The highest hill in the N. range, Penang. A Government bungalow and convalescent bungalow are erected on the summit, N. of which is the signal flag-staff. Bellevue, a little way beyond and as yet unbuilt on, offers, perhaps, the finest view of the town and province to be obtained anywhere on the Penang Hill.

Granite abounds throughout the Peninsula and Settlements, Pulo Ubin furnishing the principal supply to Singapore. Its working is farmed throughout the British possessions. A fine-grained variety, equal to Aberdeen, is found at Bukit Berapit, in Perak.

Grapes are not indigenous, and the plants introduced seldom bear fruit.

Graphite.—See Plumbago.

Guava.—One of the fruits known under the general title of jambu by the Malays, and in no way differing from the West Indian fruit. No attempt, however, except in a domestic way, has been made locally to manufacture the well-known guava jelly. The tree is common throughout the Peninsula.

Gula Estate.—A sugar estate in N.W. Perak, above the Larut R., some 6,000 acres in extent. Port Weld is within easy distance S. The estate is owned by a syndicate in China.

Gum Pering.—V. about $4\frac{1}{2}$ miles from Malacca-town, on the road to Rumbia, in the Batu Berendam district.

Gums.—The only gum obtained as an article of commerce (if we except india rubber and gutta percha, which are dealt with separately) is that obtained from the Damar-tree (Damara Sp.), which abounds in the Peninsula. (See DAMAR.) Copal and other gums are imported for transmission to Europe.

Gumunchi.—See Gemenchen.

Gunhun,—A V. on the Gading forest reserve, N. Malacca, and close to Sungei Batang Malaka.

Gunong, Mountain.—But frequently applied to what we designate hills.

Bukit and gunong indeed are often used for elevations of similar height.

Gunong Angsi (3,200 feet high).—At S. end of Jelebu range near the dividing point between Rembau, G. Pasir, and Sungei Ujong.

Gunong Api.—Literally "fire-mountain," is the usual name for a volcano, but is also the proper name of some islets with active volcanoes. See Volcano.

Gunong Banang.—Hill forming part of the range known as Batu Pahat in W. Johore.

Gunong Batang Padang.—Range in S.E. Perak, of which G. Rajah (6,500 feet) is the most conspicuous elevation.

Gunong Batu Pahat or Mount Formosa.—A range of hills on S. side of the Batu Pahat R., W. Johore.

Gunong Batu Pulei.—A table-topped hill in the C. of the Bidor and Batang Padang range, S.E. Perak.

Gunong Bau.—Hill on the E. side of entrance to Johore R., marked on the Admiralty Chart as Little Johore Hill, 749 feet high.

Gunong Bentan, 1,212 feet high, in Pulo Bentan.

Gunong Beraga.—Mt. in Rembau forming part of the Rembau chain, of granitic formation.

Gunong Bertam.—Hill between Gunong Titi Wangsa and Rui R., S. Kedah.

Gunong Besiah.—Hill about 12 miles N. of the Perak frontier in S.E. Kedah, and the N. of a chain extending from C. Perak.

Gunong Bidor.—The S. portion of a chain extending from E.C. to S.E. Perak, the central portion being the Batang Padang Mts. The natives suppose the range to be haunted by evil spirits.

Gunong Biong.—E. spur of the Perak range in N. Perak, about 8 miles S. by W. of Kota Tampan.

Gunong Blumut.—Hill in C. Johore, the supposed source of the R. Kahang.

Gunong Blungkor.—Hill on E. side Johore R. near its entrance, in a line 5 miles N. with Johore Hill.

Gunong Bubu (5,650 feet).—In W. Perak, about 9 miles S.W. of Kwala Kangsa. Formerly estimated as 6,100 feet.

Gunong Bujang Malaka (4,386 feet).—One of the hills in the Batang Padang Mts. about 11 miles E. of the Kinta R. The sea is visible from its summit; its distance from the coast is about 42 miles.

Gunong Bulu Ala.—Hill in extreme S.E. Perak; one of the sources of the Pahang R.

Gunong Challie.—Hill in N.E. Perak near the source of the Perak R. Gunong Datoh.—One of the Gunong Titi Wangsa range, C. Kedah.

Gunong Datoh.—Mt. in Rembau, N.W. of Beraga, of granitic formation.

Gunong Geriyang.—See ELEPHANT HILL.

Gunong Gressi Ambor.—Mt. in the main chain running between Pahang and Perak in W. Pahang.

Gunong Hijau (4,678 feet).—Five to six miles W.N.W. of Kota Lama,

N.C. Perak. The above estimate is that given on the Admiralty Chart. In the J. I. A. it is stated at 5,800 feet.

Gunong Inas.—One of the range in S. Kedah, running nearly at right angles to the Gunong Titi Wangsa range.

Gunong Itam.—Mt. in W. Pahang, lat. 3° 15' N., long. 102° 12' E. Tin is found on its S.E. slope.

Gunong Jabut (1,902 feet).—Hill about 4 miles E. of Kinta R., 3 to 4 miles S.S.W. of Ipoh, C. Perak.

Gunong Janing.—Mt. in N.C. Johore, about 4 miles below the Pahang frontier.

Gunong Jerei or Kedah Peak (over 4,000 feet).—The most conspicuous Mt. in Kedah, about 17 miles N. of the Province Wellesley frontier, and 6 miles N.E. of old Kedah.

Gunong Jong.—Hill at N. extreme of Titi Wangsa range, N. Kedah.

Gunong Kandong (4,550 feet).—About $1\frac{1}{2}$ miles E. of the Kampar R. in E.C. Perak.

Gunong Kangar.—One of the chain running from C. Perak to S. Kedah, about 4 miles N. of the supposed boundary between those two States.

Gunong Kendrong (2,852 feet).—One mile W. of Gunong Kernei, and 4 miles W. of Rui R., S.E. Kedah.

Gunong Kera (1,935 feet).—In the N. of the Kampar district, C. Perak, E. of a bend of the Raya R.

Gunong Kernei (2,128 feet).—About 3 miles W. of Rui R., S. Kedah.

Gunong Kledang.—Hill between the Perak and Kinta R., C. Perak, about 4 miles N.W. of Kinta.

Gunong Kledang.—Hill on the Kedah side of the boundary between that State and Reman, S. Kedah.

Gunong Krian.—Hill in S. Kedah, about 13 miles from P. Wellesley frontier, at or near the supposed dividing line between Perak and Kedah.

Gunong Lanan.—Mt. in a bend of the Raya R., about 12 miles nearly E. of Kinta, C. Perak.

Gunong Lanjut.—A hill in Naning (Malacca).

Gunong Ledang.—See Ledang and Ophir.

Gunong Lenkor (Lencore on the map).—Hill N. of Kinta R., E.C. Perak, not far from its junction with the R. Penoh.

Gunong Lesong.—Hill in E.C. Johore, one of a series lying between the sources of the R. Madek and Lenggin.

Gunong Mentahak.—Hill 2,150 feet high, about 3 miles N. of the Johore R., S. Johore.

Gunong Merah (3,750 feet).—In N.C. Perak, 7 to 8 miles E. of Kwala Kangsa.

Gunong Merbukit (645 feet).—In S. Johore. Generally known as Johore Hill. The E. point of the embouchure of the Johore R. (Admiralty Charts). Another hill $5\frac{1}{2}$ miles N.W. of Point Romania, S.E. Johore, is so named on the map of S. A. S., and the above is named Bau Hill.

Gunong Miko.—A mount or hill in the Naning district, Malacca, not marked in the maps. It produces sapan wood, damar and canes, and is infested by tigers. The paddy produced in this neighbourhood is said to be of very good quality.

Gunong Monie.—Hill on N. bank of Kinta R., near its junction with the Liong R.

Gunong Panti.—Hill 1,680 feet high, about 4 miles N. of the Johore R. in S. Johore.

Gunong Pasir.—Mt, in Rembau. The valley of the same name is well cultivated, paddy fields being numerous.

Gunong Pondoh.—A singular mountain in Perak lying a little N. of the direct route between the mouth of the Larut river and Kwala Kangsa. It is described by McNair as "rising out of the plain like a huge beehive, one mass of red and white limestone, about 1,000 feet high, bare and time-worn in places, and perforated with the caves peculiar to that formation." It can be seen from the entrance of the Larut River, and lies about 9 miles W. by S. of Kota Lama, C. Perak.

Gunong Pulei.—Mt. in S. Johore, 2,000 feet high, about 15 miles N.W. of Johore Bharu.

Gunong Rajah (6,500 feet).—The centre of a chain with two S. forks in S.E. Perak known as Batang Padang Mts.

Gunong Ramiah.—Hill about 1½ miles E. of the Kampar R., E.C. Perak. It is situated just N. of one extremity of a range some 30 miles long, of which Bujang Malaka and Gunong Rajah are the most conspicuous elevations.

Gunong Rampip.—Mt. in extreme E.C. Perak. The vicinity is still unexplored.

Gunong Rantoh.—Hill between Taipeng and Kota Lama, C. Perak; one of the Perak range.

Gunong Rapat (1,275 feet).—Hill 3 miles E. of Kinta, C. Perak.

Gunong Riam.—The S.E. angle of two ranges of hills in N.E. Perak, N. of the valley of the Kinta R.

Gunong Robinson.—Hill in N.E. Perak, 5 miles S.W. of Gunong Yong Yup.

Gunong Rundria.—Hill in E.C. Perak just S. of G. Tampurong.

Gunong Selayong.—Hill at N. extremity of Titi Wangsa range, N. Kedah.

Gunong Talian.—Hill in N.C. Pahang, forming the S. end of a chain supposed to be the highest in the Peninsula.

Gunong Tambun.—Hill on E. bank of Kinta R., C. Perak, 2 miles S. of Ipoh.

Gunong Tampin,—The nearest Mt. in Rembau to the Malacca Territory; of granitic formation.

Gunong Tampin.—Mt. to W. of small Native State of that name, Negri Sembilan.

Gunong Tampurong (3,111 feet).—E. of the Kampar district, E.C. Perak. It forms the extremity of the W. fork of the Batang Padang range, and is about 7 miles N.N.W. of Gunong Bujang Malaka.

Gunong Terandam (1,380 feet).—Mt. in C. Perak, § mile S.E. of Kinta, Gunong Timbun Tidang.—Hill in E.C. Johore, about 4 miles W. of the source of the R. Madek.

Gunong Tujoh,—A range between Kedah and Reman, with three prominent peaks, the northernmost being about 7 miles N. of the Patani-Perak frontier.

Gunong Tujoh-Blas.—Mt. in W. Perak about 12 miles S.W. of Kwala Kangsa.

Gunong Tumboh.—Hill about 3 miles of Perak R., 5 miles S.S.E. of Blanja, C. Perak.

Gunong Tunggal.—Mt. about half way between the W. bank of the Perak R. and the frontier of the Dindings territory; in W.C. Perak.

Gunong Ulu Chupei.—A S. spur of the range forming part of the supposed boundary between Perak and Kedah; extreme N. Perak.

Gunong Ulu Kewar.—Hill at supposed meeting point of the Patani, Perak and Kedah boundary lines. It has a round top.

Gunong Ulu Rengkang.—Mt. in C. Perak, about 8 miles S.E. of Kota Lama.

Gunong Ulu Sungei Raya.—Hill about 6 miles E. of Ipoh on the Kinta R., C. Perak.

Gunong Ulu Tamulang (6,435 feet).—On the supposed boundary between Perak and Kedah, about 7 miles E. of the Perak R.

Gunong Wang.—Hill at N. extremity of Titi Wangsa range, N. Kedah.

Gunong Yong Yup.—Mt. in N.E. Perak, about 13 miles W. of the supposed Kelantan frontier.

Guns, Gunpowder.—See Arms.

Guntang.—V. at S.E. extremity of Pahang on W. bank of Endau R.

Gupi.—Small V. about 2 miles W. of Nyalas in the Jus forest reserve, N. Malacca.

Gutta Percha—Was first brought to European notice by Dr. W. Montgomerie in 1843, when he reported on its usefulness for certain surgical purposes to the Bengal Medical Board. In April of the same year, a specimen was presented to the Royal Society of Arts by Dr. D'ALMEIDA. The honour of its discovery appears to be equally due to both.

It is derived from several trees, the best quality being obtained from the Gutta teban, a large tree from 60 to 70 feet in height, and from 2 to 3 feet in diameter, much resembling the Durian tree. It was at one time common in Singapore and Penang, but the wasteful system adopted of killing each tree for its juice, resulted in its almost total extinction in the Settlements. The present supply is obtained from the Peninsula, the average yield being 10 catties per tree. MURTON has the following remarks on the subject :-

"The trees producing gutta percha are all members of the order Sapotaceee, a family which includes many species useful to man, the best known in the Straits

being perhaps the Chiko (Šapota acras).

"The gutta-producing trees are confined to the genus Isonandra, which is limited to 6 species by the authors of the 'Genera Plantarum.' Isonandra Gutta (Dichopsis gutta, Singapore Botanical Garden's Report) is the oldest known species, and yields what is known in commerce as gutta percha, in local parlance Gutta těban.

"This tree is occasionally met with in Singapore, and in Johore in the Pulai hills, and is met with in Perak on Gunong Meru, Gunong Sayong, Gunong Panjang, Gunong Bubo, Gunong Hijau, and Bujang Malaka, where large trees of 80 to 120 feet are met with, but owing to the reckless way in which the gutta is collected, it is fast disappearing, and every succeeding year the collectors are obliged to go further from their kampongs in search of it. A Chilocarpus producing gutta is also found in Perak.

"The mode of collecting the milk is as follows:—A tree not less than 3 feet in circumference at 3 feet from the ground is selected, the larger the tree the greater the quantity of gutta obtainable; it is then cut down at 5 or 6 feet from the ground, and as soon as it is felled the top is taken off, where the principal stem is about 3 or 4 inches in diameter; this the natives say causes the trunk to yield a larger

quantity of milk; it is then ringed at intervals of 5 to 15 inches with goloks, and the milk collected in cocoa-nut shells, palm leaves, or other available receptacle. It is then boiled for an hour, as otherwise it becomes brittle and useless. The average

price per picul is \$45 to \$55."

Gutta Puter, the product of *I. macrophylla*, is obtained in the same way, but is only worth about \$15 per picul. It is more spongy and less plastic than *G. tēban*. It is often adulterated with *G. jelutong*, obtained from a species of *Alyxia*, and is thus rendered almost worthless. The immense destruction of gutta trees consequent on the wasteful mode of collection has attracted the attention of Government, and nurseries have been formed in Singapore. It is, however, doubtful if the native, left to act as he pleases in the Peninsula, will take the trouble to adopt a less ready way of obtaining the gum, in order to save the tree. *Gutta gigrip (Willoughbeia firma)*, *Gutta jelutong (Dyera costulata)*, and *Gutta sundek (Pargenia Learii)*, are natives of the Peninsula, but do not produce a gum of first-class quality.

The trade in gutta percha is the speciality of a few firms, and the article is not

even quoted in most of the prices current from home.

The following additional remarks are quoted from Mr. Cantley's Report on

the Singapore Botanical Gardens for 1886 :-

"Gutta Percha (Dichopsis gutta).—From statistics afforded by plants growing in the Nursery, this plant, the best variety of gutta-percha tree, seems a moderately fast grower. A plant planted in 1879 is now 25 feet in height and 12 inches in circumference at 6 feet above the ground. This gives an average yearly growth in height of about 3½ feet, and an annual increase in circumference of about 1½ inches.

"NATIVE CREEPING GUTTA.—The various Willoughbeias and others from which a very large proportion of East Indian gutta is drawn, grow with great vigour when planted off cleared land, and where, in the absence of anything to climb upon, they form large bushes in twelve months. Results of growth seem to show that it would be more profitable to plant these than the larger trees requiring some fifteen years to produce a first return.

"Foreign Creeping Gutta.—The foreign creeping guttas on hand are the African and Madagascar creepers; these are planted side by side with the native kinds, and although they grow freely, are far behind the native kinds in rate of

growth and general vigour.

"Other foreign rubbers, such as Para, Ceara, and Panama rubbers, grow well, but so far as experiments have gone, the produce of latix is very watery, and it is doubtful whether they will hold their own against the better native kinds."

The gutta-producing trees known to the Malays, however, greatly outnumber those known to commerce. Mr. D. F. A. Hervey furnished the following list for the J. S. B. R. A. S. in 1881. "Gutta" has been retained in this article as the conventional spelling:—

Gětah těban.

- " tôkon.
- ., gegrit.
- " gĕgrit pûteh. (Gives an itch.) " jĕlôtong. (White and red.)
- " anjāyus or menjayus.
- " pûdu. " sĕlambau. " rĕlang.
- " ûjil. " bëringin.
- " pěrcha (i.e., ragged).
- ", këtian. (Has a sweet, aromatic-flavoured, small, white, fleshy flower, which is very pleasant to the taste, and is always eaten by the natives when met with.)

Gětah râchun (i.e., poison).

,, jĕlâ.

" jftan. (Gëtah used as ointment for pûru, or ulcerated sores.)

châloi.

" akar sûsu putrî. (Roots covered with humps.)

, sĕrâpat.

" sundek.

" těrap.

Gutta Terap (Artocarpus Blumeii).—Introduced into the Singapore Botanical Gardens from the Malay Peninsula. The word těrap will be found in the list of both Woods and Fruits. The tree produces a gutta of no particular commercial value, however, hence its name.

Haji.—The title given to any man or woman who has performed the pilgrimage to Mecca. They are entitled to wear a green turban and robe, and the title confers a certain amount of honour on the holder. Malay women who have performed the "Haj" wear a veil called *Mergo*, which leaves only the eyes visible.

Hamadryad (Ophiophigus elaps).—The snake-eating cobra (Ular tedong besar). This is described by Dr. Fayrer as follows:—"This is probably the largest and most formidable venomous snake known. It grows to the length of twelve or fourteen feet, and is not only very powerful but also active and aggressive. It is hooded like the cobra, and resembles it in its general configuration and character.

"The colours are olive-green above; the shields of the head, the scales of the neck, hinder part of the body and of the tail edged with black; trunk with numerous oblique, alternate black and white bands converging towards the head; lower parts marbled with blackish, or uniform pale greenish. This variety is found in Bengal, Assam, the Malay Peninsula, and Southern India. Other varieties are found in Burmah, &c."

Fortunately, this snake, though widely distributed, is not very common. I have had four specimens brought me in Singapore, and have seen numerous others in Province Wellesley. The largest with which I am acquainted was caught in Selangor, and measured 18 feet 9 inches. It will attack persons approaching it without provocation. Like the cobra, it has three plates behind the eyes.

Hantu.—"Ghost, spirit, devil, demon, or phantom," according to the dictionaries. The belief in hantus (which are invariably supposed to be of a malignant nature) is deeply rooted, both amongst the Malays and the aboriginal tribes of the Peninsula. Almost all diseases are ascribed to a hantu bearing the same name. Thus the Hantu Katumbohan is the spirit of small-pox; Hantu Kambong and Hantu Chika afflict men with pains in the head and abdomen. The spirits of disease collectively are called Hantu Pënyakit. The Hantu Saburo, or Black Hunter, inhabits lakes and river pools. He is attended by three dogs named Sokom and a bird called Beré-beré. Whenever the latter is seen, pieces of wood and metal utensils are beaten together, so as to make as much noise as possible and frighten the dogs (who are supposed to chase men in the forest, and, if they catch them, drink their blood) from coming near the place. The Hautu Kamang or Raya causes swellings on the legs and feet. The Hantu Dondong is a cave demon, who hunts dogs and wild pigs with a sumpitan. The Hantu Kayu are the demons of the forest, certain trees having hantus of exceptional malignity. A paper in the J. I. A. (Vol. I, p. 307) refers most of these to Mintira beliefs, but these hantus are equally well known to the Malays, as are others enumerated in the same article.

The word is applied also in other ways, thus, Pulo hantu—ghost island; Rumah hantu—haunted house. This latter term is applied to Masonic Lodges, on account

of the mystery with which they are hedged in. Burong hantu, or the ghost bird (a night-owl), is so called from its noiseless flight as it dashes from tree to tree during the night. Probably the latest adaptation of the term is Kreta hantu—a bicycle.

Harrow.—The native harrow is simply a heavy beam studded with spikes,

and is of most primitive manufacture.

Hedgehog (Clandak tanak), resembling the European species, not very

Hemp, Indian (Cannabis Sativa).—See FIBRES.

Hemp, Manila.—See Fibres.

Hemp, Mauritius. - See FIBRES.

Hemp, Penguin.-See FIBRES.

Hemp. Sunn.—See FIBRES.

Herons (Ruak ruak) are common on the coast and at the mouths of rivers. They present no conspicuous variation from the European species.

Hibiscus.—This plant is apparently indigenous, some eight varieties being commonly met with. It grows to the size of a large tree under favourable condi-

High Peak.—Hill in the dividing range between Selangor and Pahang,

extreme E. Selangor.

Hikayat. - A history or narrative. There are several Hikayats extant, such as the Hikayat Hang Tuah, Hikayat Hamzah, Hikayat Isma Yatim, &c., but they are mostly composed of as much fable as fact. A list of those known to exist will be found under the article "Bibliography." The only notable one published of late years is the Hikayat Abdullah, written by an intelligent Malay who was present at the founding of Singapore. He describes the events of the day with commendable accuracy. A reprint of the work has recently been issued by the Straits Branch of the Royal Asiatic Society; and the Education Department of the Straits Government has published another edition of it.

As a specimen of the consideration accorded to these compilations by competent scholars, we subjoin a quotation from an interesting article on the subject in

the J. S. B. R. A. S. by the Hon'ble W. E. MAXWELL, C.M.G.:-

"The Hikayat Hang Tuah fares no better at Mr. Crawfurd's hands than the work of the Kedah historian. It is described as 'a most absurd and puerile production. It contains no historical fact upon which the slightest reliance can be placed; no date whatever, and, if we except the faithful picture of native mind and manners which it unconsciously affords, is utterly worthless and contemptible."

Leyden, in his "Essay on the Languages and Literature of the Indo-Chinese Nations," gives the following account of Malay historical manuscripts:—

"There are many Malayu compositions of a historical nature, though they are not so common as the classes that have been enumerated; such as the Hikayat Rajah Bongsu, which I have not seen, but which has been described to me as a genealogical history of the Malay Rajas; the Hikayat Malaka, which relates the founding of that city by a Javanese adventurer, the arrival of the Portuguese, and the combats of the Malays with ALBUQUERQUE and the other Portuguese commanders; the Hikayat Pitrajaya-Putti, or history of an ancient Raja of Malacca; the Hikayat Achi, or history of Achi or Achin in Sumatra; and the Hikayat Hang Tuah, or the adventures of a Malay chief during the reign of the last Raja of Malacca, and the account of a Malay Embassy sent to Mecca and Constantinople to request assistance against the Portuguese. Such historical narrations are extremely numerous; indeed there is reason to believe that there is one of every State or tribe; and though occasionally embellished by fiction, it is only from them that we can obtain an outline of the Malay history and of the progress of the nation."

Hilly Cape. The N.E. Cape of Patani.

Hindu. Hindustan.—These are words hardly known to the natives of the Peninsula. The name by which the people of India, with reference to their faith, is known to them, is that of the nation with which they have immemorially had most intercourse—the Tâlugu, whom they call Kâling. For Hindustan, or the country of the Hindus, they prefix the word for land or country of this nation, as in Malay—Tanah Kâling. The name Kâlinga, with the elision of the final vowel, it deserves notice, is the Sanskrit name of the northern part of the Coromandel coast, and, as Professor Wilson informs us, the Calingarum Regio of the Romans. Frequently, however, the Indian islanders refer to the country of the Hindus under the appellation of "the country across the water"—Tanah sabrang, an expression similar to the Italian Tramontana—beyond the mountains—applied to the countries

of Northern Europe.

The time and manner in which the Hindu religion was first introduced into the Indian islands is, to say the least, a matter of very great curiosity. Without doubt the monsoons had a very large share in bringing about this event. Favoured by these, the timid Hindus could easily complete voyages of a length impracticable to their more intrepid adventurous contemporaries of Greece and Italy. intelligent Barbosa, who describes Malacca before its conquest by the Portuguese in 1511, represents this class of traders very much as we at present find them, only more important from the absence of the competition of Europeans. "There are here," says he, "many great merchants, Moor as well as Gentile strangers, but chiefly of the Chetis, who are of the Coromandel coast, and have large ships which they call giunchi (junks)."-Libro de Odoardo Barbosa. Ramusio, Vol. I, p. 318. The word Cheti, here supposed to be the name of the nation, is, in fact, only the Talugu and Tamil corruptions of Chethi, a trader, itself a corruption of the Sanskrit Sreshti, having the same signification. It is, moreover, the same word which we have ourselves written Set, well known in our early Indian history. The trade thus alluded to by Barbosa has gone on for the period of nearly three centuries and a half since he wrote, and most probably had been carried on for many ages before it. It was, in fact, the second stage of that tedious transit which brought the clove and nutmeg to Western Europe, the first being the home trade of the Malays which

brought them from the eastern to the western ports of the Archipelago. Neither the Malays nor the Tâlugus have any record of the time or manner in which this commercial intercourse commenced, any more than the ancient Britons had of their trade in tin with the Carthaginians. Circumstantial evidence, therefore, is all that is available on the subject, and even the amount of this is but scanty. When Europeans first visited the Archipelago, they found the Malays carrying on what may be called its internal carrying trade, acting, in fact, the same part which is now, in a great measure, performed by the principal nation of Celebes. They collected the native products of the Archipelago, and conveyed them to the emporia of the West, where they bartered them with the traders of Western Asia, for the manufactures and produce of Hindustan, Persia, and Arabia. They themselves, however, it is certain, never went, any more than they do at the present day, beyond the limits of their own waters. Barbosa enumerates the commodities which the Malays brought to Malacca, then, probably, the most considerable emporium of the Archipelago. They consisted of camphor, aloes-wood, benzoin or frankincense, black pepper, cubeb pepper, the clove and nutmeg, honey, beeswax, gold, tin, and slaves. He adds, that the native vessels which sailed from Malacca went as far as Timor and the Moluccas in quest of those articles, touching at various intermediate places for trade. Such, then, was the state of the internal trade of the Archipelago when the islanders were first seen by Europeans, and such, to all appearance, it had been for many ages. It is remarkable that several of the most distinguishing products of the Archipelago are known, and this, too, even in many cases, to the natives themselves, by names which are obviously Sanskrit. Thus, camphor is kapur, from kapura; aloes-wood or eagle-wood, garu, from aguru;

the nutmeg, pala, abbreviated and corrupted from jatipahla; the clove, in Javanese, gomeda, from gomehda, meaning "cow's marrow;" and black pepper, maricha, which is unaltered. From this it is to be inferred that it was the trade of the Hindus that first gave importance to these commodities, none of which are, even in the present day, much esteemed by the natives themselves, considered as articles of consumption. Thus, the clove and nutmeg, as Rumphius long ago observed, are not used as condiments.

In the Javanese chronologies, the Hindu religion is alleged to have been introduced into their island by an Indian king, whom they call Aji Saka. This is a pure myth, for the name of the personage thus referred to is Sanskrit, the first part of it signifying king, and the last being one of the names of Salivana, who introduced an era prevalent in the South of India, which goes by his name. In fixing the commencement of this era, there is a discrepancy of one year between the Tâlugu and Tamil nations, the first making it 78, and the last 79 years after Christ. It is the first of these that was adopted by the insular Hindus, and which continues to exist in the island of Bali up to the present time, and does so also in Java nominally, although in that island lunar having been substituted for solar time, in the year of our time 1633, the time no longer corresponds with the original. This fact determines the introduction of the era of Saka to the Tâlugus, the people whom I suppose to have introduced Hinduism into the islands. We may add to this the adoption by the Malay and Javanese of the name of the

Tâlugu nation for the whole country of the Hindus.

In order to be able to form a reasonable conjecture respecting the time in which the intercourse of the Hindus with the Archipelago commenced, and the Hindu religion was introduced into it, we must have recourse to circumstantial evidence of a different description. Among the commodities which the Malays and Javanese brought to the emporia of the western parts of the Archipelago, to barter with the foreign traders that resorted to them, the only two not liable to be confounded with similar products of other parts of the east, are the clove and nutmeg. These, it is known, are not mentioned in the minute list of merchandise given in the Periplus of the Erythræan Sea, thought to have been written in the sixty-third year of Christ. Neither are they named by PLINY, who wrote about the same time. Down, therefore, to the first century after Christ, the clove and nutmeg were unknown in Europe, and if known even in the markets of Western India, they would have been enumerated in the Periplus. Little more than a hundred years later, however, we find them enumerated in the Digest of the Roman Laws. At the time, then, the Hindus must have been carrying on a commercial intercourse with the Archipelago, for they were the second link in the chain of transport by which the clove and nutmeg were conveyed, and there is no other apparent means by which the native products of the remote Molucca and Banda Islands could have reached the Western world. In so far, then, as the clove and nutmeg are concerned, the Hindu intercourse with the Archipelago may be said to have existed for at least seventeen centuries. But it may have existed, and most probably did exist, much earlier, for, besides the clove and nutmeg, the Malayan Archipelago produces several other commodities much in demand in the country of the Hindus, such as benzoin or frankincense, camphor, cubeb, pepper, gold and tin, none of which are yielded by any part of Hindustan.* The annual immigration of Indian (Kling) coolies into the Straits Settlements and Native States is estimated at about 10,000. These with Chitties (q. v.) constitute almost exclusively those of Indian birth resident in British Malaya.

Hirundo Esculenta. - See BIRDS'-NESTS.

History.—History, in its usual sense, is unknown to the Malays. The very names by which their histories are known proclaim their character, and indicate the light in which the people themselves view them. These are, either the Sanskrit

word cherita, or the Arabic hikayat, both of which signify story, tale, or romance. Until they adopted the Mahommedan religion, the Malays had no era, and reckoned time only by the duration of the reigns of their very obscure princes, not one of whom has left a name deserving of remembrance by posterity. Respecting their intercourse with the Hindus, we possess no recorded fact whatever. The earliest date that can be quoted for their intercourse, even with the Arabs, is the period of the conversion of the Achinese of Sumatra, and this corresponds to the year 1204 of our time. No doubt, however, their mere commercial intercourse was far earlier, and will probably go as far back as the first establishment of the Arabs in Egypt, and the coasts of the Arabian and Persian Gulf, which would correspond with the seventh and eighth centuries.—See Hikayat.*

Hoey.—The conventional way of spelling the Chinese word Hui or Ui, lit., to meet or confer with, hence a society.

Hui Kun, the meeting-house of a society.

See Secret Societies.

Hog.—One or more species of hog exists, in the wild state, in every great island of the Archipelago. There are abundance of hogs, even in so inconsiderable an island as Singapore. There is, at least, one species in great plenty in the Malay Peninsula.

All the wild hogs that have been seen are small animals, compared with the wild boar of Europe, or even with that of continental India. The Sus verrucosus, so called from the fleshy excrescence on the sides of the cheeks, has a grotesque and formidable appearance, but is in reality a timid animal. Their habits appear to differ in some respects from those of the European and Indian wild hog, for they come frequently to the sea-shore to feed on crabs, and they will greedily devour carrion.

Whether any of the wild species be the origin of the domesticated hog of the Peninsula is a question not easily solved. The popular names for the hog are all native words. The most frequent of them is babi, which, with slight modifications, is found in many languages from the Peninsula and Sumatra to Timor and the Philippines. This name, there is no doubt, belongs to the Malay language, which has no other.*

Honey and Wax.—Honey is the produce of wild bees, which make their hives in the crevices of trees, but no species of bee has ever been domesticated, which would probably be difficult or impracticable in countries which have no distinction of summer and winter, where every season produces flowers, and where, consequently, there is no necessity for laying up a large store of food. The honey of the Archipelago is a thin syrup, very inferior in flavour to that of temperate climates. It is chiefly sought on account of the wax, which forms a large article of exportation to Europe, India. and China. In Malay, the honey-bee has a specific name—lâbah; so has the wax—lilin; and the hive, tuwalan. The native name for honey is manisan-lâbah, "the sweet of the honey-bee," but the Sanskrit name madu is of more frequent use.*

Hornbills.—These answer to the "Toucans" of America. Their apparently cumbrous beaks and helmets are in reality very light, only one species having the portion above the head solid. It is from this—a yellow wax-like-looking substance—that the Chinese carve brooches, earrings, &c. Their way of taking food is peculiar. They are omnivorous, and quite as fond of young birds as of fruits. A gentleman who kept one loose some years ago used to miss one or more of some newly-hatched chickens daily. A watch was set, and it was at length discovered that the hornbill was in the habit of waiting for the exit of a chicken from the coop, and, selecting a victim, would dexterously jerk it up into the air by a nip where its tail-feathers were yet to grow, and catching it within his widely open jaws swallow it at a gulp.

Horsburgh, James.—The author of the "China Pilot" and the most eminent hydrographer of his day.

Horsburgh Lighthouse.—Erected under the superintendence of Mr. J. T. Thompson, Government Surveyor of Singapore, on a rock called Pedra Branca by Europeans, and Batu Putch by the Malays, in 1852, in honour of the great hydrographer James Horsburgh. The rock owes its white appearance to the exercta of sea-birds. It is situated on the E. extremity of the Straits of Singapore in lat. 1° 20′ 15″ N. and long. 104° 24′ E., 9 miles from Point Romania and 37 miles from Singapore. It is 150 feet long by 100 broad and 24 feet above high water spring tides. The lantern is 95 feet above the level of the sea, and the light is visible for 15 miles. A full account of the building appears in the J. I. A. for August, 1852. Large subscriptions were made by the Canton merchants and hongs, the Bombay and Penang Chambers of Commerce, and private individuals, the balance being made up by the Government. The total cost appears to have been \$23,667.87. It is needless to insist upon the advantages this light has proved to commercial interests in this part of the world.

Horse.- In view of the strong interest felt by all foreign residents in the Peninsula in the horse and pony, CRAWFURD's article, which applies very fully at the present day, is reproduced in extenso. It will be seen that the horse is not indigenous to the Peninsula.] The horse has been immemorially domesticated by most of the more advanced nations of the Malay Archipelago, wherever it could be made use of. The chief exceptions are the Malay Peninsula, the eastern sea-board of Sumatra, and nearly the whole of Borneo-countries in which the people dwell on the marshy banks of rivers, in which there is not even a bridle-path, and fit, therefore, only for the boat and the buffalo. The native horse is always a mere pony, seldom reaching 13 hands high, and more generally of about 12 hands. There are many different breeds, every island having at least one peculiar to itself, and the large islands several. Beginning with Sumatra, we have here at least two distinct races—the Achin and Batubara—both small and spirited, but better adapted to draught than the saddle. Of all the countries of the Archipelago, Java is that in which the horse most abounds, and here we find several different breeds—as those of the hill countries, and those of the plains. Generally, the Java horse is larger than that of Sumatra, but in the language of the turf has less blood and bottom. The lowland horses (the great majority) are somewhat coarse and sluggish, but the upland spirited, smaller, and handsomer. According to the statistics of the Netherlands Government, the total number of horses in the island in 1842 was 291,578, and at present probably exceed 300,000. The horse, although of a very inferior breed, is found in the islands of Bali and Lomboc, but the next island to these eastward—Sumbawa—produces the handsomest breeds of the whole Archipelago. They are the Arab of the Archipelago, yet the blood is not the same as the Arab, for the small horse of Sumbawa, although very handsome, wants the fine coat and the blood head of the Arabian. There are in this island and adjacent islets three different races—that of Tambora, of Bima, and of Gunung-api—the last being most esteemed. Next to Java, horses are most abundant in Celebes. These are inferior in beauty to those of Sumbawa, but excel all others of the Malayan portion of the Archipelago, in combining the qualities of size, strength, speed, and bottom. A very good breed is produced in Sumba, called in our maps Sandalwood Island. But perhaps the best breed of the whole Archipelago, although still but a pony, is that of the Philippines. It is superior in size to any of the breeds of the western islands, which it may owe to the superior pastures of the Philippines, and, possibly, to a small admixture of the Spanish horses of America, although this last is by no means an ascertained point.

In the Archipelago, as in other parts of the world, the colour of the horse is singularly connected with quality, temper and locality. The prevailing colour with

the horse of Achin is piebald, which becomes more and more rare as we proceed eastward. The most frequent colours of the Batak or Batubara horse are bay and mouse. In Java, the best and the most prevailing colours are grey, bay, and mouse; and the worst black and chestnut. To the last colour, indeed, the Javanese have such an antipathy that a chestnut horse is expressly forbidden to enter the precincts of the royal courts, or to join in the public tournaments. In the Bima and other ponies of Sumbawa, bays, greys, and duns are the most frequent and most approved. Blacks and chestnuts are rare, and a piebald is as rare as a black among Arabs. Among the Malays, the highest breed of horses is designated by the name of Sâmbrani, but what that means no one can tell, and it must be

concluded that it is a purely mythical name.

Generally, the horses of the Archipelago are hardy, surefooted, and docile. The horses are all entire, and the mares used only to breed and as beasts of burden. By the natives of the Archipelago the horse is only used for the saddle or to carry burdens, and never for draught, either for plough or wheel-carriage. To see horses drawing a native carriage, except in imitation of Europeans, we must go to the sculptures on ancient temples in Java, where they are thus represented. The Javanese have used them in war, and where there were no real horses they might have been formidable, but against a cavalry mounted on the latter they are of course worthless. On the invasion of Java in 1811, the French Government of the island had a corps mounted on native horses, but it never thought of meeting the charge of a squadron of British Dragoons, mounted on the large and active horses

of Southern India, The origin of the horse of the Malay Archipelago is as obscure as that of the same animal in other parts of the world, America, Australia, and the islands of the Pacific excepted. Its name in Malay, and the only one it has in that languagekuda—is a corruption of the Sanskrit ghura, and this might lead to the belief that it was brought originally from some Hindu country. In this case, however, we must suppose that no other horses were brought than ponies, which is improbable, or that the race has degenerated as to size, which is not likely, since it has not degenerated either in spirit or symmetry, but, on the contrary, it is, in fact, superior in these respects to the continental horse. This hypothesis is made still more improbable when we find that, in the Javanese language, the popular name for the horse—jaran—is a native word. It is true that the Javanese has also four synonyms, but these are all foreign words. Thus, in the polite dialect the name is kapal, which, in the Talinga language, is the name for a ship, here probably used in a similar figurative sense to that by which the Arabs designate the camel the "ship of the desert." The three other synonyms are all Sanskrit, and belong to the obsolete and recondite language, namely, turongga, waji, and kuda, the last being the same which has become the popular name in Malay, having, most probably, superseded a native one. The popular Javanese name has extended, unchanged, to the language of the Lampungs of Sumatra, and it is found in the Bugis of Celebes in the corrupt form of anarang, and in the Rotti, the language of a small island adjacent to Timor, as dalan. In the other languages of countries in which the horse is found, the Sanskrit name kuda prevails, and from its form evidently derived through the Malays.

In two islands only of the Archipelago is the horse found in the wild state—Celebes and Luzon—the only ones that are known to have extensive grassy plains fit for its pasture, and in these it is caught by the lasso and broke in, as in the Llanos of America. In such situations it is certainly far more likely to have become wild from the domestic state than to be indigenous. In so far as the Celebes is concerned, this view is rendered probable by the name being a corruption of the Javanese in one lauguage of that island—the Wugi; while in another—the Macassar—the horse is called "the buffalo of Java." In the Philippines it is not even alleged that the wild horses are anything else than domesticated ones become

so. In Pigafetta's enumeration of the domestic animals of Cebu, he makes no mention of the horse, nor do the Spaniards who followed Magellan allege that they found the horse in Luzon or any of the other islands. In none of the languages of the Philippines, in fact, does there exist any native or any Asiatic name for it, the only one throughout being the Spanish one-cavallo. The horse, then, is neither indigenous in the Philippines, nor was it introduced like the buffalo by the Malayan nations before the arrival of the Spaniards. But from what quarter it was brought, or at what time, it is not easy to say. Most probably it was early introduced, and the countries from which it could be most easily brought would be Celebes, Mindanao, and the Sulu Islands. It seems probable that the horse so introduced might have been improved by a few Spanish horses brought from America, but even this supposition is not necessary to account for the superiority of the Philippine horses over those of the western and southern islands, for the better pastures of the Philippines would be sufficient to do so. Some Spanish writers have fancied that the horse introduced into the Philippines was Spanish, degenerated in time by the soil and climate. This hypothesis, however, is not tenable; for the Spanish horse, although neglected, has not degenerated, at least in size, in similar latitudes and even worse soil in America. The theory of degeneration as to size must, indeed, be given up, when we find that since the time of the English occupation of Java very good full-sized horses have been bred in that island, a much less favourable situation than Luzon.

It might, at first sight, be supposed that the horse may have been introduced into the countries of the Archipelago from those parts of the continent nearest to them—Siam and Cambodia—in which, as with themselves, small horses or ponies only are found. This hypothesis, however, is only plausible. Between the countries in question and the islands of the Archipelago not much intercourse has existed at any time, and in the Peninsula, the nearest part to them, the horse does not exist at all. Even in the parts of Siam and Cambodia nearest the islands, the horse is not used, and its monosyllabic names in the languages of these countries bear no resemblance to any of those of the insular tongues. We must come, then, to the conclusion that the horse of the Asiatic Archipelago cannot be traced to any foreign stock, nor to any native wild one now in existence. All that can safely be asserted is, that it seems to have been tamed for many ages, and its first domestication belongs

to a time beyond the reach of history or reasonable conjecture.

In Singapore, a good riding horse costs from \$100 to \$120, and a pair of carriage horses from \$200 to \$300. The ponies of Sumbawa, Celebes, and Sumba, are largely exported to Java, to the British settlements in the Straits, and even as far as the Mauritius. A good racing pony has been known to fetch \$600.

Hot Springs .- See THERMAL.

Houses.—Malay houses are invariably built on posts, so as to raise the floor from four to six feet from the ground. This is, doubtless, healthy, but as the flooring is composed of bamboo or nibong, with interstices about half an inch wide between each lath, the earth beneath becomes the receptacle of the drainage of the establishment. This, of course, tells the opposite way. The universal plan of the well-to-do is to build the house in two divisions—the front one being for receiving visitors and lounging generally, while the hinder portion is reserved for the women and children. Each is separately roofed. Behind the latter another shed serves as cook-house, &c.

The roofs are of attap, and the walls of plank, bertam, or kadjang. In nearly all cases a thief can very easily cut his way through them. Nails are but little used, rattan taking their place. Many houses are literally tied together from floor to roof. The lantei, or floors, are covered with mats, and are not unpleasant to naked feet, but creak ominously under the heavy tread of European shoes.

Howdah, Elephant.—The words used in describing the various fittings which go to form the panniers, which in Malaya take the place of the Indian howdah, are given in N. and Q., with No. XV. J. S. B. R. A. S.

Hua Hoey.—The name of a lottery extensively patronized in the Straits Settlements. It is indulged in by Chinese, Malays, and Klings. The following account of it is condensed from Mr. C. W. S. KYNNERSLEY'S exhaustive paper on the subject in No. XVI. (1885) of the J. S. B. R. A. S., p. 203:—

Hua Hoey, or the thirty-six animals lottery, is extensively played in the Straits Settlements, Burma, Siam, and wherever the Chinese settle. From a small book "On the Interpretation of Dreams, with Illustrations of Hua Hoey," we learn that the game was invented in the time of the second Han dynasty. In this book there is a short sketch of the lives of the thirty-six mythical personages (who had previously existed as animals), and directions are given as to staking.

The lottery is thus conducted in the Straits:—A person wishing to open it, issues a notice that on a certain date he will open Hua Hoey under a certain chop, and that he will be responsible to all winners who stake up to such and such an amount either with him or his agents.

These agents go round, and, according to agreement, are allowed to receive stakes up to a certain limit, say \$2, but on their own account they may receive larger stakes. They carry what are usually termed hongs, i.e., papers on which the stakes are entered. In case the staker is well known to the agent, no acknowledgment is given, but the staker may receive a ticket or scrap of paper, or else he writes down on a slip of paper, which he hands to the agent, the names of the animals he wishes to stake on and the amount.

The following is a list of the animals staked on:—White fish, shell or dragon, white goose, peacock, lion or earthworm, rabbit or tortoise, pig, tiger, buffalo, alligator or dragon, white dog, white horse, elephant, white cat or dog, mouse, wasp or bee, stork, cat, monkey, frog, sea-hawk, dragon, tortoise or duck, cock, eel, turtle or carp, lobster, snake, spider, sheep or deer, goat, ghost or fox, butterfly, stone or cricket, swallow and pigeon,—each of which is the sign of one of the Hua Hoey characters. The marks (which have a conventional meaning) and figures represent the amount, either cents or dollars, staked on each animal, and the last column is the total of stakes received. A person wishing to stake a large amount, say \$5 or \$10, on an animal will sometimes write the name on a piece of paper and seal it up, delivering it with the stake to the manager of the Hua Hoey or an agent.

The lottery is opened twice a day, usually at noon and 6 p.m., and at the appointed hour the winning number (animal) is exhibited, and the result declared in the streets. Previously to this, the agents have brought in their staking papers. If the lottery is worked fairly, of course the manager who declares the winning number should be ignorant as to the amounts staked on the different animals. In China, the papers on which the stakes are entered are folded up in a packet and are not inspected till the winner has been declared, when the winning tickets are chopped and the owners of them are paid.

In the Straits these lotteries are alleged to be not fairly worked, and the animal least favoured by the public is often the winner. Stakers receive thirty times their stake, less a small commission paid to the agent, from him they receive their winnings, and this leaves a good margin of profit for the bank. A manager, for the sake of gain, or out of spite, has been known to stake by deputy a large amount with one of his agents on the animal which he means to declare the winner. The agent is "broke," and those who have staked on the winning animal are defrauded of their gains. This is only one of the many ways of swindling practised in regard to these lotteries in the Straits.

It must not be supposed that it is only the Chinese who gamble at Hua Hoey. The wealthy Babas, born in the Straits, the respectable traders, their wives and

daughters, the petty shopkeeper and the coolie who works by the day, Klings and Malays, women and children, all alike are unable to resist the temptation to gamble. The Hua Hoey lottery is drawn twice a day in different parts of the town, and the excitement is ever fresh. An outlay of ten cents, which is within

the means of any coolie, may bring in \$3.

Women are largely employed in the Hua Hoey business, while their husbands are at the shop or sailing (as they appear to be very often). They spend their time in collecting stakes and staking themselves. They have diamonds and gold ornaments in profusion, and while any of these remain, they can gamble to their heart's content. Those lower in the social scale, unblessed with diamonds or ready money, beg, borrow, or steal in order that they may gamble.

Dreams play a great part in Hua Hoey, and the confirmed Hua Hoey player gets to think of nothing else but the chance of his winning on the morrow. According to

his dreams, he stakes.

It is no exaggeration to say that Hua Hoey gambling corrupts and brings to ruin thousands of people—men, women and children—but how to check it and

minimize the evil is a very difficult question.

The common gaming houses in town are defended by strong iron-barred doors, have ladders, trap-doors and escapes, and are always ready for a raid by the Police. Premises have to be hired and fitted up for the purpose, and there is a certain amount of risk in the undertaking, but a Hua Hoey lottery can be opened anywhere—in a shop, a private house, or a kampong. The result is not often declared at the same place. All kinds of artifices are practised when the winning number is exhibited in order to escape detection by the Police. Sometimes the character is marked on a piece of yam or sweet potato and swallowed if the Police appear; or it is written on the palm of the hand or on the sand and quickly rubbed out. Instead of the well-known Hua Hoey characters, the numbers corresponding with them on the lottery papers are now frequently used. A still later innovation is to use nails, match-boxes, &c., to signify the characters staked on, and it is extremely difficult for the Police to procure satisfactory evidence against the principals engaged in the business.

The agents, with their lottery paper, pencil and stakes collected, are sometimes arrested and fined, but it has been held by a learned Judge that the possession of

these "tickets," as they are called, is no offence.

The more respectable Chinese are fully alive to the widespread mischief caused by these Hua Hoey lotteries, and a memorial was recently addressed to the Legislative Council by certain Chinese inhabitants of Penang praying that most stringent measures should be adopted for their suppression.

Iguana.—The same name usually applied to monitors, and therefore erroneous. There is, however, a small lizard about 14 inches from nose to tip of tail which answers to the description and pictures of the iguana, but it is conventionally known as the Chameleon. It possesses, in a slight degree, the property of changing colour, but I can find no description of the animal in any natural history. It is, like all the lizards of Asia, perfectly harmless. See Monitor.

Illipi Oil.—See Ons.

Imam.—The chief official of a mosque, who leads the prayers. He has under him a Khatib, Bilal, and Siak (q. v.).

Immigration.—Large numbers of Chinese and Kling immigrants flock to the Straits Settlements yearly, the influx being 100,000 Chinese and 10,000 Klings. They are both protected by special legislation, viz., Ordinances IV. of 1880, I. of 1882, and V. of 1884. Of the Chinese, a large number go to the Dutch possessions, but the local population from this source is steadily increasing.

Incantations. (See also Charms and Invocations.)—These are commonly

resorted to either to effect the injury of another or cure sickness. The Abbé FAVRE

gives the following account of a ceremony he witnessed:-

"A large vase of earth containing lighted charcoal was brought by the great minister of state, and was set before the king. In the centre of the vase, another of the same kind, containing water, was placed, and in the centre of this was a candlestick with a lighted candle. Near to this were two other but smaller vases, one filled with flattened grains of rice, having the form of small white flowers, the second containing incense. The king, sitting with his legs crossed, began by delivering some formulary which I did not understand. He then made several salutations towards the lighted candle, took incense and poured it upon the fire, threw some of the flattened pieces of rice into the water, took the candle, and, turning the flame towards the ground, made several drops of wax fall into the water, and having moved the candle, as if he would form some written characters, he placed it again upon the candlestick. All this ceremony was accompanied with the recitation of long formularies, some being delivered in a high voice, some in a low voice. The king spent about one hour in repeating three times over the whole of this ceremony, and finally he took the candle, and put its lighted end into the water, which ended the ceremony. Then his Majesty began smoking opium until he smoked himself asleep. The next day I asked my Malay coolies the meaning of such superstitious practices; they answered, that this is a Malay physic, and the king intended to cure his grandchild, who was dangerously sick, a few minutes further in the valley. They added that such remedies are much used by Malays against every kind of sickness. They appeared themselves to be convinced that the worst sickness cannot withstand it, if the ceremony is faithfully performed."

Indian Corn (Jagong) is cultivated only in small quantities, having been introduced by Europeans. The plant matures in two months, and several crops a year may be obtained.

Indigo.—See Dyes.

Indo-China.—" Miscellaneous Papers relating to Indo-China."—(Reprinted for the Straits Branch of the Royal Asiatic Society, from Dalrymple's "Oriental Repertory," and the "Asiatic Researches" and "Journal" of the Asiatic Society of Bengal. Two vols. post 8vo.)

The advertisement says: -"The importance of placing within the reach of local students (often without access to libraries) a knowledge of what has been communicated to the Journals of learned Societies in past years upon subjects having reference to the Malay Archipelago, has induced the Council of the Society (the literature in question being of manageable bulk) to reprint a series of papers, collected from various sources, relating to the Straits Settlements and Eastern Archipelago."

A second series, comprising also 2 vols. post 8vo, was published in 1887. The following is an alphabetical table of the articles in the 4 vols. already

published:-

AMPHIBIA AND REPTILIA.—Notes on some Species of Malayan Amphibia and Reptilia. By Dr. F. Stoliczka. Vol. I, 2nd series, paper 3.

BALAMBANGAN.—Report made to the Chief and Council of Balambangan. By Lieut.

James Barton, of his several Surveys. Vol. I, paper 2.

Ball.—Account of the Island of. By. R. Friederich. Vol. II, 2nd series, paper 10. BORNEO.—Substance of a Letter to the Court of Directors from Mr. John Jesse, dated July 20, 1775, at Borneo Proper. Vol. I, paper 3.

BOTANY.—Some Account of the Botanical Collection brought from the Eastward, in 1841, by Dr. Cantor. By the late W. Griffith. Vol. II, paper 38.

CAOUTCHOUC.—Some Account of the Elastic Gum Vine of Prince of Wales' Island.

By James Howison, Esq. Vol. I, paper 8.

A Botanical Description of Urceola Elastica, or Caoutchouc Vine of Sumatra and Pulo-Pinang. By WILLIAM ROXBURGH, M.D. Vol. I, paper 9.

CLIMATE.—Climate of Singapore. Vol. I, paper 16.

Geology.—Observations on the Geological Appearances and General Features of Portions of the Malayan Peninsula. By Captain James Low. Vol. I, paper 14. - Short Sketch of the Geology of Pulo Pinang and the Neighbouring Islands.

By T. WARD, Esq. Vol. I, paper 15.

On the Local and Relative Geology of Singapore. By J. R. LOGAN, Esq. Vol. II, paper 36.

Gold of Limong.-Vol. I, paper 5.

GUNONG BENKO.—Journey to the Summit of, Vol. II, 2nd series, paper 9.

HINDU.—On the Traces of the Hindu Language and Literature extant amongst the

Malays. By WILLIAM MARSDEN, Esq. Vol. I, paper 7.

INDEXES.—General, end of Vol. II, 1st series.

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- Geographical and General, end of Vol. II, 2nd series.

- Latin Terms, end of Vol. II, 2nd series.

— Malayan and Chinese Terms, end of Vol. II, 2nd series.

Indo-Chinese.—On the Languages and Literature of the Indo-Chinese Nations. By J. LEYDEN, M.D. Vol. I, paper 12.

Inscription.—Inscription on the Jetty at Singapore. Vol. I, paper 17.

- Inscription at Singapore. Vol. I, paper 19.

- An Account of several Inscriptions found in Province Wellesley. By Lieut.-

Col. James Low. Vol. I, paper 20.

- Note on the Inscriptions from Singapore and Province Wellesley. By J. W.

LAIDLAY. Vol. I, paper 21. — On an Inscription from Keddah. By Lieut.-Col. Low. Vol. I, paper 22.

Inscription, Sanskrit.—Extract of a Letter from Col. J. Low. Vol. I, paper 18.

Krau.—Across the Isthmus of. Vol. I, paper 31.
Limong.—The Gold of. By Mr. Macdonald. Vol. I, paper 5.

MALACCA AND PINANG.—Journal of an Excursion from Singapur to. By J. R. Logan, Esq. Vol. I, 2nd series, paper 1.

MALAGASY LANGUAGE.—Outlines of a Grammar of the. By Dr. H. N. VAN DER

Tuuk. Vol. I, 2nd series, paper 6. MALAY ARCHIPELAGO AND MALACCA.—Notes on. By W. P. GROENEVELDT, Esq. Vol. I, 2nd series, paper 5.

MALAY MSS.—Account of the Malay MSS. belonging to the Royal Asiatic Society.

By Dr. H. N. van der Tuuk. Vol. II, 2nd series, paper 8.

Malay Peninsula.—Geology of. Vol. I, paper 14.

Mammalia.—Catalogue of Mammalia inhabiting the Malayan Peninsula and Islands. By Theodore Cantor, M.D. Vol. II, paper 35.

MANTRAS.—Account of. By Rev. Father Borie. Vol. I, 2nd series, paper 8.

MERGUI.—Report on the Tin of the Province of. By Capt. G. B. TREMENHEERE. Vol. I, paper 25.

Report on the Manganese of the Mergui Province. By the same. Vol. I, paper 26.

- Paragraphs to be added to Capt. G. B. TREMENHEERE'S Report. Vol. I. paper 27.

- Second Report on the Tin of Mergui. By Capt. G. B. TREMENHEERE. Vol. I, paper 28.

- Analysis of Iron Ores from Tavoy and Mergui, and of Limestone from Mergui. By Dr. A. Ure. Vol. I, paper 29.

- Report, &c., from Capt. G. B. TREMENHEERE, on the Price of Mergui Tin Ore. Vol. I, paper 32.

- Note by Maj.-Gen. G. B. TREMENHEERE in reference to his papers on the Tin of Mergui. Vol. II, paper 40.

Nassau Islands.—An Account of the Inhabitants of Poggy or Nassau Islands. By JOHN CRISP, Esq. Vol. I, paper 10.

ORANG OUTANG.—Some Account of an Orang-Outang of remarkable Height found on the Island of Sumatra. By CLARKE ABEL, M.D. Vol. I, paper 13.

- Remarks on the different Species of Orang-Utan. By E. Blyth, Esq. Vol. I, paper 33.

Further Remarks. By the same. Vol. I, paper 34.

PARCHAN RIVER.—Visit to. By Capt. G. B. TREMENHEERE. Vol. I, paper 30.

- Report on a Route from the Mouth of the Pakchan to Krau, and thence across the Isthmus of Krau to the Gulf of Siam. By Capt. Al. Fraser and Capt. J. G. Forlong. Vol. I, paper 31.

Penang.—Formation of the Establishment of. Vol. I, paper 4.

- Geology of. Vol. I, paper 15.

PLANTS, MALAYAN.—Description of. By Dr. W. JACK. Vol. II, 2nd series, paper 12.

Notes to Ditto. By Sir J. D. HOOKER and the Hon. D. F. A. HERVEY. Vol. II, 2nd series, paper 12.

PEPPER.—Remarks on the Species of Pepper which are found on Prince of Wales' Island. By WILLIAM HUNTER, Esq., M.D. Vol. I, paper 11.

PHILIPPINE ISLANDS.—A Notice of the Alphabets of the. Vol. I, paper 23.

POGGY ISLANDS.—An Account of the Inhabitants of the Poggy or Nassau Islands.

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Pulo Ubin.—The Rocks of. By J. R. Logan, Esq. Vol. I, 2nd series, paper 2.

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SINGAPORE.—Climate of, Vol. I, paper 16.

SUMATRA.—On three Natural Productions of, Vol. I, paper 6.

— Orang-Utan in, Vol. I, paper 13.

TAURINE CATTLE.—On the Flat-Horned Taurine Cattle of S.E. Asia. BLYTH, Esq. Vol. II, paper 39.

TENASSERIM.—Report of a Visit to the Pakchan River, and of some Tin Localities in the Southern portion of the Tenasserim Provinces. By Capt. G. B. Tre-MENHEERE. Vol. I, paper 30.

TIDES.—Succinct Review of the Observations of the Tides in the Indian Archipelago. Vol. I, paper 24.

ZOOLOGY.—Notices on Zoological Subjects. By Messrs. Diard and Duvancel. Vol. II, 2nd series, paper 11.

Indra.—The name of the Hindu god of the air, and in Malay that also of a class of aërial beings. It is found in the names of places.

Inei.—A valley in Johol, one of the Negri Sembilan.

Inscription, Indian.—An ancient inscription, supposed to date from the thirteenth century, was extant on a sandstone rock at the entrance of Singapore river, on the spot now occupied by the Harbour Master's Offices. Col. Low [J. I. A., Vol. I, p. 89] gives the following account of it:—"The inscription, a fragment of which I possess, was only legible in few places, the character appertaining to the Peninsula of India, and probably it may be described in the Malayan annals in these terms: 'Rajah Suran of Amdan Nagara, after conquering the State of Johore with his Kling troops [Kling is the term applied to the people of Coromandel coast], proceeded to Tamsak. When he returned to his country of Kling or Bejaneegar, he left a stone monument of his victories, on which was an inscription in the language of Hindustan. Tamsak is also called Singhapura.' This was about

A.D. 1201. Singhapura, observes Mr. Crawfurd, was first settled in A.D. 1160 by Sri Sura Bawana." [See J. I A., Vol. I, p. 89, and M. P. I. C., Vol. I, p. 219 et seq.]

Mr. Maxwell states that at the foot of Bukit Mertajam, Province Wellesley, on the south side, there is a block of granite on which some rude characters have been traced. The Malays call it batu surat, the rock of the writing. "I believe," he says, "that the inscription has never been deciphered, and that the character has not been identified. When I saw it last (in 1874), it was difficult in places to detect the ancient inscription on the rugged face of the rock, its faint lines contrasting strangely with the deeply-cut initials of Col. Low on the same boulder."

Insects. - See Entomology.

Intan.—The diamond which, though not found in the Peninsula, is much esteemed by the Malays.

Interest of Money.—In Malay, bunga mas, or shortly, bunga. This signifies 'flower of gold,' that is, profit of money. By the strict letter of Mahommedan law, interest and usury are one and the same, and are expressly prohibited, so that the legitimate profits of capital in gold and silver are held to be sinful. Except by a few rigid observers of the precepts of the Koran, this foolish law is disregarded by the Mahommedan inhabitants of the Archipelago.

Invocations.—The use of these to avert evil, counteract hostile incantations, inflict maladies and misfortune on others, and excite love and regard, is common to both the Malays and the aboriginal tribes of the Peninsula.

The Chucha is an invocation which causes the invoker to prevail against his enemies. The Panundo procures submission from others. The Pebinchi is used to excite hatred in the object of affection towards a rival. The Pemata lida is supposed to render enemies speechless. The Pendinding is an invocation of defence, which must be repeated seven times at both sunrise and sunset. Pengaseh is a charm or invocation to gain the affection or good will of another. The Pimanis renders the user universally agreeable; while Tankal means both an invocation and an amulet, the former being used by hunters and sailors, and by people generally to exorcise Hantus [q. v. and Charms].

Ipecacuanha (Cephalis ipecacuanha).—This is exotic, but has been introduced into the Singapore Botanical Gardens, and is noticed here in view of its probable importance. Mr. Cantley says (Report 1886):—"A native of Brazil, and a plant which has been found generally very difficult to cultivate, it seems to grow in the Straits with all the luxuriance of its native country when a proper situation is hit upon. It enjoys a very moist, still atmosphere and somewhat dense shade. In the Straits it forms a compact little bush of about 18 inches in height, and is very ornamental when well in flower. I lately visited a plantation of the plant in Johore, and saw thousands of plants in excellent health. They were protected from the sun by palm-leaves side by side on artificial supports about 6 feet in height; hedges of the same material were put down a few yards apart. Soil chocolate colour, rich in vegetable matter, wood ashes."

Ipoh,—District and V. in Kinta, E.C. Perak. The latter has lately been made the seat of an Assistant Magistracy and Collectorship.

Ipoh Tree (Antiaris toxicaria).—The juice of this tree is used for poisoning arrows. When prepared for this purpose it resembles chandoo, or prepared opium, in consistency and colour. It is occasionally mixed with arsenic, the juices of the juices of the juices of the juices, packet, jimardes, mallye, and gadong to increase its deadly powers. The Ipoh is supposed to be synonymous with the Upas of Java.

Iron.—The word iron and steel being native, give no rise to any supposition of its foreign importation. Crawfurd, writing over thirty years ago, says:—"In the Peninsula the ore, although not smelted, at least to any extent, is very abundant; and for this we have the authority of a personal observer and a man of science.

Mr. J. R. Logan, in his account of the physical geography of the Peninsula, informs us that 'iron ores are everywhere found, and in the south they exist in vast profusion. In some places the strata have been completely saturated with iron; and here, the bare surface of the ground, strewed with blackish scoriform gravel and blocks, present a strange contrast to the exuberant vegetation of surrounding tracts, appearing as if it had been burnt and blasted by subterraneous fires. Much of the ordinary forms of iron-masked rocks, which are common, and so little regarded for their metallic contents that in Singapore they are used to macadamize the roads, contain often near 60 per cent. of pure metal.'"—J. I. A., Vol. II, p. 102. At present nearly all the iron used in the Peninsula is imported from Europe.

Iron Stone.—The whole Peninsula shows traces of iron, from the hard variety found in Perak to the soft laterite of Singapore. The latter is extensively availed of for roads, &c. It is said to contain manganese, and exists from the size of coarse sand and small pebbles to masses of ten or twelve feet in diameter. It is black or dark clove-brown in colour. Internally it is cellular like ætites; it is not magnetic in the mass, but contains grains of magnetic iron. When oxide of iron

is not present in excess it is a valuable fertilizer.

Isinglass.—This is an article of considerable export under the name of fish-maws (palongpa ikan or ari ari ikan in Malay). Large quantities are also exported by Chinese traders for sale in China. The following is a list of the local fish which furnish isinglass:—

Ikan	batu	•••	Lobotes erate	•••	•••	Cantor,		
,,	jarang gig	i	Otholithus ruber	•••	•••	,,	,,	59 .
,,	jarang gig		Otholithus argentens		•••	,,	,,	61.
,,	jarang gig	,	Otholithus maculatus	•••	•••	,,		62 .
,,	kurow			•••	•••	,,	,,	29.
	salampei			• • •	•••	,,		57.
•••	saludu			•••	•••	,,		256.
•••	saludu			•••	•••			258.
	saludu			•••	•••	,,		259.
,,	siyakup			•••	•••	,,		1.
,,	tambarak	•••	Johnius dracanthus	• • •	•••	,,	,,	67 .

Islam.—An Arabic word adopted by all the nations converted to Mahommedanism, and signifying that religion. Although properly a noun, it is much more frequently employed as an adjective, as in the examples, orang-islam, a Moslemman, and agama-islam, the Mahommedan religion, being united in the first instance with a native, and in the last with a Sanskrit word. Masok-islam, to "enter Islam," i.e., to become a Mahommedan.

Istana or Astana, Palace.—The most pretentious and comfortable in the Malay Peninsula is that of the Sultan of Johore. The building is very large, rather ugly externally, but with fine rooms furnished in European fashion. Much hospitality has been shown at this place to the Europeans resident in the Straits, and to travellers.

IVOTY.—See ELEPHANT. It is chiefly used to adorn the handles of krisses. None of the beautiful carved work, common in adjoining countries, is produced by the Malays.

Jackfruit (Cham pedak or nangka).—One of the artocarpi, rather coarse in flavour, but much liked by the natives. The seeds when roasted resemble chestnuts.

Jaggary.—Coarse black sugar containing a very large quantity of molasses; known in the Straits as Gula malacca. A palm from which coarse sugar is also made is known as the Jaggary-tree (Caryota urens), and has apparently been introduced from the E. Indies.

Jakun.—This is a name of unknown origin and meaning, which the Malays apply, seemingly as a generic term, to the wild tribes of the interior of the Peninsula, from Malacca southward to Johore. It is regarded by the people themselves as a sort of nickname. All the men that go under this name have the same physical form as the Malays, speak the same language in a ruder form, and seem, in short, to be Malays, without the Mahommedan religion, and in a much lower state of civilization. The Jakuns of Johore are a fine race, and on the whole better-looking than the Malays (J. I. A., Vol. II, p. 246), while those of the Menangkarbau States are the reverse. The Abbé Favre asserts that they exhale a strong odour when they perspire. Large numbers exist in Pahang, and are of an almost white complexion; and the same author asserts that they were frequently captured for sale as slaves. The notion of some writers, founded on certain resemblances of physical form, that the Jakuns are of Tartar origin, is, in the absence of all historical or philological evidence, and when the two parties, supposed to be the same people, are separated from each other by at least forty degrees of latitude, too whimsical for serious consideration. The Malays of Sumatra continue, down to the present day, to emigrate to and settle in the interior of the Peninsula, and the great probability seems to be that, in remote times, the Peninsula was without any other inhabitants than the negroes of the mountains, and that all its brown-complexioned, lank-haired people, whether of the sea-board or the interior, were emigrants from Sumatra, or the islands lying between it and the Peninsula. [The above statement, that the Jakuns speak a Malay dialect, is denied by later writers. The average height of males is 4 feet 8 inches, and of females 4 feet 4 inches.

Although regarded by many as pure savages, the balance of evidence is in favour of their being fairly civilized. They inhabit houses built in the Malay way, which are kept tolerably clean. Those in the Malacca territory appear to have made the least progress. They follow the Malay custom in dress, but are dirty and untidy. The women are fond of ornaments, such as rings and bracelets, when obtainable. The waist-cloth, of terap bark amongst the lowest specimens of the race, is called sabaring. It is worthy of note that a ring is the token that a female is married. They occupy themselves chiefly in hunting; but they cultivate yams, rice, &c., in Johore in temporary clearings, which are abandoned at the end of the season. They cultivate durians with particular care, and traffic in damar, rotan, &c., which they obtain from the forest. Adultery is punishable with death. The reader curious on the subject of Jakun customs will find ample information under

the reference given above.

Jala.—See FISHING.

Jalan Bharu. - V. on W. side of Balik Pulo district, S.W. Penang.

Jalan Bharu.—See KWALA PRAI.

Jalo .- A hilly district on the borders between Patani and Kedah on the N.W. bank of Patani R. One of the nine into which the State is now divided. Very rich in minerals.

Jalor.—The name applied to a river canoe on the E. coast of Johore.

Jamuan.—V. between the Perak range and R., N. Perak, 3 or 4 miles N.W. of Kwala Plus.

Jancore.—A settlement in Perak whence a good deal of tin was mined by Chinese from deep workings. Principal mine 40 feet deep. Soil poor in tin. Produce from mines from one-eighth of an ounce to one ounce per picul of ore. Small quantities of gold found in quartz débris.

Japan, - In Malay Japon, which is nearly our own old orthography - Japon. The name is, no doubt, taken from that of the principal island in the Japanese language—Nipon, and in Chinese Jipun—the corruptions being taken by the natives of Malaya from the Portuguese. On the arrival of the Portuguese in Malacca, Japanese junks seem to have frequented it. The Japanese are not, indeed, named by Barros as among the strangers that resorted to this port, but they are so in the Commentaries of Albuquerque written by his son, who thus describes them under the name of Goré:—"The Gorés (according to the information which Afonso Albuquerque received when he conquered Malacca) state that their country was a continent, but by the common voice it is an island, from which there come, yearly, to Malacca, two or three ships. The merchandise which they bring are raw and wrought silks, brocades, porcelain, a large quantity of wheat, copper, alum, and much gold in ingots (ladrillos), marked by their king's stamp. It is not known whether these ingots be the money of the country, or whether the stamp be attached to indicate that their exportation is prohibited, for the Gorés are men of little speech, and will render an account of their country to no one."

"Of the origin or meaning of the word Goré," says Crawfurd, "as applied to the Japanese, I can offer no conjecture, but it was probably the name, from whatever source derived, which the Malays gave them. The articles which composed the cargoes which the Japanese brought to Malacca, their stamped gold pieces which still exist, and the wheat which no other country to the west of the Archipelago communicating easily with it produces, seem clearly enough to identify the Gorés

with the Japanese."

Jarom Panjang.—A rapid in the Muar R., close to Kwala Gemunchi, Negri Sembilan.

Jarom Pendek.—V. on S. bank of R. Muar in Enas territory, Negr Sembilan.

Jasin.—District and V. in E.C. Malacca, the latter about 5 miles from Chinchin Police station, about a mile from the E. frontier.

Java Wind.—The following quotation, from the J. I. A., Vol. II, pp. 452-3, by Dr. Little, agrees with the compiler's experience:—"According to the natives, we have an angin jawa, or south wind, blowing from the direction of Java, which, according to them, is a most unhealthy wind. The idea is also maintained by nearly all the resident Europeans, and the longer the term of that residence has been, the more fixed is that idea, from the effects being more severely felt. This wind is supposed to blow particularly in the S.W. monsoon, but especially in the month of September; it is felt principally in the town of Singapore and extends as far as a mile inland. In my opinion, there is no such wind peculiar to Singapore, but the hot and clammy perspirations, with the want of sleep with the weak and sickly, and the languor and lassitude of the more healthy on rising in the morning, which forces out of them the remark—'I declare I feel more tired and unrefreshed than when I went to bed,'—all these symptoms are merely the effects of a hot night, from the want of the land breeze, and not dependent on any particular wind or vein of air, or on any particular direction that the sea-breeze blows from; in fact it is nothing but the want of the land-breeze, and the substitution of the sea-breeze, and if that land-breeze did not blow, there would be a continual hot atmosphere, and unrefreshing nights. As I have before mentioned, the land-breeze blows more steadily and longer during the N.E. monsoon; but let the wind chop round to the south, as it did in the end of February and beginning of March, 1848, and we have the same sensations as during the full reign of the angin jawa, or south wind, although it is not recognized as such from being out of season. This hot breeze is, as we are advancing into the interior and cutting down the jungle, advancing also, for those living in localities that were wont to be exempt from it eight years ago, now feel it, only a little less than the inhabitants of the town on the sea-beach. This same hot wind has been felt by Mr. Thomson, the Government Surveyor, in Penang and Province Wellesley. One fact more may, however, be mentioned concerning it, that it does exist where the jungle reaches the sea-beach, and that when

a cleared through country becomes again covered with trees, this hot wind disappears, as the land-breeze extends itself seaward."

Jawi.—The Malay vernacular, generally termed bhûsa Jawi. It also means "the Malay language written in the Arabic character; bastard, or of mixed race." The Arabs apply this term to Javanese, Malays, and other natives of the Archipelago.

Jawi.—The name of an estate, now abandoned, $18\frac{1}{2}$ miles from Butterworth, P. Wellesley, and just below Sungei Bakap. The chimney of the factory presents a singular appearance, a good-sized tree growing from the interior and spreading around its top.

Jawipekan or Jawipukan.—The offspring of Malay mothers and Kling or Bengali fathers. They are a clever race and not ill-looking. Several of the best native Police are Jawipekans.

Jawi Simpit.-V. on E. bank of Krian R. just above Kwala Ijuk.

Jebul Kedah.-V. on N. bank of Sembrong R., N. Johore.

Jelatang.—The name of a small shrub, the leaves of which sting the hand slightly like nettles. It abounds in Naning.

Jelatang.—A good-sized village in the Pigoh district, N. Malacca, about $\frac{1}{2}$ mile N. of Alor Gajah and about 17 miles from Malacca-town. It derives its name from the small shrub mentioned in the preceding paragraph. The V. stands by a hill of the same name.

Jelebu.—The largest, but least important, as regards population, of the old Negri Sembilan, or Menangkarbau States. It occupies an area of 500 square miles and lies to the N. of Sungei Ujong. It is mostly covered with jungle, is somewhat mountainous, and has but few cultivated places. The river of that name falls into that of Pahang. The soil is very poor, tin being the chief product. Jelebu has

now been absorbed by Sungei Ujong.

In 1883, the country, owing to misgovernment and internal dissensions, had become almost depopulated, and the Penghulu asked His Excellency the Governor of the Straits Settlements to send him a British Resident. This could not be acceded to, but in June, 1885, a European Collector was appointed under the Resident of Sungei Ujong to assist the Penghulu in the government of the country, and in the collection of the Revenue. This officer took up the appointment in June, 1885, and thereupon a marked improvement took place in the prospects of the country. Padi planting was renewed extensively, abandoned fruit gardens were reoccupied, some Chinese shops were erected, and 10 tin mines opened. A cart road from the Collectorate to Pantai, 18 miles in length, was constructed, which gave Jelebu direct communication with the Sungei Ujong port at Pengkalam Kompas. The Hon. M. Lister was subsequently appointed British Resident of the Negri Sembilan, which since 1889 has been recognized as a Protected State. Throughout the State tin ore lies only a few feet below the surface and contains a large percentage of metal. The Government consists of the Penghulu, assisted by three "Waris" and five "Lembagas." The estimated Revenue is about \$7,000.

Jelebu Mts.—Separate Sungei Ujong from Selangor, Terachi, Gunong Pasir and part of Rembau.

Jelei.—V. on N.E. bank of Pahang R., W.C. Pahang. Gold is found close by.

Jelentu Ulu.—Part of the Goping Valley, Kinta. Several tin mines have been recently opened there.

Jelli or Jelliye.—Was one of the petty States forming one of the Negri Sembilan (q. v.), situated a little N. of Malacca. It was formerly tributary to that Government, but has been so completely absorbed that its name no longer appears on the map.

Jelutong.—V. and district S.W. of George-town, Penang. V. about $1\frac{1}{2}$ miles S. of the Gaol.

Jelutong.—Hill and tapioca plantation in Batu Berendam district, Malacca, about 9 miles from Malacca-town.

Jembu.—District in N.E. Patani between the Patani and Telupin R. Galena is found in the neighbourhood. It is one of the nine districts into which Patani is divided.

Jemuan.—V. on W. bank of Perak R., 3 miles N. of Kota Lama in N.C. Perak.

Jeram.—V. on E. bank of R. Kampar, E.C. Perak.

Jeram Kling.—V. just above Kota Tampan on W. bank of Perak R., N. Perak.

Jeram Kling.—A dangerous rapid in the Perak R. close to V. of same name.

Jeram Panjang.—A dangerous rapid in the Perak R. close to the V. of Jeram Kling.

Jerei.—V. on E. side of Triang R., W. Pahang, lat. 3° 16' N., long. 102° E.

Jerman Dudok.—V. near the E. bank of R. Pulei, S.W. Johore, about 3 miles from its mouth.

Jerom Segunlin.—A Malay settlement in Perak, up the R. Batang Padang, about 45 miles from Durian Sabatang. Soil very good. Canes, tapioca, sirih, &c., grow to perfection. Mosquitoes and sand-flies very numerous.

Jew's Harp (Ginggong).—Imported only.

Jimantang.—A small V. in the Machap district, N.C. Malacca. A tapioca factory exists here.

Jimantang.—V. and tapioca plantation in Parit Malacca district, C. Malacca.

Johol.—The name of the small inland Malay State of the Peninsula of Malacca, claiming to derive its origin from Menangkarbau in Sumatra, and forming the south-easternmost of the Negri Sembilan. It lies between Malacca and the Malay State of Pahang on the eastern side of the Peninsula. It contains a large lake called Brah, alleged to be 50 miles in length. The waters of this lake are discharged into the China Sea, by the river on which stands the town of Pahang. The country produces gold and tin, but these are not worked to any extent, the mining being confined to the inhabitants, gold especially never having paid foreign enterprise. The whole population is estimated not to exceed 5,000. The State lies in a valley, and its five principal villages are Nuri, Ladang, Inei, Toman, and Benang. It is sparsely inhabited, there being a few Jakuns in various places and the Malays themselves being of low type. Enas (or Inas) and Gemunchi in the N. district were formerly a portion of this State, but are now recognized as two of the Negri Sembilan (q. v.).

Jin.—The spirits intermediate between the Creator and the human race believed in by the *Benua* or aborigines as well as the Malays. Every species of tree has its jin. The most powerful of all is the jin bumi, or Earth spirit, but rivers, mountains, &c., have their jins also. The word is Arabic, as readers of the "Arabian Nights Entertainments" will recognize. The Malays, however, do not seem to endow them with destructive powers only. See HANTU.

Jinricksha.—This "man carriage" has been introduced into the British Settlements from Japan, its original home, viá Hongkong. At present there are about 2,500 licensed in Singapore, 1,340 in Penang, and 120 in Malacca.

Johore.—Position.—The territory of Johore (officially spelt Johor), which now includes Muar, annexed in 1887, includes the whole of the southern end of the Malay Peninsula, from lat. 2° 40′ South of Cape Roumania, and includes the small islands that lie along the coast to the South of 2° 40′. It is bounded on the E. by the China Sea; on the S. by the Straits of Singapore; on the W. by Malacca Strait, the Malacca territory and Johol; and on the N. by Pahang, the R. Endau forming a portion of the boundary on the E. side, the Segamat R. making its N.W. frontier.

HISTORY.-Johore, says Mr. SKINNER, took an important part, in the 140 years' struggle over Malacca, between the Portuguese and the Dutch. At the beginning of this century, the central authority of the Johore Sultanate having been removed from the mainland to the Lingga (Lingin) and Rio (Riau) Archipelagoes, little cohesion remained among the different feudatories. hereditary Bendahara (in Pahang), and the hereditary Temenggong of Johore (in Bulang), had virtually become independent chiefs. The titular authority of the Sultan over them was little more than a survival of the past, though at times it might suit a superior foreign power to magnify it. The Dutch, for example, when ousted from Malacca in 1795, and debarred, by the issue of the Great War, from all hopes of returning there, sought to make some settlement in the Straits. They had already taken Rio under their protection, and they now took possession of the Carimons and other islands as subject territory. Consequently, the Temenggong removed from Bulang to the Singapore river, where he established himself a few months before the expedition to Java (July, 1811). After the restoration of the Dutch possessions at the peace, all the former dependencies of Johore, including Bulang and the Carimons, were comprised, somewhat questionably, in the Netherlands-India dominions; the Johore rule being thereafter confined to the mainland and closely adjacent islets.

The principal changes since then have been those resulting from the establishment of Singapore; from the Treaty of 1855, by which the *de facto* administrative rights of the Temenggong were acknowledged and Johore Bharu became the capital; and from the re-union, as in former times, of Muar to Johore in 1877. The ruler enjoyed the title of Maharaja, not previously known in Malaya, from 1868 to 1887, when H.M. Government recognized his title as that of Sultan.

Geology and Mineralogy.—No thorough geographical survey has ever been executed, but in general terms the territory may be described as ferruginous with numerous tin-bearing streams. Gold quartz has been found in places, but mining of any sort has not been encouraged.

CLIMATE.—Much the same as that of Singapore in the cleared and settled districts.

FAUNA.—The mammals, insects, and reptiles are those of the Peninsula generally. Tigers exist in large numbers.

GOVERNMENT.—The form of Government is that of the usual Malay autocracy; but the freedom and the laisser-faire of its administration are in marked contrast with the usual administrative system of Malay States: rather resembling that of the neighbouring colony, with which it is so closely connected both in the present and the past. A Council of State assists the Sultan, and the police, judicial, and

other departments are modelled upon those of Singapore.

The Sultan's Chinese subjects are by nature indifferent to their ruler, provided their personal independence is secure. Hitherto they have usually proved contented and obedient subjects to the Malay Rajas, even where their race is in a very large majority.

REVENUE.-No returns available.

Topography.—The area of Johore must be nearly 9,000 square miles, and its population is about 200,000, thus giving about 22 to the square mile. The population is almost confined to the districts lying near Singapore on the one side, and Malacca on the other; the interior of the country being covered for the most part by virgin

forest, only partially explored. During the last twenty-five years, it has been, to some extent, opened up under its present ruler, Sultan Abubaker, K.C.S.I.,

G.C.M.G., the descendant of the former hereditary Temenggongs.

Towns.—The capital is the town of Johore Bhâru or New Johore, as distinguished from Johore Lâma, or Old Johore, the former seat of the Sultans of Johore, which was situated a few miles up the wide estuary of the Johore river. The new town is a flourishing little place on the nearest point of the mainland to Singapore, separated from the island by the old Straits, and lying about 14 miles to the north-east of Singapore city, in 1° 26′ N. It contains some 20,000 inhabitants, mostly Chinese, who are within immediate reach of Singapore by a frequent service of coaches.

Within the last few years (says the Singapore and Straits Directory) "a town named Bandar Maharani has sprung up near the mouth of the Muar River, and owing to the personal interest manifested in it by H.H. the Sultan and the Resident of Muar, Unkoo Sulieman, has made rapid strides. There are now about 8,000 inhabitants in the new town. The former temporary attap-covered houses are gradually being converted into tiled buildings of a permanent nature. Amongst the Government buildings are the Istana, Court and Police Stations, Barrack, Gaol, Hospital, Market, Railway Station, and a new Mosque. A steam saw-mill, owned by Chinese, does a good business. A plentiful supply of water by means of pipes from a stream in the hills, about 121 miles distant, has been provided since March, 1890. Good roads are being made, and, to meet the requirements of the Padang district, a Light Railway was completed during 1890 as far as Parit Jawa, a distance of eight miles. A new Istana is now in course of construction on the sea-shore, about a mile from the town. There is steamer communication with Singapore every second day, and with Malacca almost every day; while four steam launches ply up and down the Muar River, going up as high as Bukit Kepong (referred to below), taking passengers and light cargo. The bulk of the gambier and pepper produce is conveyed direct to Singapore by native tongkangs and junks. The produce of the Padang district, viz., betel-nut, is conveyed by the steamers to Singapore. The country surrounding the town of Bandar Maharani is a rich alluvial flat about 30 miles long by 10 miles broad."

There is no other settlement in Johore which can be spoken of as a town: but one or two populous and flourishing villages are found on the south bank of the large River Muar, at Lenga and Bukit Kepong. Padang, a little to the south of the River Muar, is another important and very populous place. Like Johore Bharu, it is not situated up any river, as almost every other important Malay settlement is throughout the Peninsula, but on the sea-shore, which is here exceptionally sandy and open. Padang has a population of nearly 2,000, mostly Javanese,

scattered along the coast, engaged in planting and fishing.

Lenga lies about 40 miles, and Bukit Kepong about 60, up the River Muar. There are in these, as in most places in this district, many Javanese and others engaged in planting pepper, with some Chinese gambier-planters. In the north of Johore the population is, however, chiefly Malayan, and looks to Malacca as its capital. The settlement at Kwala Segâmat is an open and well-populated district in the interior.

RIVERS.—There are three tolerably large rivers—the Muar, the Endau and the Johore—and several smaller ones, of which the Bâtu Pahat and the Sedîli alone need be named. The largest of all the Johore rivers is the Muar on the west coast, which is, in fact, the most important stream in the south of the Peninsula. It takes its rise from among the Negri Sembilan, flowing south-west from Brimbûn (Bërëmbun). The population is chiefly found on the southern side of the stream, in Johore proper, of which it was formerly the natural boundary.

The other large rivers are the River Endau on the east coast, which forms the boundary with Pahang and flows down from the Segamat Hills; and the River Johore in the south, which flows from Mount Blumut, and opens out into a wide

estuary opposite the eastern side of the Island of Singapore.

MOUNTAINS.—The country is, as a whole, less mountainous than any other part of the Peninsula. Its hills are all detached groups, or portions of two interrupted chains, running along the west and east sides respectively; the one from Mount Ophir by Penggalam and Mount Formosa to Pulei and the Carimons group (a geological extension of Johore); and the other from the Segamat Hills and Mount Janing to the Blûmut and the neighbouring hills beyond (Měntáhak and Panti).

The Blûmut Hills (3,300 feet) are the principal mountain group in Johore; giving rise to the River Kahang flowing north—to join the Sembrong, an affluent

of the River Endau.

Mount Ophir, in Muar, 4,400 feet, is, probably, the highest peak in the State. It was a few years ago reckoned the highest in the Peninsula, but this is now, of course, known to be entirely erroneous. Its shape, and its situation near the sea, are remarkable. No rivers of any size take their rise in it; but two of its streams, though small, are of some consequence as marking Johore's northern boundary—the River Chohong, which, with Kesang, divides it from Malacca; and the River Gemas, which forms its Johol boundary.

INHABITANTS AND PRODUCTS.—The population of the State is remarkable for containing a larger number of Chinese than of Malays. The exact figures have not been ascertained, but probably come to 200,000, viz.: Malays, 35,000, Chinese, 150,000, and Javanese 15,000. More than half are to be found within 15 miles of the Singapore Straits. The Chinese are chiefly found as cultivators of gambier and pepper, spread over about this range of country in the extreme southern end of the Peninsula, nearest to Singapore, of which Johore has been described as the "back country." These cultivators go from Singapore, the capitalists for whom they cultivate are Singapore traders, and all their produce and most of their earnings find their way back to Singapore again. European pioneers have, in the last few years, made some experiments in planting, on a large scale, sago, tobacco, coffee, tea, and cocoa. These have been grown in six different districts—Batu Pahat, Pulau Kokob, Pulei, Panti, Johore Bhâru and Pengerang; but it is uncertain how many of them can be considered established industries. The busy collection of gutta which went on in Johore for the Singapore market, from Dr. Montgomerie's discovery of its useful properties in 1842 until the supply was exhausted, deserves special mention; as also the successful working of some large saw-mills for utilizing the great resources of the country in serviceable timber, which are now, however, appreciably diminished. At the present time, the principal exports of Johore are the carefully-cultivated gambier, pepper and sago, and the natural products of timber, rattans and damar. For almost all such produce, Singapore is the port of shipment.

MINERALS.—The only mineral in which the country is really rich is iron. It is nowhere worked, but is found almost everywhere. Some deposits of tin are known in several places and gold in one or two spots. A little tin-mining is worked at Seluang, but no considerable mining is actually carried on, unless the islands of the Carimons be included. Though now politically separated from Johore, they are geologically part of it, and were formerly a dependency of the kingdom.

COMMUNICATIONS.—By coach and steam launch daily to Singapore, whence letters and passengers find easy access to all other ports. A telegraph line has been erected between Johore Bharu and Singapore, and a railway has been proposed.

Johore Bharu.—The present capital of Johore, situated on the N. side of the Strait between that State and Singapore.

Johore Hill or Gunong Merbukit.—The extreme E. point of the embouchure of the Johore River, 661 feet in height.

Johore Lama.—The former capital of Johore, now only a small fishing V., principally inhabited by Bugis. It lies about 9 miles from the mouth of the Johore R. on the E. bank.

Journal of Eastern Asia.—But one number of this Journal ever appeared, and was succeeded by the J. S. B. R. A. S. (q. v.).

Journal of the Indian Archipelago and Fastern Asia, 1847 to 1862, 12 Volumes, 8vo, Edited by J. R. Logan, F.R.S., &c., Singapore, Mission Press.—Commenced under the auspices of the Bengal Government upon the warm recommendation of Col. Butterworth, C.B., then Governor of the Straits Settlements, this useful periodical became, for sixteen years, the repository of numerous papers of interest relating to Malaysia. Mr. Logan was rightly considered one of the best authorities on Malaysia subjects then alive, and his "Journal" was supported by able local and other writers. The information contained in the volumes of the Journal has, so far as it relates to the scope of this work, been condensed and brought up to date in these pages. (See also Logan.) Sets now command £20. A table of contents, arranged for convenience in alphabetical order, is given in the article on Bibliography.

Journal of the Straits Branch of the Royal Asiatic Society.—The Society of which this is the organ, was organized on 4th November, 1877, and published the first issue of the Journal in June, 1878. It is under the management of a President, two Vice-Presidents (one at Singapore and one at Penang), a Hon. Treasurer, and a Hon. Secretary, with a Council of five. Lists of the members and the Council's reports are published annually, two numbers of the journal appearing each year.

Jugglers (Orang silap mata or Penyilap mata).— Malay jugglers are clumsy and seldom met with, and their tricks are of little interest. Hindus are almost the only professional jugglers in the Peninsula.

Jumpoh.—V. on W. bank of Perak R., W.C. Perak, about 9 to 10 miles S.S.W. of Kwala Kangsa.

Jumpol.—The N. State of the Negri Sembilan (q. v.), its principal village bearing the same name. It is divided from Pahang by the R. Sebaling and is watered by five small streams, affluents of the Muar and Sereting Rivers. Senelling, Pila, and Peniak are, after Jumpol, the principal villages. The State produces tin, sapan-wood, damar, rattans, and paddy, the articles being sent to Malacca $vi\hat{a}$ Padang on the Muar River.

Jungle.—The Hindu word jungul has become Anglicized and is always applied to the forest land of the Peninsula. The Malay word is Utan or U. rimba. Secondary jungle, Utan bluker, has sprung up in many places, which, having been once cleared, have afterwards been abandoned. Conspicuous for their tall, straight trunks, the loftiest seen are numerous Kompas trees, the timber of which, however, is too brittle for much use. Palms of great variety and beauty abound, as do also enormous creeping vines and other plants. Low bushes are called Semak or Utan kechil.

Jungle Cock.—The probable ancestor of our game cock. A beautifully feathered bird, extremely pugnacious. They are frequently shot, the huntsman tethering an ordinary game fowl in his boat. The challenge he invariably crows soon brings one or more jungle cocks to the scene, to fall a victim to the gun.

Junk.—From the Portuguese junco, a corruption of the Malay word ajong, abbreviated jong, a ship or large vessel. Europeans have applied the name to the largest of the trading vessels of the Chinese, which are called by the Malays wangkang, while they designate the smaller vessels of the same people top.

Juno.—Name of a valley in Rembau, Negri Sembilan (not marked in map S. A. S.).

Jurong.—District S.W. Singapore between E. Bukit Timah and Pandan on E. bank of R. of same name.

Juru,—R. in Province Wellesley, enters the sea at Bukit Juru after passing between Bukit Tengah and Bukit Minyak. A substantial bridge some 75 yards long crosses it and connects the road between the two places.

The South bank was formerly the site of a sugar estate, now cut up into small native holdings: 500 acres were at one time under sugar-cane and 300 under

betel-nut.

Jus.—District and principal forest reserve in extreme N. of Malacca on the Johol boundary. It is spelt "Juse" on the Government maps.

Jus (Juse on the map).—Small V. in district of same name, about 3 miles W. of Nyalas, N. Malacca.

Jusi.—A mt. in Jumpol, Negri Sembilan.

Jusi.—A hill inside the Johol frontier on the road from Rembau. The road itself is very bad, being an almost indistinguishable track.

Kaban.—An island adjacent to Blair's Harbour, off S.E. coast of Pahang. Formerly a place greatly resorted to by pirates.

Kaf.—The mountains which in the Malay cosmogony encircle the world.

Kajang.—An important V. on the N. side of the Langat R. in S.E. Selangor, lat, 3° N., long. 101° 31′ E.

Kajangs.—Rough mat made of the leaves of the mangkwang or bungkwang utan, a species of pandanus, and used to protect goods in boats and carts from sun and rain. Drivers and boatmen, &c., put them to the same use. A smaller but similar sort of mat made from nipah leaves is called samei. Both sorts are sewn together, and answer the purposes of tents in the jungle.

Kakki (Jap.) .- See BERI BERI.

Kalang, -District in E.C. Singapore, just above Gêlang, and E. of Rochor.

Kali.—The Mahommedan registrar of births, deaths, and marriages under Straits law. Formerly the Government recognized certain magisterial or judicial functions on the part of these officials, but their only importance nowadays under British administration is regarding marriage or divorce, which, however, give them considerable weight amongst their co-religionists.

Kamoy Tengah.-A small V. in the Tabu district, N. Malacca.

Kampong.—An enclosure, collection of houses, village. It forms the prefix to the names of many places in the Peninsula, such as Kampong Bharu, Kampong Rawa, &c.

Kampong Asahan,—V. on S. bank of Selangor R., 18 miles from the coast, but about 23 miles by river.

Kampong Ayer Mati.-V. on W. bank of Perak R., S.W. Perak.

Kampong Bakar.—V. in S. Kedah, about $2\frac{1}{2}$ miles S. of the Muda R. and close to the Province Wellesley frontier.

Kampong Bentan.—V. in Johore on coast of old Straits opposite Selitar, N. Singapore.

Kampong Bharu.—The district lying between the town and the Teluk Blangah district. The Borneo Co.'s wharf is the only noteworthy place of business within its boundaries. It is not shown as existing on recent maps.

Kampong Bharu.-V. on E. bank of Kampar R., S.C. Perak.

Kampong Blukang.—V. on N. bank of R. of same name, W. Singapore.

Kampong Dedap.—V. on W. bank of Perak R., half way between Bota and Blanja, C. Perak.

Kampong Durian.—V. on W. bank of Perak R., about $2\frac{1}{2}$ miles below Bota, W.C. Perak.

Kampong Gajah.—V. on E. bank of Perak R., about $4\frac{1}{2}$ miles above Bandar Baru I., S.W. Perak.

Kampong Gerah.—On W. bank of Perak R., about 9 miles S. of Kedah frontier.

Kampong Jelutong.—V. on road from Thaipeng to Kwala Kangsa, C. Perak, about 3 miles S. of bank of Larut R.

Kampong Jerin.—V. 3 miles S.E. of Larut R., Perak.

Kampong Keloh.—V. on E. bank of Perak R., extreme N. of Perak.

Kampong Ketum. -V. on S. bank of Muda R., E. of Kupang, S. Kedah.

Kampong Kiti.—V. on N. bank of Muda R., Kedah, 2 miles N. of Kwala Kupang.

Kampong Kladang.—Imp. V. on E. bank of Muar R., just N. of Segamut in S. Pahang.

Kampong Kleydang.—V. on W. bank of Perak R., N. Perak, about 3 miles N. of Kwala Plus.

Kampong Kling.—A V. on Mt. Miko in Rembau, Negri Sembilan. About 800 inhabitants. (Not marked in map S. A. S.)

Kampong Labu.—V. on the border of Selangor and Sungei Ujong, extreme S. Selangor.

Kampong Ladang.—A V. at the foot of Bt. Kledang, in the Sungei Bharu Ulu district of Malacca, about 20 miles from the town.

Kampong Loui Telor.—V. at head of R. Loui, a small N. affluent of the Pahang R. in C. Pahang. Gold is said to be found here in large quantities.

Kampong Mahang.—V. in N. Perak just inside the supposed boundary line with Kedah on S. bank of R. and at foot of hill of same name.

Kampong Malayu.—V. on E. bank of Perak R., above a horse-shoe bend about 10 miles S. of Bota.

Kampong Mondok.—V. in extreme S.W. corner of Pahang at the junction of the R. Segamat and Muar.

Kampong Niamong.—V. on W. bank of Perak R. about 4 miles S. of supposed boundary line between Kedah and Perak.

Kampong Nior.—V. on N. bank of a bend in the Selangor R., about 7 miles from the coast.

Kampong Pabei.—V. at the S. end of a spur of hills in W. Rembau, Negri Sembilan.

Kampong Pala.—V. on E. bank of Perak R. about 5 miles above Bota, W.C. Perak.

Kampong Paret.—V. on E. bank of Perak R. 4 miles S. of Blanja, C. Perak. Kampong Pasar.—V. on W. bank of Perak R., N. Perak, about 4 miles N. of Rwala Plus.

Kampong Paya.—V. near head of R. Burong in W. Penang, S. of Balik Pulau district.

Kampong Penghulu Gondong.—V. on N. bank of Pahang R., W.C. Pahang.

Kampong Perlis.-V. on W. coast of Penang in Pondok Upeh district.

Kampong Pianggu.-Small V. on W. bank of Endau R., S.E. Pahang.

Kampong Pingi.—V. in C. Perak on E. bank of Kinta R. just above Kinta.

Kampong Rafri.—District S.W. of Relau in S. Penang.

Kampong Sabatang.—V. about 7 miles below Durian Sabetang on the E. bank near the mouth of the Perak R. in S. Perak.

Kampong Sadong.—V. on W. bank of Perak R. about 4 miles below Blanja, C. Perak.

Kampong Senang Hati.—V. on E. bank of Perak R. about 3 miles N.N.E. of Kota Tampan.

Kampong Sungei Limau.—V. at head of R. of same name on coast of C. Perak,

Kampong Tambang.—Small V. near mouth of Endau R., S.E. of Pahang.

Kampong Tampayan.—V. about 7 miles from the W. coast on S. bank of R. Tiram Batu, S.W. Johore.

Kampong Telok Rabia.-V. on E. bank of Kurau R., N.W. Perak.

Kampong Tengah.—A sparsely inhabited kampong in Kwala Sungei, Bharu district, Malacca, on the high road from Linggi to Malacca.

Kampong Tengah.-V. in Sungei Bharu Ulu district of Malacca.

Kampong Tengah.—V. about 4 miles above Bandar Baru I., in the Perak R., S.W. Perak.

Kampong Tepus.—V. on W. bank of Perak R., C. Perak, opposite Blanja.

Kampong Terah.—V. in N. Perak on the E. bank of Ijuk R.

Kampong Toh Saret.—V. on E. bank of Perak R. about 7 miles below Bota in W.C. Perak.

Kampong Trong.—V. at the source of the Trong R., a small stream falling into a creek of the sea called Kwala Trong, 8 to 9 miles S. of Kwala Larut, W.C. Perak.

Kampong Tuan (marked "Tucan" on the map S. A. S.).—V. on side of old Straits, Johore.

Kampong Wau.—Small V. near the source of the Chandriang R., E.C. Perak.

Kamuning.—A small V. in the Tabong district, N. Malacca.

Kamuning, Bunga.—A flower resembling that of the orange in look and scent.

Kanchei.—V. on S. bank of Pahang R., C. Pahang, about 6 miles E. of Cheno.

Kanching.—V. in the extreme E. of Selangor at head of R. of same name. Tin mines in the vicinity. R., range, and hill of same name.

Kandang.—Large V. and Police station about 3 miles E. of Malacca-town.

Kandang Gajah.-V. 41 miles E. of Merlimau, S.E. Malacca.

Kandang Lembu.-V. on E. bank of Kinta R., at Kwala Sei Pari, C. Perak.

Kanggar.—V. about 5 miles from the coast and N. of the Purlis R., N.W. Kedah.

Kangka Perhentian Kechil.—Hill 2 miles S.W. of Gunong Pulei, S. Johore.

Kangkah.—V. close below Lim Chu Kang in W. Kranji, N.W. Singapore.

Kaolin.—White porcelain clay abounds in Singapore, and some forty years ago was the subject of special investigation by the Government of India. Should the apparently inexhaustible mines of South England ever give out, this clay would become an important article of commerce. It is found also in the Peninsula, but nowhere, so far as is known, in very large quantities.

Kapas.—See Cotton.

Kapok Fibre. -- See Fibres.

Karimon, correctly Krimun.—There are two groups of islands of this name, one at the eastern end of the Straits of Malacca, and another on the northern coast of Java. Included here as the former are sighted by all vessels making Singapore from the N.

Karu.—One of the districts of Rembau, Negri Sembilan, under a Penghulu and four Sukus.

Kassing.—A V. on the R. Endau, 5 miles from the mouth, of no particular importance. The people reputed to be uncivil to strangers.

Kati.—Frequently written "Catty," a weight of 1\(\frac{1}{2} \) pounds avoirdupois; the kati contains 16 taels, and 100 katis make a pikul, or picul, literally "a load." The tael, the kati, and the pikul are native words, but the weights they express are Chinese.

Kayong.—V. on the Purlis R., N.W. Kedah, about 5 miles from the coast.
Kayu (Wood).—For a list of the woods known to exist in the Peninsula, see
Woods.

Kayu Mengapit.—A gambling instrument of wood with places to contain two cocoa-nuts, one for each player. The instrument is struck by a man with a hammer, and the one whose nut is broken loses.

Kayu Puteh Oil (Malaleuca leucodendron).—See Oils.

Kedah* (formerly written "Queda," the Portuguese spelling), called Sai by the Siamese, to whom it is nominally tributary, is a State, bounded on the north by Ligor (part of Siam), on the east by Patani, on the south by Perak, and on the west by the sea and the strip of land called Province Wellesley. It lies between 5° 30′ and 7° 4′ N. lat., is about 130 miles long by 30 to 40 miles broad, and has a continental area of about 5,000 square miles, or, including that of a chain of islands off the coast, which comprise four (Langkawi, Buton, Ladas, and Trutao) of considerable size, about 6,000 square miles in all. The meaning of the name is "elephant trap."

The State is divided into three provinces—Setul, Perlis, and Kedah proper; the first-named being the most northerly, and Perlis in the centre.

HISTORY.—The history of this State, observes CRAWFURD, as of all the others of the Peninsula, except Malacca, is involved in obscurity. According to the "Annals," the Rajas of Kedah, at a date long anterior to the Portuguese occupation of Malacca, proceeded to that place to receive the *nobats*, or drums, forming the insignia of royalty, as it was considered tributary to the Kedah State. This, however, is doubtful. Col. Low discovered in the forests some remains of temples, and some inscriptions in the Pali character, and which, consequently, indicated not Malay but Siamese occupation. It would appear that even in the beginning of the

^{*} By the Hon. A. M. Skinner, C.M.G.

sixteenth century, the Malays had been but partially converted to Mahommedanism. The earliest authentic information we have of Kedah is from the Portuguese writer, Barbosa, whose manuscript is dated at Lisbon in 1516, and he describes it as "a place of the kingdom of Siam." "Having," says he, "passed the aforementioned country of Tenassire, and proceeding along the coast of Malacca, there occurs a seaport called Queda, to which an infinite number of ships resort, trading in all kinds of merchandise. Here come many Moorish ships from all quarters. Here, too, is grown much pepper, very good and fine, which is conveyed to Malacca, and thence to China."-Ramusio, Vol. I, p. 318. Kedah, in common with all the other States of the Peninsula, has been immemorially tributary to Siam, and being, with Patani, the nearest to it, has been most subject to its direct influence. In token of its subjection, it sends once in three years an offering consisting of an artificial "flower of gold," which is the literal meaning of the name of this offering, Bunga-mas, receiving, however, in return handsome presents of greater value. Notwithstanding this dependence the Raja, in 1785, alienated to the British Government a portion of his dominions, namely, the island of Penang, and subsequently a further portion of the mainland, all without the sanction or even knowledge of his liege, the King of Siam, but still without the right of alienation being disputed. By the cession of Penang, the Prince of Kedah lost some of the native foreign trade which used to frequent his ports, but this was more than counterbalanced by the annual stipend paid to him by the British Government, and by the demand which the new Settlement gave rise to for the produce of his country. The revenue which the prince received, including a stipend from the British Government, had amounted in all to 82,000 Spanish dollars, or near £18,000—a large sum for a Malay prince. In 1821, the Raja was either refractory. or alleged to be so, and the Siamese invaded his country, overran it, and, after several years, abandoned its direct administration. The prince fled to the British for protection, and received an asylum. His successor was left unmolested by the Siamese, and on very few occasions have the latter since interfered with the internal administration of the Government, although they claim the right of nominating the Raja.

Geology and Mineralogy.—The geological formation is chiefly granitic, but there are large areas of alluvial soil, there being more level land in Kedah than in any other State in the Peninsula. Limestone crops out in numerous places. Its highest hill, known as Kedah Peak, or Gunong Jerei, is about 4,000 feet high, and forms a striking object viewed from Penang or Province Wellesley. Gunong Geriyang (called by us Elephant Hill, from a fancied resemblance to that animal, Geriyang, however, being the name of a large forest tree) is another notable feature

in the landscape, and is celebrated for its magnificent stalactite caves.

MINERALOGY.—The metals tin, copper, and iron are found in fair abundance. Iron is dug in the district of Nanah lying N. of Alos Star (the residence of the Raja, on the S. bank of the Kedah R.) and S. of the R. Purlis, which forms a portion of the boundary between Kedah and Siam. A little copper is worked in the same neighbourhood. Tin is found in Gunong Jerei, already noticed, in large quantities, Chinese being the chief miners. Gold is only found on the Patani border in the Jalo district, and galena mines exist at Pala, on the Kedah bank of the Patani R. It is probable that foreign enterprise might develop important mines. Diamonds are asserted to be found in good quantities in the same localities as gold, but this requires verification.

CLIMATE.—There is no appreciable difference between the climate of Kedah and of Penang or Province Wellesley (q, v). The absence of high ranges in the

N. leads to greater dryness.

FAUNA.—Tigers, tapirs, wild pig, and all the other mammals common to the Peninsula, exist in Kedah, which also (as its name implies) abounds in elephants, which are not only captured, but bred in captivity. Cattle and buffaloes are abundant. Elephants are both used and exported to the Coromandel coast. As regards Entomology and other branches of natural history, the State has yet to be fully explored, and the same remark applies to its Botany. The horse is not found in Kedah. The coast abounds in fish, of which the bawal putch (white pomfret) is one of the most esteemed.

AGRICULTURE.—Rice is the staple product, and is cultivated to an extent that permits of large exports to Penang. In other respects, Kedah resembles the rest of the Peninsula. Sugar has of late been grown, the mills being worked by oxen or buffaloes. Fruits are largely cultivated and exported to Penang.

PRODUCTS.—In addition to rice and sugar, tobacco is grown for domestic consumption. Cotton and pepper, as also cocoa, cinnamon, &c., would probably flourish. Fruits of all kinds abound, as in the neighbouring States, and the mangosteen and orange attain great perfection.

TRADE.—Rice and tin alone are very important items, but fruits, fowls, ducks, birds'-nests, hides and bats' dung, &c., are largely sent to Penang and the Province.

Iron of indifferent quality is also exported to Penang.

POPULATION.—The inhabitants consist of Malays, of Samsams, or Siamese converted to Mahommedanism, and speaking a mixed language of Malay and Siamese; of the Peninsular Negritos, of mestizo Telingas speaking both Telugu and Malay, and of a very few Chinese. Before the Siamese invasion and conquest of 1821, the country is believed to have had a population of 50,000, which in 1839 was reduced to 21,000, the rest having been either killed in action, perished by disease and famine, or taken refuge within the British territory. The last of these numbers gives a relative population of less than five inhabitants to the square mile, and even the higher of one under twelve. Indeed, at all times, the greater part of the country seems to have been little better than a primeval jungle. The present population was estimated by Bock at from 400,000 to 500,000 souls, but this is really guesswork; 150,000 is probably nearer the mark. All that is certain is that it has immensely increased since the Siamese occupation terminated, our own annexation or protection of adjoining territory having largely contributed to maintain peace and so allow the natural increase to take place.

maintain peace and so allow the natural increase to take place.

Government.—The Government consists of the Yang-di-per-tuan, or Raja, assisted by a Council of State of seven members, and a clerk. There is also a Secretariat, Mantri's Office, Treasury, Public Works Department, Supreme and Minor Courts, Government Land Department, &c., all appointments, except those of Interpreters, Head of the Police, and Medical Officers, being filled by natives.

The Raja is hereditary sovereign.

TOPOGRAPHY.—The boundaries of the State have already been defined. It is 120 miles in length, with a breadth of from 30 to 40 miles, comprising an area of 5,000 square miles. It contains no lake, but some twenty-six rivers, six of which are of considerable size, but all of them obstructed at their mouths by bars, over which at spring tides there is not above 9 feet of water. The most considerable of them is that on which the chief place stands, a mere village, and of this the embouchure is in lat. 6° 5′ N. Between the mainland and Langkawi and the other islands, indeed, there lies an extensive mud-bank, so that vessels of any considerable burden cannot come nearer the coast than four miles.

The principal hills or mountains are mentioned above, but three others are given on the most recent maps—Bukit Jernah, Bukit Besar, and Bukit Jalo. The southern district has a few hills of low elevation. The capital is Alos Star, the residence of the Raja, on the S. bank of the Kedah R., a fort and village known as Kota Star being on the opposite bank. Alos Star is about 7 miles from the mouth of the river. From Padang Salla, about 3 miles from Kota Star, a canal has been cut to Gunong Jerei, a distance of over 16 miles. Fifteen miles beyond Gunong Jerei is Kwala Muda, the village next in importance to Alos Star. The canal runs through one of the alluvial plains above referred to.

COMMUNICATION WITH OTHER PORTS.—Three steam launches ply between Kota Star and Penang, the voyage taking about seven hours. One launch runs daily each way.

Keeling Islands.—See Cocos.

Kelang.—The word used in Province Wellesley to mean mill (sugar, rice mills, &c.). The same word (but in this case Chinese) is also used for fishing stakes.

Kelantan.—Position.—Between 5° 40′ and 6° 20′ N. lat. with a coast line of about 50 miles, bounded on the N. by the China Sea and Patani, on the E. by Tringganu, on the S. by Pahang, and on the W. by Reman, Perak and Patani.

HISTORY.—Kelantan is known to have existed as an integral State at the close of the fifteenth century and before the arrival of the Portuguese; and in the Malay Annals it is specially stated that, during the time of Mahmud II, of Malacca, A.D. 1477, Kelantan was a kingdom "more powerful than that of Patani." Like Tringganu, Kedah and Patani, it has, from time immemorial, been harassed by the demands of Siam; and, according to the official statement of Mr. Anderson, Political Agent in 1825, repeatedly solicited, in the early days of Penang, the protection of the British Government and the establishment of an English factory,

offering very considerable advantages.

In 1832, the Chief of Patani, upon the invasion of his country by Siam, fled to Kelantan, but was delivered up to the Siamese Praklang, who repeatedly ordered the Raja of Kelantan into his presence. With these mandates the Malay chief did not deem it prudent to comply, but was eventually compelled, it is said, to propitiate his foe by a large present of specie and gold dust. Newbold pointed out at the time that this was a violation of the 12th Article of Major Burney's Treaty of 1826, which stipulates that "Siam shall not go and obstruct or interrupt commerce in the States of Tringganu and Kelantan. English merchants and subjects shall have trade and intercourse in future with the same facility and freedom as they have heretofore had; and the English shall not go and molest, attack and disturb those States upon any pretence whatever." What little trade and intercourse now exist have passed from the hands of English merchants to those of Chinese and Native traders.

Geology and Mineralogy.—The interior is believed to consist to a large extent of flat country traversed by long but shallow rivers. Tin, gold, and lead are found, the export of tin being considerable. Kelantan gold is much esteemed by the natives.

CLIMATE.—The same as that of the neighbouring States, but slightly cooler

than on the W. side of the Peninsula.

FAUNA.—No details are to hand as to natural history or botany, but the jungle produce is the same as that of the other native States.

AGRICULTURE, PRODUCTS, &c.—A good deal of pepper is grown by the Chinese,

and rice is cultivated to a large extent. Details, however, are wanting.

TRADE.—Pepper and jungle produce with tin and gold form the principal items. Chinese from Singapore visit the coast in the S.W. monsoon and return at or after the change.

POPULATION.—This is estimated by the natives at over half-a-million, but 150,000 is probably nearer the mark. The State is a prosperous one, and its population undoubtedly exceeds that of any of the native States on the E. side of the Peninsula. Jakuns inhabit the S. districts.

GOVERNMENT.—That of a practically independent Raja who acknowledges fealty to Siam by the periodical transmission of a bunga mas, or golden flower. No

particulars as to REVENUE are obtainable.

TOPOGRAPHY.—The area of the State is about 7,000 square miles. It is watered by two long but rather shallow rivers—the Kelantan and its large tributary the Lebih. In the South is a range of Mts. running N.W. and S.E., which MACLAY

believes to be the highest in the Peninsula, but so far as is known no other hills of any particular elevation exist.

COMMUNICATION WITH OTHER PORTS.—By sailing boats and prahus only from the coast or $vi\hat{a}$ the Pahang R. to its entrance some 140 miles of lat. further S. than the mouth of the Kelantan R. (By Hon. A. M. Skinner, C.M.G.)

Kelantan.—The capital of the State of that name near the mouth of Kelantan R., which here forms a delta. It is a large and flourishing place with considerable trade; population estimated at over 20,000. The position given on the map is probably only approximate, as the entire country is little known geographically.

Keliling Selat.—V. on W. bank of R. Sembrong, N. Johore.

Kemaman.—R. and district. The latter as now marked on the maps extends from 4° 39′ to 5° 20′ N. lat. It is said to have formerly been a district of Pahang, but is now practically incorporated with Tringganu, of which it now forms the N.E. portion. Its N. boundary is the R. Tringganu, and its S. the R. Kemaman. It would, however, appear that formerly the same name was applied to a district extending far more to the S., now shown as part of Tringganu. The Kemaman of the present day is divided into the smaller districts of Paka, Dûngûn and Marang, which are each under a chief subordinate to Tringganu.

The town is only a mile or two from the mouth of the river of the same name, in lat. 4° 15′ N. It is a settlement of modern origin, and probably owes its existence to the tin mines, discovered early in the century in the neighbourhood. The district is scarcely 1,000 square miles in area; and is, or until recently was, under the direct control of a separate chief, under Tringganu. Its population was estimated in 1839 at 1,000 Malays and Chinese. It produces tin, a little gold, camphor, ebony, &c. According to a Mr. Medhurst, who visited the place in 1828, Kemaman at first yielded a considerable revenue to the Sultan of Tringganu, but afterwards the mines failed, and the Chinese dispersed. It is believed to be scarcely more prosperous at the present time than it was in 1839.

Kenaboi, Orang.—Apparently a synonym for Orang Sakei (q. v.).

Kepala Batas.—The other name of Samagaga Dalam (q. v.), P. Wellesley-Kerbau.—Small V. in the Parit Melana district, C. Malacca, about 1 mile from Durian Tuggal.

Kerbu.—V. at junction of R. Serdang with R. Plus, N.E. Perak.

Kernei.—V. on the Rui R. (the W. source of the Perak R.), S.E. Kedah.

Kessang.—District and V. in E.C. Malacca; the latter with a police station, and situated just above the forest reserve N. of Ayer Panas. Tin mines formerly existed in the neighbourhood.

Kessang R.—The E. boundary between Malacca and Muar. Tin mines were opened in the Chinchin district, on the left bank, in 1847, and some 2,000 Chinese were then employed. But little, however, is now found.

Kessang Tuah.—A small V. 2 miles E. of Kessang.

Ketam Luar and Ketam Dalam.—Two V. on tongue of land forming the N. shore of the entrance to Perak R., S.W. Perak.

Ketiar.—The name of a fruit found in Perak, from which the natives make oil. It does not appear to have been botanically identified.

Khatib.—The preacher in a mosque. He ranks below the Imam, who leads the prayers.

. Kiligan Tebu.—Small V. on border of Sungei Bharu Ulu district, Malacca W.

Kinchei.-V. on N. bank of Pahang R., E.C. Pahang.

Kindin.—Large V. on E. bank of Kinta R., about 14 miles N.E. of Kinta. Tin mines exist in the vicinity.

Kingfisher.—Several species of this beautiful bird are found in the Peninsula. Happily their skins have not yet become an article of traffic as in China, whence tens of thousands are annually exported for ornamental purposes.

Kinta.—The W. district of Perak, the river of that name flowing through it. It is in charge of a magistrate and collector, whose head-quarters are at Batu Gajah (marked as the town or village of Kinta in many maps), with assistants at the important villages of Gopeng and Ipoh. The district is most flourishing, and its administration reflects great credit upon the officers under whom it has reached its present position. A railway will shortly be completed from Batu Gajah to Teluk Anson, and this will still further develop the resources of this portion of Perak. Tin is the principal product, and Gopeng the chief centre of production.

Kites (Layang-layang).—Although the Malays do not equal the ingenuity of the Chinese in the art of kite-flying, they are fond of the pastime. The best kites known by the words above given are reputed to be made at Palembang. Cotton paper is used for the purpose. In the Peninsula a kite is called wau.

Klama. - A small V. in the Mak district, N. Central Malacca.

Klana.—A title implying jurisdiction on the mainland. It was conferred on a former chief of Sungei Ujong by the then Sultan of Johore.

Klang.—The Residency of Selangor, about 12 miles from the mouth of the Klang R.

Klang, Lower.-V. 3 miles from the mouth of Klang R. on the S. side.

Klebang Besar.—V. about ½ mile N. of the high road from Malacca-town to Tanjong Kling.

Klebang Kechil,-Kampong immediately W. of Malacca-town.

Kledang.-V. on R. of the same name on the Kedah-Reman frontier.

Klian.—V. between the Patani and Telupin R. about 14 miles from E. coast of Patani.

Klian Bharu.—V. 3 miles N.E. of Thaipeng Kota in W.C. Perak, about 10 miles from the coast. Tin is found in large quantities amongst the surface gravel, and gold and galena exist in small quantities.

Klian Intan.-V. on E. side of Gunong Titi Wangsa, S. Kedah.

Klian Mas.—V. on E. bank of Telupin R. about 29 miles from its mouth, N.E. Patani.

Klian Mas.—V. in C. Kelantan on R. of that name. Gold is reported to be found in the vicinity.

Klian Paku.—V. about 8 miles W. of G. Batu Pulei, S. Perak, on the W. bank of Bidor R.

Klian Pao.—V. 2 to 3 miles N.E. of Thaipeng Kota on Larut R., W.C. Perak.

Klian Pechal.-V. at N.E. end of Kampar district, E.C. Perak.

Kling.—The name given by the Malays (J. I. A., Vol. II., p. 10) to the Telinga nation of Southern India, and which appears to be a corruption or abbreviation of the genuine name of the country of this people—Kalinga. So many have settled in Malaya that they form an appreciable portion of the population. Being the only Indian nation familiarly known to the nations of the Archipelago, the word is used by them as a general term for all the people of Hindustan, and for the country itself. The trade and intercourse of the Telingas with the Archipelago

is of great but unascertained antiquity, and still goes on. Many Telingas have, from time to time, settled more particularly in the western parts of Malaya, as in Sumatra and the Malay Peninsula, and their mixed descendants are tolerably numerous. In Singapore, for example, the Telingas form about one-tenth of the population, and in Penang they are even more numerous. It was this people that, in all probability, introduced the Hindu religion, and they seem also to have contributed materially to the spread of Mahommedanism, the majority of the settlers being at present of this persuasion. In the beginning of the sixteenth century, the Portuguese found them carrying on trade at Malacca, and BARBOSA, who calls them Chetijs (obviously the "Chitties" of to day), describes them as "wealthy merchants of Coromandel, who traded in large ships."

A propos of this subject, two interesting communications appeared in the Penang Gazette under date of 16th September, 1887, the greater portions of which

we quote hereunder. VILAYAT writes :-

In my edition of ELPHINSTONE'S "History of India," p. 242, the following

passage occurs :-

"Another branch of the tribe of Châlukya * * ruled over Calinga, which is the eastern portion of Telingana, extending along the sea from Dravida to Orissa."

"GARRETT, in his 'Classical Dictionary of India,' says: Kalinga is the name of the sea-coast west of the mouth of the Ganges with the upper part of the Coromandel Coast. The inhabitants are called Kalingas."

"Forbes, in his 'Hindustani Dictionary,' says: Kaling, the name of a country, especially applied to a district on the Coromandel Coast between Cuttack and

When I first heard the name Kling, I considered it a misnomer, but have

changed my opinion for various reasons:-

(1.) The people we speak of as Klings cannot properly be called Hindus, as the majority in the Straits will, I believe, be found to be Mahommedans. This disposes of the religious name.

(2.) They cannot be called Tamils, as very many, if not most of them, are

Telugus (Telingana); thus language fails to meet the difficulty.

- (3.) Coromandels might be used, but this word is only known as a geographical expression by the Europeans. Natives of India do not use it, that I am aware of.
- (4.) Dravidians might meet the want of a common name (one in common I mean), but philologists would be horror-struck at the desecration of one of their pet words. Nor is it a word in common use among natives of India.

We are thus compelled to fall back upon the despised word Kling, which, I

think, may be satisfactorily accounted for on the following suppositions:-

(1.) Penang was originally a part of the Bengal Presidency, or rather was ruled from Bengal.

(2.) Officials from Bengal must have brought Bengali servants with them.

(3.) These, when the first importations of natives of the south-east coast of India were brought over, would class them as Kaling; that is, as people coming from the districts known to them as Kaling, south of Bengal.

(4.) The next step would be easy—Kaling has a short "a"; omit it altogether (there are many similar instances in philology), the result is Kling, applied to all

natives south of Bengal.

The above appears to me the probable derivation of the name as used here. It should be observed that Former gives the word as Kaling and not Kalinga, as spelt

by other authors from whom I have quoted.

"SCAREBŒUS" adds the following remarks:—The word is a most interesting one, and points to a connection between the Straits and India reaching nearly as far back as the time of ALEXANDER THE GREAT, and the only trace of which remains in its continued application to natives of Southern India. It is not used only in the Straits, but all over the Dutch and Portuguese possessions in the East Indies, and its universal application in these parts points to a large trade having been carried on between Southern India and the Eastern Seas. It is erroneously derived from Telinga or Telingapatam, once a port on the Madras Coast, from which the sea has receded, and which is now an inland town about 2 miles from the shore. The name of this port signifies that there was a community or nation bearing the name of Talingas or Kalingas, and it is from the name of this people that our word is derived. Indian archæologists are well aware of the existence of a large nation in Southern India who worshipped Siva, and who called themselves Kalingas. Some record of this nation is found in the oldest of known Indian inscriptionsthose at Khalsi-which are probably the most interesting in the East, as demonstrating the connection of India and Greece, by their mention of the names of PTOLEMY and ALEXANDER. Evidences of this connection are abundant in Greek literature; but these are the only clear ones on the Indian side. The country that this nation inhabited is now known as Northern Circars—the Telugu Coast of the Bay of Bengal. No doubt emigration and trade from this part of India was then more extensive than any other, and the word Kalinga was applied in general to all emigrants from India. In the Journal of the Indian Archipelago, in an article on the Siyara Malayu—a collection of Malay legends—it is stated the word Kaling is used generally for India. The Klings of the Straits do not come so much from the Northern Circars as from districts about Tanjore, and from purely Tamil districts; and the classes who take domestic service in the Straits-Hindus or Lubbais-are never known to serve Europeans in India. Two quotations which I have found with reference to the word are of great interest; one is from the translation of Mr. SENART of the Khalsi inscription, and is as follows: - "Great is Kalinga, conquered by King Pujadasi, beloved of Devas. Hundreds of thousands have been carried Immediately the King, on learning of the conquest of Kalinga, turned to religion, &c." This dates about 250 B.C. The other is from a French translation of a narrative of a Chinese traveller, HUEN TSIANG (Pelerins Bouddistes); it runs:-"After having travelled 1,500 li, he arrived at the Kingdom of Kalinga. In ancient times the Kingdom of Kalinga possessed a dense population; insomuch that in the streets shoulders rubbed and waggon wheels jostled; if the passengers but lifted their sleeves an awning of immense extent was formed " The narrative of these travels was written by the traveller about 640 of our era, and though travellers' tales are proverbially liable to being taken at something less than par value, this ancient Chinese traveller seems, in the opinion of his French translator, to have been not only a prince among pioneers, but an observant and truthful narrator of what he saw.

Klubi. - See BERTAM.

Klubi.—An important V. on N. side of Muar R., above Gemencheh.

Kobak.—V. in Sungei Ujong between Jumpol and Selangor.

Kohong.—V. on the road from Chinchin to Chaban, E. Malacca, about $\frac{1}{2}$ mile on the W. bank of R. Kessang.

Komang.-V. 1 mile S. of Chaban in same district, E. Malacca.

Korinchi.—Immigrants from the interior of Sumatra who have settled in Perak. They are more industrious than the Perak Malays, and will not undertake menial work. They speak ordinary Malay, but write it in their own character, which Mr. Crawfurd thought was the original alphabet of the Malay people.

Kota.—A fort or stockade. A common compound in the names of places.

Kota.—A V. on S. bank of Prai R. about $4\frac{1}{2}$ miles from Butterworth, Province Wellesley. Its inhabitants have the reputation of being gamblers and smugglers.

Kota Aur.—Is a V. 13 miles 2 furlongs from Butterworth, Province Wellesley, on the British side of the Muda R., with a population consisting chiefly of Malays employed in agriculture. The bank of the river is here well covered with fruit-trees, more especially the cocoa-nut, and fine clumps of bamboo are seen at intervals. Many houses, singly or in groups, are indeed scattered pretty plentifully on both sides of the river hereabouts, the greater number, however, being on the British side. The village lies a little more than $\frac{3}{4}$ mile above Bindahari.

Kota Bharu.—An important V. on the Kinta R., and the principal place of embarkation from S. Kinta.

Kota Bharu.—V. on S. side of entrance of Kelantan R., Kelantan.

Kota Bharu.—V. on E. bank of Patani R., in the Sai district, N.E. Patani.

Kota Blanda.—V. on E. side of Perak R. about 6 miles below Durian Sabatang.

Kota Lama.—Important V. on W. bank of Perak R., N.C. Perak, about 4 miles N. of Kwala Kangsa.

Kota Lumut.—V. on W. bank of Perak R. in S.W. Perak, about 5 miles above Durian Sabatang.

Khota Pagar.—V. on E. bank of Perak R. about 7 miles N. of Bota, W.C. Perak.

Khota Raja Itam.—V. at mouth of small R. of same name, C. Dindings.

Khota Raja Lela.—V. on W. bank of Patani R. about 11 miles N. of Pala Galena mines in N. Patani.

Kota Siam.-V. on C. coast of Dinding Ten.

Kota Star or Alor Star.—The capital of Kedah on N. bank of Kedah R., N. Kedah.

Kota Stia.—V. on N. bank of entrance of Perak R. about 7 miles from the entrance.

Kota Tampan.—Important V. on W. bank of Perak R., N. Perak, about 20 miles N. of Kota Lama.

Kota Tinggi.—V. on E. bank of Johore R. about 7 miles N. of Johore Lama.

Kow.—V. on N. shore of Patani.

Kramat.—An ancient burial place, many of which exist throughout the Peninsula. That of Dato Dalang in Naning used to be largely visited by wealthy Chinese from Singapore, buffaloes, goats, and fowls being offered as sacrifices to ensure good luck.

Kramat Hantu.—V. and stockade on S. bank of Bernam R., N. Selangor, on a bend S. 4 miles below its junction with the R. Slim.

Kranji.—The N.W. district of Singapore, divided by a river of same name. The word is usually applied to the small V. with Police station and Government bungalow on S. side of the strait opposite Johore Bharu.

Kretang R.—Small E. affluent of Johore R. just below Johore Lama.

Kretow.—V. on W. bank of Pahang R., C. Pahang.

Krian Estate, Province Wellesley.—Lies on the N. bank of the Krian opposite Caledonia Estate, and is 22 miles from Butterworth. It was originally opened by foreign enterprise, but is now Chinese owned. Sugar-cane is the staple. Admirable bricks and draining pipes were made here at one time under European supervision.

Kris.—The abbreviation of káris, a dagger or poniard, the universal weapon of all the civilized inhabitants of Malaya, and of a hundred different forms, short

The word is probably Malay. The blade varies in width from 1 to the hilt and scabbard. Men of all ranks, from the prince, wear this weapon, and those of rank, when full dressed, two man tone. The word is probably Malay. The blade varies in width from 1 to the beam the length from 12 to 18 inches. The finer blades are veined and the length from 12 to 18 inches. The finer blades are veined and the length from 12 to 18 inches. The finer blades are veined and the length from 12 to 18 inches. The finer blades are veined and the length from 12 to 18 inches. The finer blades are veined and blades and always kept very keen. The handles have a peculiar curve, which is, however, convenient for grasping daggerwise. They are made of gold, alver, ivory, abony, kamuning wood, or buffalo horn, and are often carved and polished with great taste. The ornamental part of the hilt is called sampiran, the sheath sarong, and the ferule buntul. The sheaths, like the handles, are of various materials and often ornamented with ivory, gold, &c. The sheath or sarong is of wood and in three parts; the sampir, or crosspiece near the hilt, usually of kamuning wood; the batang, or sheath proper, commonly of senna wood; and the buntut, or end thimble, of ivory, metal, or ebony. A gold-covered sarong is called trapang.

The proportions of the *kris* are a matter of superstitious care; if not correct it is considered unlucky to own it. The best *krises* are reputed to come from Celebes and Menangkarbau in Sumatra. It is the national weapon of execution.

(See Execution and PAMUR.)

There are many varieties of the kris, known as Kris pandak, Kris panjang, Kris sampana, Kris sapukul, Badik and Tumboh lada, the latter slightly curved, &c. A charmed kris is called Kris betuah.

Kroh.-V. on E. side of Gunong Titi Wangsa, S. Kedah.

Krosang.—The brooch worn by Malay and Chinese women in the Straits and Peninsula. It consists of a flat hoop of gold or silver, often set with precious stones. A pin at the back like that of the European brooch secures it to the dress.

Krubong.-V. in the Blimbing district, about 8 miles N. of Malacca-town.

Kruing (or Wood Oil).—Obtained by cutting a hole to the heart of the tree, to which fire is then applied, the oil gathering in the hole. After being thoroughly boiled, it forms a good varnish and paint oil, and is much used for coating rough woodwork, sampans, &c.

Kru Rupa.-V. in Tampin, about 3 miles from the Malacca frontier.

Kubang Badak.—Small V. on W. edge of Jus forest reserve, N. Malacca. Kubang Semang.—A V. 7 miles 1 furlong from Butterworth, Province Wellesley. A bridge here crosses the Sungei Derhaka, a small stream scarcely to be called a river. From this point there is a clear view over the paddy fields to the coast. Large boats were formerly able to come up the creek to the bridge, but its bed has lately become choked with weeds and rubbish. From the bridge the road runs nearly south, skirting Bukit Mertajam, through fruit gardens all the way, which extend far up the side of the hill. This is the most picturesque piece of road in the Province.

Kuin Babi.—Small V. 21 miles E.N.E. of Ayer Mulei, S. Malacca.

Kuli.—V. on N. bank of Pahang R., at foot of a range of hills in W.C. Pahang.

Kulim.—V. on R. of same name, just E. of Province Wellesley frontier, in S.W. Kedah. A favourite place for coolie deserters from estates in the Province. A large number of Chinese of bad reputation are settled here, and the Penghulu has much difficulty in keeping order.

Kumbang.—A Jakun V. on E. side of R. Sembrong, N. Johore. Also the Malay word for cocoa-nut beetles, (q, v).

Kumbar. - See BERTAM.

Kupang.—Large V. on a small S. affluent of Muda R., W. side of Gunong Titi Wangsa, S. Kedah.

Kupus.—V. on N. border of Sri Menanti, on S. bank of the Muar R.

Kwala.—The embouchure of a river. By a curious linguistic coincidence, the same word is used in the same sense by several African tribes. The word is also applied to the place of junction between two rivers.

Kwala Bekum.—Junction of small R. of that name with the Songkei R., S. Perak.

Kwala Belida.—In N. Perak, where a small W. affluent falls into the Perak R. about 4 miles W. of Bukit Panjang range.

Kwala Bera.—Junction of Bera R. with the Pahang R. in C. Pahang. Just below it the river forms a chain of small lakes and leads into Tasek Bera, the principal lake in the Peninsula.

Kwala Betey.—A small V. on the Sungei Batang, Malacca, between Gading and Padang Sebang.

Kwala Chepah.—On E. bank of Perak R., N. Perak, about $6\frac{1}{2}$ miles N.N.E. of Kota Tampan.

Kwala Cherako.—About 3 miles below Kota Tampan in N. Perak, on W. side of Perak R.

Kwala Chigar.—On the W. bank of Perak R. about 5 miles S. of Kota Tampan in N. Perak.

Kwala Dipang.—On W. bank of R. Kampar, S.C. Perak.

Kwala Dolah.—On the Perak R., and a supposed boundary between Perak and Kedah.

Kwala Eana.—A large V. in Pulau Sebang district, N. Malacca, about $\frac{1}{2}$ mile S. of Dusun Feringgit, on the boundary line between Rembau and Malacca territory.

Kwala Gapam.—Junction of the two affluents of the Duyong R., Malacca, about 4½ miles direct, and 6 miles by river from its mouth.

Kwala Gula.—Mouth of creek between two islands N. of Kwala Larut, W.C. Perak. (The Admiralty chart and the map S. A. S. differ so materially as to the coast line, that revision is absolutely necessary.)

Kwala Ijuk.-Junction of Ijuk R. with Krian R., N. Perak.

Kwala Injil.—A bend in the Perak R., N. Perak, where it turns abruptly N., 6 to 7 miles S. of Kota Tampan.

Kwala Jelai.—On W. bank of Perak R., 3 miles below Kota Tampan in N. Perak.

Kwala Johore.—Entrance of R. of same name N. of Changi district, Singapore.

Kwala Jumpol.—The junction of the Jumpol R. with the Muar at the S.E. corner of Jumpol State, Negri Sembilan.

Kwala Jus.—Small V. on high road, Jus district, N. Malacca.

Kwala Kabul.—On the S. bank of the Kampar R., S.C. Perak.

Kwala Kali.—Junction of R. of that name with Selangor R.

Kwala Kampar.—Junction of the R. of same name with the Kinta R., S.C. Perak.

Kwala Kanching.—Junction of that R. with the Selangor R. 3 miles below Bt. Jelutong in E. Selangor.

Kwala Kangsa (spelt Kangsar by Mr. Wray).—Important settlement [187]

on W. bank of Perak R., 4 miles S. of Kota Lama. It is the seat of Government and the residence of the Resident. Extensive tin deposits exist in the vicinity. The Regent resides at Syong on the opposite bank of the R., which is here about 200 yards in width.

Kwala Kangsa (Gangsa on the map).—Small V. N. of the Batu Berendam district on the Malacca R.

Kwala Kendrong.—Junction of R. of same with the Perak R. in S.E. Kedah.

Kwala Kenering.—On W. bank of Perak R. about 7 miles S. of Kedah

Kwala Kera.—On E. bank of Perak R. about 6 to 7 miles S. of the Kedah frontier.

Kwala Kinta.—The junction below Bandar Baru I. of the Perak and Kinta R., S. Perak.

Kwala Klang.—The entrance to the R. of that name, Selangor.

Kwala Kupang.—On the Muda R., at junction of a stream leading to Kupang V. 3 miles S. Kedah.

Kwala Kurau.-Entrance of the Kurau R., N.W. Perak.

Kwala Kurling.—Junction of R. of that name (q. v.) with Selangor R.

Kwala Labu.—The junction of the Lanjat R. with the Jugra R., S. Selangor.

Kwala Labu.—Close to the boundary between Selangor and Sungei Ujong, lat. 2° 53′ N., long. 101° 30′ E.

Kwala Labu.—On Perak R., S. Kedah, 5 miles N. of supposed Perak boundary.

Kwala Leppa.—Junction of a petty stream with R. Ekkawaya, about 8 miles in a S.W. direction from Gunong Batu Pulei, S. Perak.

Kwala Lumpor.—The seat of the Residency and principal Government offices of Selangor, near the head of the Klang R. It gives its name to the district, which contains numerous rich tin mines. Situated in lat. 3° 12′ N., and long. 101° 54′ E.

Kwala Madek. - Junction of the Kahang and Madek Rivers, E. Johore.

Kwala Mawah.—Kwala in Kedah on E. side of Perak R. about 10 miles N. of the assumed Perak frontier.

Kwala Menkwang.—Junction of a small affluent with the Muda R. about 3 miles N.W. of Kupang, Kedah.

Kwala Muar.—The entrance to the Muar R. dividing Muar from Johore. V. of same name on S. bank of R.

Kwala Muda.—The entrance to the Muda R. which divides Kedah from Province Wellesley.

Kwala Panchor.—V. at the junction of a small affluent with the Malacca R. in the Parit Melana district, C. Malacca.

Kwala Parit.—The junction of the Perak and Kinta Rivers, S.W. Perak.

Kwala Pelang.—Kwala on Perak R., S. Kedah, 6 miles N. of supposed boundary of Perak.

Kwala Pesolot,-V. on E. bank of R. Sembrong, E.C. Johore.

Kwala Piah.—About 4 miles S. of supposed Kedah boundary in N. Perak on E. bank of Perak R.

Kwala Pila.—Kwala and V. in S.W. corner of Jumpol, Negri Sembilan.

Kwala Pinji,-Junction of R. of that name with the Kinta R., C. Perak.

Kwala Prai (Pre in the Directories).—The name of the entrance to the Prai R., Province Wellesley, and of the V. on its bank. It is 1 mile and 5 furlongs from Butterworth, and, as stated by Earl, was once a place of considerable importance, with a foreign trade and mud docks for the repair of ships of burthen, but Penang has gradually absorbed its trade, although there are still a few prakes and small schooners belonging to the place, which trade chiefly with the Sumatra coast. The road leading up to the ferry is lined on each side with Chinese shops, and there is also a Chinese theatre, but its appearance nowadays is not altogether prosperous. The Malays, however, whose dwellings are scattered pretty thickly over the neighbouring mangrove swamps, appear to thrive well enough, and the number of children is something surprising. The river is one-eighth of a mile across at the ferry station, which is about half a mile within its mouth. There is a good deal of traffic at the ferry, both of horse and foot passengers, although travellers from the southern part of the Province generally embark in boats for Penang at the landing-place on the opposite side of the river, leaving their vehicles there if they intend to return speedily.

The new road (Jalan Bharu), which commences on the south bank of Prai, runs quite straight in a south-easterly direction for $3\frac{1}{3}$ miles to the point of junction with the road running south from Permatang Pau. This has been taken as the base line of the trigonometrical survey of the Province. The first mile and a half is through mangrove swamp, with abundance of Nipah palms, and the remainder is through an uninterrupted series of paddy-fields studded with clumps of cocoanut-trees. The road was originally formed of the mud and earth thrown up from two deep trenches between which it runs, and was hard and firm (barring the crabholes), except in very wet weather. It has, however, within the past few years been carefully put in order by the Public Works Department, and is now a very good road. Its width is being further extended by the same authorities. There

are three villages, besides several detached houses along the road.

Kwala Rantau.—V. on S. side of Bernam V., about 8 miles W. of Kwala Sempang, N. Selangor.

Kwala Rui.—Junction of the Rui R. with the upper Perak R. in S.E. Kedah.

Kwala Sawa.—Junction of a petty affluent with the Linggi R., 3 miles below Niato, Sungei Ujong.

Kwala Seleman.—Junction of a petty stream with the Muda R., just below Padang Pulei, S. Kedah.

Kwala Selensing.—Entrance to a small R. of same name on the coast of N.W. Perak fronting Gula Sugar Estate.

Kwala Seluang.—A kwala about 18 miles from the mouth of the Muda R., S.W. Kedah.

Kwala Sempang.—The junction of the W. affluent of the Kessang R. with the main stream, in the Chinchin district, E. Malacca.

Kwala Sempang.—V. on S. bank of Bernam R., about 8 miles E. of Kwala Rantau, N. Selangor.

Kwala Sempang.—A kwala on E. bank of Muda R., 3 miles above its turn N. in S. Kedah.

Kwala Semut.—Junction of a small E. affluent of Kinta R. in C. Perak just above Kindin.

Kwala Senang.—In extreme S.E. of Kedah on the Perak R., about 2 miles N. of supposed Perak boundary.

Kwala Si Marabow.—On a branch of the R. Linggi, formerly the point where the boundary line between Malacca and Rembau touched the river.

Kwala Sungor.—V. on boundary line between Malacca and Johol. After running nearly due E. from Dusun Feringgit, the line here turns abruptly to the N.E. The V. lies at the N.W. extremity of the large forest reserve embracing the Jus and Bukit Linggi districts.

Kwala Sungor.—V. in S.E. corner of Tampin, Negri Sembilan.

Kwala Talang.—Junction of a small stream with R. Kinta, C. Penang.

Kwala Tamok.—V. on the N. side of Sembrong R. where it turns from a N.N.E. direction to E. in N. Johore.

Kwala Tawa.-V. on S. affluent of Muda R. near Kupang, S. Kedah.

Kwala Teja.—On E. bank of Kinta R. at junction of R. Teja with it.

Kwala Tekan.—Junction of a small R. of same name with R. Kinta, just N. of Ipoh, C. Perak.

Kwala Telok Pan.—At the junction of a petty affluent with the Batang Padang R., 3 miles above Durian Sabatang, S. Perak.

Kwala Tembon.—On W. bank of Perak R., about 5 miles N. of Kota Lama, N. Perak.

Kwala Temiteh.—Junction of small E. affluent of same name with R. Kinta, 1½ miles N. of Ipoh, C. Perak.

Kwala Terup.—Junction of the R. Papan with the Kinta R., C. Perak.

Kwala Triang.—Junction of the Triang with the Pahang R., in W. Pahang.

Kwala Trong.—A salt-water creek between an unnamed island and the Perak coust, about 10 to 11 miles S. of Kwala Larut, into which a small stream flows of same name.

Kwala Trus.—Junction of the Perak and Kinta rivers, just above Bandar Baru I., S.C. Perak.

Kwala Wau.--Junction of small bank of Chandriang R. with the main streum, E.C. Perak.

Lac. The colouring matter produced by the lac insect, or Coccus ficus, is known and used by the inhabitants of the Malay Peninsula, where the insect is found. The produce, however, is neither so good nor so abundant as that of Hindustan, Burma, or Siam, probably owing to the insect not being, as in these countries, domesticated and reared. The Malay name of the dye is ambalau, a native one. It has been found in Singapore, but not in sufficient quantities to assume commercial importance.

Ladang. V. in S. Perak about 3 miles E. of R. Batang Padang.

Ladang Suka. A small V. 1 mile S. of Payah Rumput and about 7 miles N. from Malacca-town.

Lugoons, Province Wellesley.—See Permatang Mangis.

Laksamana. The second in rank in a native State. In the event of a death, the Laksamana succeeds to the dignity.

Lalang. A course grass (Gramen caricosum or Imperalia Kænigii) which, unloss precautions be taken, overruns all newly-cleared ground. The sensitive plant is said to be the only plant which extirpates it. It reaches a height of from 4 to 5 feet, and is used by the Malays for thatch and cattle bedding, while the flowers serve to stuff pillows. Both paper and sugar are said to be derivable from this grass, but no public success has as yet attended any experiments in the latter direction. See Finers.

Lathing. The site of a French tin-mining company near Gopeng Kinta, Perak. Lathin. The swamps found in so many portions of the Peninsula.

Lambor.—V. in N.W. Sungei Ujong, near Kwala Labu.

Landang.—A village in Johol, Negri Sembilan.

Langat.—Island, town and river at entrance of R. of same name, its outer embouchure, however, being known as the Jugra R. On the Island is situated Parcelar Hill, a well-known mark for mariners making the S.W. coast of Selangor. The R. rises in Ulu Langat, on the W. borders of Sungei Ujong.

Langka.—The mythic name of Ceylon in the Hindu poem of the Ramayana, and, as such, well known to the more advanced nations of Malaya. The popular name for it, however, is *Selan*, evidently taken from the Arabs, who probably made he island first known to the Malayan nations.

Langsuyar.—A "white lady," or banshee, who may be heard at night moaning amid the branches of a tree, and much dreaded by superstitious Malays.

Language.—With the exception of the Negrito tribes of the Peninsula, Malay alone is the current language. Each State, however, has peculiarities of speech, and a Singapore-bred man can at times hardly understand one from Kedah or Patani. Of the places under British influence, the best Malay is spoken in Perak and Province Wellesley.

Of foreign languages, Chinese, of course, is spoken by the great majority, i.e., using the word "Chinese" as we should use "European," each so-called "dialect" being in reality a distinct language. These "dialects" are Cantonese (Macao), Teochew, Hokien, Hylam, and Hakka or Keh. Of these there are several subdivisions, being true dialects.

Portuguese comes next in order, and it is by no means the Portuguese of Lisbon. Custom has so contracted the moods and tenses of the verbs that it almost resembles Malay in simplicity, while of course sacrificing precision.

Tamil is the language of the Klings, who, however, soon lose the purity of the original language in favour of phrases pronounced by Tamil scholars to be obscure and ungrammatical.

English, the language of the ruling race, is now spoken by a large number of the rising population educated at the Government schools. It will doubtless in time become even more prevalent.

Many other Asiatic and European languages are largely spoken. German counts a large number of adherents, but as the countrymen of the Emperor William all speak both English and Malay, besides being, as a rule, accomplished linguists in other tongues, the existence of a German-speaking community does not materially affect our own countrymen as to personal intercourse.

Of other Oriental languages, Arabic is the only one which is spoken by any appreciable number. But it is worthy of record that during one year eighteen different languages were used in the Singapore Magistrates' Courts. No better testimony than this could be adduced as to the cosmopolitan character of the population.

Lanjut Manis.—A pretty V. on the Malacca-Rembau border.

Lanjut Manis.—A small V. in the Blimbing district, C. Malacca.

Lanjut Mt.—In Rembau, Negri Sembilan (not marked in maps S. A. S.).

Lankut Buntal.—V. about 9 miles E. of the junction of the Langat R. with the Jugra R., S. Selangor.

Lantei.—The flooring of native houses, made of laths, usually cut from the nibong palm (Caryota urens), but sometimes of bamboo or even ordinary wood.

Lanun.—Originally the name of the boldest and most dangerous of the piratical tribes of Malaya. Their vessels were known as prahu lanun, and the last word is now often used by itself to designate them. The original habitat of the Lanun is supposed to be Mindanao in the Philippines.

Lata Mamboh.—V. in Sungei Ujong between Niato and Rassa.

Latah.—How to define latah is somewhat puzzling. If any short equivalent be desired, it may be described as an irresistible impulse to imitate the words or actions of those around them. Another form of the disease, very often not less startling to the onlooker, is the exhibition of intense nervous excitement when some particular word is mentioned—usually in the form of most abject fear. A third, and less noticeable, form is the exhibition of alarm at some unusual but not ordinarily terrifying sight or sound, much as a child will start at the sound of a gun, or a grown person on suddenly discovering a corpse. The two first-named manifestations are of course those which strike the spectators and auditors as most strange and inexplicable. The nervous impressionability of the Malays in other ways is well known to all who have lived amongst them. A very slight cause will change an ordinarily placid and inoffensive native into a very demon of rage, the extreme illustration of such a mental condition being known as "running amok" -or as foreigners usually call it, "amuck." Over and above a readiness to take offence at unjust blame, or what he considers disrespectful treatment, native public opinion considers a Malay dishonoured who does not avenge a blow by taking the life of the party giving it, not at the moment, but on some subsequent occasion, when the intended victim is off his guard. It would be going too far to say that a tendency to sulk and take revenge accounts for the Malay liability to latah, as many other peoples amongst whom the disease is unknown develop the same disposition, while almost destitute of the childlike good temper and unaffectedly good manners of the Malayan tribes. All that can be asserted is that such a disease would never exist amongst a phlegmatic race. Nor, again, must it be imagined that latah is of every-day occurrence. Many people have lived in the Straits Settlements for over twenty years without ever seeing a single case of it.

The impulse to imitate the words or actions of others is sometimes evinced in not merely a ludicrous but a most distressing way. In some cases it should be premised the attacks occur only at long intervals; in others the patients are habitually subject to the disease, and can at almost any time be compelled to exhibit it. When this results in any unpleasant consequence the latah (it is customary to apply the word both to the disease and to the patient), while quite unable to resist the strange influence exerted, will keenly resent the practical joke. In a case recorded by Mr. H. A. O'Brien, a woman was introduced to him as a latah, and he for some time conversed with her without detecting anything abnormal in her conduct. "Suddenly her introducer threw off his coat. To my horror my venerable guest sprang to her feet and tore off her kabayah (jacket). My entreaties came too late to prevent her continuing the same course with the rest of her garments, and in thirty seconds from her seizure the paroxysm seemed to be over. What struck me most in this unsavoury performance was the woman's wild rage against the instigator of this outrage. She kept on calling him an 'abandoned pig,' and imploring me to kill him, all the time that she was reducing herself to a state of nudity." An equally absurd but less distressing manifestation of the disease was provided by a Malay woman, who, on seeing her master tear up a letter and throw it out of the window, at once followed suit with a basket of clean clothes she was carrying. No great harm, of course, resulted in this case, but tragical effects have more than once followed practical jokes with latahs. The following instance is related by Mr. O'Brien:—The ship's cook of one of the local coasting steamers happened to be a pronounced sufferer from the disease, and, as but too commonly happens in such cases, was continually victimized by his shipmates. As a rule the effects were simply ludicrous, and hugely amused the crew, who shared the fondness for horseplay proverbial among European sailors. On the occasion in question the cook was dandling his baby on the forward deck. One of the men, noticing this, picked up a billet of wood, and, standing in front

of the latah, commenced nursing it in the same way as the latter was dandling

the baby.

Presently he began tossing the billet up to the awning, the cook imitating his motions with the baby. Suddenly the sailor opened his arms, and the billet fell to the deck; the unfortunate latah did the same, and the child, falling on the planking, was instantly killed. It is very singular that in no case has a latah been found to exhibit any other mental peculiarity. There appears to be no tendency in such a case to lunacy, nor does the disease appear to shorten life. That an imitative propensity is sometimes the forerunner and accompaniment of certain mental diseases among Europeans is alleged by more than one medical authority, but seldom becomes so pronounced as in the cases of Malay latahs. Moreover, it never manifests itself in the latter race before the age of puberty. The patient, again, is perfectly conscious of what he (or she) is doing, and frequently resents in the strongest manner any attempt to play upon his infirmity.

The second form of latah mentioned above, in which intense nervous excitement is caused by the mention of some particular word, is scarcely less curious to onlookers than that already illustrated. The patient in this case will exhibit uncontrollable fear, evinced by running away at full speed or plunging into jungle if on shore, or by jumping overboard if in a ship or boat, at the mention of some animal or reptile. Some are thus affected if a companion shouts Ular! (a snake), others at the words Rimau (tiger), or Buaya (crocodile). The strangest fact in this connection is that such patients seem to have little or no fear of the animals themselves, or certainly not more than any prudent native exhibits when meeting them in the river or jungle. Thus a man who will jump overboard in hot fear at the shout of "Crocodile!" will readily stalk and, when it is disabled, approach one of these reptiles. The Malay, it should be added, is an exceptionally plucky and expert hunter and woodsman, so that this particular form of nervous fright is the more remarkable.

The third, and less noticeable, form of latah, in which some unexpected sight or sound induces fright, might, without explanation, be deemed common to all humanity. But in the case of a Malay latah such a surprise invariably provokes a desire to strike at the nearest object, and is also accompanied, in almost every case, by an obscene exclamation, no matter how correct his or her usual language and behaviour. It will of course be remembered that among all Oriental nations phrases which we consider obscene are ordinarily used in conversation before women and children; but the Malay, aware of our prejudices on the matter, usually refrains from using them before Europeans. The most common exception is when the speaker is a latah. Altogether the disease is a most obscure manifestation of nervous irritability and disturbance. It would be interesting to know if the brain of a latah differed in any way from that of the ordinary individual. The subject presents a wide field for pathological research.

Laterite is formed by the decomposition of iron pyrites and the diffusion of the iron in solution. It abounds in various portions of the Peninsula, and is largely present in the soil of Singapore, where it is extensively used as road metal.

Lau Chu Kang.—V. in Mandai district, N.W. Singapore, 131 miles from the town.

Laut.—This is the most general name among the nations of the Archipelago for the sea or ocean—the most common, even with the Javanese, who have besides three synonyms for it. It is found in composition in the names of places, as Pulo-laut, "sea-island," Tanah-laut, "sea-land or sea-board land," and Laut-kidul, "the south sea."

Laws, Malayan.—Most of the native States have well-drawn-up codes of laws, of which that of Johore, translated at p. 71, Vol. IX, J. I. A., serves as a

good example. Excepting as regards women and slaves, its provisions evince a considerable respect for abstract justice, and are worth the study of sociologists.

Another code to which the Malays attach considerable importance is the *Undang-undang*, or Laws of Menangkarbau, of which mutilated copies exist. It is noticed in the N. & Q. of the J. S. B. R. A. S.

Lawyers, Penang.—A corruption of Layor, a species of cane furnishing the sticks so named.

Lead.—In Malay, tima-itam, that is, "black tin," is known to the natives only as an article introduced from abroad. No ore of this metal has as yet been found in any part of the Archipelago, although, most probably, such will eventually be discovered, as was the case with antimony, which was unknown until the year 1823.

Leaf Insects (Sonsong arus).—A name given to one of the Phasmidæ or "spectre insects." So exactly does it resemble a leaf with all its delicate markings and veinings—in some cases the colours of a faded leaf are reproduced with equal accuracy—that it is difficult to persuade oneself, even with the specimen before one, that it belongs to the insect world. They are reputed "curios" even amongst the natives, who keep them to show their friends. No foreign naturalist has as yet studied their habits. The Zoological Society of London was very anxious to obtain some of these insects for its insectarium when I last visited London.

Leda Tana.—Small V. on the Sungei Chohong, a portion of the Kessang R., the boundary between Muar and Malacca.

Ledang.—"This is the Malay name of the highest mountain of the Malay Peninsula, one of the two which the Portuguese thought proper to call Ophir, the other, of far greater elevation, being in Sumatra. Ledang lies inland from the town of Malacca at the distance of about 40 miles, and is just inside the Muar border. It is chiefly of granitic formation, boulders of granite being found on its very summit. In recent times it has been repeatedly ascended to the top by European travellers, and its height has been ascertained to be 4,400 feet above the level of the sea. Fahrenheit's thermometer at night falls at the summit to 64°." The gold mines of Ophir were worked till 1817 by the Malays, the metal being of 9 touch. The depth of the mines varies from 70 to 200 feet, but they are now almost abandoned. Crawfurd, in an interesting article, not however worth transcription in full, points out the many reasons against Gunong Ledang being the Ophir of King Solomon, and thus sums up his conclusions:—

"From all that has now been stated, I think it may be concluded that the Ophir of Scripture was a commercial emporium, situated either close to the entrance of the Red Sea on its Arabian side, or not far east on the southern coast of Arabia. The nearest of these localities to the head of the Arabian Gulf would assuredly have been a long and difficult voyage even for the small coasting craft of the Phœnicians, and still more so for the confessedly inexperienced Jews; without

supposing voyages to India, or far south on the coast of Africa."*

Leeches.—A small variety abounds in all moist places in the jungle, and is a daugerous pest to unwary travellers. In preparing to cross leech-haunted marsh, the trousers should be tied round the ankle and placed inside the boots, the latter being freely rubbed with lime-juice, which leeches especially abominate. A species resembling the horse-leech (lintah) is also found, utilized for surgical purposes. The smaller sorts are in many cases beautifully marked with bright yellow stripes.

Legends.—Numerous Malay legends will be found in the J. S. B. R. A. S. and in the J. I. A., especially under geographical headings.

Lela.—Heavy brass guns employed in stockades. They were also used on board the large piratical prahus when piracy flourished in Malayan waters. They resemble the jingals of the Chinese.

Lemon Grass (Serai).—Much cultivated for the essential oil it yields, especially by Europeans and Chinese.

Lendek.—In Naning, Malacca, site of a tin mine opened in 1807, but since abandoned.

Leopard.—Only one species is known in the Peninsula, and that, by a misnomer, is generally termed the black tiger (q, v).

Leppa.—R. in Pahang. A tin mine is said to exist near it. (Probably the S. Lupa of map S. A. S.)

Leprosy.—In Malay untal and kudal, from Sanskrit kosta, is a disease not unfrequent in all parts of the Peninsula. In many places the only beggars to be seen are the unfortunate persons labouring under this incurable malady. The Leper Hospital of the Straits Settlements is situated at Pulo Jerejak, an island between Penang and Province Wellesley. It contains about 200 patients, and is in charge of the Colonial Surgeon of the Province with a resident apothecary.

Leyden, John.—" This remarkable man, who was born of peasant parents, was born in the parish of Cavens and county of Roxburgh in 1775, and is mentioned in this work on account of his researches into the history and languages of the Malay nations. In 1803, after distinguishing himself at the University of Edinburgh, and enjoying the friendship and intimacy of his great cotemporary Sir WALTER Scorr, he proceeded to Madras in the Indian Medical Service, and there received the liberal patronage of the Governor-General, the EARL of Minto, near whose estate he was born. In 1811 he accompanied this nobleman on the expedition which effected the conquest of Java and most of its dependent islands, and was eventually destined to proceed on a mission to Japan. Unhappily, however, he had exposed himself in his literary pursuits to the malaria of Batavia, and caught the fever which, on the 27th of August, carried him off, in the 36th year of his age. I had seen and conversed with him the day before his death, labouring under the complaint, but without any appearance of imminent danger. Leyden's Oriental erudition, more particularly as relating to Malayan literature, was more multifarious and surprising than accurate, as might reasonably be expected from the number and rapidity of his acquisitions. He published at Calcutta a copious vocabulary of the Malay, Burmese, and Siamese languages, and after his death appeared a small work entitled 'Malay Annals.' His political views were wild, speculative, and scholastic, as is sufficiently attested by a published letter of his to his friend Sir STAMFORD RAFFLES, at the time about to undertake the administration of the Indian Dutch possessions. 'We must,' says he, 'have a general Malay league in which all the Rajas must be united, like the old ban of Burgundy, or the later one of Germany, and these must all be represented in a general parliament of the Malay States like the Amphyctyonic Council of the Greeks." (Memoirs of Sir STAMFORD RAFFLES, page 25.)

Liar, Orang.—"Wild men," a term often applied to the Jakuns. Several other phrases are also employed, e.g., Orang bukit, Orang dalam, and Orang ulu, the word ulu meaning the upstream part of a country.

Ligei.—One of the nine districts of Patani (q. v.).

Ligor "is the Malay name of a Siamese province, called by the Siamese Lâkon. It is the portion of the Siamese territory which lies nearest the country of the Malays on the western side of the Peninsula, bordering there on the principality of Kedah. Geographically, indeed, it forms a portion of the Peninsula, as does Singora, another Siamese province, on its eastern side. The population is scanty and poor, the majority consisting of Siamese, with a considerable number of Malays, and a mixed race of these two, called in Malay Samsam, with a few Chinese."

Lily.—Generally confounded with the various species of Arum, all being termed bakong.

Limbongan.—Excavations made by miners in swampy tracts at the bases of hills. (J. I. A., Vol. II, p. 173.)

Lim Chu Kang.—V. in W. Kranji district, Singapore. Numerous pepper and gambier plantations exist in the neighbourhood.

Lime.—This fruit abounds, and there are several excellent varieties.

Lime is prepared in large quantities from coral and shells, the principal lime-burning works on the coast being at Pulo Pangkor (Dindings).

Limestone, with sandstone and clay, is the predominating stratified rock from Junk Ceylon to Penang. It does not occur in large quantities southward of the latter.

Limmair.-V. on S. bank of Pahang R., C. Pahang.

Linggi.—The most W. district of Malacca forming the E. bank of the Linggi River, which divides Malacca from Sungei Ujong. An old Dutch fort and a Police station exist on the shore, as also a village of the same name. From Linggi to the town of Malacca a good road has been constructed, about 29 miles in length. The local steam launches take up passengers between Linggi and Malacca, or Sungei Ujong. The district was originally colonized from Rembau.

Linggi.—V. 8 miles from mouth of R. of same name, Sungei Ujong. A good bridge crosses the R. here, connecting Permatang Pasir with the main road to Rassa.

Lingin.—"In Malay, correctly, Lingga. The name of one of the multitude of islands by which the eastern end of the Straits of Malacca is crowded. It extends from the equator to 20 miles south of it, and is estimated to have an area of 286 square geographical miles. Its highest mountain rises to the height of 3,755 feet, and is consequently the most elevated land of any of the islands within the Straits of Malacca. Nearly the whole island is covered, like the others in its neighbourhood, by an ever-verdant forest, the inhabitants consisting of a few Malay fishermen, and in the interior, of some wandering tribes of savages of the same nation. Lingin was formerly a part of the territories of the Kings of Johore, and is, therefore, mentioned here. It is now under Dutch protection."

Linsum.—Coffee plantation close to Rantau, Sungei Ujong.

Lion.—"In Malay Singa, from the Sanskrit, just as our own name is from the Latin. The lion is a mere myth to all the inhabitants of the Peninsula. The word is chiefly found in composition in the names of places and the titles of persons, as in the examples Singasari, 'lion flower,' the name of some ancient Hindu ruins in Java; and Singanagari, 'lion of the city,' the name of one of the public executioners under the native governments of Java." The word has no connection with Singapore or singapura, which means a "port of anchorage."

Lismore Fort. -See FORT.

Literature.—The Malay tribes possess but little in the way of literature. The greatest part of it, like that of Java, consists of romances, known under the Sanskrit name of cheritra, or the Arabic one of hikayat. Their subjects are taken from the Hindu epics, from the local legends of Java, from the Mahommedan legends of Arabia, and from the story of Malay princes hardly less fabulous. Such compositions differ, however, in this respect from those of the Javanese, that the greater number of them are in prose. The Malays are possessed of no ancient manuscripts, nor inscriptions on stone or brass. Their whole literature, all in the Arabic character, is certainly not of greater antiquity than their conversion to the Mahommedan religion; indeed, the earliest recorded specimen of it is the vocabulary of the Italian Pigaffetta, collected in the Moluccas in the year 1521, during

the first navigation round the world. (See Bibliography, under which head is given a list of all known works existing in Malay.)

Little Johore Hill,-Gunong Bau (q. v.).

Lizards.—An enormous number of species are found in the Peninsula and Settlements, but a monograph has yet to be written on the Malayan varieties. Certain species will be found described under the heads of Gecko, Chichak, &c. The flying lizard (Chaco volans, or Chichack terbang, or Kubin) is found throughout the Peninsula. A large house lizard is called toké from the sound it emits.

Lobok Penawing.—A settlement on the Muar R., just E. of the borders of Johol.

Lobster (Hådang gålah).—A beautifully marked variety of large size is found on the coast, and specimens are preserved in the Raffles Museum. The cray-fish is unknown in Malayan waters.

Logan, J. R.—A full biography of this eminent scholar appears in No. 7 J. S. B. R. A. S., 1881, p. 75.

Londang.—V. on W. bank of R. Sembrong, C. Johore, 4 miles N. of its turn at a right angle N.

Loris.—A small species of lemur found in the Peninsula. It is of nocturnal habits, seldom stirring during the day.

Lory.—But correctly Nuri in Malay, is the generic name for "parrot." The sub-family of parrots, to which naturalists have given the name of Lorius, is not found in any island of the Archipelago west of New Guinea, nor at all in the Philippines. The lories of naturalists are, in fact, confined to New Guinea and its adjacent islands. The bill of the lory is somewhat weaker than that of other parrots. The prevailing colour of the plumage is a bright scarlet, and the general shape that of the panakut. Numbers are brought to Singapore from the Moluccas and other places for sale.

Lot's Wife.—A pillar at W. entrance of Singapore Harbour marking the Harbour limit.

Lotteries are a favourite mode of gambling, amongst the Chinese especially, in the Settlements and Peninsula. The best known is the Hua Hoey, in which the names of 36 animals are selected, and upon any one or more of these the gambler pays his stake, receiving an informal receipt in return. At a given time the name of the winning animal is announced, and those who have staked upon it receive thirty times the amount of their investment. The winnings are paid over honestly enough, but the lottery manager can of course often ascertain upon which animal there are the lowest stakes. (See Hua Hoey.)

Lotus.—The far-famed lotus lily is indigenous to the Peninsula, but the pink variety so common in China is the least often met with. The seeds are not used for food, as in China.

Low, Sir Hugh, K.C.M.G.—Formerly H.M. Resident at Perak, who rendered good service to that State, and contributed much useful information on Malayan matters to various periodicals. His principal scientific work has been botanical, and he has added several plants, hitherto unknown, to the Kew lists. His record in the Colonial Office list is as follows:—"Entered the Colonial service as Secretary to Government of Labuan in 1848, Police Magistrate, 1850; administered the Government of Labuan in 1855 and in 1863, and from October to December, 1865; again from November, 1866, to December, 1867, and also from December, 1874, until April, 1876; British Resident, Perak, 1877; now retired."

Low's Pass.—On W. side of Bukit Penara, C. Penang. A Police station lies on W. side of the pass.

Low Point.—A point in the Bernam R. where it turns S., about 13 miles from the mouth, N. Selangor.

Lubo Imas.—V. about 6½ miles S.W. of Gunong Bujang Malacca in E.C. Perak.

Lubok.—A pool, or deep holes in the sea, a lake, or a river; a reach in a river before it trends. Of constant occurrence in the names of places.

Lubok Bantal.—V. in Sungei Siput district, N.W. Malacca.

Lubok Chaong. - V. on E. side of R. Sembrong, E.C. Johore.

Lubok China.—V. and Police station in extreme N.W. of Malacca territory on S. bank of Sungei Pedas, a branch of the Linggi.

Lubok Kepong.-V. on E. side of R. Madek, E. Johore.

Lubok Lesong.—V. on W. bank of R. Sembrong, in the Jakun country, C. Johore.

Lubok Mak Serei.-V. on E. bank of Endau R., N. Johore.

Lubok Masjid.—V. about 10 miles 1 furlong N. of Butterworth, Province Wellesley, between Penaga and Permatang Bindahari.

Lubok Pasir.-V. on S. side of bend of R. Sebrong, N. Johore.

Lubok Peniu.—V. on E. bank of Endau R., 1 mile N. of its division into the Kahang and Sembrong Rivers, N. Johore.

Lubok Penjit.—V. on the R. Tamboh, one of the W. affluents of the Kinta R., S.C. Perak.

Lubok Pongkor.—V. just above junction of Sebrong, Kahang, and Endau Rivers, N. Johore.

Lubok Talam.—Beach and V., W. bank of R. Sembrong, just before its turn W. in N.E. Johore.

Lubok Valley.—In N. Sungei Ujong between Bt. Niwang and a hill lying further S.

Lubu Mariam.—A V. 9 miles from Butterworth, Province Wellesley, just below the Malakoff Estate.

Lukut.—V. about $2\frac{1}{2}$ miles from the mouth of R. of same name, Sungei Ujong.

Lumut.-V. on W. side of old strait, Johore.

Lundu.-A V. in the district of that name, Central Malacca.

Lungga.—Imp. V. on E. bank of R. Muar, Johore, 15 miles S.E. of Mt. Ophir.

Lycanthropy.—A belief similar to that of the wehr-wolf of Germany, &c., is widespread amongst both Malays and aborigines in the Peninsula, as is also that in its opposite—metempsychosis. In Malaya, the tiger takes the place of the wolf.

Maccaroni.—Extensively used by all classes. Europeans import it as a rule, but both Chinese and Malays manufacture it in large quantities. It is called *lassa* in Malay. The mould for making it is *kebok lassa*.

Mace.—The brilliant red covering of the nutmeg, which see, the history of the one being that of the other. It is called bunga pala (flower of nutmeg) in Malay.

Machap.—A district in N.C. Malacca. Tapioca is largely cultivated in the neighbourhood. It is reached by a first-class road from Malacca viá Durian Tunggal, and is the site of a Police station.

Magellan, Ferdinand.—The discoverer of the Philippines; a native of [198]

Portugal, born about 1470. He served under Albuquerque at the capture of Malacca, but is not otherwise associated with the history of the Peninsula. Killed at Mactan, near Cebu, in April, 1521.

Magnet.—The name of the magnet in Malay is batu-brani or besi-brani—the latter term being now the more common: the former extends to all the languages of the Asiatic Archipelago, including those of the Philippines. The literal meaning of the words is "dare-stone," or "venture-stone (or iron)," a term similar to our own of load or leading-stone, although less expressive. (See Compass.)

Magnetic Dip AT SINGAPORE AND OTHER PLACES. — See Journal of Eastern Asia, p. 90, Article by Vice-Admiral Sir C. F. A. SHADWELL, K.C.B., giving tables

Maharajah.—The title taken by the present Sultan of Johore on first assuming the government of that State. It is not, strictly speaking, the title applied by Malays to native rulers in the Peninsula, but in native writings is regarded as the equivalent of "Emperor." Maharani signifies "Empress." Many Malays, however, have the title as a name only, without its implying any territorial rank.

Mahommedanism.—The Mahommedan religion is known to the natives of the Peninsula by its usual Arabic name of Islam, to which they generally prefix the Sanskrit word agama, religion. All who have adopted it are of the same professing orthodox form as the Arabians, by whom, directly or indirectly, they were converted. The history of the conversion of the Malays may be briefly told. The missionaries who effected the conversion were not, for the most part, genuine Arabs, but the mixed descendants of Arab and Persian traders from the Persian and Arabian Gulfs, parties who, by their intimate acquaintance with the manners and languages of the Malays, were far more effectual instruments. In the course of several ages, Arabian and Persian merchants, and Mahommedan merchants from Gujerat and other parts of India, had settled in various parts of the Archipelago. Unaccompanied by their families, they intermarried with the native inhabitants, and from this union sprang the apostles of Islam. The earliest recorded conversion was that of the people of Achin, in Sumatra, the nearest part of the Archipelago to the civilized parts of Western Asia. This happened in 1206 of our cra. When the Malays of Sumatra were converted is not fixed, but probably about the same time as their neighbours, the Achinese. The Malays of Malacca adopted Mahommedanism in 1276, and it is now the religion of the Peninsula.*

Mail-Armour.—In Malay, baju-rantai, the sense of the term being "chain-coat," or jerkin, and agreeing exactly with our own definition of the term, as given by Johnson—"a coat of steel net-work for defence." This coat, and a morion, or casque, called katopang, both being native words, are the only kinds of defensive armour which were used by the Malayan nations. They are now rarely seen, and from the high price of iron and the impediments they would throw in the way of the free use of the favourite weapons—the spear and the dagger—were probably never in general use.*

Major.—V. on N. bank of Chandriang R., E.C. Perak.

Mak.—A district in C. Malacca, Alor Gajah being the principal village in its vicinity. About $14\frac{1}{3}$ miles N. of Malacca-town.

Makkilei.—A village in Naning, the residence of a Penghulu.

Malacca, Town and Settlement of.—While the town itself demands separate mention as regards its position, history and social aspect, all remarks upon its government, climate, geology, &c., apply also naturally to the Settlement. The two will, therefore, be dealt with under one heading. As regards its history, it must be understood that the district followed the fortunes of the town, but that,

prior to British possession in 1824, the territory of Malacca comprised a smaller area than it now does, Naning and Jelli having been absorbed within its limits, while slight extensions of its N.E. to E. frontier have also taken place since the

period of the Dutch ascendency.

Position.—The town of Malacca lies in lat. 2° 11′ 30″ N., and long. 102° 12′ 20″ E., and is situated upon a small river of the same name, which divides it into two parts, though now but an insignificant stream. The town forms the capital of a district extending from Sungei Linggi on the N. to Sungei Kessang on the S., and is bounded inland by the States of Muar, Johol, and Rembau. The coast line of the Settlement is about 40 miles in length, and its extreme width from E. to W. about the same, its mean width being about 20 miles. The town lies about 115 miles N.W. of Singapore, and about 45 miles E. of Sumatra.

HISTORY.—Few States had a more varied and romantic history than that of Malacca. Before dealing with its modern aspect we quote hereunder a condensation

of CRAWFURD's carefully written article on the subject :-

"The native history of Malacca is full of obscurity. Two Malay manuscripts, known by Arabic and Malay titles which signify 'the Crowns of all Kings,' that is, the Reigns of all Malay Kings, and their Genealogies, give the following account of the foundation of the State:—About the year 1160 of our time, a certain chief of Palembang in Sumatra, with his followers, established themselves at Singapura. Here he and his successors continued until 1252, when they were expelled by an invasion of the Javanese of the kingdom of Majapait, and next year established themselves at Malacca. The third prince in succession to the fugitive who founded this last place, ascended the throne in 1276, and was the first who embraced the Mahommedan religion. It was the twelfth prince in descent from the founder of Singapura, and the seventh from the founder of Malacca, who was driven from his throne by the Portuguese in 1511. There is, however, too much reason to believe that the greater part of his story is a fabrication of comparatively recent times.

"There is more consistency and verisimilitude in the account rendered by the early Portuguese writers, who derived their information from the Malayan cotemporaries of the conquerors. 'Concerning the time,' says Barros, 'in which Malacca was founded, or respecting its early inhabitants, no writing has come to our knowledge, but there is a common belief among the people themselves, that little more than two hundred and fifty years had elapsed since the place was first peopled.' He gives no dates, nor does he furnish the names or the number of the line of kings. This, however, is done in the 'Commentaries of Albuquerque,' which

give six kings, all but the first with Arabic names.

"Barros' account of the foundation of Malacca is as follows:—'A fugitive from Java, whose name he writes Paramisora, and which is probably the Javanese compound, taken from the Sanskrit, Prama-sora, meaning "valiant hero," arrived in Singapore, then ruled by a chief named Sansinga. This prince received him hospitably, but in requital was assassinated by him, with the aid of his Javanese followers, and of a certain people called Cellates. The assassin seized the government and retained it for five years, when he was expelled by the Siamese, not by the Javanese of Majapait, as he is represented to have been in the Malay manuscripts. On his expulsion, he is represented as having fled and sought refuge at Pago, on the River Muar, distant, according to Barros, forty-five leagues from Singapore, and five from Malacca. Eventually, along with 2,000 Javanese followers, he settled at Malacca, on the invitation of some of the Cellates, who had themselves taken refuge on the banks of the river of that place.'

"Who these Cellates were is certain enough. The word is a Portuguese formation, from the Malay word Sâlat, a strait or frith, and at full length in this language would be orang-sâlat, or men of the narrow seas, in reference to the numerous straits among the many islands between the Peninsula and Sumatra. The Cellates were, in fact, the well-known orang-laut, or 'men of the sea,' famous all over the

Archipelago for their piscatory and predatory habits. Such of this people as had fled with the Javanese from Singapore, and had formed their encampment about the river of Malacca, found there, not far from it, an inland people, of the same race, speaking the same language with themselves, with whom they intermixed. 'The first settlement,' says Barros, 'which they (the Cellates) made was on a hill above the fortress which we now hold, where they found some people of the land, half savages in their manner of living, whose language was the proper Malay, which all these people used, and with which the Cellates also were acquainted. But as in the beginning of intercourse there was some alienation caused by difference in their modes of life, concord was established through the women, in which the Cellates were deficient, each party, however, still following the mode of life to which they had been accustomed—the Cellates living by the produce of the sea, and the Malays by the fruits of the earth. And as both these people knew that the place where Paramisora dwelt was confined, they invited him to join them. Finally, Paramisora, having seen the place, quitted his residence in Pago, and came and dwelt among the people of the plain of Beitam.'—Decade I., Book 6, Chap. 1.

"It was the son of Paramisora, according to Barros, that commenced the building of Malacca. 'And,' continues he, 'as the Cellates were a low and vile people, and the natives of the country half savages, Paramisora and his son, in order to make them faithful allies in their labours, and especially, in order to avail themselves of their services in building the intended city, they ennobled them by intermarriages with distinguished persons of those whom they had brought with them from Java, and thus the Malays became all of them Mandarijs (mantri, in Sanskrit, a counsellor or noble), and these are now the nobles of Malacca, in virtue of the privileges conferred by former kings on them, as being the first inhabitants

of the city.'

"The account given in the 'Commentaries of Albuquerque' is esentially the same. On one point all parties seem to agree, that not only the founders of Malacca, but even of Singapore, were Javanese and not Malays, for even the Malayan account is substantially to this effect, since it brings the emigrants who established themselves

in Singapore from Palembang, which was a Javanese settlement.

"In Barros and the 'Commentaries' the name of Malacca is alleged to be connected with the foundation of the State. There can, however, be no doubt but that it is derived from that of the Malaka plant, Phyllanthus emblica, a shrub said to be abundant in the locality. MARSDEN, after quoting BARROS, observes that, 'an error so palpable (as that Malacca, in Javanese, meant 'exile') throws discredit on the whole narrative.' This, however, is not correct. The passage, as he quotes it, runs thus:—'They again descended the river, in order to enjoy the advantages of a seaport, and built the town which, from the fortunes of his father, was named Malaca, signifying an exile.' But the passage at full length is as follows:—'XAQUEN DARXA (SEKANDAR SHAH) now ruled the people, because his father was very old, and in order to avail himself of the sea, through which he hoped to attain eminence, he resolved to make Malaca a city, to which he gave this name in memory of the banishment of his father from his native country. For, in his own language (Javanese) it means an exile (homem desterrado), and hence, also, the people call themselves Malaios.'—Decade I, Book 6, Chap. 1. In the 'Commentaries of Albuquerque,' the founding and naming of the town are ascribed, not to the son, but to the fugitive Javanese himself, and the account they give is this:— PARAMISORA gave the town the name of Malaka, because, in the language of Java, they call Palimbao (Palembang, which the writer in another place says is in Java, instead of Sumatra), to which he fled, Malayo, and because he came a fugitive from the kingdom of Palimbao, of which he was king, he named the place Malaca. Others say it was called Malaca on account of the many peoples that came to it from one or other country in so brief a time, for Malaca also means to meet or assemble (encontrar.).'

"But the language of the people of Malacca was not Javanese but Malay, and it may be asked, how this is to be accounted for? The obvious explanation seems to be that, in a mixed population, the easy language of the majority prevailed over the more difficult one of the minority. What took place in our own country, and also in Northern India, in both of which the languages of the few were absorbed or displaced by those of the many, are examples in illustration. Castanheda's account of the Malay, as a language of intercommunication, is perfectly accurate. 'The people' (of Malacca), says he, 'speak a language called Malaya, which is very sweet (muy doce), and easy to acquire.'—Vol. II, p. 335. The Malay spoken at Malacca contains a large infusion of Javanese, as the English does of Norman-

French, and Hindi of Persian.

"Of the supposed expulsion of the founders of Malacca from Singapore by the Javanese of Majapait, there is no allusion in the Portuguese writers, and certainly there is no mention of it in the native chronicles of Java. Both Barros and the author of the 'Commentaries of Albuquerque,' state that the expulsion was effected by the Siamese, and the latter expressly asserts that the Prince of Patani, at present the next Malay State to Siam on the eastern side of the Peninsula, was the instrument employed, as he was the brother of the King of Singapore who had been assassinated by the future founder of Malacca. The subjection of Malacca to Siam seems, indeed, to be admitted by all parties. Four of the most northerly of the states of the Peninsula are still subject to it, while a claim of supremacy was made, until modern times, for at least three more. The author of the 'Commentaries of Albuquerque,' giving a greater extension to Malacca than Barros, thus describes it and its subjection to Siam :- 'The kingdom of Malacca on one side borders on Queda, and on the other on Pam (Pahang). It has 100 leagues of coast, and inland extends to a chain of mountains, where it is parted from Siam, a breadth of 10 leagues. All this land was anciently subject to Siam. It was, more or less, ninety years before the arrival of Alfonso D'Albuquerque that the country became independent, and that the kings became what they called themselves, Coltoes (Sultans), which among them is equivalent to Emperor.'—Chap. 17,

"Of the time in which the Mahommedan religion was embraced by the people of Malacca there is no precise statement. The Malay account assigns the event to the reign of a prince called Sultan Mahomed Shah, who ascended the throne in 1276, and this seems probable, since so remarkable an event is likely enough to have been chronicled (as indeed it has been in other countries of the Archipelago) by a people proud of the event, and now in possession of an era to reckon by. The statement of Barros respecting the conversion is as follows:—'The greatness of Malacca induced the kings, who followed Xaquen Darra (Sekandar Shah), to throw off their dependency on the kings of Siam, and this chiefly since the time when, induced by the Persians and Gujrati Moors, who came to Malacca and resided there for the purpose of trade, from Gentiles to become converts to the sect

of Mahommed.'

"The account given by the Portuguese historian Diego de Couto differs materially from all the other statements. He says that the conversion of the King of Malacca was effected by a cazee from Arabia, who gave him the name of Mahommed after the prophet, adding that of sá (shah) to it, and that this took place in the year 1388, or 112 years later than the date assigned to this event by the Malay manuscript. Including the converted prince, he gives the names of the five kings who reigned down to Albuquerque's conquest, and these agree substantially with those of the other statements. This account, then, which would give from twenty-two to twenty-three years to each reign, is, after all, perhaps the most probable.—Decade IV, Book 2, Chap. 1.

"The flourishing condition of Malacca, at the time it was attacked by the Portuguese, has, no doubt, been much exaggerated, but making every abatement,

enough will remain to show that it was a place of considerable commercial importance, judging it by the ideas of the beginning of the sixteenth century, and by the peculiar value then attached to some of the commodities of which its trade consisted. 'In matters of trade,' said Barros, 'the people (the Malays) are artful and expert, for, in general, they have to deal with such nations as the Javanese, the Siamese, the Peguans, the Beugalis, the Quelijo (Chulias or Tâlugus), Malabaris, Gujratis, Persians, and Arabians, with many other people, whose residence here has made them very sagacious. Moreover, the city is also populous, owing to the ships that resort to it from the country of the Chijs (Chinese), the Lequios (Japanese), the Luçoes (people of Luzon in the Philippines), and other nations of the Orient. All these people bring so much wealth, both of the East and the West, that Malacca seems a centre at which are assembled all the natural products of the earth, and all the artificial ones of man. On this account, although situated in a barren land, it is, through an interchange of commodities, more amply supplied with everything than the countries themselves from which they come.' The same author, in the same place, describes the general aspect of the town as follows:—'Our people, although they did not see majestic structures of stone and mortar, or ramparts, or towers, or indeed any other kind of defence, beheld, notwithstanding, a town extending along the beach for a good league, and, ranged along the shore, many merchant vessels. But if the town was almost entirely built of wood, and the houses thatched with palm-leaves, in others places there were towers, walls, and some examples of a better architecture. Its real defences were a numerous people, and a multitude of ships.'

"The account given of Malacca by the author of the 'Commentaries of Albuquerque' is less moderate. Thus, he asserts that the predecessor of the last king had accumulated a treasure of 140 quintals of gold, and that the town, in his time, contained 40,000 dwellings (vezinhos). According to him, it contained, including its precincts, 100,000 dwellings when Albuquerque attacked it. 'It is truly believed,' says he, 'according to the information we have of Malacca, that if another world and other navigations were discovered, all parties will still resort to it, for here come every sort of drugs and spices of the world that can be named, because its port is the most convenient in all monsoons of any from and within Cape Comorin.'

-Chap. 18.

"Castanheda's account is less extravagant. 'The city,' says he, 'at the time of its capture, was as long as from Dexobragas to the monastery of Belem, but narrow. It might contain about 30,000 hearths (fogos). The river divides it into two parts, the communication between them being by a wooden bridge. The houses are of wood, and principally by the sea-side, but in other directions, they are of stone and mortar, very noble. In the quarter which lies to the south stand the king's palace and the large mosque, and here dwell all the nobility. On the northern side dwell the merchants, and here the city is most extensive.'—Vol. II, p. 335.

"According to the most moderate of these accounts, Malacca is made to contain a population of 150,000 inhabitants, and although narrow, inland, to have extended three miles along the shore. It is evident, however, that it was for the most part a mere assemblage of thatched huts, and, with the exception of temporary breastworks, it is certain that it had no kind of fortification such as the Portuguese

themselves had found in other parts of Asia.

"The reputation of Malacca had reached the Portuguese as soon as they had arrived in Calicut, and in 1509, ten years after that event, King EMANUEL fitted out a fleet in Portugal in order to establish a trade with it. This was under the command of Diego Lopez de Sequeira, and reached the city in the following year. Here, through the representations of the Mohammedan merchants of Western India trading with Malacca, an attempt was made to cut him off, and some of his people were killed, and others taken prisoners. The ill-conduct of the Portuguese,

indeed, had been such, since their arrival in India, that an act of perfidy to cut them off is easily credible on the part of a semi-barbarous people. Barros, after describing the flourishing condition of Malacca, gives the following account of the effect which the depredations of his countrymen had produced on it:—'This busy trade,' says he, 'lasted until our arrival in India, but the Moorish, Arabian, Persian and Guzrati ships, fearing our fleets, dared not, in general, now undertake the voyage, and if any ship of theirs did so, it was only by stealth and escaping our ships. The king Mahomed of Malacca immediately began to experience a loss in the duties which he levied on trade. As from the great number of ships which had frequented the port, a large revenue had been realized, and now from a few there was but a small one, he began to recompense himself for his loss by plundering the resident merchants, and they, consequently, began to leave the place.'—

Decade II, Book 6, Chap. 2.

"According to Barros, the conduct of Sequeira was, at least, as barbarous as that of the Malay king. 'Finally,' says he, 'seeing so many inconveniences to arise, they agreed that it was expedient to quit the place, and by way of proclaiming their future intentions, Diego Lopez commanded that a man and woman, who had come on board the ships the day of the affray, should have an arrow passed through their skulls, and thus they were landed in one of his boats as a present to the king, who was thus informed through these his subjects that, unless he kept a good watch, the treason which he had perpetrated would be punished with fire and sword.' It was to punish the act of perfidy practised towards Sequeira and his companions that Alfonso Albuquerque, then Governor-General of India, fitted out the expedition which effected the conquest, and which he himself commanded in person. This fleet consisted of nineteen sail, and, according to Barros, the Portuguese troops amounted to no more than 800 men, with 200 Malabar auxiliaries, the latter armed only with swords and shields. The fleet anchored in the Malacca roads on the first day of July, 1511, near a small island, the usual station of the Chinese junks, of which three had already arrived. The first care of Albuquerque was to enter into a negociation in order to rescue the prisoners of SEQUEIRA's fleet, in which he succeeded, and with the information which they furnished, he resolved to attack the city. In his first attempt, however, he met with such resistance that he was either beaten back or found it prudent to retire to his fleet, and it was only in the second assault that he succeeded, and then, in a good measure, through a kind of blockade, which lasted nine days, and by which the Malays were starved into quitting it. 'In the attack,' says Barros, 'Albuquerque confined himself to capturing the bridge, at which he entrenched his troops. In this position he maintained himself for nine days, until the Malays were wearied out and forced to abandon the town. Among them there was such hunger that, in order to pilfer a little rice from houses in which they knew there was a store, they preferred risking their bodies against our steel to losing their lives through want of food.'

"The preparation for and commencement of the first attack is thus mentioned by Barros:—'Next day, which was the vesper of St. Jago, before dawn and to the sound of the trumpet, the captains in their boats repaired to the admiral's ship, and having received absolution from the priest, they instantly made for the land, Alfonso Albuquerque making for the mouth of the river in order to capture the bridge, and the other commanders proceeding to the different points assigned to them. Albuquerque giving the word "St. Jago," the trumpets sounded the signal to engage, and the soldiers set up a shout. Some artillery, brought in the boats, replied to the cannon which the Malays had on the bridge. On this, the air was rent with a confusion of noises, so that the trumpets, the cannon, and the shouts, could not be distinguished from one another, the whole forming a doomsday of fear and terror.' The arms of the Malays consisted of cannon (bombardas), hand-guns (espingardas), bows and arrows, blow-pipes for discharging small darts, swords,

daggers, spears, and bucklers. Among other means of attack by the Malays were elephants, and with the usual result to those that employ them. 'The king and his son,' say the 'Commentaries,' 'who were mounted on elephants, seeing themselves pressed by our men, turned back, with 2,000 men that accompanied them, but some of our men, meeting them at the end of a street, resolutely attacked the elephants with their lances. The first to do this is said to have been Fernao Gomes de Lemos. As elephants bear ill to be wounded, they turned backwards and fell on the Moors, throwing them into confusion. The elephant on which the king was mounted, feeling the pain of its wound, seized the "negro" that guided it with its trunk and dashed him to the ground, on which the king, wounded in his hand, dismounted, and not being recognized, effected his escape.'

"In the first attack the Portuguese set fire to both quarters of the city. From the stockades which he had erected,' say the 'Commentaries,' 'Alfonso d'Albuquerque directed Gaspar de Paiva, with 100 men, now that the sea-breeze had set in, to fire the commercial part of the town, and Simao Martinez, with an equal number, to do the same to the king's palace. When the fire took effect, it consumed a great part of the city, and the Moors, in consequence, kept at a distance

from our people.'-P. 369.

"As soon as the Portuguese had become masters of the town, Albuquerque, as a reward to his troops, gave a general order to sack it, making an exception only in favour of the natives of the Malabar coast, and of the Javanese and Peguans, who had favoured his enterprise. No account is given of the total loss sustained by the Portuguese in the capture, but in the first attack the number of the wounded is stated at seventy. 'Of the Moors,' say the 'Commentaries,' 'men, women, and children, an infinite number perished by the sword, for no one was spared.'

"Barros estimates the value of the plunder taken at 500,000 crusados, which would amount to no more than £62,200, but Castanheda reduces it to no more than two-fifths of that sum. All the authorities seem to agree that the number of cannon captured was 3,000, most of them, in all probability, mere wall-pieces. This is the account given in the 'Commentaries':- 'There were captured 3,000 pieces of artillery, 2,000 of them of brass, and among these was one large gun presented to the King of Malacca by the King of Calicut. The rest were of iron. All this artillery, with its appurtenances, was of such workmanship that it could not be excelled, even in Portugal. There were also captured matchlocks (espingardas). blow-pipes for shooting poisoned arrows, bows and arrows, lances of Java, and divers other weapons, which excited the wonder of the captors. Besides these arms, much merchandise of many kinds was taken. All this, and much besides not stated to avoid prolixity, Alfonso Albuquerque ordered to be divided among the commanders and crews of the fleet, taking to himself only six large brass lions, which he reserved for his tomb. These, with a bracelet, some children of all the nations of the land, and some tributes to be presented to King Dom EMANUEL and Queen Dona Maria, were all lost in the ship Flor del Mar in returning to India. Let no one be surprised, in perusing this narrative, that in Malacca there were taken 3,000 pieces of artillery, for Ruy de Araujo (a prisoner of Sequeira's fleet), NINACHETUAN (chief of the Talingas), and Alfonso Albuquerque stated that in Malacca there were 8,000, and this may be believed for two reasons: first, that in that town there was much copper and much tin, with smelters as good as in Germany, and in the second place, that the city was a league in length, and that when Albuquerque was effecting a landing he was fired upon from all parts, from which it will appear that the number of guns was even small for the extent that had to be defended.'-Chap. 28, p. 380.

"The Portuguese certainly considered the capture of Malacca one of the most glorious of their Asiatic conquests. Castanheda, speaking of the point at which the chief resistance was experienced, says of it, 'and surely until this day, from the time we began the conquest of India, was no enterprise undertaken so arduous as

the affair of that bridge, nor one in which so much artillery was employed or in which so many were engaged in the defence. Moreover, from the play of the enemy's artillery, we received much damage before we had effected a landing.'-Vol. III, p. 195. The enemy that Albuquerque had to contend against was certainly both braver and more skilful and better armed than the American nations over whom, a few years later, Cortez and Pizarro gained their victories. The inhabitants of Malacca, however, when attacked, divided as they were into several different natious, were not unanimous. Thus, shortly after capturing the city, ALBUQUERQUE pursued the King to Muar, and his force is described as having consisted of 400 Portuguese, 600 Javanese, and 300 Peguans. In his meditated attack on the city, the commanders of the Chinese junks, anchored in the roads near his fleet, volunteered their assistance in the storm, but it was declined with thanks, and the reason is characteristic, although not consistent with the help he afterwards accepted. 'The Portuguese never accepted assistance when they fought against Moors, for God, through his apostle, had commanded them to fight them. But he (Albuquerque) requested them to look on and see how the Portuguese fought.'—Barros, Decade II, Book 6, Chapter 4.

"The Portuguese held Malacca for 130 years, a period of disaster throughout, in which, with the exception of courage and daring, they exhibited none of the qualities fit to rule an Asiatic people. Their subjects were Mahommedans, most of those with whom these maintained commercial relations were of the same religion, and against the Mahommedan religion the Portuguese declared a crusade from their first appearance in the Indian seas. Their main object, too, was the establishment of a commercial monopoly, and they made a piratical war on all who opposed them in its prosecution. This policy necessarily raised against them a host of enemies. The expelled Malays made war upon them during their whole occupation of Malacca, and finally assisted in extruding them. They had hardly got possession when they were nearly losing it by famine brought on by their own acts. This was immediately followed by an invasion from Java, and from the kingdom of Achin, in Sumatra, Malacca was invaded no fewer than eight different times. Besides these attacks by the natives of the different countries of the Archipelago, a far more formidable enemy—the Dutch—continued to assail them

for 40 years, until they at last supplanted them by the capture of the city.

"The Portuguese resisted all these enemies with extraordinary courage and fortitude. The Dutch had besieged Malacca in 1606 and 1608, and were defeated on both occasions, and it was not until 1641, and after a blockade, a siege, and an assault, that they succeeded in capturing it, the siege having in all lasted nine months. The Dutch force had amounted to 1,500 men, with Malay auxiliaries to the same number, the storming party to 650. The Portuguese garrison on the capture was found reduced to 200 Europeans and 400 natives. This was the end of the proud conquest of Albuquerque and his companions. The Dutch held possession of Malacca until 1795, or for 154 years, when, during the war of the French Revolution, it was surrendered by capitulation to the British Government, by which it was occupied until 1818, when it was restored to the Netherlands Government, which exchanged it for Bencoolen in 1824. Down to 1813, the principles on which all the three European nations governed the country were those of an exclusive commercial monopoly, and the result of this mode of government was that the country was far poorer than it had been under its native rulers three centuries before."

Turning from the accounts of those who, more or less interested in the events recorded, were apt to colour them in accordance with their own views, let us now refer to the impression produced on the minds of travellers, who were at least presumably free from bias. The first we quote is from "The Navigation and Voyages of Lewis Wertermanus of Rome, in the year 1503":—"Sailing westward towards the city of Malacka, we arrived in eight days' sailing. Not far from this

city is a famous river named Gaza, the largest I ever saw, containing 25 miles in breadth. On the other side is seen a very great island called Sumatra, and is of old writers named Taprobina. When we came to the city of Malacka (which some call Meleka) we were incontinent commanded to come to the Sultan, being a Mahommedan, and subject to the great Sultan of China, and payeth him tribute, of which tribute the cause is, that more than 80 years ago that city was builded by the Sultan of China for none other cause than only for the commodity of the haven, being doubtless one of the fairest in that ocean. The region is not everywhere fruitful, yet hath it sufficient of wheat and flesh and but little wood. They have plenty of fowls in Calicut, but the popinjays are much finer. There is also found sandilium and tin, likewise elephants, horses, sheep, pyne, pardilles, bufflos, peacocks, and many other beasts and fowls. They have but few fruits. The people are of blackish ashe colour. They have very large foreheads, round eyes and flat noses. It is dangerous there to go abroad in the night, the inhabitants are so given to rob and murder. The people are fierce, of evil condition and unruly, for they will obey to no Governor, being altogether given to rob and murder, and therefore say to their Governors that they will forsake the country if they strive to bind them to order, which they say the more boldly because they are near unto the sea and may easily depart to other places. For these causes we spent no long time there, but hiring a brigantine we sailed to the I. of Sumatra, where in few days sailing we arrived at a city named Pidir, distant about eighty miles from the continent or firm land."

The following is from the voyage of John Francis Gomelli Careri, who seems to have visited Malacca in 1505:—"Malacca is situated in 2° 20' N. lat. It contains about 5,000 souls, most of them Portuguese Catholics, better instructed in matters of faith than any in Europe, there being children 10 to 12 years old that answer in questions concerning religion as solidly as a divine could do. The city gives laws to all ships that pass the Straits, obliging them to pay anchorage, whether they put into the port or not. Spanish and Portuguese ships pay 100 pieces of eight each, others less. The Dutch are so hard upon these nations, because they say they paid as much when the Portuguese were masters of it. The English are not only free from the burden, but much honoured. * * * * The port of Malacca is very safe, and has a great commerce from east and west.

* * The dominion of the Dutch reaches but three miles round the city. The dominion of the Dutch reaches but three miles round the city, because the natives being a wild people, living like beasts, they will not easily submit to bear the Holland yoke. They are called *Menancavoes*, very great thieves. Their king, called PAGARIOVON, has his residence at Naning, a village made with mats, ill put together, in the thickest of the wood. No better account of their country can be had, from want of commerce with them."

The next extract is from the travels of CESAR FREDERICK, under date 1564:—
"Malacca is a city of marvellous great trade of all kinds of merchandise, which come from divers parts, because that all ships that sail in these seas, both great and small, are bound to touch at Malacca to pay their customs there, although they unlade nothing at all, as we do at Elsinor; and if by night they escape away and pay not their custom, then they fall into a greater danger after, for if they come into the Indies and have not the seal of Malacca they pay double custom. I have not passed further than Malacca towards the East, but that which I will speak of here is by good information of them that have been there. The sailing from Malacca towards the East is not common for all men, as to China and Japan, but only for the King of Portugal and his nobles, with leave granted to them of the King to make such a voyage, or to the subscription of the Captain of Malacca. These are the King's voyages that every year there departeth from Malacca two gallions; one of them goeth to the Moluccas to lade cloves, and the other to Banda to lade nutmegs and maces."

The next extract from ancient voyages is from that of Newhoff, in 1662:—

"The capital city is likewise called Malacca, being the same in former times called It lies under 2.30 in a bay at the ascent of a hill on the west side of the River Muar (otherwise called the Gaza and Jyga and Kroisant, or, as the Dutch exprest it, Krisarant), which, having its rise deep in the country, divides the castle from the city, and, washing its walls, falls with a rapid current into the sea. Cross this river is a strong bridge built of stone with several arches. * * * It is very populous. * * * The King of Johore besieged the city in 1606 with 60,000 men, the Portuguese having maintained themselves there till 1646, when the Dutch after a siege of four months made themselves masters of it, after the Portuguese had been in possession 130 years. * * * The foundation of Malacca was laid about 250 years before the arrival of the Portuguese in India. About that time one Sangsinga reigned in Sinkepure, situate under 50 minutes of north latitude, and in the neighbouring country of Java one Paravisa, who at his death left his sons under the guardianship of his own brother, their uncle; but he having found occasion to murder the eldest, usurped the throne, at which some of the noble Javanese, being highly disgusted, did, with Paramisora, their late king's youngest son, fly to Sinkepure, where they met with a kind reception from Sangsinga, but it was not long before Paramisora, in combination with his Javanese, murdered Sangsinga and put himself in possession of his kingdom. The King of Siam being highly exasperated at the treachery against Sangsinga, his vassal and son-inlaw, forced the Javanese to quit the country, who, being now obliged to seek for a new habitation, settled themselves near the River Muar, where they built a stronghold called Payopayo, beside the Javanese. PARAMISORA was followed by 2,000 others called Cellati, who live upon fishing and robbing; but, though they had been very instrumental in Sinkepure, he did not think fit to receive them within his new built city, which made them settle their colony about 3 or 4 leagues from the River Muar, not far from where Malacca now lies, where they joined with the inhabitants, who were half savages, since which time their language is called the Malaya language. But when they became straitened for room some of them settled themselves about 4 of a league from thence on a hill called Bitan surrounded with a large plain. PARAMISORA being taken with the conveniency and pleasant situation of this place abandoned Payopayo, and transferred his colony near this place, which afterwards was called Malacca, i.e., 'banished persons,' in memory of the exiled Javanese. Saguan Dorsa, son of Paramisora, succeeded him in the kingdom, and, having submitted himself as a vassal of the King of Siam, reduced the whole country of Sinkepure to the East as far as Porto on the isle of Zambilan, which lies west of Malacca, a tract of land 40 leagues in length. His successors found means to shake off the yoke of Siam, especially after they were, by the Persians and those of Sinat, brought to the Mahommedan religion. The King of Siam, in 1502, about nine years before the Portuguese became masters of Siam (Malacca?), did attack the King of Malacca with a fleet of 200 sails, aboard of which were 6,000 soldiers under the conduct of the Governor of Ligor, but the fleet was scattered by a storm.

"The harbour of Malacca is one of the finest in all the Indies, being navigable at all seasons of the year, a conveniency belonging scarce to any others in the Indies. Whilst the Portuguese were in possession of it, this city was very famous for its traffic and riches in gold, precious stones, and all other varieties of the Indies, Malacca being the key of China and Japan trade and of the Molucca Islands and Sunda. In short, Malacca was the richest city in the Indies, next to

Goa and Ormus.

"The Portuguese used to take ten per cent. custom of all ships passing that way, whereby they got vast riches, but the Dutch E. I. Co. has abolished this, looking upon it as an unreasonable imposition, and are contented to traffic there. Malacca is a country producing but very little itself, but must be looked upon as the staple of the Indies. * * In short, there is such vast traffic and concourse

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of merchants here that from them probably it got the name of 'Golden Chersonesus' among the ancients, Malacca being certainly the richest harbour that can be seen, for formerly and to this day the merchants were so rich here that they used to compute by no less than by bars of gold."

"Sinkepure lies on the most southern point of all Asia, about half a degree to the north of the line and 20 leagues from Melacca. " " To the south of Melacca is a small island of about half a league in compass, by the Portuguese called Isle das Nâos or Ship Island. Two leagues from Melacca is a pretty large island called Sapta."

The foregoing extracts give sufficiently graphic sketches of the State of Malacca to a little over two and a quarter centuries ago. We will now give a short précis of its fortunes, taken from Mr. Skinner's excellent article on "British Connection

with Malaya":-

"Malacca having been taken from its Malay Sultan, Mahmud Shah, by the Portuguese under Albuquerque in 1511, to punish an attack upon his lieutenant, SEQUEIRA, in 1509, it was held by them till 1641, when the Dutch, after several fruitless attempts, succeeded, with the help of the Achinese, in driving them out. The place remained under Dutch government till August 25th, 1795, when it was taken military possession of by the English. The Dutch Government was dissolved on December 4th of that year; and the English administration which took its place under Admiral Mainwaring abolished the Dutch system of monopoly in the Straits, as RAFFLES afterwards did on a wider scale in 1813. Malacca was held by the English till 1818, at which date it was restored to the Dutch, in accordance with the Treaty of Vienna. It came finally into our hands under the Treaty with Holland of March, 1824, in exchange for our Company's Settlement at Bencoolen, and other places on the west of Sumatra. By that treaty it was also arranged that the Dutch should not again meddle with affairs, or have any settlement on the Malay Peninsula, the British Government agreeing, at the same time, to leave Sumatra to the Dutch, saving only Achin in the north, of which the independence was protected until the recent Treaty of 1872.

"A few years after reoccupying Malacca, a small force of Sepoys had to proceed against Naning, the interior district of Malacca, in which Dutch sovereignty had apparently never been fully admitted. Our first expedition (1831) failed; the second (1832) succeeded. In 1833 a treaty was made, settling the S.E. boundary of the Settlement as at present. There has been no disturbance in

any part of Malacca since the 'Naning War.'

"When Malacca was taken possession of by the Portuguese in 1511, it was one of the grand entrepots for the commerce of the East, and it so continued till the close of the sixteenth century; but as the Portuguese and other European nations pushed to the East, in the Archipelago and neighbouring countries, the trade of Malacca gradually declined, and the place ceased to be of much consequence as a collecting centre, except for the trade of the Malayan Peninsula and the Island of Sumatra. This trade it retained, under Dutch rule, till the establishment of Penang in 1786; when, in the course of a few years, it became, what it has ever since been, a place of no commercial importance, but possessing some agricultural resources. Penang soon acquired most of the trade of the Malayan Peninsula and Sumatra, Borneo, the Celebes, and other places in the Archipelago, not reduced to mercantile subjection by the Dutch; but soon after Singapore was established, Penang in its turn declined in importance, the greater part of the extensive Eastern trade being centred at Singapore. [Penang's local trade has, however, largely increased within the last few years, in consequence of the increased prosperity of the extensive tin mines in Larut, Renong, Junk Ceylon, the tobacco plantations on the E. coast of Sumatra, &c.] The opening of Singapore in 1819 may be said to have accomplished for the time being, the ruin of Malacca's commerce. To use RAFFLES' own words at the time, 'the intermediate station of

Malacca, although occupied by the Dutch, has been completely nullified."

One of the most romantic episodes in the history of the town was connected with the visits to it of St. Francis Xavier, "the Apostle of the Indies." On the first occasion, in 1547, he described the inhabitants as living in the commission of all crimes, "without fear of laws, ecclesiastical or civil. Avarice, intemperance, uncleanliness, and forgetfulness of God were everywhere predominant, and the habit only, or rather the excess of their vices, distinguished the Christians from the unbelievers." St. Francis' teaching, however, produced a temporary effect, but on his subsequent visit he found the people had relapsed into their former iniquities. "Before his final departure," says Mr. T. Braddell in his article on the "Ancient Trade of the Indian Archipelago," "Malacca was publicly cursed. Standing in the church door, the Saint took off his sandals, struck from them the dust, and, declaring the place accursed, refused to bear away so much as even the dust from the earth. The curse is said to rest on Malacca to the present hour, and is frequently brought forward to account for the wretched state of decay and misery in which the place is now (1858) found."

Under British rule, however, such a description as that contained in the last sentence is no longer appreciable. That its former fortune has entirely decayed cannot be denied. But there is probably as little misery in either the town or

settlement as in any other portion of our colonial empire.

Geology.—The geological formation of the territory of Malacca consists chiefly of granite rocks, overlaid in several places by the red cellular clay ironstone called by geologists laterite. Many of the low plains are alluvial, the soil composed of decayed vegetable mould intermixed with sand. The metallic ores are iron, gold and tin. The surface generally is undulating, consisting of low, round ridges and narrow valleys, the only mountain of considerable elevation being the Ledang of the Malays, and the Ophir of the Portuguese, 4,400 feet above the level of the sea, or less than one-half the height of the principal mountains of the volcanic islands of Java, Bali and Lomboc, or those of the partially volcanic

neighbouring Island of Sumatra.

MINERALOGY.—The mineral products of Malacca were at one time looked upon as offering valuable prospects. Gold to the extent of 1,500 ounces yearly was obtained in 1857–8, but the yield decreased to such an extent that it is no longer worked. Tin, about the same period, assumed considerable importance. The first mines were opened in 1793, but no great enterprise was displayed until 1848, when some 5,000 cwt, was the annual product. This increased until 1858, and a large number of Chinese were employed in the industry. The superior yield of the Native States, however, combined with the exhaustion of the surface washings, resulted in mining enterprise in Malacca being virtually abandoned, although both gold and tin probably still exist in workable quantities. Mount Ophir, just beyond the E. border of the Settlement, and its immediate neighbourhood, is undoubtedly auriferous, as is also Chindras on the N. border, some 15 miles from Mount Ophir. The failure of a local company formed some 13 years ago to work the mines has, however, damped foreign enterprise, the want of roads for transport being the chief difficulty.

CLIMATE.—The climate of Malacca, as to temperature, is such as might be expected in a country not much more than 100 miles from the equator, lying along the sea-shore—hot and moist. The thermometer in the shade ranges from 72° to 80° of Fahrenheit, seldom being so low as the first of these, and not often higher than the last. The range of the barometer is only from 29.8 to 30.3 inches. Notwithstanding constant heat, much moisture and many swamps, the town at least is remarkable for its salubrity, and, with the exception of the early period of its occupation by the Portuguese, has always enjoyed

this reputation.

FAUNA.—Malacca offers numerous attractions to the ornithologist and entomologist, but is less rich in mammals than many other tropical districts. Nine species of quadrumana, the tiger, black leopard, wild cat, several species of viverra, such as the musang and binturong, the elephant, one-horned rhinoceros, tapir, six species of deer, and two of the wild ox, comprise a nearly complete list. Most of these are referred to under their respective headings, the remarks under each applying to the entire Peninsula. Fair sport can be obtained by those fond of shooting, from tiger to quail. It is noteworthy that the existence of the tapir was unknown until 1816, although European intercourse dated back to some three centuries before. Tigers in the early days of Portuguese occupation were so plentiful that the want of inhabitants was seriously attributed to this cause.

As with the birds and insects, so with the reptiles. The snakes, lizards, and crocodiles are, as a rule, those of the Peninsula generally, the birds alone presenting a rather larger variety than those of other districts. Nor does the vegetation present any exclusive features, being that of the surrounding States. The coast line is poor in shells, and the absence of limestone accounts for the few species of

land shells found within the district.

AGRICULTURE.—The following remarks by CRAWFURD on the poverty of the soil in Malacca were evidently written on imperfect information:—"Some English writers have dwelt on the eminent fertility of the soil of Malacca, apparently judging it by the luxuriance of its vegetation. Facts contradict such a flattering notion of it. In a practical sense, a country can only be considered fertile when it produces the cereal grasses, that is, the best human food with comparatively little labour, and this proof is eminently wanting in Malacca. It has no chain of high mountains yielding a perennial supply of water for irrigation. With Malacca, the result of this absence is, that it has not only never exported corn, but never even furnished enough for the maintenance of its own scanty population, always—even down to our own times—importing it, first from Java, then from Bali, Siam, and Arracan. The Portuguese conquerors had formed a far juster estimate of the capabilities of the soil of Malacca than ourselves. Barros expressly calls the country a 'barren land' (terra esteril), and informs us that, immediately after the conquest, a dreadful famine ensued, in consequence of the junks which brought the usual supplies of food from Java being stopped and seized by the expelled Malays, while the Portuguese themselves were prevented by an adverse monsoon from repairing to that island for a supply." Facts, however, contradict this estimate, as in reality Malacca padi commands a high price, and it supplies large quantities of fruit to other ports. The reason for the comparative unproductiveness of the soil lies in the circumstance that the Malays do not plant for purposes of trade, but simply to supply their own immediate wants. Short-sighted and careless of the future to a degree scarcely comprehensible to Europeans, their want of energy invariably results in an insufficient supply and the consequent necessity of importation. Properly cultivated, Malacca might, in this respect, be self-supporting. The chief agricultural industry at this moment is tapioca, to which the recent recovery of the market has given an essential impetus.

TRADE.—The trade of Malacca is comparatively insignificant, except as regards articles of domestic use. Since the abandonment of tin-mining, but little has been done in the way of exports, its agricultural resources alone enabling the Settlement to pay its way. A good import business is carried on from Singapore in the way of household necessaries, but no important article except tapioca figures in the list of exports. The development of the territory, owing to the formation of good roads, has nevertheless been very satisfactory. In 1853 the imports were valued at £248,385, and the exports at £337,058. For 1887 they were \$3,833,311 and

\$3,985,308, respectively.

POPULATION.—"In 1847 the population of the whole territory of Malacca," says Crawfurd, "was reckoned to be within a fraction of 55,000, which, on the

estimated area, gave 55 inhabitants to the square statute mile, the majority, however, being comprised within the narrow compass of the town and its vicinity, which consequently left the greater portion of the country either very thinly inhabited, or a mere jungle. The population then consisted of 2,784 Europeans and their descendants; 10,589 Chinese and their descendants; 33,473 Malays; 6,875 natives of Hindustan and their descendants; and about 1,000 natives of the islands of the Archipelago. The remainder consisted of a few Arabs, Siamese, and African negroes. In 1828 the population had been estimated at no more than 28,000, so that, in about twenty years' time, it must have nearly doubled, if these figures be correct. By the latest census (of 1881) the total population is given as 93,579, or nearly double that of 34 years before. Of these, 19,700 were Chinese, and 67,000 Malays, the Europeans numbering 40, and Eurasians 2,213. The absence of any troops probably accounts for the enormous difference between

GOVERNMENT.—The Government is administered by a Resident Councillor, assisted by a Magistrate, Collector of Land Revenue, District Officer, Harbour Master, Police and Prison staff, Medical staff, &c., the majority being under heads

of departments residing at Singapore.

Revenue.—The revenue of Malacca is derived from the same sources as that of the other British, and generally of the Dutch, possessions in the Archipelago, namely, from excise licenses for the vend of opium, spirits, and the like, together with the land revenue, now of considerable importance. As elsewhere, much of the revenue is realized on the principle of farming, the farmers being always Chinese. As at Penang and Singapore, no custom duties, or any other charges on ship or cargo, except light-dues, exist. In 1847, the total net revenue amounted to £19,272, of which £3,427 consisted of a tax on the rent of houses assessed for municipal purposes. This amounted at the exchange of the day to a tax per head of better than 8s., which was more than the rate paid in any part of continental India, and chiefly ascribable to the Chinese, who were the principal contributors. The expenditure was enormous, having amounted in the same year to no less than £51,783, or 168 per cent. beyond the receipts. It must be stated, however, that a very considerable portion of this expenditure was factitious and extrinsic, such as the expenses of convicts from continental India, the salary and establishment of a non-resident Governor, and a share of the charge of two war steam-ships engaged in the protection of the general trade of India from piracy. Certain estates, the fee simple of which had been alienated by the Dutch Government to private parties, were bought up for £1,000 a year by a former Governor, and others are being bought up under the Tithes Impropriators Ordinance sanctioned in 1887.

The immense increase in revenue since 1847 will be seen by the following

figures :-

1868	***		**	\$112,725
1875	***	***	***	\$118,307
1887		***		\$306,763

The revenue for 1892 was \$294,507. The expenditure, in the latest returns available, is included in that of the sister settlements.

TOPOGRAPHY.—The territory of Malacea is divided into 38 districts, some of these, however, being known locally by other names; but it will suffice, for the purposes of this work, to state the principal divisions in alphabetical order, viz. :-

> Aver Pah Abas. Batu Berendam. Blimbing. Bringin. Bukit Linggei.

Chabau. Chinchin. Durian Tunggal. Gading. Jasin.

Juse.
Kessang.
Kwala Sungei Bharu.
Linggi, R. and Kwala.
Lundu.
Machap.
Mak.
Malakka Pindah.
Melakek.
Merlimau.
Nyalas.
Padang Sebang.
Parit Melana.
Pigou.

Pondok Kompas
Pulau Sebang.
Rim.
Sungei Bharu Ilir.
Sungei Bharu Tengah.
Sungei Bharu Ulu.
Sungei Petei.
Sungei Petei.
Sungei Udang.
Tabu.
Tabong.
Tangga Batu.
Tanjong Rimau.
Umbei.

RIVERS.—There are no important rivers within the territory, the largest—Sungei Malakka—which takes its rise in the Juse district, being insignificant in width. The Duyong, about 2½ miles to the E., is only 13 miles long. The Kessang, which divides it from Muar, and the Linggi between Malacca and Sungei Ujong, are the only two streams of any importance, although numerous little rivers flow into the sea.

MOUNTAINS.—No mountains, and but few hills of any elevation, exist, the territory being, as a rule, flat and well adapted to the purposes of cultivation.

DESCRIPTION.—The town lies upon an open roadstead, of which the only advantage is its immunity from stormy weather, variable winds of little force, or complete calms, nearly always prevailing. Short heavy squalls, called "Sumatras," are sometimes experienced, but they seldom cause much damage. The shallowness of the water, however, obliges vessels to lie at from one to two miles off the shore, and the advantageous geographical position of the port was the sole reason of its importance before its eclipse by the sister Settlements of Singapore and Penang.

Landing at the jetty, the visitor finds himself on a road winding round the hill upon which formerly existed the Portuguese fort surrounded by a wall, now destroyed. Grouped at the base are the Stadthouse, court-house, gaol, the site of the old Inquisition and convent, the police office, post office, school, and master attendant's office. The military and hospital buildings were formerly within the same circle, but are no longer used for these purposes. Upon the summit of the hill are the ruins of the Church of Our Lady do Monte, erected by Albuquerque, whence, according to received legend, St. Francis Xavier solemnly cursed the ungrateful and profligate town as he shook its dust from his feet before departing on his last voyage to China. The eastern end, which alone retains a roof, has for many years been used as a powder magazine. The grass-grown pavement of the nave contains numerous tombstones (some dating back to the time of Albuquerque himself) of long-forgotten priests and soldiers. What appears to have once been the belfry is still inhabited by the signalman, who signals passing vessels to the town below, and keeps the light burning by night, which forms the main guide to vessels entering the roads after dark. Tradition is singularly silent regarding the church, beyond the fact of its erection by ALBUQUERQUE. There is no record of when it exchanged the solemn pomps of Catholic service for its present ruinous and dismantled condition, but it seems probable that this latter dates from 1641 (just 130 years after its erection), when the Dutch, as above related, captured the town after a siege of nine months. Sir Frederick Weld, K.C.M.G., whilst Governor of the Straits Settlements, placed a tablet in the ruins commemorating St. Francis XAVIER'S visit to the place. (See XAVIER.)

Just below the church is situated the residence of the Resident Councillor.

The Stadthouse, above referred to, contains most of the public offices, is generally the residence of the Magistrate, and affords accommodation to the Chief Justice and other officials when they visit the town.

A subterranean passage formerly existed from the church or convent to the foot of the hill, the outer entrance being still open. But although several attempts have been made to explore it, the earth has so fallen in a short distance from the mouth, that no success has attended them.

A little to the south is the Hill of St. John, and in the rear that of St. Francis. Upon both still exist the remains of Portuguese and Dutch forts commanding the eastern and southern portions of the town. Smaller hills intervene, mostly used as

Chinese cemeteries: the most important is called Bukit China.

As already stated, a small river divides the town into two parts, and the principal business quarter is situated on the right, or N. bank. Three large thoroughfures run parallel to the coast, one continuing as far as Limbongan. This contains many well-built houses inhabited by descendants of the Dutch possessors and by the better-conditioned Klings, Chinese and Malays. The Anglo-Chinese College, once the head-quarters of Morrison and the few sinologues who then existed, is in this road, now known as Heeren Street. Numerous interesting drives can be made by those who desire to see the place more fully than by viewing it from the hill. There is an old-world look about it that is rather fascinating, but the absence of relics of the past—if the old archway forming an entrance to the fort be excepted—is somewhat striking, and a visitor unacquainted with the history of the place would scarcely give it credit for the romance surrounding it.

Public Buildings.—There are no public buildings, except those already referred to, and the three churches—Protestant and Catholic. The former is an ugly edifice, built by the Dutch, and stands in the square opposite the Stadthouse. The two Catholic churches are respectively under the charge of Portuguese and French priests. The Portuguese one is an ancient building, but the French church has, on the contrary, some pretensions to impressiveness. The latter, though built only some 35 years ago, the stucco used for its exterior gives it a look of antiquity which deceives most people, who are much astonished to learn that it is the offspring of a very recent enterprise.

Places of Amusement.—None, except Chinese theatres.

SOCIAL ASPECT.—Malacca numbers but few Europeans amongst its population, but a hospitable and well-to-do class, more or less purely descended from its former possessors, form an appreciable portion, and they perpetuate the names celebrated in its history, notably that of Albuquerque. Many wealthy Chinese also are found, who are ever ready to welcome strangers duly introduced.

The following statistics give the average for the past few years:-

Clergy a	***	11				
Officials	and clerks,	&c., other than (Chinese	***	***	106
Persons	connected v	vith Schools and	Librari	ies		14
**	**	Banks	**		244	3
"	**	Telegraphs	***		***	2
**	17	Mercantile	firms,	European	and	
		Eurasia	ın	***	***	27
**		Chinese Mer	nbers o	f Firms		56

It must, however, be borne in mind that these numbers only represent those whose names appear in the Directories, and that, as regards the Chinese and the

poorer class of Portuguese especially, larger figures might be given.

Malacca Canes (Samambu).—Not, as the name would imply, grown at Malacca, but a species of rattan imported from Borneo and other places, and originally offered for sale to Europeans at Malacca. They are largely used for fences, only the best being reserved to become walking-sticks.

Malacca Fish.—Often known as "Macassar fish." A small fish from 2 to 6 inches in length, which, having been cleaned and deprived of its head, is salted in quantities and placed under pressure in flat earthenware vessels. After two or three days of this treatment, they are washed and saturated with toddy vinegar; ginger, peppercorns, brandy and "red rice" being added ("red rice" is bras pullut steeped in an infusion of cochineal). The result is a deep brick-red colour to the fish, which is then covered with vinegar in bottles for sale. It is locally known as ikan mas.

Malacca Straits.—This is the name given to the channel which separates the Malay Peninsula from the Island of Sumatra, but the Malays have no name for it, for it is not consonant to their practice to give the appellation of strait (selat) to so large a body of water, whatever its form. The Straits of Malacca form, in fact, almost a land-locked sea, in which variable winds prevail, and in which the monsoons are felt only for a few miles at both extremities. Their extreme length is about 500 miles, and their breadth varies from 40 up to 300. At their western end there are many islands, chiefly towards the Malayan shore, half a dozen of which, including Penang, are of considerable size. At the eastern end they are almost innumerable, about a dozen of them, including Singapore, being large. The Straits of Malacca form the usual channel through which is carried on all the intercourse of the countries of Asia east and west of them. The dangers which impeded the navigation in the middle of the passage from sandbanks, and at the eastern entrance from countless islands, have of late years been obviated by the construction of two lighthouses by the British Government. The first notice we have of these straits is by Ludovico Barthema, a native of Bologna, who seems to have visited Malacca about 1503, or six years before the visit of Sequeira, and he would seem to have taken them for a salt river. "Opposite to that city (Malacca)," says he, "there is a very great river (Fiumara), than which we had never seen a larger. It is named Gaza (?), and appears to be about 15 miles broad."—Ramusio, Vol. I, p. 166.

Malakka Pindah.—A district 11 miles N. of Malacca-town. A reach of the Malacca river close by is called Kwala Malakka Pindah. Two villages, one on the N. and the other S. of a small range of hills called Bukit Panchor, are called by this name. Fruit-trees flourish exceptionally well in this neighbourhood.

Malakoff Estate.—Known to the natives as Ara Rendang, from the small village of that name beside it, is 9 miles 6 furlongs N.E. from Butterworth, Province Wellesley. It was originally opened by Mr. E. Chasseriau as a sugar estate, but is now, and has for some years been, under tapioca, with considerable success. The manager occupies a very well-built house close to the works.

Malang.—Rocks visible at high water—such as M. Sakit Mata and M. Tikus, near Pulo Babi, off the S.E. coast of Pahang.

Malang Hitam. — On S.W. face of Blakang Mati Island, S. of Singapore.

Malay.—The word is correctly Malayu, in the language of the Malays themselves. A people of the brown-complexioned race, with lank hair, speaking the Malay language, is found in greater or lesser number all over the Archipelago, from Sumatra to New Guinea, and from the Peninsula to Timor. It is, however, only in Sumatra, the Malay Peninsula, and islands adjacent to its coasts, and in Borneo that they exist in large numbers, and have a distinct independent nationality, for everywhere else they are found only as settlers or sojourners among indigenous populations. With the exception of a few wandering negritos, they form the entire population of the Malay Peninsula and its adjacent islands, and their number here has been estimated at about a quarter of a million. In this

number, however, is no doubt included many not of the original Malay stock, but who, adopting their language, manners and religion, came, in process of time, not

to be distinguishable.

The Malay nation may be divided naturally into three classes—the civilized Malays, or those who possess a written language, and have made a decent progress in the useful arts; the gipsy-like fishermen, called "the sea-people;" and the rude half-savages, who, for the most part, live precariously on the produce of the forests. The civilized Malays consist of the inhabitants of the Malay Peninsula. The sea-gipsies are to be found sojourning from Sumatra to the Moluccas, but are most numerous among the narrow seas of the many islands lying between Sumatra and the Peninsula towards the eastern end of the strait that divides them. The only habitations of this people are their boats, and they live exclusively by the produce of the sea or by the robberies they commit on it. The most usual name by which they are known is *Orang-laut*, literally, "men of the sea," but they are also sometimes called *Rayat-laut*, or "sea-subjects," the Arabic word for subject being here used to express their dependence on the princes of the civilized Malays. Another name for them is Sika, and a very frequent one Bajau, which seems to be only the Javanese word bajo, a robber, with a Malay termination. The rude, wandering class, speaking the Malay language, is found in the interior of the Malay Peninsula, in Sumatra, and in the islands lying between them, but in no other part of the Archipelago. They are known under the name of Orangutan, men of the woods, wild men, or savages. The most general name for them is Orang-benua, that is, "men of the soil," or aborigines, but in some parts they are called Sakei, which means followers or dependents. These are, all of them, names given by the civilized Malays, for among themselves the many tribes into which they are divided are known only by the names of the localities which they frequent, as Udai, Jakun, Sabimba, Bâsisi, &c.

These three classes of Malays existed near three centuries and a half ago, when the Portuguese first arrived in the waters of the Archipelago, just as they do at the present day. That people describes them as having existed also for two centuries and a half before that event, as without doubt they did in times far earlier. Thus Barros describes the first class of Malays as men "living by trade, and the most cultivated of these parts;" the second as a "vile people," whose "dwelling was more on the sea than the land," and who "lived by fishing and robbing;" and the third as "half-savages" (quasi meios selvages), while the Malay

language was common to all of them.

The question of the parent country of a people so widely spread over the Archipelago, which has exercised so large an influence over the other population of the same region, and of whose tongue clear and unquestionable traces are found. not only in those of the Philippines, but of the South Sea Islands, and even of remote Madagascar, has been much debated, but certainly not settled, nor, indeed, likely ever to be precisely determined. The Malays themselves, like all people in the same state of society, have no true history. The books which have been called their Annals are, in reality, romances, and indeed so called by themselves. The quality of these productions may be judged from the example of one of them translated by the learned Dr. LEYDEN, and which is deemed the most authentic. It is called Sajarah Malayu, which is rendered "Malay Annals," and stated to have been composed in 1612, at Malacca, of course under the government of the Portuguese. This was framed from a Malay manuscript which had been brought from Goa, and entitled a hakayat, the Arabic word which the Malays use, in common with the Sanskrit one, charitra, for a tale or romance. Even the name given to these Annals themselves is not Malay, but Javanese, and misspelt in adoption. They are without a single date, and indeed, for the period of Malay history which preceded the conversion to Mahommedanism, there could hardly have been any dates, as the Malays are not known to have had an era from which to reckon. The

narrative is a wild tissue of fable often drawn from Hindu and Arabian mythology, and the personages that figure in it not unfrequently Arabians and Hindus. It is conclusive of the worthlessness of such writings that the Malays have long ago converted even the events of the Portuguese conquest of Malacca into a mere romance.

In order to conjecture what may have been the parent country of the Malays, and to form some notion of their early history, nothing better than a reasonable hypothesis can be offered. The name of the people gives little assistance in this inquiry. The word Mâlayu is an adjective which requires to have a noun prefixed in order to give the sense required, as orang Mâlayu, a Malay or Malays; tanah Mâlayu, the "Malay land," or land of the Malays; and bahasa Mâlayu, the Malay language. Mâlayu is, no doubt, the name of the original tribe or nation, and its source is obscure and untraceable. We need not, indeed, go further than our own language for a name as obscure, for Angle, as applied to ourselves, our country and our language, is as difficult to trace as Mâlayu applied to those of the Malays.

It is natural to look for the parent country of the Malays where this people are most numerous, and least intermixed with other nationalities; and this locality can be no other than either Sumatra, the Malay Peninsula, or the islands lying between. The Malays themselves called the Peninsula tanah Malayu, that is, the "Malay land, or country of the Malays;" and they designate its wild inhabitants, speaking the Malay language, as the orang banua, literally, "people of the soil," or, as we should express it, "aborigines." The term "land of the Malays" is, however, given to the Peninsula by the civilized Malays, perhaps only on account of its being the only country almost exclusively peopled by Malays; whereas in Sumatra and Borneo they are intermixed with other populations. The term "men of the soil," applied by the civilized Malays, may, in the same manner, be used by them only to distinguish the rude natives from themselves, claiming to be foreign The expression, however, would seem to imply that the civilized Malays considered the wild tribes, speaking the same language with themselves, as the primitive occupants of the land. But the same wild tribes, speaking the Malay language, although not distinguished as "men of the soil," exist also in Sumatra, and more especially on its eastern side opposite to the Peninsula; and they are found also in several of the islands lying between these countries, extending even to Banca and Billiton.

The first seat of the Malayan nation may, therefore, be either the Malay Peninsula, Sumatra, or the islands lying between them; and, as in the instance of the Polynesian people of the islands of the Pacific, where we find men speaking the same language and of the same race, from the Sandwich Islands to New Zealand, and from the Friendly Islands to Easter Island, it is difficult or impossible to determine on a particular locality for an original seat. The origin of Malay civilization, however, is quite a distinct matter from that of the nation; and we may be tolerably sure that this did not spring up in the Peninsula, or islands adjacent to it, for no civilization has ever sprung up in any part of the globe in a country of such a physical character—in a region covered with an obstinate tropical forest, destitute of open plains, composed of mountains without table-lands, without natural facilities for irrigation, and with a stubborn or sterile soil. Such obstacles would be insuperable in the early and feeble stages of society, and, indeed, in the Peninsula, have not been conquered even in a more advanced one. The only Malay State within it that ever acquired any degree of eminence was Malacca; and it owed it to the strangers who founded it, and to the convenience of its position as a commercial emporium; assuredly not to the fertility of a soil which never raised sustenance enough for its inhabitants, many of whom still continue in the condition of mere savages.

All the civilized Malays of the Peninsula claim their origin from Sumatra and from Menangkabau, the most powerful State of that island; but they do not pretend to state the time or the cause of their migration. Some of the States of the interior even called themselves "men of Menangkabau," their chiefs receiving an investiture from that place. Indeed, the migration from Menangkabau to the Peninsula, although in dribblets, goes on down to the present time. The Malays of Borneo, in like manner with those of the Peninsula, claim their descent from the

same Menangkabau.

The claim of Malays beyond Sumatra of being colonies from a country in the heart of that island, is probably, after all, no better than a myth, founded on a desire to claim a descent from a country which had, at one time, acquired more power and distinction than any other inhabited by Malays. The apocryphal Malay chronicle, for such without a doubt it is, referred to in the article on Malacca, does not, however, refer to Menangkabau, but to Palembang, as that part of Sumatra from which Singapore first, and afterwards Malacca, was founded. This probably arose from the real founders of both, as has been attempted to be shown elsewhere, not having been Malays but Javanese. Even, however, supposing the emigrants in these cases to have been Malays, and the statement to be trustworthy, the mere peopling of two small places, and this, too, at a time by near a century posterior to the Norman conquest of England, would be neither an account of the parent country of the Malay nation, nor a history of its

migrations.

To account for the civilization and migration of the Malays (to fix their original seat is hopeless), the most probable supposition seems to be, that the wandering tribes of the Sumatran coast, or of the Peninsula, or of the islands between them, after they had learned the construction of boats, after they had acquired some nautical skill and enterprise,—after they had, in a word, become the sea-gipsies which some of them still continue to be, -in process of time reached lands more promising than their own, and there settled, abandoning, to some degree, their habits as fishermen, and addicting themselves to agriculture. By such a progress they would, in due course, become what most of the civilized tribes of Malays are at the present day—half-fishermen and half-husbandmen. Of such tribes, there existed in Sumatra, at the time of the arrival of the Portuguese, no fewer than nine-and-twenty; while in the Peninsula there were, at least, eight. All of these were at or near the coast, and invariably at the mouth or on the banks of a river. The maritime character of the Malay nation is, indeed, impressed on its language, and discoverable in the copiousness of its meteorological and nautical vocabulary. Thus, the compass is divided into sixteen points with specific names, all native; and there are peculiar idiomatic terms for windward and leeward, signifying literally, "above the wind," and "below the wind." The river, the favourite and familiar locality of the Malay nation, affords room for a curious variety of expression:—Kwala and muwara signify "the mouth," and ulu "the source" of a river; ilir is to "descend," mudik to "ascend" it, these last terms signifying, at the same time, "the interior" and "the sea-board." Teluk means "a bight," or "cove," and rantau "a reach;" but they also signify a district of country, which is moreover frequently called anak-sungei, "child of the river."

There is but one country eminently favourable to the development of an early civilization, in which we find the Malay nation planted—Menangkabau, so often referred to in Malay story. This is in the centre of Sumatra, among the fertile valleys of the volcanic mountains, rising to a height exceeding 10,000 feet; in short, in a locality of similar features to Java, and the islands immediately to the east of it. Sir Stamford Raffles, who had visited Menangkabau, declared that it was as populous and well cultivated as any part of Java that he had seen, which is assuredly what cannot be asserted of any other country whatever inhabited by Malays. The great probability then is, that this country was peopled by the Malays of the eastern coast of Sumatra penetrating into the interior of the island by the principal rivers which have their source in it. This, indeed, is distinctly

asserted in the traditions of the Malays themselves. In this favourable position they would naturally acquire a degree of power which the same people have certainly nowhere else reached. It is, no doubt, the possession of this comparative power which has caused the maritime Malay States to look to it with respect, and claim their origin from it. Malay tradition, however, by no means asserts that Menangkabau was the primitive seat of the Malayan nation; but, on the contrary, affirms that it was itself peopled from Palembang, in the same island.

The Javanese, as already intimated, appear to have had no inconsiderable share in the civilization of the Malays; and although there is certainly no historical record of it, there is satisfactory proof. The Javanese would seem to have been even the founders of Malacca. Monuments, which prove the presence of this people in the country of the Malays, have even been discovered. Thus, Sir Stam-FORD RAFFLES, when he visited Menangkabau, found there inscriptions on stone in the ancient character of Java, such as are frequent in that island; and he was supported in his conclusion that they were so, by the learned natives of Java who accompanied him in his journey. The settlement of the Javanese in several parts of Sumatra is, indeed, sufficiently attested. In Palembang, they have been immemorially the ruling people; and although the Malay language be the popular one, the Javanese, in its peculiar written character, is still that of the court. In the State of Jambi, which borders on Palembang, Hindu images, identical with those of Java in all respects, except that the material is granite instead of trachyte, have been discovered. Probably as much as one-fourth part of the Malay language is equally Javanese, and in a good many instances of compounded words, their Javanese origin is satisfactorily made out through their elements, themselves without significance, in the Malay language. One example will suffice. founder of the States of Menangkabau, who is stated by Malay tradition to have come from Palembang, is called SANG SAPURBA. The word sang is not Malay but Javanese, and signifies, literally, "a flower," but is frequently prefixed to the titles of personages of distinction, as sang-prabu, or sang-aji, "a king;" sang-yogi, "a devotee;" and sangywang, "a god" or "deity." Sapurba is composed of the article sa, "one," and the Sanskrit purba, "first" or "beginning." The name, in fact, has much the appearance of one fabricated for the occasion. To these evidences of Javanese influence, it may be added, that Malay literature has nothing original of its own; being, when not drawn from Arabic sources, borrowed from the fictions of Java, or the mythology of the Hindus, such as the latter was in

It is remarkable that Barros, drawing his information, no doubt, from the traditions furnished by natives to the Portuguese conquerors, expressly states that the Sumatrans themselves considered that the Javanese were once masters of their island. "It is held by themselves," says he, "that the Javanese (Jaos) had been once masters of their great island, and that prior to the Chinese (Chijs), they conducted its commerce, as well as that of India."—Decade III, Book 5, Chap. 1. The authority of Barros in this case, no doubt, suffers some depreciation from his asserting afterwards that the Javanese themselves were a people of Chinese origin, a derivation which he founds on their supposed imitation of the policy of the Chinese, and of their skill in the mechanic arts. This assertion, however, is but an hypothesis of his own.

The reliable history of the Malays began only with the arrival of the Portuguese. As already stated, the maritime Malays, without including those of Borneo, were at this time divided into nearly forty petty States. With the Malays of the interior of Sumatra the Portuguese did not come into communication. Menangkabau is simply named, but certainly not, as it has been very absurdly called by some European writers, as a great empire, which undoubtedly it never was, unless we are contented to accept assertion for proof. The Portuguese found the maritime

Malays, in common with the Javanese, conducting the carrying trade of the Archipelago, including, at the time, the most important branch of it—the spice trade. Along with their trade, they propagated the Mahommedan religion. Many of the inhabitants of Borneo, of the southern Philippines, and most of those of the Moluccas, they had converted before the arrival of the Portuguese. In most of the sea-coasts of the islands of the Archipelago we find traces of the settlement of Malays. Both for trade and propagandism, this language was the medium of communication, and for such a purpose it is certainly peculiarly well suited, from the simplicity of its structure and facility of its pronunciation and acquisition. From Sumatra to the Philippines and Moluccas, it was in general use for this purpose. "The Gentiles of the interior, as well as the Moors," says Barros, "who dwell on the coast, although they differ from each other in language, nearly all speak the Malay of Malacca, being the most common in these parts." When MAGELLAN discovered the Philippines, he had no difficulty in communicating with the inhabitants through a Sumatran slave that he had brought along with him. The same state of things continues to the present day from Sumatra to New Guinea.

But the Malay language, besides being the common medium of communication, has been infused, to a greater or less extent, into all the languages of the Archipelago, and clear traces of it are to be found even in the languages of tribes with which the Malays of our time hold no communication, and even of whose existence they are wholly ignorant, as in the case of the languages of the islands of the Pacific and of Madagascar.*

Malay Peninsula.—Position.—The Malay Peninsula extends from 7° 4′ N. lat. to 1° 16¼′ (Tanjong Bolus), or, if Singapore and its outlying islands be included, to 1° 10′ N. lat., its extreme N.W. point being in long. 99° 41′ E., and its extreme eastern point (Tanjong Pungi, 4½ miles to N. of Point Romania) lying in long. 104° 20¼′ E. The Horsburgh Lighthouse, however, which is a portion of the Straits Settlements, lies in 104° 24½′ E. The Peninsula is bounded on the N. by Siam, on the E. by the China Sea, and on the S. and W. by the Singapore and Malacca Straits.

HISTORY.—This work only dealing with the Peninsula and British Settlements, it is not proposed to sketch the history of Malaya generally, of which a good summary is given in Mr. Skinner's "Eastern Geography." His work, however, has, with others, been availed of to furnish some of the salient facts referring to the more restricted area.

The first notices of the Peninsula are dated 1511, when the Portuguese made their appearance at Malacca, but it was not until 1592 that Captain Lancaster, in the Bonaventure, cast anchor in the harbour of Penang. Remaining there from June till the end of August, he set sail for home, taking care, in the fashion of those days, to plunder a few Portuguese and Peguan vessels, off the Perak coast, of pepper and other spices. Meanwhile the Dutch had visited and opened factories in other portions of Malaya, but there is no record of further European visits to the Peninsula until 1613, when Captain Hippon is said to have formed a factory at Patani, being the first Englishman to sail round the Peninsula. In 1650, the Dutch established a factory in Perak, and shortly before that, one in Kedah. These were, however, abandoned about 1661. Malacca had been captured from the Portuguese by the Dutch and Achinese in 1641.

The real history of the Peninsula begins with the foundation of Malacca, and to make this notice more complete the more detailed account given, sub voce Malacca, is here repeated in condensed form:—About that time, one Sangsinga reigned in Singapore, and in the neighbouring country of Java one Paravisa, who, at his death, left his sons under the guardianship of his own brother, their uncle; but he having found occasion to murder the eldest, usurped the throne; at which

some of the noble Javanese, being highly disgusted, did, with Paramisora, their late King's youngest son, fly to Singapore, where they met with a kind reception from Sangsinga; but it was not long before Paramisora, in combination with his Javanese, murdered Sangsinga, and put himself in possession of his kingdom. The King of Siam, to avenge the outrage inflicted on Sangsinga, his vassal and son-in-law, forced the Javanese to quit the country for Muar: and subsequently Paramisora transferred his colony to Malacca. The King of Siam's interference was common then. In 1502, only seven years before the Portuguese arrived, he attacked the King of Malacca with a fleet of 200 sails, aboard of which were 6,000 soldiers, under the conduct of the Governor of Ligor; but the fleet was scattered by a storm."

The whole of the Peninsula, except Malacca and Johore, appears at this time to have been under Siamese influence. Attached to Johore was Singapore, said to have been founded about a.d. 1150. It rapidly rose in importance and was noticed by Barros as:—"The resort of the navigators of the western seas of India as well as those of the eastern seas from Siam, China, Choompa (Champa), Camboja, and of the many thousand islands which lie towards the East." But in one hundred years it had so far declined, that Marco Polo makes no mention of its name, and when Europeans first began to settle on these shores, a rude fishing village alone occupied the site of the rich godowns and palatial public buildings of to-day.

Meanwhile, Malacca was founded as above related (circa 1200), and soon eclipsed its southern rival. No doubt, as regarded foreign intercourse, "the real history of the Peninsula" commenced at this date. But as the various Native States with, in many cases, different names and different frontiers, then existed, the history of Malacca can hardly be said to furnish the history of the large area which was then practically unknown to voyagers, and is even at the present day almost a terra incognita to that very persistent animal—the modern explorer. Native records unfortunately contain more fable than fact, and the latter of so doubtful a

character that its reproduction as "history" would be absurd.

The most valuable and original portion of Mr. Skinner's compilation is, perhaps, that relating to Johore and its Archipelago. He says:-"The Johore Archipelago was probably inhabited from a very remote period, anterior even to the existence of any of the Malay race in Sumatra, by a maritime branch of the same people, radically Malayan, who are now found in the interior of the Peninsula and of the southern half of Sumatra. Several tribes, in various stages of civilization, still possess the Johore islands. Though little known to Europeans, they can never have been without Malay or Hindu-Malay visitors, for it was by the great rivers of Palembang, Jambi, Indragiri and Kampar, before whose embouchures these islands lie, that the Hindus of Ceylon and Southern India must have gradually carried civilization into the interior of Southern Sumatra. The Indragiri, in particular, appears to have been crowded with Hindu-Malay settlements, many of the numerous villages on its banks retaining purely Hindu names to this day. It was by this river, probably, that they reached the fertile plain of Menangkabau. It is probable that the Malays on these rivers had attained a certain civilization in advance of the wandering mountain tribes, even before the Hindus came." All that can be gathered of the various other States will be found under those headings, and in most cases this amounts to very little.

Matters become clearer towards the end of the seventeenth century, and it becomes increasingly evident that the history of the Peninsula, so far as it affected European interests, was comprised in the doings of European enterprise on these coasts. From 1684 to 1762 most of this was directed to places, Malayan indeed, but not the Peninsula. These efforts had a reflex effect upon our intercourse with the native Rajas, but no real footing was gained until the foundation, by friendly cession and payment, of Penang in 1786. Ten years after it became the penal settlement

for India, and very satisfactory traces of that measure exist in the excellent roads

and other works constructed by convict labour.

The success of Penang induced the Indian Government to send an expedition to seize Malacca in 1795. A brief account of its fortunes will be found sub voce Malacca, as also of the later proceedings which eventuated in its complete cession to us in exchange for Bencoolen in 1825. A few years previously we had made treaties with the Native States of Perak and Selangor. The modern history of the Peninsula has really been that of the dominant power—Great Britain. The Naning and Perak wars have been the only two of importance, and these will be found detailed under their respective headings.

An effort has been made in the foregoing brief notice to avoid trespassing too much upon the ground occupied by Mr. Skinner's "Outline History of the British Connection with Malaya," which embraces a far wider field, and which general

students will do well to consult.

Geology.—Geologically speaking, the extremity of the Peninsula extends to Billiton (Bilitong), including the three Archipelagoes of Bentan, Lingga, and Banka, now cut off from the main. But as these latter districts are not included within the scope of this work, we confine our attention to the Peninsula. The Malay Peninsula, wrote Mr. Logan, has, perhaps, the most stubborn and intractable soil of all the large countries of the Archipelago. Its geological formation is exclusively sedimentary, plutonic and alluvial, and it is destitute of any peculiar facilities of irrigation. It is rich in tin, iron, and even gold, but its soil is either sterile or stubborn. The consequence is that its mountains, valleys and plains are, with the exception of a few patches, covered with a stupendous primeval forest. This estimate, however, is scarcely correct, large tracts being admirably suited for cultivation. Mr. Skinner describes the formation as granitic, traversed by veins "of stanniferous quartz and overlaid by sandstone, unfossilized clay slates, laterite, or ironstone, and in a few places, principally to the north, by limestone; for although no trace has been found of recent volcanic action, there are several isolated and unstratified limestone masses, from 500 to 2,000 feet high, of a highly crystallized

character, with no fossils of any kind."

MINERALOGY.—The following remarks by Mr. Logan hold good at the present The prevailing metals are iron, tin, and gold. "Iron ores," says Mr. LOGAN, a skilful geologist, "are everywhere found, and in the south they exist in vast profusion. In some places the strata have been completely saturated with iron, and here the naked surface of the ground, strewed with blackish scoriform gravel and blocks, presents a strange contrast to the exuberant vegetation of the surrounding tracts, appearing as if the ground had been burnt and blasted by subterraneous fires. Much of the ordinary forms of iron-masked rocks are so common, and so little regarded for their metallic contents, that in Singapore they are used to macadamize the roads, although containing nearly 60 per cent. of pure metal." The Peninsula, with the islands adjacent to it, certainly contain by far the most extensive tin-fields in the world, extending as they do over seventeen degrees of latitude, or from Tavoy, in north latitude 14°, to the island of Billiton, in south latitude 3°. "Seeing that tin is procured in all parts of the Peninsula where it is sought for, and in proportion to the enterprise and labour which are devoted to the search, we may consider the entire zone as a great magazine of tin. It is, in fact, incomparably the greatest on the globe." He gives examples of the extent of its distribution. Within the territory of Jehore, forming the southern extremity of the Peninsula, it was not thought to exist until 1846, when it was found in several places. In 1845, the whole quantity produced in the territory of Malacca was about 13 tons; in 1846 it rose to 84 tons; and in 1847, when there were fifty different mines open, to 260 tons; and this result proceeded entirely from the application of the skill and enterprise of the Chinese, for tin was not discovered in the Malacca territory until 1793. The intelligent writer who furnishes these details estimates the whole produce of the Peninsula in 1848 at 2,400 tons. This is constantly increasing, and forms a large portion of the consumption of Europe, China, and India, and is the great staple product of the Peninsula and its islands. The whole ore is "stream," or alluvial, and as yet the metal has not been traced to its veins in the rock. Galena is frequently found in close proximity. Mr. Skinner gives some additional details:-"Tin is found throughout the Peninsula, from Tavoi 14° N. to the Carimons (Kerimon) and to Lingga (on the Equator); and again, after a break of of about 2°, as far south as Banka and Billiton (3° S.), which, as pointed out above, form, in every respect, but an extension of the Peninsula. Tin has not been found elsewhere in the Archipelago. The bed of the ore is, where it has yet been observed in situ, the quartz: which is found penetrating the granite at every elevation; but all tin-mining has hitherto been confined to the deposits near the foot of the hills, in the alluvial ground formed by the decomposition of the encasing rocks." Gold is much less abundant in the Peninsula than in Sumatra, Borneo, or Celebes, and its whole produce is thought not to exceed 20,000 ounces a year, less than the weekly produce of a single locality in Australia. Iron exists everywhere, but has never been thought worth the cost of mining. Some of the W. Native States have the reputation of producing precious stones, but this is doubtful, most of those shown having been imported from Borneo or other places.

CLIMATE.—"The climate everywhere is moist and hot, though seldom malarious, even along the low muddy banks near the coast. The mean temperature in the Peninsula is, throughout the lowlands of the plains, about 80°. There is, strictly speaking, no winter, nor even any very distinctly marked rainy season; the alternate north-east and south-west monsoons distributing the moisture over the east and

west slopes throughout most of the year."

At Penang, in latitude 5° 15′ N, the mean annual temperature, at the level of the sea, is nearly 80°, and the mean range from 70° to 90°. At the height of 2,410 feet, the mean of the year is 70°, and the range 10°, from which we may infer that the average temperature of the year at the highest elevation of the Peninsula -Mount Ophir—is rather less than 40°. The average number of rainy days in the year is 190, and the mean rainfall of the Peninsula from 100 to 130 inches; a rainy season being but indistinctly marked. Heavy dews fall in all clear nights throughout the year, and fogs, although not dense ones, are frequent, especially during the most rainy season. At Malacca, in latitude 2° 14′, the mean temperature of the year is 80°, and the range 15°. At Singapore, in latitude 1° 17′, the average heat of the year is 82°, and the range from 68° to 92°. The fall of rain here is frequent, generally every third day, although a continuous drought of ten or fourteen days, and in some cases, three, four, or five months, occasionally occurs. A rainy season is scarcely distinguishable. Generally, the climate of the Peninsula, notwithstanding its heat and moisture, is not insalubrious, although a few ill-ventilated spots here and there occur with most pestiferous malaria. Singapore, indeed, is termed the "paradise of children," so few infantile complaints occurring. The west coast is exposed to sudden squalls of short duration, known as "Sumatras" from the direction whence they blow; while the opposite side is almost closed to navigation under sail alone during the north-east monsoon.

Fauna.—The fauna of the Peninsula is allied to that of the adjacent Archipelago. Of the mammals, the following is a brief view of its most remarkable animals. The quadrumanas, or apes, amount to nine—eight monkeys, each species having a distinct name, and a loris, the Lemur tardigradus of naturalists, called by the Malays the kukang, and occasionally kamalisan, that is, "the lazy," or "the slothful." Of bats there are several species, but the most remarkable is the vampire, or kalung of the Malays. This flies high in great flocks, and but for larger size and slower flight, flocks of them might easily be mistaken for those of crows or rooks. The kalung is a great enemy to the best esculent fruits. The only plantigrade animal is a bear, which attains a respectable size, known as the

"sun" or "honey" bear, peculiar to the Peninsula and Borneo. Of viverra, or weasels, there are several species, the largest and most singular of which is the binturung of the natives, and the Ictides ater of naturalists. Of the feline family there are seven, including the royal tiger and the black leopard, both of them far too numerous. The domestic cat exists, as in Siam, not unusually with a tail half the usual length, as if it had been amputated, but with a sort of kink or excrescence in it about half-way down. The domestic dog, the anjing of the Malays, exists in the same vagrant state in which it is found in most Asiatic countries; and a wild dog is said to exist in the woods. The otter, the mâmbrang of the Malays, exists, but seems to be scarce, which is not easily accounted for, considering the abundance of fish. The Pachydermata, or thick-skinned family, consist of four—the elephant; the one-horned rhinoceros, the same with that of Sumatra; the Malay tapir, or tânau of the Malays; and the hog. Elephants are numerous, and appear to be of the same species as the ordinary Asiatic one. That they are equally capable of domestication is certain, for they are used as beasts of burden in the northern parts of the Peninsula, and occasionally exported to the coast of Coromandel. The hog is found both in the wild and domestic state, and numerous in the first, constituting the chief animal food of the nomadic races, as no doubt, before their conversion to Mahommedanism, it did of the cultivated Malays. No animal of the Equine family is known in the Peninsula, for the horse itself is not found even in the domestic state, excepting, of course, in the British and pro-A country covered with forest or marsh, and where it would be difficult to find a mile of firm open land, is eminently unsuited to it. The ox or the buffalo takes its place. Even in Malacca under the Malays, the horse seems not to have been used; at least the early Portuguese make no mention of it. The species of Ruminants are thirteen in number, namely, eight deer, the goat, the buffalo, and three species of ox. Two of the deer are smaller than the European hare, a third about the size of a fallow-deer, and the fourth as large as an elk. The domestic goat is a small mean-looking animal, of little value; and there exists in the forest a wild one, the same with that of Sumatra. The buffalo attains its greatest size in the Peninsula, and is larger than that of Java, or of Cochin-China, both of which far exceed the buffalo of Italy, and in a still greater degree that of Continental India. The domestic ox is a short-legged, compact, strong and hardy animal. The wild species are two-the Sunda ox of Java and Borneo, and an undescribed one called by the Malays saladang, and which would seem to be peculiar to the Peninsula. The sheep is known to the Malays of the Peninsula by its Sanskrit name biri, but in the British Possessions as kambing, and as a partially acclimated stranger. The hare is wholly unknown, and the rabbit only in the domestic state, introduced by the Portuguese, the name tarwelu and kuwelu being probably a corruption of the Portuguese coelho.

The most remarkable birds of the Peninsula are those of the gallinaceous and pigeon families. Of the first, there are the peacock, or mārak of the Malays, the same as that of Java, but differing from that of India, and never seen in the domesticated state; the double-spurred peacock, smaller than the European pheasant, a beautiful but shy and timid bird; three species of pheasant, including the Argus, or the kuwau of the Malays; a partridge, the Perdrix javanica; and the cock in the wild and domestic state, the last a small bird, but of great courage. The species of pigeons are very numerous, from those of the size of a thrush to that of the European ringdove, the prevailing colour being green, and some of them being probably migratory. Snipes are numerous, and quails rare. In the wild state, there is but one duck—a teal—and no goose. The only poultry of the Peninsula, in so far as the Malays are concerned, is the common fowl and the duck. The goose is known only by its Sanskrit name—angsa; and the peacock and rock pigeon have not been domesticated. The parrot family—in Malay nuri, the same word which we have converted into

lory—is numerous, but none of the species are equal in brilliancy of plumage to those of New Guinea and its adjacent islands. The esculent pest-making swallow, the lawit of the Malays, exists in the caves of the coast of some of the islands, but is not numerous. The birds of prey are numerous, and consist of kites, alang, and hawks, alapalap, in Malay. The vulture does not exist, and there is no hawk of a size to entitle it to the designation of an eagle. Some further particulars of the birds of the Peninsula will be found under the head of Ornithology.

The reptiles consist of the alligator, the iguana, and several species of small lizards, and of some fifty different species of snakes, of which fifteen are poisonous. Among the innocuous snakes is a python, and among the poisonous ones, four species of cobra. Both the seas that wash the shores of the Peninsula, but more especially the comparatively shallow and sheltered one which parts it from Sumatra, abound in fish, which form the principal sustenance of the great mass of the inhabitants. The seal and the whale do not exist, the latter being known to the Malays either by a Sanskrit name—gajah-mina—which signifies "elephant-fish, or as paus." The only cetaceous animal is the duyong, which our naturalists, by the mistake of a single letter, have converted into dugong. This animal, not very frequent, lives in the shallow waters, feeding on submarine plants, and its flesh is esculent, being much superior to that of the green turtle. The fresh-water fish are not abundant, nor held in much esteem by the natives, but some of those of the sea are of excellent flavour; and the white pomfret, the baval of the Malays, as also the ikan merah, are certainly two of the most delicate fishes in the world to the European palate, being less rich than the turbot, and higher flavoured than the sole.

BOTANY.—The botany of the Peninsula is a very wide field, as yet not wholly explored. Many plants put to economical uses are, however, sufficiently known. Of the great many species of forest trees not the whole yield good durable timber. The forests yield ebony, sapan, and eagle-wood, but none of them of the best quality, or in much abundance. They yield also rattans, bamboos, the nibong and the nipa palms, all constituting the main materials of the Malayan architecture. But their most remarkable and valuable product is the gutta-percha, some years ago used only for Malay horsewhips and knife-handles, but by the help of which the sea is now crossed by the electric telegraph. It was from the Peninsula, in fact, that this article was first made known to Europeans, more than three centuries after the country had been frequented by them. This was in 1843, when Dr. WILLIAM MONTGOMERIE first made the discovery, and was rewarded for it by the gold medal of the Society of Arts. The chief products of agriculture are rice, the cocoa, and areca palms, yams, the batata, and the sugar-cane. The esculent fruits are numerous, abundant, and some of them excellent. Incomparably the most esteemed by the natives is the durian, which attains perfection without culture; and by the Europeans the mangosteen, which is the most delicate fruit in the world. The exotic ananas, with little or no care, attains the same perfection as the best pines of our hot-houses, and is hardly dearer than Swedish turnips, The same soil brings such luxuries as these to perfection which is unfruitful in the production of the food of man, if sugar, sago, tapioca, and rice be excepted.

Fruits, woods, ferns, &c., will be found catalogued under their respective

headings.

Products, Agriculture, and Trade.—The principal products and exports of the Peninsula, arranged in alphabetical order, are:—Buffalo horns and hides, cloves, coffee (Liberiau and Arabian), copra, cow-hides, dammar, fish-maws (from which isinglass is made), gambier, gutta-percha, mace, nutmegs, pepper, rattans, rice, sago, sugar, tapioca, and tin. Rice is uncertain, and in some years enormous imports furnish the inhabitants of the Peninsula with the staff of life. In addition to the foregoing, several articles appear in the trade reports which are more or less

found in the Peninsula, but are also largely imported from native centres elsewhere for export to Europe, such as cubebs, cutch, gamboge, green snail-shells, gums, benjamin and copal, ilipe-nuts, mother-of-pearl shells, sapan-wood, sticklac, and teel-seed. To the European market, gutta-percha is probably the most important. Its purchase and export lies in the hands of a few of the more enterprising of the European community. As regards imports (we are of course dealing in this case with European and Chinese houses only, as no Malay ever yet dreamed of importing anything as a matter of business), Manchester and Sheffield goods, with wines, spirits, and canned provisions exhaust the list, long enough however even then.

That any import trade is done at all in the Native States is chiefly owing to the fact that they are all more or less settled by Chinese, who deal in cottons, matches, &c., for sale to the Malays, whose export trade in gutta, rattans, and other jungle produce is almost entirely owing to the inducements held out by foreign buyers in the Settlements. The articles named will be found dealt with under their respective headings.

POPULATION.—The estimated population of the Peninsula and Settlements is 1,300,000. That given by the "Encyclopædia Britannica," viz., 650,000, is certainly understated. The amended estimate gives 15 inhabitants to the square mile, and

of these some 537,000 belong to the Straits Settlements.

As regards race, the inhabitants of the Native States may be divided into Malays, Benua, Jakuns, and Sakeis. But numerous subdivisions exist, there being the Orang Besisi, Biduanda, Gargassi, Gunong Kenaboi, Laut, Liar, Mintira, Rayat, Semang, and Udai, while there are local tribes, such as the Sabimba and Selitar, who once inhabited Singapore. Each of these are noticed at length under their respective headings. Broadly speaking, the central portion of the Peninsula appears to have been settled by immigrants from Menangkabau in Sumatra, and the Malay race of the Peninsula appears to be more or less derived from the same stock, making allowances for the difference consequent on intermarriages with native races of the better class. The orang-utan, or men of the woods, such as the Jakuns, &c., seldom contracted these alliances, and have to the present day preserved their distinctive characteristics. In the British Settlements, three races, other than Chinese or Malay, alone exist in any large numbers—those purely British, those of Dutch and Malayan descent, and those of Portuguese-Asian descent; and the latter form valuable members of the community. The Chinese and native races are described under their separate heads.

GOVERNMENT.—"The only forms of government to be found in the Peninsula, outside the colony of the Straits Settlements, are either tribal or elective, as in Rembau and the contiguous inland States; or autocratic and hereditary, like those of the Malay or Siamese Rajas and Governors on the seaboard. Something of a tribal form of rule is to be traced in all Malay administrations; and none of them, whatever the form, appear to be 'free' States, in any true sense of

he word

"The government of the colony is that of the usual 'Crown Colony' type, Penang and Malacca being represented in the Legislative Council, which sits at

Singapore.

"The administration of the Protected States is peculiar to themselves. It has been a natural development from the state of things which was left after the military occupation of 1875. Supreme power is vested in a State Council, of which the Resident is the moving spirit, though it is presided over by the Sultan or Rajah in person, and consists in each State of the highest native authorities as well as the principal English officials. The Residents are directly under the Governor of the Straits Settlements, and have, of course, almost the entire control of, and responsibility for, the affairs of the State in which they reside."

REVENUE.—Details, so far as obtainable, will be found under the heading of each State and British Settlements.

TOPOGRAPHY.—The area of the Malay Peninsula is about 70,000 square miles, somewhat smaller than Great Britain. It consists mainly of connected ranges of mountainous land, running N.W. and S.E., which constitute a waterparting between the streams flowing east and west to the surrounding seas. The western range continues unbroken from the interior of Kedah (6° N.) to the interior of Malacca (2° N.), and it reappears at intervals in the south (Johore). On each side of the elevated region is a narrow littoral of recent formation, by which the Gulf of Siam and the Straits of Malacca are bordered, and which alone, it may be said, is inhabited and cultivated at present. The primeval forests which, in general, cover the whole country, are occasionally interspersed with grassy plains in the north. The coast on both sides, and particularly the west, is almost invariably marshy and alluvial, scarcely raised above the sea, and being under shelter of Sumatra, even and unbroken towards the Straits of The seaboard is generally overgrown with mangroves for some four or fives miles inland. In some parts the breadth of the plain reaches 30 miles, but it is usually much less. On the east coast, where there is an open sea, the hills at several points are close to the shore; but the general character of the country is the same on both sides. The height of the mountain chain increases towards the wider parts of the Peninsula, at the back of the Dindings; many peaks in Perak being now known to exceed 8,000 feet—it is even said 10,000 feet; such as the Titi Wangsa hills between Kedah and Perak, and Mount Robinson and other summits in the south of Perak. An unexplored ridge-Mount Tahan—on the east side of the River Pahang, near the west frontier of Tringganu and Kelantan, is thought by Maclay, who alone has traversed the interior (1875), to be the highest land of the whole Peninsula.

The entire Peninsula, to within some 10 to 25 miles of the coast, is broken and hilly, covered both on hill and plain with dense forests.

RIVERS.—The principal streams, following the coast from N. to S., are as follows:—Between the Pakshan (the lowest course of which separates the Peninsula from Tenasserim in British Burma) and the Rivers Muda and Krian, there are none but small streams. The first large river is the Perak, with its chief tributaries—the Plus, Kinta, and Batang Padang. (The Perak, on the west, and the Pahang, on the east slope, are the larger river basins in the Peninsula, each draining an area of 4,000 to 6,000 square miles.) The other chief streams are the Bernam, with as large a volume of water, but draining a less area; the Selangor, the Klang, and the Langat, on the south-west coast; the Linggi, the Muar, and the Johore, of which the estuary faces Singapore. On the east side, there is the Endau, the Pahang with its large tributaries—the Bera, the Triang, the Jelei, &c.; the Kwantan, the Besut, the Kelantan with its large tributary the Lebih; and the Patani.

MOUNTAINS.—The highest mountains of the Peninsula are probably not yet discovered. Those known are:—Kedah-Perak (Jerei), 3,894 feet; Mount Titi Wangsa, 6,840 feet; between Kedah and Perak; Inas, in Kedah, 5,000 feet; Bubo, 5,650 feet, and Ulu Temeling, 6,435 feet, near the right and left banks respectively of the Perak River; the Slim range, 6,000 to 7,000 feet, in South-east Perak; Mount Robinson (Riam), about 8,000 feet; Chimberas, 5,650 feet, in Sclangor; Berembun, about 4,000 feet, in Sungei Ujong; Mount Ophir (Ledang), 4,200 feet, until recently supposed to be the highest point in the Peninsula; and Blumut, 3,200 feet, in the centre of Southern Johore, and where the River Johore takes its rise.

Of the remaining elevations the following list is published in the "Singapore and Straits Directory," a most valuable work to all resident in the Peninsula or Settlements:—

Territory in which	nh situate.		Elevation in feet.	Territory in which		Elevation in feet.	
MALACCA-				PERAK-			
			000	Gunong Bubu	***	***	5,450
Bukit Sidenan	***	111	952	Gunong Juas	199	1992	5,000
Bukit Panchor		111	886	Gunong Meru			3,500
Bukit Bruang	***	***	518	Birch's Hill	10.0	1900	-
Bukit Brisu		***	696	Caulfield's Hill		***	-
Bukit Sebang	***		557	Maxwell's Hill	200	***	-
Bukit Pulau Besar		***	253	Gunong Arang Para	***	***	200
			1000	Gunong Sayong	***		2,000
Site of Reservoir of proposed new			10-10	Gunong Hijau		-74	4,300
Water-Works	Pro-Pro-		125				2000
Travez Trozza	***		1	PROVINCE WELLESLEY-			
				Bukit Mertajam		1444	1,843
PENANG-				Bukit Panchore			1,450
LEMANU				Bukit Juru		0.00	824
Flag - signal staff	(Govern	mont		Dukit suru	***	***	021
Bungalow)			2,500	SUNGEI UJONG-			
AND THE PERSON NAMED IN	***	747		The second secon			9 900
The Aug This	***	***	2,750	Bukit Tanggah	***	***	3,300
Batu Etam	***	***	2,275	Gunong Angsi	***	/92	3,200
Bukit Sungei	200	***	1,775	Bukit S'tul	***	**	1,500
Low's Pass	***	***	1,150	Jelebu Gap	***	***	950
Ghinting Pass		***	380	Bukit Berembun	***	100	4,000

Islands.—The northern seaboard has several small islands and insular groups, which lie in clusters of innumerable small islets on both sides of the isthmus to the north. The coast farther south is remarkably free from islands. The only ones of any consequence are Langkawi and Penang (Pinang), on the west side; the Carimons (Kěrimons), Singapore (Singapūra), and the Bentan and Bulang Archipelagoes, at the south extremity; and on the east side, off the coast of Johore, some high peaks, of which Tioman and Tinggi are the largest, and a similar but less important group (the Great and Little Redangs) off Kelantan.

Political Divisions.—Ligor and Singora being purely Siamese, are not dealt with in these pages. On the west coast, the most N. of those nominally tributary to Siam is Kedah, and following the coast line come Perak, Selangor and Klang, Sungei Ujong, and Johore; Province Wellesley taking a slice out of the Kedah coast, and Malacca intervening between Sungei Ujong and Johore—or rather Muar, which, however, now forms an integral portion of the Johore territory. Ascending the east coast, the States are:—Pahang, Tringganu, Kemaman, Kelantan, Patani, and Reman. In the interior N.W. of Malacca lie the Negri Sembilan, or Nine States (q. v.). The Straits Settlements comprise Penang and Province Wellesley, opposite Kedah, the Dindings, originally part of Perak, Malacca, and Singapore. The portion under British influence covers about 35,000 square miles.

COMMUNICATION.—As regards the British Settlements, the great mail and ocean lines afford a ready means of reaching almost any part of the world, the Cape and Mauritius alone having infrequent communication. On the west coast, small coasting steamers run at short intervals from the Settlements to most of the principal native ports, but sailing boats or vessels are alone available for the east

coast, and these only at certain seasons.

Malim and Malim Kechil.—Villages in Malacca distant about 4 to 5 miles N.W. of town, and about 1 mile W. of Malacca River.

Malim Kechil.-A village in Naning, N. of Malacca.

Mamadin Creek.—Formerly the site of a bridge across the Prai R., Province Wellesley, now decayed.

Mambu.—V. in Sungei Ujong, 5 miles W. of Rassa.

Mammalia.—A catalogue of the Mammalia known to exist in the Malayan Peninsula, by Dr. Cantor, will be found in Vol. II, p. 1 et seq. of the "Essays relating to Indo-China" published by the S. B. R. A. S. The Catalogue is obviously beyond our limits, but it may be added that scientific exploration has scarcely added a single mammal to the list published as it was forty years ago.

Mandai.—A district in N.W. Singapore, its principal point being Kranji, whence there is a ferry to Johore, with a Police Station and Government Bungalow. Upper Mandai is the name of the district immediately S. of Mandai.

Mandeling.—A people who, like the Rawas, came originally from Sumatra, and have partially colonized Selangor. They are said to be a branch of the Batta tribe, who are alleged to be cannibals. Dr. Leyden published a rather sensational account of their cannibal ceremonies in 1823, which was reprinted a few years ago in a local paper. But there appears to be good reason to believe that the Battas ate human flesh, and that if they have abandoned the custom, it is only within the last few years.

Mandor.—A good-sized V. on the coast 2 miles N. of Tanjong Kling, Malacca.

Manei.—V. on S. bank of Pahang R., E. Pahang.

Mangkudu (Morinda umbellata).—The root of this plant was used extensively by the Malays as a red dye, but European importations of aniline have, to a great extent, displaced it. Malacca at one time exported considerable quantities.

Mangkwang.—In places pronounced Rungkwang. A pandanus somewhat resembling a pine-apple in growth. The leaves, edged with prickles or thorns, furnish a fibre much used by the Malays for rope, string, &c. The umbut is eatable, being used as a vegetable.

Mango.—The native mango is a very poor imitation of its Siamese or Philippine cousin. It is usually gathered green for pickling, and is seldom touched by Europeans, except a solitary species known as Mangga Dodol.

Mangosteen.—A delicious fruit, the pulp of snowy whiteness being enveloped in a tough brown rind, a decoction of which latter is said to be a good cure for diarrhea. A patent has also been taken out for the manufacture of a dye from the same source. The petals of the flower, which leave a mark on the skin of the fruit, indicate the number of lobes into which the pulp is divided: thus, if there are five in the exterior, there will be the same number of lobes inside. The fruit exudes a juice precisely resembling gamboge, and as a rule drops of this on the skin indicate an unsound interior. It is common throughout Malaya.

Mangrove (Bakau).—There are two varieties of this tree—one having a globular seed, and the other long skittle-shaped pods. The latter plant themselves by dropping perpendicularly in the mud. The trees affect brackish or salt water, and flourish best in the black mud common at the mouths of tropical rivers. The bark is used in tanning, and is also said to prevent incrustation in steam boilers. Mr. T. Christy says:—"It is used by the tanners in the localities where it abounds, but hitherto has not been profitably employed in England, from the fact that the leather made with it is of a bad colour and spongy nature. It has been tried on a large scale in England, but the result has always been the same, the leather being very inferior in colour and quality. A good deal of cheap leather which reaches us from India is tanned by means of this material, and has to be corrected by the use of Myrobalans and other tanning materials in this country to render it of a saleable colour. Tanners in other parts of the world, where the mangrove flourishes, might use it in this way with profit."

In India it grows to the height of 50 feet, spreading out its roots in all

directions in the moist soil. The mangrove appears to thrive in brackish water. As the muddy deposits at the mouth of the tropical rivers become consolidated, the mangrove takes possession even to the verge of the salt water. All parts of the tree appear to be useful for tanning; the bark, roots, and leaves, have been so applied. It contains about 17 per cent. of tannic acid.

Manti.—V. in N. Malacca, about $2\frac{1}{2}$ miles from the Johol frontier, on the road to Chindras. Hill of the same name $\frac{1}{2}$ mile to the N.

Mantis.—No insects present such extraordinary forms as the Mantidæ, of whom the Malay Peninsula is a principal habitat. Some naturalists include the Phasmidæ or phantom family (which includes "stick" and "leaf" insects) under the same head. But even the Mantidæ proper are sufficiently grotesque in shape. The "praying mantis," which is the commonest representative form, and so called from its usual attitude, is also one of the most ferocious. Two insects, even male and female, are never kept long in confinement together without one (usually the female) destroying and eating the other. The long serrated fore-feet can at one blow decapitate or cut in halves an antagonist, and the quicker insect is always the victor. In addition to causing injury with its legs the mantis can inflict a tolerably severe bite on the hand of a human captor, and it is always advisable to use a cloth in handling one. (See Stick and Leaf Insects.)

Mantra.—A V. in central Malacca, once a mission station, now abandoned. A tapioca plantation exists on the W. side.

Mantra Mission.—In W. Malacca, just above Tangga Batu district. It comprises over $1\frac{1}{2}$ square miles, and has a church at the S. extremity.

Marachet.—A hill in Padang Sebang district, Naning, N. Malacca.

Marbeau Kudong.—A V. on the Prai River, 7 miles from Butterworth, Province Wellesley. The produce of the Malakoff Estate is shipped from this point, the river being narrow but deep.

Maritime Code of the Malays.—The Malacca code appears to have been compiled during the reign of Sultan Mahmud Shah, the first sovereign of Malacca mentioned in the Malayan annals to have embraced the Mahommedan faith. The circumstance is understood to have taken place about the year of the Hejirah corresponding with the Christian era 1296. The origin of the Malay code may, therefore, be considered as nearly coeval with the first establishment of Islamism among the Malays. The authority of the code is stated in the preamble. A translation of all essential parts appears in No. 3, p. 62, and No. 4, p. 1, of the J. S. B. R. A. S. (1879). It was executed by Sir Stamford Raffles, and originally appeared in the Malacca Weekly Register. It answered to our Merchant Shipping Act, defining the laws and usages of the Malays at sea.

Maps of the Peninsula, &c.—The first official map known to exist was published in 1857, and was attached to a book containing copies of the Treaties of the E. I. Co. with Native Princes. A second, published in 1862, like its predecessor, was apparently based on an old Dutch map of 1820. In 1879 a large scale map was computed by the Hon'ble A. M. SKINNER, and published under the auspices of the S. B. R. A. S. A second and improved edition was published in 1888, and a revised issue is now in the printers' hands.

A map of Perak was published in Blue Book C. 1,512 (June, 1876), and a similar, but less correct one, by the local Government at the end of the same year. The oldest known map of Malacca was published in 1857. The latest official

map appeared in 1878.

Of Penang and Province Wellesley, maps first appeared in 1854, followed by corrections in 1879. The latest edition, 1886, is a sensible advance on previous issues.

The following is a list of the latest existing maps of the Settlements and Peninsula:—

Singapore Island, 1885. Singapore Town, 1881. Malacca, 1878. Penang, 1886. Province Wellesley, 1886. Dindings, no detached map printed. Perak, no detached map printed.

Selangor, 1884.
Sungei Ujong, 1885.
Malay Peninsula, 1893.
Straits of Malacca, Admiralty Charts
brought up to 1886.
Jelebu, 1885.

Markets.—It may be interesting in a work of this nature to give a list of the ordinary articles sold in the markets of the Settlements, with their approximate prices. It would be obviously impossible to give the latter with any precision, for not only do they differ at each Settlement, but from day to day in each. The following may be taken as giving a fair idea of the average values—under 5 cents, varying a cent each way, and those of 20 cents and upwards, 2 cents. Certain fruits are, of course, only in season at particular dates. Thus durians, varying from 7 cents to \$1.50, are omitted. Turtle again is very seldom procurable at Penang, though always plentiful in Singapore. But the following list will give a new-comer a fair idea of what can generally be obtained:—

Beans, Long per catty 2½ Fish, Small per catty 5 do. French do. 9 do. Pickled do. 4-14 do. Egyptian do. - do. Large Salted do. 8½ Beef do. 12 do. Siam Salted do. 12 Beef Steak do. 4 do. Small Salted do. 10 Bean Sprouts do. 4 do. Medium Salted do. 10 Bamboo Sprouts per 100 10 Firewood, Charred per per joil — Beans, Flat do. 8 Flour, best American do. — Blachang per catty 10 do. Whampoa do. — Bread per loaf 2 Fowls, Large per dozen 4			8	Cents.	i		8	Cents.
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do. Egyptian do. — do. Large Salted do. 8½ Beef do. 12 do. Siam Salted do. 12 Been Steak do. 4 do. Small Salted do. 10 Bean Sprouts do. 4 do. Roe each 4 Betel-Nuts per 100 10 Firewood, Charred per picul — Beans, Flat do. 8 Flour, best American do. — Blachang per catty 10 do. — Whampoa do. Brinjals do. 2 Fowls, Large per dozen 4 —	J. 171			9	l do Diololod			4-14
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Blachang per catty 10 do. Whampos do — Brinjals do 2 Fowls, Large per dozen 4 —		• -		8				
Brinjals do 2 Fowls, Large per dozen 4 —		per catty		10		do.		_
								_
	Dana	per loaf		2			3	
Cabbage, Batavia each 15 do. Small do. 2 —		each		15			2	_
do. China per catty — Gambier per catty 15	a. Ohina				O-m-Linn			15
do. Salted do 3 Ginger do 4				8				
do. Singapore do 8 Garlic do 5	27.			-	0 - 1 i -			
Carrots, Imported do — Geese, Large each 1 20								
do. Singapore do — do. Medium do. 1 —		_						
Capons do 25 Gram per picul —				25			-	
do. Large cach 1 — do por bag —					ا ا			
Celery leaves per catty 8 Lettuce per catty 8				8	Taldanaa			8
Chillies, Fresh do 10 Limes per dozon 12-18					T :			
do. Dry do 9 Lard per catty 14					T3	-		
Cucumbers do 2 Laksa, Chinese do 8	O							
Cocoa-Nuts each 21 Matches per packet 3	Cases Marta							
Cocca-Nut Oil . per catty — Milk, Fresh per chupak —				-2				-
Chunam, Coloured do 5 do. Condensed per tin				5	An 'Mamalamana'			
do, White do 2 Melons per catty 2					36.1			
Coffee, Ground do — Mint per bunch 1				_	Mind			
do. Raw do — Mangkwangs per catty 2	do Raw			_				
Challe Towns and South State on Current may need to		_		20				
de (Smell) de 10 Menteur month 00	da Omaall				Manddon			
Curry-stuff per catty 10 Nutton per 10 22 Curry-stuff per catty 10 Onion, best Bengal per catty 4								
Ducks, Large per dozen 8 40 do. Small do 4								
do. Small do. 3 — do. Spring do 3								
Duck Eggs, Fresh do 15 Potatoes, Bengal do 5½			_					
do. Salted do 12 do. Batavia do —	do Saltad							
Eggs, Hen do 18 do. Sweet do 1					J. Coment			1
Thurston do 0 do do Now Zooland do	Manuella							
Fire Busit non cetter 0 Dunrang Frank do 90								
TWILT ame Theal de 10 de Don de 10	Figh Large Fresh							
do. Medium do 12 do. Salted do 12					3. 0.14.3			
[991]	w. mouldin	20.	•••				•••	

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			8	Cents.			8	Cents.
Pine-Apples	111	each		21	Sugar, second quality	per catty		7
Pepper, White	***	per catty		-	do. third ,,	do.	***	6
do. Black	***	do.	***	-	Sea-Weed, Jelly	do.	***	-
Peas, Green	***	do.		-	Sirih Leaves	per bundle		21
Pigeons		per pair	***	-	Tamarind, Red	per catty	***	2
Pumpkins		per catty	***	2	do. Black	do.	111	3
Parsley	***	per bunch	***	1	Tea	per packet	444	4
Plantains	***	per bunch of	10	2	Tobacco, Java No. 1	per catty	***	40
Pork		per catty	***	14	do. Java No. 2	do.		30
do, Chops	***	do.	***	14	do. Chinese	do.		25
Padi		per picul	***	-	Tomatoes	do.		-
Rice, first quali	ty	do.	444	-	Turtle	do.	***	-
Raddish, Chines	80	per catty	***	2	Tuba Root	per bundle	144	21
do. Englis	sh	do.	***	-	Vegetables, average pr		***	21
Salt, Table		do.		1	Watercress	per bundle		-
do. Coarse	464	do.		1	Yams	per catty	***	2
Sugar, first qual	lity	do.		8				

Marong Mahawangsa or Kedah Annals.—Treated as worthy of some credibility by Col. Low, who translated them (see Contents, J. I. A., sub voce), but unsparingly condemned by Crawfurd as "a dateless tissue of rank fable." Maxwell adds:—"If, as there seems good reason for believing, the Hindu legends in these works are traceable to the Brahminical scriptures of India, their value from an ethnological point of view may perhaps some day be better appreciated."

Maroo Chandong.—V. on N. bank of Bernam R., 5 miles below its abrupt turn S. in S. Perak.

Marriage.—The only terms for marriage in Malay are the Arabic and Persian ones, respectively nikah and kawin, the native ones having probably been displaced by these and forgotten. Owing to the youth of the parties in a first marriage, the negotiation is almost always conducted by the parents. The court-ship among the Malays consists in the lover sending his mistress a present of areca and betel pepper, the ceremony, from the name of the first of these, being called vinangan. Children are frequently betrothed at an early age, and this goes under the name of tunangan.

The conditions of the marriage contract vary, but generally there is more or less of a purchase of the bride by the bridegroom, or, more correctly, by his parents. The sum among the well-to-do is about \$100, and this is paid over on

the morning of the marriage.

The marriage ceremony is everywhere a religious one. The Kali is present at the wedding feast and formally records the marriage in his register. Sir Stamford RAFFLES gives the following translation of the form in Java, which resembles that of the Peninsula, as pronounced by the priest:—"I join you, Radenmas, in wedlock with Satiya, with a pledge of two reals weight in gold. You take Satiya to be your wife for this world. You are obliged to pay the pledge of your marriage (sisikawin), or to remain debtor for the same. You are responsible for your wife in all and everything. If you should happen to be absent from her for the space of seven months on shore, or one year at sea, without giving her any sustenance, and are remiss in the duties you owe to your sovereign, your marriage shall be dissolved, if your wife demand it, without any further form of process; and you will, besides, be subject to the punishment which the Mahommedan law ordains." Much the same form is used everywhere. A betrothal ring is given to the bride a month before the marriage, but the actual ceremony, equivalent to our putting on the ring ("with this ring I thee wed," &c.) is that of twining the fingers. Marriages always take place late in the evening, and the guests appear in their most brilliant dresses—red, green, or yellow. Two days after the marriage the newly-wedded pair dress in their gayest clothing and receive the congratulations of their friends.

Marriages within certain degrees of consanguinity are prohibited, but, as with the Jews, a man can intermarry with the widow of a brother, and then becomes liable for all the obligations of the deceased husband. Polygamy and concubinage are legal, but these are, from the nature of things, only the riotous indulgences of the few rich and powerful. Divorce—in Malay, cherei or telak, signifying "a parting," or "a separation"—is easily obtained. A seven months' absence by land, or a year's by sea, without provision for the wife, is declared to be a virtual divorce, should the wife demand one. Among the simpler inhabitants of the Archipelago, divorces are of rare occurrence; but not so in the Peninsula, where they are frequent. Amongst the Mentira, the teeth of the bride and bridegroom are filed with a stone before the day of marriage. (See also Betreothal.)

Marsden, William.—Was born in Dublin, the son of a merchant of that city, and the second in descent from a Derbyshire gentleman, who had settled in Ireland in the last years of the reign of Queen Anne. After the usual school education in Dublin, he received a civil appointment for Bencoolen, at sixteen years of age; proceeded to that place in 1771; remained there eight years only, and returned to England in 1779. In 1782 he published his "History of Sumatra," which established his reputation as an Oriental scholar and a man of clear and sound judgment. His well-earned reputation obtained for him, first, the situation of Under-Secretary, and, ultimately, of Chief Secretary to the Admiralty; and these offices he discharged with great credit for the twelve years from 1795 to 1807, when he retired, and returned to his favourite studies. The fruits of these were his "Grammar and Dictionary of the Malay Language," the first deserving the name which had been published in England, and the best which had been published everywhere. This work had engaged, more or less, his attention for six-and-twenty years. In 1811 a new edition of his "History of Sumatra," which had been translated into French and German, was called for and published. In 1817 he published, with copious and valuable notes, his translation of the celebrated "Travels of Marco Polo," that singular work which gave the hints that led to the discovery of the New World. In 1823 he published his "Numismata Orientalia, or Description of Eastern Coins," a valuable collection of which had fallen into his hands; and in 1834, in his seventy-eighth year, he gave to the world his last work—a "Collection of Essays"—the most valuable of which consists of a dissertation on the "Polynesian and East Insular Languages." By his will he bequeathed his valuable collection of Oriental coins, medals, and manuscripts to the British Museum, and his library to King's College, London.

MARSDEN'S long and meritorious career terminated on the 6th of October, 1836, when he had nearly completed his eighty-second year. He was the first literary and scientific Englishman who, with the advantages of local experience treated of the Malayan countries; all our knowledge before him being confined to the crude narratives of mariners and voyagers unacquainted with the language, through which, alone, accurate knowledge could be obtained. He was the contemporary of Sir William Jones, of Colebrooke, and of his own relative, Sir Charles Wilkins; and while they were studying the philosophy of Continental Asia, he was doing the same thing for its islands. The chief characteristics of his writings are laborious care and scrupulous fidelity, ever under the control of a sound judgment—qualities in which he has not been excelled, or even equalled, by any writer on the subjects he treated of, foreign or native. He is, in fact, the model and example of all that has been done since his time—sometimes with more knowledge than he could have possessed, but never with more care or

integrity.

Marungal.—The name of a tree the root of which resembles horse-radish in taste, and is so used by foreigners in the Straits Settlements. The leaf is used as a vegetable and the bean for making curries.

Masoi or Misoi.—The aromatic bark of a tree imported from New Guinea and the adjacent islands for use as a cosmetic and external medicine by the Malays and Chinese. It is the *Cortex oninus* of RUMPHIUS.

Mata-Mata (lit. "eyes").—The native word for a guardian of the peace, and now the conventional term for policeman.

Matang.-V. on N. side of Larut R., close to Port Weld, Perak.

Mats, Matting (tiker).—Matting is woven by the Malays from a soft rush of indifferent durability, but they have never approached the taste and ingenuity of the Chinese, who practically supply all the matting used in the Straits.

Mayung.—A kind of theatrical performance with some dancing and socalled singing—the performers being as a rule a travelling company of three or four men and perhaps one woman, who make their living by their performances, and play either at the invitation of a Rajah in his own house or before the public on a stage erected in the street.—(MAXWELL, J. S. B. R. A. S., No. II, p. 163.)

Meals.—The Malay breaks his fast at daybreak with some light food, and

those that can afford it imbibe coffee or tea; the former is preferred.

Between 8 and 10 a.m. the first regular meal is eaten; boiled rice forms the staple dish, the usual addition being burnt salt fish or sambal. During the day food is seldom touched, and the second meal is eaten between 7 and 10 p.m. No difference is perceptible in the food used at the two meals. Rice, salt fish, gulie, or curry, and sambal are the principal dishes found at a Malayan feast.

The gulie, or curry, of the poor, is a very simple dish; it consists of the principal ingredient—be it fish, flesh, or fowl—and some sliced chillies, onions, and ginger, the milk of the cocoa-nut being sometimes added; the last is obtained by bruising or rasping the kernel of an old cocoa-nut and squeezing the juice

therefrom.

Sambals are invariably used instead of curry with rice. The principal ingredient in a sambal is blachan, which is a condiment prepared from shrimps and small fish, to which is added a thousand articles of food, and these sambals are

exceedingly palatable.

In the fruit season, scarcely anything else is eaten, and from morning to night, man, woman, and child may be seen eating durians, mangosteens, chempadaks (a species of jack), and other fruits. The durian is considered exceedingly nutritious and is much prized, and although nauseous to an European palate on the first introduction, the dislike is generally overcome, and he enjoys it eventually as much as a native.

The most common preparation of rice is called nasi pulut, which is made in three ways:—First, the Pulut pangang, which is thus prepared:—a sufficient quantity of uncooked rice is well washed and steeped in water for about half an hour; the water is then poured off, and the rice is put in an open basket and steamed over a pot of boiling water. When half cooked, the rice is thrown into cocoa-nut milk and allowed to soak for some time; it is then closed in pieces of plantain leaf and roasted over a slow fire.

Pulut inti is similarly prepared, but it is not roasted.

Pulut chachau is also prepared in the same way, except that after the rice has been steamed, it is mixed with cocoa-nut milk and syrup poured into moulds and cooled; it is then cut into various shapes and served up as confectionery.

Poor Malays live principally on rice, pulut, and fried plantains.

Those better off indulge in rich curries with their rice, which resemble the curries of India. They are thus prepared:—Each ingredient is first ground into a pulp; the more numerous the ingredients the more palatable will the curry be; turmeric, onions, garlic, chillies, coriander, and other aromatic seeds, and tamarind are the principal; a little of each is thrown into boiling grease or oil, with vege-

tables, fish or flesh, and simmered over the fire till cooked; to it is added cocoa-nut milk or lime-juice as a relish.

Malays are not at all particular as to their companions at meals, they may be seen feeding with Chinese, Indians, and Europeans; a few of the very devout, especially those who have visited the Holy Land, are more exclusive. Hinduized Mahommedans of Bengal are so particular that they will not sit at meals with the votaries of any other creed; those that gain a livelihood by serving Europeans on board ships are looked upon as outcasts, and, on quitting the sea, they have to pay largely for certain religious ceremonies that must be undergone ere their countrymen will admit them into their circles again. The only distinction a Malay draws is between the sexes; men and women never eat together, the former eat first, and then the females partake of their meals. There is very little ceremony observed at Malayan feasts. The rice is put in a large plate, or bowl, with dried fish or curry in small cups, which are placed on a mat spread on the floor, and four or five eat off the same dish, each helping himself to curry as needed. Water is always placed handy in pots. The rich enjoy their meals with more luxury. If the family be large, several mats are spread in the hall, and one or more water jars are placed near, curries and sambals are put in small earthen saucers and placed on a brass tray which is put on a pedestal or stand, and plates sufficient for all are placed on the mats. The guests and males of the family sit in groups, and a bowl of water is brought for each to dip his hand in ere he commences his meal; rice is heaped upon each plate, and the curries and sambals are partaken of as required; small earthen spoons are placed on the tray on the side of each sambal dish.

Water is handed round in brass or earthen pots with spouts like teapots and drunk out of china cups, glass tumblers, or from a small brass bowl-cup which is used to cover the mouth of the water-pot. Plates, knives, forks, and spoons of

Europe are now commonly used.

After meals, or on entertaining a visitor, the *sirih* holder is produced; the latter has generally a tray fitted on the top, which is divided into several compartments, containing the ingredients used with the *sirih*; they are prepared with lime, betel-nut cut into small pieces, and gambier; portions of each are wrapped in the *sirih* leaf, well masticated and the *débris* ejected; tobacco is masticated by a great number.

Light refreshments are also presented to guests, consisting of tea, cakes, &c.

—J. D. Vaughan in J. I. A., Vol. XI.

Mecca.—A belief in the efficacy of a pilgrimage to Mecca is deeply instilled in the Malay mind. The returned pilgrim is termed a Haji, is privileged to wear the Arab costume, and is treated with much consideration by his fellow-countrymen. Regular lines of steamers are now put on the berth to meet the demand for "pilgrim" accommodation.

Medicines.—See Drugs.

Melagapi.—V. on E. bank of Muar R., W. Johore, about 25 miles from its mouth.

Melaki.—V. in the Melakek district, N. Malacca, about $2\frac{1}{2}$ miles N. of Alor Gajah.

Menangkabau Codes.—See Laws.

Menangkabau States.—Those until recently known as the "Negri Sembilan"—the small States between Malacca, Pahang, Johore, and Selangor. Their original inhabitants are supposed to have come from Menangkabau in Sumatra.

Mengah.—V. on the road from Chabau to Nyalas, E. Malacca.

Mengkudu.—The bark of a tree used for dyeing purposes. It is one of the exports from the Cocos Islands. Probably the same as that known in the Peninsula as Mengkádu, the wood of which is used for posts, &c. Sp. not known.

Mentira.—A name applied to one of the aboriginal tribes generally spoken of as Orang-Benua (q. v.). The account given of the latter applies in all essential details to the Mentira. They principally inhabit the interior lying at the junction of Malacca, Johol, Pahang, and Johore. For a full account of them, see J. I. A., Vol. I, pp. 246 and 294 et seq. Curious details of their superstition are given at p. 307 et seq. of the same volume.

Merebau.—A small V. in the S. of the Lundu district, about 2 miles from Payah Rumput, Malacca.

Merhun.—V. on S. bank of Sungei Sayong, the S. source of the Johore R. Merlimau.—District and V. in S.E. Malacca, the latter one mile from the coast, and the site of a Police Station.

Mermaid.—Like most nations dwelling near the sea, the Malays have their mermaids, of which the *dugong* is the probable origin (q. v.).—J. I. A., I, 9.

Metals.—There is no word for this general term in Malay, or any other language of the Archipelago. Sometimes the word lâburan, signifying the "melted object," is used by the Malays. The metals immemorially known to the natives of the Peninsula are gold (mas), iron (besi), tin (timah), silver (perak and salaka), and copper (tembaga). The only alloys known to them are those of gold and copper (suwasa), and those of copper and tin (loyang and kuningan). The three first-named metals only are native products and have native names. Silver has also native names, the origin of which cannot be traced, but the metal is certainly a foreign one, and Barros informs us that, before the arrival of the Portuguese, the Malays of Malacca received their supply of it from Siam, to which, Barros tells us, it had been brought from Lao. The probability, however, is that most of it must have come from China. The name for copper is the corruption of a Sanskrit one, and the knowledge of this metal was probably made known by the Hindus, but at the arrival of the Portuguese, the market of Malacca was supplied from China. Quicksilver was probably, like copper, made known to the Malays by the Hindus, for the only name for it—rasa—is Sanskrit. Lead is known by a name which signifies "black tin," and is probably of Chinese introduction. Down to the year 1824, when it was first made known to them by Europeans, the natives of Malaya were as ignorant of antimony, which abounds in their country, as were the natives of Europe four centuries before.*

A writer in the J. S. B. R. A. S. thus notices the metallurgical products of the Peninsula:—

"Gold, tin, and galena have been a source of export from the Peninsula for some centuries, and the early Portuguese and Dutch settlers used to return to their countries with rich cargoes of those precious metals. Some of the workings that were active in the last century are still yielding valuable results; others were abandoned on account of the extortion and oppression of native princes; others from the alluvial washings and shallow leaders having 'run out.' A different order of things exists at the present day; chemistry, geology, and steam have in other countries converted obsolete mines into valuable properties, and if the same services are applied to the Malay Peninsula, the country might become rich and prosperous.

"It would appear that the Malay Peninsula would be a vast uninhabitable jungle were it not that the interior yields rich gold and tin alluvial deposits on either side of the range of hills that form the backbone of the country. These deposits, crushed and washed down by nature from their original rocky bed, have attracted large numbers of Chinese miners for many years, and on their industry (for the Malay miners are in a very inferior minority) the revenue and prosperity of the Peninsula in a great measure depend. Apart from political and protective purposes, it would appear to be a question whether the Native States were worth

interfering about were tin not to exist.

"The soil is generally of a very poor description. With the exception of a few patches of good limestone country, it is a granite formation of recent date, slowly undergoing decomposition, and as yet quite unable to cope with the rich loams of such countries as Cuba or Java. Malays do not grow sufficient rice for their own consumption, and, with the exception of tin, nearly all that comes under the title of 'Straits Produce,' comes from other countries, and merely rests at Singapore and other ports for transhipment. The tin produce, and the consequent importation of Chinese miners, is essential to the prosperity of the country."

To this it may be added that gold in paying quantities has recently been discovered in Pahang, and that companies have already been formed to work it.

Mias.—The Bornean name of the Orang-utan, and as such known to many Malays. The animal, however, does not exist in the Peninsula, the term Orangutan being applied to the aborigines, or real "men of the woods," found in the interior.

Middle Cape forms the S. boundary of entrance to Kemaman R., Tringganu.

Middle Island.—See Pulo Sabarut.

Miko.—A V. in Rembau (not marked in map S. A. S.).

Miko Bukit.—A Mt. in Rembau, Negri Sembilan (not marked in map S. A. S.).

Minah (Burong tiong).—Two varieties are known. It is alleged that this bird is the best imitator of the human voice amongst the feathered tribes. A specimen belonging to the writer had acquired the words "Good-bye, boy!" and one day made his escape. It was extremely ludicrous to see him perched on a branch, out of reach of the domestic, while he kept repeating the very apropos words. He was eventually enticed back, and lived for some three years in contented captivity. Minahs command about \$5 each, if good talkers.

Mines and Mining.—Practically speaking there is only one form of mining industry largely carried on in the Malay Peninsula. Gold is found and is being worked by Europeans in Pahang, but gold-mining is scarcely as yet an established industry. Of other metals tin alone is produced in such quantities as to yield a large revenue to the Government and profit to the mine owners.

The assertion made in McCulloch's "Dictionary of Commerce," "that the most extensive and probably richest tin deposit in the world" exists in the Malay Peninsula and its neighbouring islands, may be accepted as a statement of fact. The stanniferous area is estimated to have an extreme length of 1,200 miles, and few portions of Malaya are destitute of indications that the metal exists beneath the surface. Singularly enough, the whole product as yet met with consists of alluvial ore, known as "stream tin," and is obtained by simply washing the soil after the superincumbent layer of clay or gravel has been removed. The generally accurate authority above quoted makes the somewhat misleading remark that "no attempt has hitherto been made at regular mining, or obtaining the ore from its rocky matrix;" misleading because as yet such matrices remain undiscovered, although natives occasionally aver that they have seen large lumps thus procured. As the local Governments have offered a fair reward for any information as to the existence of reefs, it seems hardly probable that the Malays, who prefer to make money in any way rather than by hard work, would have neglected such a chance. Practically speaking, at all events, the tin of the country is derived exclusively

Certain portions of the Peninsula are naturally more productive than others, and Perak, or the "Silver State"—why so named is a mystery, as no silver has been found there—stands at the head in this respect. The richest district of the State lies a little to the eastward of the right branch of the Perak River—known as the Kinta River—the Kinta district occupying the southern half of the entire area.

The great industry is carried on in a similar way throughout the country, so that a description of the methods pursued in Perak applies to Malayan mining generally. It must not, however, be supposed that the Malays are the miners of the place. A few "ancestral mines," i.e., mines which have been worked by their fathers and forbears, are indeed in Malayan hands. But the great majority of the working class in the Peninsula—as, indeed, everywhere else, if they can get a footing—are Chinese. Untiring in his toil, sober, to be relied on if well-treated, and willing to work for wages on which any one else would starve, while his chief vices—gambling and opium-smoking—are only indulged in when the day's toil is completed, Ah-sin and his friends are the pioneers of the Eastern world. It is usually agreed that the miners shall receive a share of the profits made by each mine, the small sums paid them meanwhile being treated as advances from the

amount finally due.

Let us see how the Chinaman sets about opening a mine. It seldom happens that the would-be tin-digger is a man of means. He therefore goes to some richer friend, who agrees to advance the necessary money upon condition that the metal obtained is sold to him exclusively, and that all the tools, food, opium, and anything else required is bought from him. We assume that the digger has obtained a yearly license, but if not, he can, for a small fee, get the ground he proposes to work surveyed and staked out, and upon payment of a dollar be entitled to work it for twelve calendar months. These preliminaries settled, the next question is plant. It is very simple. Firstly, a number of changkols, or native hoes, must be obtained, according to the number of men it is proposed to employ. This serviceable tool becomes, in Eastern hands, the equivalent of spade, hoe, and rake—to say nothing of its uses as a weapon of offence. The next articles to be got are a sufficient number of bakols and ragas, or baskets. The ordinary earth-carrying basket is known by the former name, but the three varieties used only in mines by the latter. They are, as a rule, spoon-shaped, with two handles, and are made of an open-worked sort of wicker, so as to act as a sieve when lifting stones or dirt out of the mine. When the tin-bearing stratum is actually reached a sort of wooden spade is used in place of the changkol to work up the sand. The next necessity is to provide wooden planking to build the waterways, as without water no mine is workable. The stream thus obtained turns a rudely-made undershot waterwheel, 4 feet to 5 feet in diameter, and about the same in width. A sprocket-wheel on the axle serves to work the well-known Chinese pump, familiar to all who have visited exhibitions or museums. It resembles our old man-of-war chain pump, but the pistons are square instead of round. When used at an angle, these work in a three-sided trough, passing over another sprocket-wheel placed at its foot. For more perpendicular work the trough is closed, and thus becomes a four-sided pipe. The trough passes through a water-tight box in the wheel-sluice, into which it empties its contents; and as it is always at work, it effects the end in view

From 10 feet to 12 feet of "overburden" is the average that has to be removed before the karang or tin-bearing drift is reached, and water usually appears at about this depth. Assuming the vein to be satisfactory, and the pit kept well drained, the coolies load their ragas with the tin-sand, gravel, and soil, of which the drift consists, and convey it up planks to the edge of the pit. The baskets are either carried singly or from a bamboo yoke in pairs, and the drift is then thrown into the head race. The sluice-box is frequently made of a tree split lengthwise and hollowed out. Small dams are placed at intervals in the race to retain the rich dirt, which is again and again re-washed, until only the biji or "tin-seed"

remains.

To smelt the biji, two forms of furnace are employed. One in use by the Malays is supplied with a blast from two upright cylinders. It is built of clay. The Chinese smelting furnace differs from it slightly in shape, and being supported on three legs is vulgarly known as the Sam Kak Miao, or "three-legged cat." It derives its blast from a square wooden box, in which slides a feather piston, usually worked by a boy squatted on the ground. The melted metal pours from the furnace direct into the mould, not more than one slab or shoe of tin, as a rule, being cast at the same time. The slabs are piled in a hut, until a sufficient number have accumulated to freight a good-sized boat, when they are despatched to head-quarters.

Such in brief is a general sketch of native tin-mining. Expenses have, of course, to be incurred in building attap huts for the coolies and staff, and in obtaining sufficient provisions. Riots often occur if the commissariat is not well looked after, as also on the six-monthly or annual settling days, should the coolies imagine they have been cheated of their just rights. In the main, however, the work is peacefully carried on, and many who began as day-labourers have become rich men. Europeans have gone to this district, and have sent out quantities of costly machinery for the tin-mining, dressing, and smelting. They have, however, failed, chiefly because that which will pay on the very economical system of working adopted as described, will not pay under European systems with a numerous and expensive staff and costly machinery. The pay to native labourers is exceedingly small, and it will only be by a very careful study of the whole of the conditions and circumstances on the spot that really profitable working will be possible to Europeans by Western methods.

Miniak.—A small V. in the forest reserve, E. of Sungei Siput district, N.W. of Malacca.

Mining Customs and Superstitions.—An interesting paper on this subject was contributed by Mr. A. Hale, Inspector of Mines, Kinta, to the J. S. B. R. A. S. for December, 1885. Much of what follows is condensed from his article.

When any one wished to prospect for a mine in former years he usually engaged the services of a pawang (q. v.) or medicine man. Nowadays this step is sometimes dispensed with, but if the would-be mine owner is sufficiently rich he will probably follow the old custom. A pawang usually has a good "nose" for tin, and knows where to look for likely spots. He uses a special vocabulary like the camphor hunters, and this is called bahûsa pantang. Thus an elephant must be called berolak tinggi, a cat ber-olak dapur, a water buffalo sial, a lime salah nama, and so on. The first proceeding is to erect a sort of altar, and invoke the hantu of the locality to help the enterprise. He also hangs an ancha, or square tray made of split bamboo, under the eaves of the smelting-house. Certain rules, the breach of which involves a more or less heavy fine, are then promulgated. Thus raw cotton in any shape or form must not be brought near a mine. None but a pawang may wear a black coat; earthenware, glass, limes or lemons, and cocoa-nut husk are prohibited articles, as are also water gourds. Charcoal must not be allowed to fall into the races, weapons are forbidden in the smelting-house (where coats are also tabooed), and the posts must not be cut or hacked. Elephants are forbidden to come near a mine, for the good reason that they might break down dams, &c., owing to their great weight. Beyond these, and many similar regulations, the Malay miner has peculiar superstitions about tin and its properties. He believes that it is under the protection of certain spirits, whom he endeavours to propitiate; but he also thinks that the tin itself is alive, and has many of the properties of living matter; that it can of its own volition move from place to place, and that it has likes or dislikes regarding certain people. Hence, says Mr. HALE, it is advisable to treat tin ore with a certain amount of respect, to consult its convenience, and, what is perhaps more curious, to so conduct the business of mining that the tin ore may, as it were, be obtained without its own knowledge!

Mr. Hale adds a most useful mining vocabulary to his paper, few of the words being found in existing dictionaries.

Missions and Missionaries.—As regards Protestant Missions, the S. P. G. may be said to have begun its operations in the Straits with a Tamil Mission at Singapore in 1867. This has since been extended to the Malay-speaking Eurasians and Chinese, and possesses, besides the School-Chapel and Missionary's house in Singapore, an important branch at Jurong, where a substantial Church has been erected. In 1871, a Tamil Mission for Penang and Province Wellesley was begun, for which a School-Chapel and Missionary's house were erected in 1886. It is now proposed to add to this a Mission to the Chinese. In Malacca, a Mission to the Chinese has been in existence since 1870, and is conducted by a Catechist under the Chaplain's supervision, some of the services being held in the English Church.

Missions, Catholic.—The first Roman Catholic Mission in the Straits was established at Pulo Tikus (Penang), by the Rev. M. P. Rectenward in 1797. Since that date no less than six mission stations have been established in Penang, three in Singapore, four in Malacca, and four in Province Wellesley, while ten stations exist in various parts of the Native States, such as Johore, Muar, Perak, Selangor, &c. The estimated number of converts is about 5,500 in the British Settlements, and 900 in the Peninsula. There are 23 French, 1 Eurasian, and 1 Chinese Missionaries; 22 mission schools with 1,200 boy and 900 girl pupils have been established under their auspices. A College at Pulo Tikus educates 100 pupils for mission work, the inmates coming from Japan, Corea, China, Tonquin, Cochin-China, Cambodia, Siam, Burma, and Malaya. The institution is directed by a Rector, aided by 9 clergy and professors; 6 orphanages with 480 girls and 160 boys owe their foundation to the same source. The Procurateur des Mission Etrangères resides at River Valley Road, Singapore. The Right Rev. Bishop Edouard Gasnier is the present head of the Catholic Church in this part of the world.

Moar or Muar.—This is the name of a river which gives its name to a State, and of some note in the history of the Malays, a place situated on it being that to which the Javanese founder of Malacca fied when driven out of Singapore, and where his descendant first took refuge when driven from Malacca by the Portuguese in 1511. The place is about ten leagues south of Malacca. At its embouchure, the river is 600 yards wide, and 18 miles up diminishes to one-sixth part of this breadth. A sand-bar obstructs its mouth on which there is no more than three-quarters of a fathom of water. The whole country is an extensive primitive jungle. The district now forms part of the territory of the Sultan of Johore, and is rising in importance. Its productions are the usual ones for such a country—most of them spontaneous products of the forest, as ivory, ebony, bees'-wax, rattans, &c. The interior, however, yields a little gold and tin.

Moh.—V. on S. bank of Plus R., about four miles E. of Perak R., N. Perak.

Mole (Munduk).—Found in the Peninsula, and similar in all respects to the European variety.

Money.—The current and convenient principal coin of the Malay countries is at present, and has long been, the Mexican dollar, which, now worth in sterling money barely 29 pence, has an universal preference. Of late years, the now nearly extinct Hongkong dollar and the Japanese Yen have been largely current, the latter in 1886 forming a good proportion of the coin tendered in the Settlements. The English rupee and the Dutch guilder are but of local currency, and always,

more or less, at a discount. The dollar, in the native languages, is known by various names. The Malays usually call it *ringgit*, which literally means "scenic figure." Such figures had been represented on ancient coins; and the impressions on the Spanish coin, which was the first dollar introduced, appearing to resemble

them, probably gave rise to the name.

A great variety of small coins of brass, copper, tin, and zinc are in circulation throughout all the islands. The most frequent of these is the Dutch doit, of which about 300 ought to go to a Spanish dollar. The intrinsic value of all such coins, however, having no relation to their assumed one, and being usually over-issued, they are generally at a heavy discount. The small coins of Kedah are of tin. These go under the name of tra, which is, however, only the word "stamp" or "impression." Of these, 160 are filed on a filament of rattan, of which 8 strings, or 1,280 coins, are considered equivalent to a hard dollar. Chinese cash are often known as pitis by the Malays. This was the name of the ancient coin of Java, and is a frequent appellative for money in general, as well as for small change. Chinese coins of this description were found in the ruins of the ancient Singapore, of as early a time as the tenth century, and we have the authority of the first Europeans that visited Borneo Proper—the companions of Magellan—that they were the only money of that part of the Archipelago. "The money," says Pigafetta, "which the Moors use in this country is of brass, with a hole for filing it. On one side only there are four characters, which represent the great King of China. They call it picis."—Primo Viaggio, p. 121.

In Singapore, after our occupation, there were excavated some Chinese coins from among quantities of Chinese pottery. One of these bore the name of a Chinese emperor, whose death corresponded to the year of our time 967, of another to 1067, and of a third to 1085, upon which Crawfurd remarks that it may be confidently asserted that an intercourse, direct or indirect, existed between China and Singapore as early as the tenth and eleventh centuries. This belief, however, is quite erroneous. Coins of equally ancient or far older date are in common circulation throughout China at the present day, and may frequently be found in

the strings of "cash" brought down by any newly-arrived coolie.

The absence of all other current coin than such as are now mentioned previous to the arrival of Europeans is testified by the Portuguese historian, and this, even in Malacca, the most considerable trading emporium of the Archipelago. The enterprising Albuquerque, before he quitted that place after its conquest, proceeded at once to supply this deficiency, actuated at the same time, in a good measure, by his hostility to the religion of its previous rulers. "Having," says Barros, "done these things for the security of the city (built a fortification and a church from materials furnished by the tombs of ancient Malay kings), he did other things for its grandeur and for its commerce and this as if at the request of the people. With this view, he ordered money to be coined, for in the country gold and silver passed only as merchandise, and during the reign of King MAHOMMED there was no other coined money than that made from tin, which served only for the ordinary transactions of the market."-Decade II, Book 2, Chap. 2. money still circulates in Pahang and other Native States. Castaghneda is more full in his account of the transaction. "As," says he, "there was no money in Malacca except that of the Moors, the governor-general ordered some to be coined, not only that he might extinguish the Moorish coin, but also in order that a coin might be struck with the stamp and arms of his royal master. And taking on this subject the opinion of the Gentile Chins (the Talinga Hindus) and other honourable men, dwellers in the city, he commanded forthwith that a tin coinage should be struck. Of the one small coin called caixa (cash), he ordered two to be made into one, to which he gave the name of dinheiro. He struck another coin, which he named soldo, consisting of ten dinheiros, and a third which he called bastardo, consisting of ten soldos. And as there existed no coin of gold or of silver, for the

merchants made their sales and purchases by weighing the precious metals, the governor-general resolved, with the advice of the persons above-mentioned, to coin gold and silver money. To the gold coin he gave the name of catholicos, and it weighed 1,000 reas, and to the silver that of malaques. Both were of the purest

metal that could be smelted."-Vol. II.

The Malays generally, however, had no recognized coinage. Some employed salt, cakes of bees'wax, and similar commodities as a standard of exchange: but most of the civilized nations used gold dust, estimated by weight and touch, a practice in which it is evident, from the derivation of the terms connected with them, that they were initiated by the Hindus, most probably the Telingas of the Coromandel coast. Thus we have the scarlet weighing-bean rakit, from the Sanskrit raktaka, mas from masha, tael from talaka in the same language, with mutu—the touch of gold—from the Telinga. The values of the denominations are all Hindu. Thus 24 of the scarlet beans, each $2\frac{1}{2}$ grains troy, make a mas, and 16 mas make a tael, while the touch is a scale of 10, like that of the Hindus. A colony of the Hindu of Telingana still exists in Malacca, whose profession it is to try gold by the touch and to refine it.

There is no word for "coin" in Malay. For money, the Malay name is uwang, abbreviated wang, but the Sanskrit word bânda is used. Uwang or wang, in Malay, signifies also "the palace," and may possibly be the source from which the term for money is derived, in something like the manner in which our own coin is called "a sovereign." The Malays use also the name of their small coin—pitis or pichis—for money generally, but wang is the common name throughout the Malay

Archipelago.

A large quantity of coins are still current in Perak supposed to have been minted by the East India Company for Malayan use. Five sorts of dollar, in addition to those of Hongkong and the Pillar dollar, are in circulation, the latter being, however, now seldom met with. The Maria Theresa dollar is accepted as bullion only. The majority of the coins are either Japanese Yen or the Mexican cap and eagle. The banks in the Straits Settlements issue notes of from \$5 to \$1,000 in value, but those of Penang are at a slight discount in the other Settlement, and vice-versâ.

Counterfeit coin and notes sometimes find their way into circulation, some 32 sorts of dollars having been imitated. The blanks for absolute base coin are of white brass, and the imitations are often excellent, the familiar Mexican being especially good. Oddly enough, base cents are also put into circulation, though one would hardly have thought such an enterprise remunerative. Chinese "cash" are not legal tender in the Settlements, but are freely used in the Native States. The dollar, from its original exchange value of 4s. 2d., has

within the past fifteen years sunk to below 2s. 6d.* (See Currency.)

Monitor (Monitor dracana).—The Indian monitor abounds in the Peninsula, and I have frequently seen it swimming across the ditches and canals in Province Wellesley. It is indeed called by some naturalists the "water lizard," but, oddly enough, I cannot find that any popular work notices its existence in the Peninsula. It may be described as a lizard with an extremely elongated neck, and in the water it looks very like a large snake. The popular European term for it is Iguana, which is, however, a misnomer.

Monkey or Ape.—Crawfurd says:—"I do not believe there is any genuine name to express the quadrumanas or four-handed family of animals in any tongue of the Archipelago. In the different languages, each species has its own proper name, and the family is referred to generally by the name of the most familiar species, as kra in Malay. There are names or synonyms for, at least, nine different species; moniet, however, has of late years become the accepted term for the animal generally."

One of the commonest known is Hylobates lar, known as the wah-wah, from its peculiar and mournful cry, with which the forests of the Peninsula resound at early morn. This animal, unlike most monkeys, walks habitually on its hinder legs, using the arms to balance itself. The fur is black, white, or a combination of both, but difference of colour is not held to show a difference in species. In some natural histories, the wah-wah is named the "silvery gibbon." The kahau, or proboscis monkey, is said to inhabit the Peninsula, but the specimens as yet obtained have come from Borneo. Two or three species of Semnopithecus are also found. They are long-tailed and of small size and full of vivacity. Two species of macaque inhabit the jungle, M. cynomolgus and M. nemestrinus. The latter is taught to climb cocoa-nut trees to pick the nuts—a feat performed by one at the compiler's house in Butterworth. None of the monkeys of Malaya have prehensile tails. The orang-utan is not found in the Peninsula.

A very short-tailed monkey known as bruk is also trained to pick cocoa-nuts

or durians, and does so very cleverly.

Monkey Cup (Nepenthe).—This curiously-shaped order of flowers, known also as the "pitcher plant," is the telaga burong, or "bird's well," of the Malays. There are several varieties, the most beautiful of all being found in Malacca. On Penang Hill is a circular patch of two or three acres known as "Monkey Cup Hill," where a very handsome species flourishes, almost to the exclusion of every other plant. The cups of some varieties are from 10 to 12 inches in length, and contain a viscid fluid, in which is usually found a number of dead insects. Both the English and Malay names arise from the erroneous idea that monkeys and birds drink this liquid, although, as testified by Mr. Wallace, the liquid is drinkable by thirsty men.—Mal. Archip., p. 31.

Monsoon.—This is a corruption of the Arabic word musim, "season," which the Portuguese received from their first instructors in Indian navigation—the Arabs and other Mahommedan navigators—and which they corrupted into monção, whence the form of our own term. The word, in the sense of the Indian periodical winds, occurs in Barros, who wrote his history in the middle of the sixteenth century. Thus, when he is giving an account of the famine which took place in Malacca immediately after its capture, he ascribes it to the supplies of corn from Java being intercepted by the fleets of the expelled Malays, and by the impossibility of the Portuguese ships going for them themselves in consequence of the monsoon (monção) being adverse, that is, the south-east monsoon prevailing.

The word musim is in use among all the maritime nations of the Archipelago, but only as a synonym for the Sanskrit words kutika and masa, "time" or "season." To complete the sense, the words east and west, timur and barat in Malay, must be added. There is a peculiar idiom of the Malay language connected with the monsoons which requires a short explanation. The Malays call all countries west of their own "countries above the wind," and their own and all places east of it, "countries below the wind," the Malay words being atas angin and bawa angin. The expression is really equivalent to "windward" and "leeward," the west representing the first, and the east the last. The origin of the phrase admits of no explanation, unless it have reference to the most important of the two monsoons—the western, that which brought to the Malayan countries the traders of India. It is at least as old as the sixteenth century, and no doubt a great deal older. Barros describes it, but mistaking east for west, he gives an explanation of the phrase which is necessarily erroneous. "For," says he, "before the foundation of Malacca, which, by its position, ought to be the Saba of PTOLEMY, it was at Cingapura that the navigators of the western seas of India and the eastern seas of Siam, China, Champa, Camboja, and of the many thousand islands which lie to the eastward, assembled. These two different quarters (the east and the west), the natives of the country (the Malays) call Dybanangim (dibawa angin), and Atazangim (atas-angin), which mean below the wind and above the wind, that is, the west and the east. For as the chief parties that navigate these seas proceed from two great gulfs—that of Bengal and that which extends towards the land of China reaching to a high northern latitude—it is in reason to call the one high and the other low."—Decade II, Book 6, Chap. 1. Barros adds, by way of confirmation, that the expression may also have reference to the rising and setting of the sun in the east and west, and that it is consequently equivalent to the Levante and Ponente, or orient and occident of European nations, a plausible theory founded, however, on a misstatement of facts.*

The monsoons which blow over the Malayan Peninsula are the north-east and south-west. The former is (relatively) the dry monsoon, and the latter the wet

one, the rains being then heavier and thunderstorms frequent.

Moringa Tree.—A forest tree the pods of which are used for curries, while the scraped root forms a substitute for horse-radish, which it exactly resembles in flavour.

Morro.—This well-known Italian game has its counterpart amongst the Chinese of the Peninsula. Each player suddenly holds up any number of fingers, or his clenched hand, the latter counting 0, and his opponent has to at once name the number held up. A full description will be found in "Notes and Queries," with No. 15 of the J. S. B. R. A. S.

Mosque.—The Malay mosque is always square, with a verandah, where practicable, running round its four sides. A recess in the centre of one side opposite which the *Imam* recites the prayers points towards Mecca. In front a large tank is provided for ablutions before entering. A drum is suspended in the front verandah or other convenient place, and is struck by the *Bilal* to call the people to prayers. A gong is sometimes substituted for the drum. No furniture is provided, mats alone covering the floor. The Malay term for mosque is *māsjid*, pronounced *māsqid* in the North.

Mosquitoes.—These abound throughout Malaya, the worst species being somewhat small, banded with black and white. The mosquito curtain is a necessary of life in these regions.

Mother-o'-Pearl.—See PEARL.

Moths.—The heterocera of the Peninsula are still in need of a scientist who will describe and catalogue them. A few, such as the Atlas and Sphinxes, attract everybody's attention by their size and beauty. The "death's-head" is also common. But no pretence can be made of even describing the commoner varieties, collections of which, if in good condition, command high prices from home museums, &c.

Mount Elvira (2,384 feet).—Highest elevation in the W.C. chain of hills, Penang.

Mount Faber.—The W. signal-station of Singapore-town, whence all vessels coming from the N. and W. are first signalled, the flags being repeated at Fort Canning. In like manner it repeats the signals of the latter as regards vessels coming from the E. In the Teluk Blangah district.

Mount Formosa.—The foreign name of Batu Pahat (q. v.).

Mount Fraser.—Hill in Tanjong Tokong district, N.E. Penang.

Mount Olivia (819 feet).—In N.E. Penang, just inside Bagan Jermal.

Mount Palmer.—Elevation N. of Tanjong Pagar, Singapore, carrying a battery.

Mount Vernon.—Hill in Paya Lebar district, E.C. Singapore.

Mouse-Deer.-See DEER.

Moussay.-V. on W. bank of Pahang R., C. Pahang.

Muar .- See MOAR.

Muda.—R. and district in Province Wellesley, the former being the boundary between the British and Kedah territory. As regards the district, the word is vaguely applied to the entire tract lying N. of a line drawn through Penaga

and Permatang Bertam.

The river takes its rise in the Gunong Wangsa, a spur of the Titi Wangsa range. As the sand ridges which form the banks of the river near its mouth project some distance out to sea, in the form of the bill of a bird, while the stream of fresh water poured out by the river is generally strong and abundant, the rise and fall of the ocean tides have no further influence on the waters of the river beyond causing a corresponding rise and fall, and retarding or accelerating the stream. In unusually dry seasons, however, the sea-water sometimes flows up as high as Bindahari during spring tides, so as to render the water brackish. Boats ascending the river have to be well manned, and frequent relays are necessary when speed is an object. The river here is nearly a furlong in breadth, and it varies very little throughout the whole of the distance. The mangrove is not altogether absent, as there are patches on each side of the river near the mouth, but they disappear when the river has been ascended a little more than a mile, and the banks, which are almost invariably formed of stiff clay, become steep and sometimes precipitous.

Mudar Fibre. - See FIBRES.

Muka Head .- See Tanjong Puchat Muka.

Muk Kwa.—A tree the leaves of which when dried are used to stuff pillows and mattresses.

Mules (Barhal) are known to the Malays, but seldom seen in the Peninsula.

Muruwa.—V. on E. bank of Perak R., about half way between Blanja and Bota, W.C. Perak.

Musang.—The true musang is one of the Paradoxures, but some allied species (see Rasu and Delendung) are called by the same name in Malay. It plunders coffee plantations and henroosts and has the reputation of being the bitter enemy of all snakes. This, however, appears to be unfounded, the character properly belonging to a species of grey ichneumon—Herpestis griseus, called Bangbun by the Malays. Swettenham translates the word by polecat.

Mushrooms.—The tree mushroom does not appear to exist in Malaya, though it has been introduced into Singapore. Various species of fungi are, however, for sale in the markets, that most common being imported from China. A poisonous variety—chandawan lilin—of a bright sulphur colour, becoming paler and more watery round the edge of the cap, and found on trees, tasting much like the true mushroom, but not bitter or astringent, is found in the Peninsula and Settlements. It has at times been eaten, and nearly caused death. The Malays, however, assert that if simply boiled and the water thrown away, no ill-effects ensue. If stewed, the poisonous properties are retained.

Music.—There is no word for music in Malay; the term bunyi-bunyian, a derivate from bunyi, "sound," is occasionally used to express it, but its real meaning is "musical instrument," the cause and effect being confounded. The Sanskrit word lagu is used, but this really signifies "air" or "time." Fine musical ears often occur among all the nations and tribes of Malaya, and in this respect they are favourably distinguished from the Hindus, and still more from the discordant Chinese. They are all passionate lovers of their own music, and capable of acquiring considerable skill in European. Like all rude nations, their music is composed in a single common enharmonic time, the sounds produced by their instruments being the same as those of the black keys of the harpsichord. They have wind and stringed instruments, and instruments of percussion.

Of the first of these, the most singular is a sort of gigantic Æolian pipe, frequently referred to in the poetry of the Malays under the name of buluh-parindu, literally "the languishing bamboo," and occasionally of buluh-ribut, or "the bamboo of the storm." By far the best account of it has been given by Logan, in the narrative of his journey into the interior of the Malay Peninsula. It is as follows: -- "On our right, there is a succession of neat cottages, amongst cocoa-nut trees, forming the village of Kandang. On nearing one of these, our ears were saluted by the most melodious sounds, some soft and liquid, like the notes of a flute, and others full like the tones of an organ. These sounds were sometimes interrupted or even single, but presently they would swell into a grand burst of mingled melody. I can hardly express the feelings of astonishment with which I paused to listen to and look for the source of music so wild and ravishing in such a spot. It seemed to proceed from a grove of trees at a little distance, but I could see neither musician nor instrument, and the sounds varied so much in their strength, and their origin seemed now at one place, and now at another, as if they sometimes came from the mid-air, and sometimes swelled from amidst the dark foliage, or hovered faint and fitful around it. On drawing nearer to the grove of trees, my companions (Malays) pointed out a slender bamboo which rose above the branches of the trees, and from which they said the music proceeded, and when the notes had died away in the distance, our ears were suddenly penetrated by a crash of grand and thrilling tones which seemed to grow out of the air that surrounded us, instead of pursuing us. A brisk breeze which soon followed, agitating the dark and heavy leaves of the fronds of the gomuti palms, explained this mystery, while it prolonged the powerful swell. As we went on our way, the sounds decreased in strength, and gradually became faint, but it was not until we left 'the bamboo of the wind' far behind us, and long hidden by intervening trees and cottages, that we ceased to hear it." The instrument which produced these fine effects was a bamboo cane, "rough from the jungle," from thirty to forty feet long, perforated with holes and stuck in the ground. This is certainly a very simple contrivance, but would not have occurred to any people who had not a natural taste for music. Certainly the Hindus and Chinese have, as well as the Malays, been living for ages among forests of bamboo without making such an invention.*

Musical Instruments.—The principal instruments in Malay use are, the gendang or drum, those hung in mosques being called gendang raya or gendang panjang, the smaller drum is called gendang prang or war-drum; the serunei or flageolet; the suling and serunei or flutes; and rebana kathira or tambourine. Gambang, or wood harmonium, and gamboosh, or bamboo harmonium, consisting of a large number of suspended bamboos of various sizes, are played with pleasant effect; they are used at marriages, &c., but are too bulky to be carried about in procession. A Malay gambang tested by the writer with a piano was found to have nine notes in the octave. The native violin is called rebab; but all these terms are probably Javanese or Persian. Chinese instruments have been too often described to render notice necessary. (See Buluh.)

Nails.—Malay dandies imitate the Chinese in allowing the nail of the forefinger of the left hand to grow long, so as to intimate that they do not work. A

sheath is used to protect it from damage.

Nam-Nam.—An acid fruit of leathery consistency, which when cooked strongly resembles dried apples. It grows on the stem of the tree, which is generally much infested with ants.

Nam Toh Kong.—V. in Sembawang district, N. Singapore.

Names, Malayan.—It is customary to name the eldest child Sulong and the youngest Bongsu, irrespective of their sex. Seven names are invariably used by rural Malays. They are:—Sulong, Awang, Itam, Putch, Allang, Pendeh, and

Kechil. If more children are born, the same names are repeated, with the word kechil (small or younger) annexed, thus, Sulong kechil, Awang kechil. Girls are included in the above nomenclature, with the addition of the word meh or mah

prefixed-thus, Meh Sulong, Meh Kechil.

It follows, necessarily, that in each kampong, or village, there are several men and women of the same name. To avoid confusion, nicknames are resorted to. The following epithets are frequently heard:—Awang itam, or Awang the black; Long (a contraction of Sulong) putch, or Long the fair; Kechil pendeh, or Kechil the short; Allang gemok, or Allang the fat; Itam panjang, or Itam the tall; Putch

bengkok, or Puteh the crooked, and so on ad infinitum.

The above custom is very ancient. Other names, such as Mahomet, Drahmin, Abdulrahman, Babu, Daoud, Hussian, are obtained from foreigners. Nicknames are not restricted to the above names; every peculiarity is noticed, and some wit of the village connects it with the individual's real name, and if it be a hit, the new name is generally used, thus:—Matt (Mahomet abbreviated or corrupted) kerbau, Matt the buffalo; Drahmin juling, squinting Drahmin; Babu tuli or pukka, Babu the deaf; Ismail brani, Ismail the brave.

The nickname frequently supersedes the real name, and people are soon known

by the former only, viz., Gemoh, Pendek, Bengkoh, Juling mata, &c.

Females share the same fate. Some are Chantek (handsome), Manis (sweet), Bungah (a flower), Puteh, Itam. To their honour be it said, the Malays see no defects in their women, and all bear pretty nicknames.

Occupations, residences, &c., also afford nicknames.—J. D. VAUGHAN in

J. I. A., Vol. XI.

Naning.—The name of the territory forming the N. portion of Malacca, and including the present districts of Nyalas, Jus, Bukit Sunggi, Tebong, Machap, Pulau Sebang, Tanjong Rimau, Padang Sebang, Gading, Pigoh, Tabu, Melekek, Ayer Pah Abas, Sungei Siput, Sungei Bharu Ilir, and Linggi, covering an area of about 240 square miles. In 1643 the Dutch sent a deputation to "persuade" the Menangkabaus of Naning to lead a peaceful life, the disturbed state of the territory, owing to external wars, being highly injurious to trade. A treaty was made under which the Naningites engaged to pay tribute of one-tenth of all padi grown. This was not adhered to, and in 1645 an unsuccessful attempt was made to coerce them. In 1701 Naning was placed under Dutch protection by treaty with Johore, but the collection of tenths became nominal. In 1746 it was commuted for a tithe of 400 gantangs yearly, then worth about twelve dollars only. In 1795 the English became possessed of Malacca, but paid little attention to Naning till 1801, when a treaty was made with the Penghulu. Prior to 1785 the Dutch had succeeded in imposing a tax of buffaloes and fowls, but in 1807 this was reduced by us to six dozen of fowls only, the 400 gantangs of rice being still paid. In 1825 Malacca was finally ceded to us, and in 1829 the chiefs, who had been giving some trouble, promised better behaviour. The Penghulu, Dool Syed, however, being shortly afterwards summoned to Malacca, refused to come, and put himself in open rebellion, in which he was abetted by the surrounding States. In October, 1830, he crossed the boundary, and seized some land belonging to a Malay British subject, who applied to us for redress. The Penghulu refusing to notice our remonstrances, a force was, in August, 1831, despatched to bring him to reason, and so commenced the well-known "Naning war."

The first attack was not very successful, and the force retreated to Malacca, leaving two six-pounder guns in the jungle. In March, 1832, a second campaign was opened. Nothing, however, was done until June, when the arrival of H.M.S. Magicienne, allowed of the blockade of the Linggi and Kessang Rivers. On the 15th June Tabu, the residence of Dool Syed, was captured, the Penghulu, however, escaping and wandering about as an outcast till February, 1834, when he uncon-

ditionally surrendered.

Naning may be said to have become a virtual portion of the Malacca territory on the conclusion of the war in 1832, and the remarks on the fauna, climate, &c., of Malacca, apply to Naning in common with other portions of the territory.

Nauh.—The name of a tree which furnishes the kalam, or pen of the natives. The portion used is a woody shoot three or four feet in length of grooved section and black in colour.

Nautch, Malay.—The following description of the dancers and their performances is condensed from the Hon'ble W. E. MAXWELL'S account in Vol. II, J. S. B. R. A. S. (pp. 164 et seq.):—When we entered, we saw seated on a large carpet in the middle of the hall four girls, two of them about eighteen, and two about eleven years old, all beautifully dressed in silk and cloth of gold. On their heads they each wore a large and curious, but very pretty ornament, made principally of gold-a sort of square flower garden where all the flowers were gold, but of delicate workmanship, trembling and glittering with every movement of the wearer. Their hair, cut in a perfect oval round their foreheads, was very becomingly dressed behind, the head-dress being tied on with silver and golden cords. The bodies of their dresses were made of tight-fitting silk, the neck, bosom and arms bare, whilst a white band round the neck came down in front in the form of a V. joining the body of the dress in the centre, and there fastened by a golden flower. Round their waists they had belts, fastened with very large and curiously worked pending, or buckles, so large that they reached quite across the waist. The dress was a skirt of cloth of gold (not at all like the sarong), reaching to the ankles, and the dancers were also a scarf of the same material fastened in its centre to the waistbuckle, and hanging down on each side to the hem of the skirts.

All four dancers were dressed alike, except that in the elder girls the body of the dress, tight-fitting and showing the figure to the greatest advantage, was white, with a gold handkerchief tied round under the arms and fastened in front, whilst in the case of the two younger, the body was of the same stuff as the rest of the dress. Their feet, of course, were bare. On their arms they were numbers of gold bangles, and their fingers were covered with diamond rings. In their ears, also, they had fastened the small but pretty diamond buttons so much affected by Malays,

and indeed, now, by Western ladies.

As soon as the music struck up a lively measure, the performers rose and saluted. Gradually raising themselves from a sitting to a kneeling posture, acting in perfect accord in every motion, then rising to their feet, they began a series of figures, hardly to be exceeded in grace and difficulty, considering that the movements are esentially slow, the arms, hands, and body being the real performers, whilst the feet are scarcely noticed, and for half the time not visible. They danced five or six dances, each lasting quite half an hour, with materially different figures and time in the music. All these dances, I was told, were symbolical-one, of agriculture, the tilling of the soil, the sowing of the seed, the reaping and winnowing of the grain, might easily have been guessed from the dancers' movements. But those of the audience whom I was near enough to question were, Malay like, unable to give much information. Attendants stood or sat near the dancers, and from time to time, as the girls tossed one thing on the floor, handed them another. Sometimes it was a fan or a glass they held, sometimes a flower or small vessel, but oftener their hands were empty, as it is in the movement of the fingers that the chief art of Malay nautches consists.

The last dance, symbolical of war, was perhaps the best, the music being much faster, almost inspiriting, and the movements of the dancers more free and even abandoned. For the latter half of the dance they each had a wand, to represent a sword, bound with three rings of burnished gold, which glittered in the light like

precious stones.

This nautch, which began soberly, like the others, grew to a Bacchante revel,

until the dancers were, or pretended to be, possessed by the Spirit of Dancing, "hantu menari" as they called it, and leaving the hall for a moment to smear their fingers and faces with a fragrant oil, they returned, and the two eldest, striking at each other with their wands, seemed inclined to turn the symbolical into a real battle. They were, however, after some trouble, caught by four or five women, who felt what the magic wands could be made to do, and carried forcibly out of the hall. The two younger girls, who looked as if they, too, would liked to be possessed, but did not know how to do it, were easily caught and removed.

The band, whose strains had been increasing in wildness and in time, ceased on the removal of the dancers, and the nautch was over. This was after 5 A.M.

Navigation.—The prevalence of the easy language of the Malays, the existence of Malay colonies or settlements on the coasts of most of the islands remote from the parent country of this people, and the infusion of more or less of the Malay and Javanese languages into all those from Sumatra to New Guinea and Luzon, are sufficient proofs even of the antiquity of Malay navigation, for such

effects are not the result of a few years' intercourse, but of that of ages.

Malayan navigation, although it probably embraced an area of not less than a million and a half of square leagues, it is certain never extended beyond the bounds of Malayan waters. The exceptions to this are few, and limited to places at a very moderate distance from them. It extended as far as Martaban on the Bay of Bengal, to the north, and to the south as far as the northern coast of Australia, for the fishery of tripang and tortoise-shell, as it still does. In the China Sea, the Malays went as far as the 10° of north latitude, planting a colony in Kamboja, the

limit of the region which is free from the equinoctial storms.

The natives of Celebes have, in the navigation of the Archipelago, to a great extent, taken the place which the Malays occupied before the arrival of the Portuguese. These consist of two nations—the Macassar and Bugis—but especially the latter. It is singular that Barbosa, who describes so correctly the trade which the Malays and Javanese conducted from Malacca, does not even name the people of Celebes as being present at that place. The first account we have of them is in the native annals of Ternate, as given in the "History of the Moluccas" by Argensola, where they are described as having frequented that island in 1338. The earliest notice we have of them in the annals of the Malays is in the reign of a prince called Mansur Shah, who ascended the throne of Malacca in 1374, and died in 1447. They are, in this case, described not as traders, but as freebooters that harassed the trade of Malacca, under the leadership of a notorious pirate of the name of Samerluk, whose title of Kraing shows that he was of the Macassar, and not the Bugis nation. When the Portuguese first became acquainted with the inhabitants of Celebes, they had not yet been converted to the Mahommedan religion, and it seems to have been subsequent to their conversion that they acquired that industry and spirit of enterprise which has continued ever since to distinguish them.

The vessels in which the most distant voyages of the most civilized nations of the Archipelago were performed were all of small size, seldom exceeding the burden of 50 or 80 tons. What they wanted in size was, in some degree, made up in numbers. The number of foreign and native vessels which yearly frequented the port of Singapore, and it included the junks of China, Cochin-China, and Siam, gave an average burden to each vessel of no more than 30 tons. All native vessels continue to use the oar as well as the sail. The larger vessels of the Malays go under the name of jung, the same word which the Portuguese write junco, and which we have corrupted into junk, and apply to the huge unwieldy vessels of the Chinese. Neither of them have any name for a ship in our sense of the word, except the foreign one—kapal—which they have borrowed from the natives of Coromandel,

who have immemorially traded with the western parts of the Archipelago in vessels that have some right to this name. Each nation of the Archipelago has its own form of construction, both as to hull and equipment, and by this their nationality is readily known. Flags, in so far as shipping is concerned, have been taken from the Portuguese, as the sole name—bandera—implies. Such rude native vessels as are here referred to are to be seen in the same harbours with the sailing ships and steamers of European nations, with the unwieldy stereotyped junks of China, and with the lighter and more manageable ones of Siam and China, all affording true types of the respective social conditions of the people to whom they

belong.

In the early period of European intercourse with the nations of the Archipelago. we find them in possession of large fleets of vessels of the description just referred Thus, the King of Malacca, after his expulsion from his capital, was still in possession of a fleet that, in a good measure, blockaded the town, interrupting the supply of corn from Java, so as to produce a famine in the recent conquest, and this in despite of the fleet of Albuquerque, who was himself still in the roads of Malacca. A still more remarkable instance was presented in a fleet which had been prepared by certain Javanese chiefs, for the purpose of wresting Malacca from the Malays—an enterprise which was persevered in even after it was known that it had fallen into the hands of the Portuguese. Castaghneda gives the following account of this singular expedition:—"Fernão Perez, Admiral of the Malacca sea, observing that the city was secured from attack, resolved to return to India. this intention, he sent a message to the Governor of Malacca, informing him that he would depart with the monsoon in January, taking along with him the merchant ships of Diego Mendez. Just as he was making preparations to leave, news came to the fortress that PATE UNUS, lord of Japara, in the island of Java, had passed through the Straits of Sábáò (Sabon-one of the narrow straits leading through the islands at the eastern entrance of the Straits of Malacca), with a great fleet, and such turned out to be in reality the case. This PATE UNUS was a Moor, a valorous cavalier, and not a vassal of the Gentile King of Java, against whom, on the contrary, he and other Moorish lords had rebelled, calling themselves kings. Before the Governor-General (Albuquerque) had quitted Malacca, news had come that PATE UNUS had fitted out a great fleet, not only with his own means, but with the assistance of other lords, his friends and relatives, with the intention of attacking Malacca, and taking it from the Malay king, who was then still in possession of it. With this object in view he sent many Javanese to reside in Malacca, in order to have them at his service when he should arrive there. PATE UNUS had entered into a league with MUTARAJA, the same whom the Governor-General had put to death, and this person had promised him his entire assistance. This fleet having been prepared, he did not desist from his enterprise, even although he knew that Malacca was now in our possession, for he was told that we were few in number, and might be easily overcome by the strength of his armada, which was very powerful, consisting, between juncos (junk), lancharas (lanchang, a barge), and calalenzes, of three hundred vessels. The fleet, equipped as I have now said, sailed for Malacca, and passing the Straits of Sábáò, was seen by certain people of the town of Malacca, who brought information of it to the Governor, Ruy DE BRITO. who forthwith communicated the news to the Admiral, Fernão Perez, in order that he might ascertain what fleet it was, and whether it was as great as it was represented."—Decade II, Book 9, Chap. 5.

Castaghneda's account of one of the ships that form this fleet is curious:—

Castaghneda's account of one of the ships that form this fleet is curious:—
"Pate Unus," says he, "gave orders to construct a ship which should be of the size of ours, 500 tons. In building her, he commanded that a second layer of planking should be placed over the first, and so on, to the number of seven coats. And between each layer of planking there was put a coating consisting of a mixture of bitumen, lime and oil. Each layer of planking they called lapis (in Malay, 'fold')

or 'lining'). In this manner the sides of the junco were three palms in thickness, so that, wherever she might be placed, she would serve for a tower or bastion."—

Decade II, Book 9, Chap. 4.

A part of this expedition made an effectual landing, but quickly re-embarked, and fled. It was pursued, attacked, and discomfited by five Portuguese ships, none of which could have exceeded the size of an ordinary corvette. This is the historian's account of the flight and pursuit:- "At sight of the flight of the enemy, our people were so overjoyed that they shouted 'Victory, victory, they fly!" FERNÃO PEREZ, making sail, gave the signal, 'Saint Iago at them!' and it was marvellous what every one then achieved. It would be difficult to describe the daring, the courage, which every man displayed in this action. Suffice it to know, that our few ships appeared among the multitude of those of the enemy like so many wolves amid a flock of sheep. Our people had to reach their little vessels to set fire to them with the materials we had prepared beforehand, and to pass on. The enemy, without means of defence, and without even attempting to take refuge in the River Muar, saw the vessel of PATE UNUS himself turning her head in flight towards the Straits of Sábáò, and followed her. He himself, when he saw one part of his fleet burnt, and another sunk, ordered the vessels that were near him to come closer, in dread of being boarded or sunk by our artillery, notwithstanding his many-coated ship."-Decade II, Book 9, Chap. 5.*

Negri Sembilan ("The Nine States").—Are situated to the N. of Malacca, being bounded on the W. by Sungei Ujong, on the N. and N.E. by Pahang, and on the E. by Johore. They originally comprised Johol, Rembau, Sungei Ujong, Jelebu, Klang, Ulu Pahang, Muar, Naning and Jelli, but now consist of:—

1. Johol.

2. Rembau.

3. Ulu Muar.

4. Jempol. 5. Tampin. 6. Terachi.

7. Enas.

8. Gunong Pasir.

9. Gemencheh.

These will be found described in their proper places, but as they have recently placed themselves under British protection, no apology is needed for quoting the following extracts from an interesting report made by the Hon. Mr. Lister, Collector and Magistrate, Sri Menanti, upon their present condition:—"On the 1st of January, 1887, the States under treaty for administration and the collection of revenues were those under the immediate control of His Highness the Yam Tuan of Sri Menanti, viz., Ulu Muar, Jempol, Terachi, and Gunong Pasir. Johol was under a similar treaty, but any decided action with regard to it had been deferred.

In January, the most serious differences arose in Rembau, which might have resulted in a civil war, but immediate action was taken. The authority of the *Penghulu* was supported, the disloyal and turbulent chiefs were dismissed from their posts, and others elected in strict accordance with the constitution of the State, and since then each individual chief has been kept to, and has even scrupulously observed, the powers vested in him by the constitution.

The Penghulu, however, was not satisfied with this. He therefore asked the Governor of the Straits Settlements to assist him in further reforms. On the visit of the Governor to Rembau, on the 7th of September, 1885, a formal agreement

was entered into for the collection and participation of revenue.

In Jempol, difficulties arose from intrigue, and although already under treaty, an attempt was made to ignore it, which had immediately to be checked. Johol, Enas, and Gemencheh may be taken collectively. The *Penghulu* of Enas was in serious difficulties with his chiefs, and applied to the Yam Tuan for assistance.

At the same time it was found that in Johol and Gemencheh huge grants of land were being made to Malacca traders, in many cases to men with no capital. These grants were recommended by interested persons, and the Datoh of Johol, an old man, unacquainted with business matters, merely agreed. The people of the country were disgusted, and the Penghulu, whose confidence had by degrees been obtained, very readily understood the troubles in which he would certainly be involved, and asked for assistance in police and land matters and in general reform. In Tampin, difficulties arose in consequence of the participation of revenues. The descendants of Syed Saban, whose name is well known in Malacca history, claimed participation, to which they had every right, and it was found absolutely necessary to adjust these claims finally. SYED HAMID, the recognized head of the State, agreed to this solution of the difficulty, and also agreed that the Governor should decide the participation of revenue to each chief, and appoint his officer for the collection of revenue. Thus all these States collectively, having for their boundaries Sungei Ujong, Muar, Pahang, and Malacca, have been brought under the immediate influence and control of the Governor of the Straits Settlements.

The immediate source of revenue is from the vast jungles of Johol and lands already planted in Tampin and Rembau with tapioca. So far a very small proportion of these lands produces tapioca, and an export duty on the product was taken more into consideration as a source of revenue than the premia for the land, in order that the original concessionaires should not be called upon to disburse large sums, and should yet contribute a fair revenue to the State from so destructive a product as tapioca, most favourable terms being given, at the same time, for the cultivation of pepper, coffee, and all permanent products, and reserves of forest made in order to meet applications and restrict what may be termed devastation for tapioca. Tapioca will, however, yield increasing

revenue as soon as the product is exported.

In Kru, Johol, Gemencheh, and the Sri Menanti States, tin and gold abound, though more especially tin in the Sri Menanti States. Encouragement having been given to prospectors, it has been found that nearly every stream is stanniferous, and there are now no less than twenty streams in process of development, though only on a small scale. The cart traffic has only recently reached Kwala Pilah, the centre of supplies for the Sri Menanti States; advancers have, however, already come in, and there is every prospect of immediate attention being given to more extensive development of the mines. [The farm revenues for the years 1889, 1890, and 1891 brought in a very large increase in revenue, but the opium farm has now been abolished.] The number of Chinese engaged in tapioca estates and in mines have greatly increased, and, for years to come, there must be a perceptible monthly increase.

The expenditure must necessarily be very considerable, consequent on the rapid increase in administrative responsibility, and in order to secure proper

administration and assist and develop enterprise.

In order to meet this expenditure it was found necessary to make application to the Crown Colony for loans for the completion and execution of works. The revenue provides for establishments, allowances to chiefs, and services exclusive of establishments, but not entirely for works and buildings, or for roads, streets, and bridges. The main cart-road through these States has been metalled in parts, kept up, and extended towards Jempol, and this road, which is the main road through these States, not only taps all the resources of these States, but, by a most easy route, connects Malacca with a tributary of the Pahang River. Provision has also been made for roads for tapioca planters, and for general assistance consistent with the present rapid development of the States. Also for buildings to provide suitable police protection, gaol, and for the staff employed in administering and collecting the revenue.

The loan up to the end of 1887, amounted to \$120,000, bearing interest in 1888 at the rate of 4 per cent. The loan at the end of 1888 amounted to \$150,000, and at the end of 1892 to \$785,340.

Apart from the loan the States may now be said to be self-supporting, the revenue for 1892 being \$117,948, and the expenditure \$111,901; but as this leaves too small a balance to pay the 4 per cent. interest agreed upon, further revenue development must be hoped fo

Negro or Negrito.—There exists, both on the interior and on both sides of the Peninsula, a race of somewhat pigmy proportions, bearing a general resemblance to the African negro. Their average height is 4 feet 8 inches. Never of the ebony-black of the African race, they are nevertheless so much darker than the Malay as to justify the appellation bestowed upon them. By the Malays they are known as Semangs, but the language of those on the east side differs from that of those on the western side of the Peninsula. They are described as Asiatic savages, living on the produce of the forests, and but little superior to the savage Australian. Their number is probably insignificant.

Nepenthes or Pitcher Plants.—Several beautiful varieties of these plants are found in the Malay Peninsula. A very good description of them is given in No. I, p. 54, J. I. A. (Singapore, 1875). (See MONKEY CUP.)

New Harbour.—The space between the shore of Teluk Blangah district, Blakang Mati Island, and Pulo Brani, S. Singapore. A flourishing dock company has its premises just N. of Pulo Hantu.

Newbold, Capt. T. J.—Author of "A Political and Statistical Account of the British Settlements in the Straits of Malacca, viz.: Penang, Malacca, and Singapore; with a History of the Malayan States on the Peninsula of Malacca," 2 vols., John Murray, London, 1839. Newbold was a captain in the 23rd Madras Light Infantry, and was a member of the Bengal and Madras Asiatic Societies. His book still remains a standard work on Malacca and its vicinity, and contains a reliable account of the Naning war. He was also a very good authority on Malay customs and traditions. Much of Newbold's work has been embodied, with due acknowledgment, in the present volume.

Niato.—An imp. V. in C. of Sungei Ujong, about 3 miles S. of Rassa.

Nibong Angus.-V. on S. bank of Kurau R., N.W. Perak.

Nibong Palm.—This furnishes a hard black wood of fibrous texture, used for spears, fences, posts, &c., and sometimes for floors. It serves for many purposes when bending is not required.

Nibong Tebal.—The principal V. with Police station and Courthouse in the S. of Province Wellesley, 22 miles from Butterworth, and 24 from Parit Buntar, the frontier settlement of Perak. A Court of Police and of Requests is held here by the Magistrate of the Division. Attap roofing having of late been forbidden, the style of the native buildings has much improved, and the place bids fair to become of considerable importance. The present population is about 600.

Nini Kabaian.—Often mentioned in Malay romances. Generally a perfume or flower-seller, who, from her occupation, has free access to the women's apartments of Rajas, &c

Nior Sabatang.—V. on N. Coast of Penang, 14 mile E.S.E. of Pulo Tikus.

Nipah Kudang.—V. in extreme N. Penang, 4 mile E. of Tanjong Batu, in the Batu Feringgi district.

Nipah Palm.—This, to the Malay, is scarcely inferior in importance to the [253]

cocoa-nut or bamboo, as its leaves furnish the universal thatch of all native dwellings—attap—which, originally meaning roof, has come to signify conventionally the material of which the roof is made. It is also used as a covering for cigarettes. It grows in brackish water. The fruit is used for making a preserve. Salt is extracted from the stem of the leaf, and the trunk produces a juice which will ferment like toddy.

Nitre or Saltpetre.—The only name for this salt in Malay is såndawa; and it appears to be a purely native one, which has spread to all the languages of all the nations with whom the Malays have held intercourse, although in some of them it be corrupted, Saltpetre, in the Indian Islands, is prepared from the decomposed dung of bats and swallows, accumulated in caves or old buildings; and is not, as in Hindostan, the almost spontaneous produce of certain soils. That it was known to the people of Malaya before they were acquainted with gunpowder we may believe from their having a native name for a commodity which they only produced by art. But to what use they applied it, unless to the preparation of fireworks, for which also they have a native name—mârchun—it is hard to say. It is, at present, chiefly used in the manufacture of gunpowder, to which, in Javanese, it gives its name.*

Nobat Nopiri.—Lit. "drums and flageolets," a band of music. A native band usually consists of about eight performers, viz., two drummers, two horn players, and four flageolet players. The result is not precisely that of an overture by Rossini, but is by no means so unpleasing to the European ear as Chinese music. On State occasions, three relays of players are provided, the playing being kept up without intermission so long as the ceremonies last.

Nobut.—A sort of kettledrum, the use of which is confined to Royalty on occasions of State only. By metonomy, "to confer nobuts" signifies "to confer Government powers with Royal status."

Nong Chik or Tujong.—One of the districts of Patani (q. v.).

Nopolom.—V. in Reman, on the Kedah frontier (supposed), on a S. affluent of the Perak R.

North Cape.—The E. point of the Kemaman district, Tringganu.

North Hummock.—A conspicuous hill 4 miles N.N.W. of Klang, and 9 miles from the coast, Selangor, called Bukit Musiam by the Malays.

North Mound.—A hill forming a portion of the range nearest the sea, in Perak.

Numeration.—The Malay system of numeration is similar to our own, and, strictly speaking, extends to 1,000. The Sanskrit word laksa has, however, been introduced for higher numbers; sa'laksa = 10,000; sa'puloh laksa = 100,000.

Nuri.—The principal village in Johol, Negri Sembilan, the residence of the Penghulu. It lies just E. of the Rembau frontier.

Nutchi or Tejong.—V. on W. bank of Patani R., about 15 to 16 miles from its mouth.

Nutmegs (Myristica fragrans).—The cultivation of the spice was at one time a most important industry in the Straits Settlements. Nutmeg-trees were first introduced into Singapore in 1818. In 1843 the total number of trees was estimated at 43,544, of which 5,317 were in bearing, the produce being stated at 842,328 nuts. In 1848 the total number of trees planted out was estimated at 55,925, of which the number in bearing was 14,914, and the produce 4,085,361 nuts, besides mace, estimated at about 1 lb. for every 433 nutmegs. In Singapore, the cultivation extended very rapidly, not gradually, but every now and then, when some person with capital entered upon it. The district of Tanglin, in the beginning of 1843, consisted of barren-looking hills covered with short brushwood

and lalang, which had sprung up in deserted gambier plantations. Immediately upon the regulations for granting lands in perpetuity being promulgated in the middle of that year, a great part of the district was cleared, and nutmeg plantations formed, and there were not less than 10,000 trees planted out in it. Penang and Province Wellesley, at the same date, had plantations numbering some 18,000 trees. In 1848 a curious disease, described by Dr. R. LATTLE as resembling leprosy in the human subject (J. I. A., Vol. III, p. 679), wrought much havoc at Penang and did some damage to the Singapore plantations. For some years, every effort was made to combat the evil, but it became so fatal that, about 1862, the cultivation totally ceased. It was, however, revived a few years ago at Penang, where there are now several plantations in good order, and the spice produced takes a high place in the market. No attempt has been made to replant in Singapore or Province Wellesley, except in the Botanical Gardens, regarding which Mr. Cantley says the plants in the nursery "look very promising, and seem as if prepared to begin another cycle of satisfactory growth in the Settlement. Their successful cultivation seems to depend on what nearly all other crops depend on in the Straits, i.e., liberal manuring.'

Nyalas .- V. in N. Malacca, in district of same name, E. of the Jus and Bukit Linggi forest reserves.

Octopus (Nuas Sunting).—Octopi of considerable size are alleged to exist in Malayan waters. According to the reports of native divers, a large animal of this description inhabits a deep pool between the Tanjong Pagar and Borneo Co.'s Wharves, S.W. Singapore.

Oil.—In Malay minyak, a word of extensive currency throughout Malaya. The plants from which fatty oils are chiefly extracted are the cocoa-palm, the ground pea, the sesame, and the palma-christi; the first for edible use, and the three last for the lamp. Oil is not expressed from cruciform plants, nor is flax reared for this purpose. Animal oils are hardly used in any shape; essential oils are obtained from the clove, the nutmeg, lemon and citronella grass, the kayu-putch (Melaleuca cajeput), and in great abundance and cheapness from the Malay camphor-tree (Dryobalanops camphora).

Oil, Crab.—The oil of a species of crab is used by the natives of the Cocos

Islands in place of butter.

Oils.—The following is from Mr. N. Cantley's Report for 1886 of the plants cultivated for experimental purposes in the Botanical Gardens, Singapore:—

CITRONELLA GRASS (Andropogon nardus) and Lemon Grass (Andropogon citratus).—The cultivation of these grasses would appear not to receive sufficient attention. Their growth in the Straits is all that can be desired, and the cultivation pays well when properly attended to.

RUSA OIL GRASS (Andropogon schenanthes) does not seem to be known in the Straits, and so far I have not been able to procure plants, but that it will succeed

here there is but little doubt.

CROTON OIL (Croton tiglium).—Among recent introductions, this is by far the most promising. It seems to have found a climate and soil entirely to its liking in the Straits. The plant bears heavy crops of fruit, its cultivation will no doubt prove a profitable investment.

ILLUPI OIL (Bassia latifolia).—Plants of this valuable oil-tree do not appear to succeed well in Singapore. They are much preyed upon by insects, and although the tree is found in a wild state at no great distance, it has refused so far

to grow satisfactorily in this island.

CASTOR-OIL (Ricinus communis).—Castor-oil is now largely used in the manufacture of soap, for machinery and other purposes. In the Straits the plant grows with great vigour, and under proper treatment its cultivation should pay. Some Chinese made an attempt to cultivate the plant in Malacca some years ago. The attempt was a failure in point of profitable return, and no one else seems to have tried it since then. I have strong reason to think, however, that the plant used was an inferior variety, i.e., the variety common in the Straits, the cultivation of which could hardly have been expected to be profitable. The failure has had the effect of discouraging others, but there would seem no good reason to be discouraged so long as the plant has not had a proper trial.

COCOA-NUT OIL (Cocos nucifera).—Little need be said of this well-known oil, but it is found that the plant does not yield sufficient crops to pay, when grown more than about half a mile from the sea; when grown in the interior of Singapore, the crops obtained are said to be only sufficient to cover cost of

labour.

OLIVE OIL (Olea europea).—The olive plants introduced in 1885 and planted on Penang Hill are making very satisfactory growth, and I am in hope of its proving well adapted for cultivation on mountains and high lands generally.

BEN OIL TREE (Moringa pterogysperma) is everywhere cultivated in the Straits for its leaves and roots, which are used as vegetables, but apparently no

attempt has been made to manufacture oil from the tree.

KAYU PUTEH OIL (Melaleuca leucodendron).—Whole forests of this tree exist in Malacca, but little attention seems to be given to the manufacture of oil from the plant as is done elsewhere. The tree yields many useful products, but oil may be looked upon as the most valuable, and it could, no doubt, be extracted from it at a rate which would give a good margin of profit.

GINGELLY OIL (Sesamum indicum) grows wild all over the country, and bears abundance of seed from which oil might be profitably extracted. The seed contains 50% of oil, and some three crops a year may be had. The oil is used for soap-making, in perfumery, and to adulterate almond oil, which it much resembles.

In India one million acres are said to be under cultivation of sesamum.

Wood Oil (Dipterocarpus spp.).—At present wood oil in paying quantity is obtained only from primeval forest. I would, however, suggest that indigenous trees yielding wood oil and gutta-percha be planted for pepper supports. The time they will require to make supports will be about seven years, at which date the temporary supports (Dadup or deadwood) could be removed. Acting on this principle, a time would arrive when the supports would become a source of considerable revenue, probably greater than the pepper crop, whereas at present they are generally a source of trouble and expense.

Olak Bendahara.-V. on W. bank of Endau R., N.E. Johore.

Olak Gol.-V. about 5 miles from mouth of Endau R., S.E. Pahang.

Old Kedah.—The capital of Kedah on N. side of entrance of R. Merbuk.

Old Strait or Silat Tebrau.—Separating Singapore from Johore. Before the settlement of the former, this was the only known route to China. The banks of the strait are picturesque in the usual tropical way. Johore Bharu—the capital of Johore—lies on the N. side, opposite the V. of Kranji in N. Singapore. Ferry boats ply between the two places.

Olive Oil.—See Oils.

Omra or Amrah.—The love-apple, or tomato. It has a strong smell, and is of different sizes.

Ooloo.—A native name for Upper Perak.

Ophidia.—Sixty-one species of snake are known to exist in the Malay Peninsula and Straits Settlements, but it is probable that others might be discovered were any specialist to devote attention to the subject. The above number includes a late addition—Cylindrophis Dennysi. The Zoological Society named a small snake, believed to be new, Lycodon Dennysi, but further examination showed it to be a

young specimen of a species already named, and a new species, at first named C. lineatus, was renamed as above, in compliment to the writer.

It would obviously be beyond the scope of a dictionary to describe each reptile in full. Most of the commoner sorts, such as pythons, cobras, &c., will be found referred to under separate headings. Suffice it to say that, of the sixty-one species referred to, eighteen are venomous. Of these, the cobra, hamadryad, and bungarus are the most conspicuous; but though they are often found, accidents from snake-bite have, for the past thirty years, been extremely rare. Of the non-poisonous sorts, the python (q. v.) is the most conspicuous. It is noteworthy that the red python, of which only one specimen is known to exist in European collections, is found in the Peninsula.

Dr. Gunther's great work on the *Ophidia* of India, and Dr. Phayre's work on the *Thanatophidia* should be consulted by students. It is impossible to describe most snakes in anything but scientific language, which, to the vast majority of readers, would be useless.

Ophiophagus Elaps.—See Hamadryad and Reptiles.

Ophir, Mount.—The reputed Mount Ophir of Scripture, regarding which Crawfurd gives several pages of curious detail, the ultimate conclusion at which he arrives being that there is not sufficient evidence to justify its identification as such. The neighbourhood is undoubtedly gold-bearing, especially in a N.W. direction, but foreign enterprise has never been successful in working it. The native name is Gunong Ledang. Mount Ophir is in Muar, about 5 miles E. of the Malacca frontier, lat. 2' 23° N., long. 102' 39° E. Wallace describes the summit as a small rocky platform covered with rhododendrons and other shrubs; the view from it is very fine in its way, but monotonous, as is mostly the case where tropical foliage is concerned. The estimated height is from 3,850 to 4,000 feet.

Opium.—The first notice of opium being an article of commerce in the Malay Peninsula appears to be that in "Dampier's Voyages," in which the writer mentions that in 1688 he took some from Acheen to Malacca to dispose of privately, its import being forbidden. From Malacca it was sent to the various Malay States in exchange for pepper and other articles. Opium-smoking, however, has never assumed the dimensions of a national vice amongst the Malays as it has amongst the Chinese.

It would be impossible in the limits of a short article to set forth all the arguments advanced in the great controversy regarding the harmfulness of the vice. But they may briefly be summarized as follows:—It is undoubtedly expensive, and as a rule enervating. In certain cases, and it may be added in nearly all cases, of excessive smoking, it causes decrepitude, loss of virile power, and a general wreck of the constitution. The moderate use of the drug, on the other hand, does not seem to cause these evils, except with certain constitutions. As the great bulk of opium-smokers are Chinese, our remarks must be taken as chiefly applying to them.

To the poorer classes, except in strict moderation, it is a grave evil. To the richer it is less so, but not one to be encouraged. Experience does not bear out the assertions of the Anti-Opium Society that all smokers, even moderate ones, become ruined in health or intellect, or that the sudden cessation of the practice, as in the case of men sent to prison, is liable to cause death. This Society, indeed, with a very good object in view, has alienated a great deal of support by the reckless assertions it has endorsed in these directions. And it must be added that, while the habit no doubt often induces theft amongst the poorer classes to obtain the means of gratification, it is not responsible for any of those crimes of violence which so commonly attend undue indulgence in ardent spirits.

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Opium is obtained chiefly from the white poppy, which is cultivated for the purpose in Egypt, Persia, Asia Minor, India, and other warm countries. It is a hardy annual, varying somewhat in the form and colour of its rich, beautiful double petals. The process of obtaining the drug consists essentially in making cuts into the unripe capsule, and collecting the juice which exudes. In Asia Minor, they carry the incision in a line round the circumference, or in a spiral from apex to base, whilst in India, it is customrry to scarify the capsule from top to bottom. The white milky juice is allowed to dry into tears, and is then scraped off and pressed together so as to form a homogeneous mass, after which it is dried in a warm, airy room. The opium manufacturers suffer no inconvenience from the nature of their employment, contact with crude opium and breathing air impregnated with the emanations from the drug apparently exerting no injurious influence on the system. During the operations of drying, packing, and examining opium, immense quantities necessarily pass through the hands of those engaged in the process, but no complaints are made of any ill-effects resulting from contact with the drug. The native opium examiners often sit for hours together in the midst of tons of opium, samples of which they are constantly manipulating and smelling, and yet they, as a rule, enjoy the most perfect health. There are several varieties of opium, of which the most valuable and best known in the East, are Turkey, Persian, Patna, Benares, and Chinese. Opium is a solid, compact substance, of a dark reddish-brown colour, opaque, soft, tenacious when fresh, but when long kept, hard and readily powdered. It has a strong, heavy, peculiar, and somewhat disagreeable smell, and a nauseous taste. It is inflammable, and burns with a bright flame. It is partly soluble in water, forming a solution of a dark-brown colour.

The preparation of opium, i.e., its conversion into chandu, as it is called when fit for smoking, is as follows:-Most of the drug used in Singapore is either Patna or Benares, the former being preferred. It arrives from India in balls about six inches in diameter, the exteriors covered with poppy leaves, which form a sort of husk or shell. These are cut in halves and the inside extracted with the fingers, the water in which the manipulator washes his hands being carefully preserved. Into this latter, the broken-up husks are subsequently thrown. The husks are then boiled so as to extract all the drug, and the opium-water thus produced is used to boil down the purer opium until it assumes the consistency of treacle, the scum being constantly skimmed off till nothing but a clear viscid fluid remains. The refuse is sold cheap, and is often used to adulterate pure opium. The next operation is called firing. The treacly mixture is again worked over a steady fire, and finally transferred to numerous flat iron pots, each of which is carefully turned so as to expose the contents equally to the effect of the fire. The resulting opium is again dissolved in water and boiled in copper pans until it assumes the consistency of the chandu used in the shops. The yield from a ball weighed in gross is about 54 per cent.

Chandu is prepared opium. An inferior quality, called madat in Malay,

is prepared from the leaf coverings of the balls.

The rents of the Opium Farms at the three Settlements were for 1891, \$1,032,000 for Singapore; \$600,000 for Penang; and \$147,600 for Malacca; giving a total of \$1,779,600. They have since decreased.

Orang.—In Malay, a man or human being, in the singular or plural; also

people.

Orang Benua or Binua of Johore.—(See J. I. A., I, p. 242.) The aboriginal inhabitants of Johore. (See Benua and Malay Peninsula, under which accounts of this and other aboriginal tribes in the Peninsula exactly resembling them are given in detail.)

Orang Besisi or Basisi.—See Basisi.

Orang Biduanda Kallang.—See BIDUANDA KALLANG.

Orang Gunong.—A mountaineer; and hence a rustic or clown. The Malays apply the phrase to any people less cultivated than themselves.

Orang Kaya .- Lit. a rich man, but often used as a title in the sense of

"headman."

Orang Kenaboi.—See Kenaboi.

Orang Laut.-Literally men of the sea, or sea-people. This is the most frequent name given by the Malays to that rude class of their own nation whose permanent dwelling is their boats, without any fixed habitation on shore. They are also called rayat-laut, or, abridged, rayat; literally, "sea-subjects," the last word being only a slight corruption of the Arabic word with the same signification, the phrase meaning the sea-subjects of the kings of Malacca or Johore. Occasionally, too, they go under the name of sika, the meaning of which is obscure; and more frequently of bajau, which is probably the same as the Javanese word bajag, a pirate or sea-robber, a name to which they have often earned a title. Some English writers, from their wandering habits and suspicious modes of life, have, with a good deal of propriety, called them "sea-gypsies." The native locality of this people, for it cannot well be called country, is the straits or narrow seas of the many islands between Sumatra and the Malay Peninsula, towards the eastern end of the Straits of Malacca. There, at least, they were congregated in the greatest numbers. From this locality they appear to have spread themselves, most probably step by step, to the shores of Banca, Billiton, some of the islands on the eastern and western coasts of Borneo, the coasts of Celebes, and even of Boeroe and other islands of the Molucca Sea, from which again they make voyages to the northern coast of Australia, in search of tripang and tortoise-shell. "At Pulo Tinggi (on the eastern coast of the Malay Peninsula, in north latitude 2° 17') we found," says Mr. Thomson, a very intelligent traveller, writing over half a century ago, "many orang-lant, or sea-gypsies, assembled. A large crop of durians this season had attracted tribes of them from the coasts of the Peninsula, as well as from the islands of the Johore Archipelago. Six boats from Mora, an island of that group (about fifty miles north of the equator), we found on our way to Pulo Tinggi. They had travelled by sea a distance of 180 miles to partake of the fascinating fruit. This would appear incredible, were it not explained that these people live in their boats, changing their position from the various islands and coasts according to the season. During the south-western monsoon, the eastern coast of the Peninsula is much frequented by them, where they collect, as they proceed, rattans, damar, and turtle, to exchange for rice and clothing. The attractions of Pulo Tinggi are also of a more questionable kind, by its offering, during the season that the Cochin-Chinese visit Singapore in their small unarmed trading junks, considerable facilities for committing occasional quiet piracies on that harmless class of traders. Prior to the introduction of steam-vessels by the English and Dutch governments, these sea-gypsies were notorious for their piratical propensities, though less formidable than the Illanuns (people of the southern side of Mindano), owing to the smallness of their praus, which, while it rendered them harmless to European shipping, did not cause them to be less dangerous to the native trade, which is generally carried on in vessels of small burden." This description does not of course apply accurately at the present day. But the term is still in use to designate the wandering boatmen—as opposed to ordinary sailors who still frequent the coasts and islands.

"This singular people," adds the writer quoted, "who are in fact maritime nomads, are, wherever found, in race and language genuine Malays. Some of them have been converted to a kind of superficial Mohammedanism, while others are still Pagans. A few of their tribes have more industry than others, and a few are more attached to particular localities than the rest, even practising a little husbandry, and intermarrying with the more civilized Malays. What seem the original inhabitants of Banca, Billiton, and some of the islands on the coast of Borneo and Sumatra, are only the same Malays in the same rude state, the only difference being that they have the land instead of the sea for their habitation. One can hardly, indeed, help conjecturing that even the more advanced Malay States of the Peninsula, Sumatra, and Borneo, of whose history we have no record, may have sprung from the same people, seduced by circumstances favourable to social advancement to abandon their roving habits and precarious mode of existence for a fixed life."

The first notice of the sea-gypsies that we possess is by Barros, who describes them at the beginning of the sixteenth century, very much as they were until recently. He calls them Cellates, which is only a Portuguese corruption of sălat, a strait or narrow sea, the Malay idiom requiring orâng, or people, to be prefixed, making "people of the straits," a name by which they are still occasionally called by other Malays. He describes them as a people whose life was passed rather on the sea than the land, whose children were born and reared on the sea without hardly landing; and as a low and mean people, whose livelihood was gained by "fishing and robbing." Besides all this, he expressly states that, like other Malays, they spoke the Malay language.* (See Malacca and Malax.)

Orang Liar.—See LIAR.

Orang Mintira. - See MINTIRA.

Orang Putch.—The generic title applied to Europeans in the Native States—"white men." In the Settlements a distinction is usually made, Orang blanda being "foreigner." Nationalities are distinguished—Orang Holanda, O. Inggris, &c.

Orang Rayat.—See RAYAT.

Orang Sabimba. - See Sabimba.

Orang Sakei. - See SAKEI.

Orang Selitar.—See SELITAR.

Orang Semang.—See SEMANG.

Orang Serani.—See SERANI.

Orang Tallah (People presented).—The title given to the descendants of two slaves presented by the Sultan of Johore (circa 1720) to the Penghulu of Naning on account of his services in recovering for him a concubine inveigled away by one of his subjects. They are no longer viewed as slaves, and amounted to some 300 people about 30 years ago. They have now become merged in the general population.

Orang Udai. - See UDAI.

Orang-Utan.—Literally signifies man of the wood or forest, but its current sense is "wild man," or "savage." The man-like ape to which Europeans give this name is never so called by the natives, but is known to the Malays under that of mias (q. v.).

Orchids.—According to the Malays, these were created by Nabi Tuakal, who finding that Nabi Noah had filled the world with plants having roots, had to

place his creations on the trunks and branches of trees.

Several beautiful varieties, such as the *Vanda*, "scorpion," and "spider," are found in the Peninsula, but its orchidaceous flora is greatly inferior to that of the Philippines. A pretty little variety, known as the "pigeon orchid," of delicate white, and slightly resembling a bird in form, produces enormous clusters of flowers. The plants possess the peculiarity of all blossoming on the same day. They wither very rapidly, and seldom last over twenty-four hours. Orchidaceous ferns also

abound. The most striking are known as "stag-horn," "elk-horn," and "bird's-nest," the latter resembling a gigantic "hart's tongue."

Ordeal.—The name for this is ganju, but sumpa and supata are also used; each kind of ordeal being designated by an annexed epithet, as the trial by fire, by boiling oil, by melted tin, and by submersion in water. It must have been, at least in former times, in use, as it is referred to in the Malayan collections of written laws called Undang-undang, which may be translated "edicts." The collection of Johore has the following reference to it:—"If one party make an accusation, and another deny its truth, the magistrate shall direct both to contend by diving under water, or by immersion of the hands in boiling oil, or molten tin. The party who is worsted in this contest shall be deemed the guilty one, and be punishable with death or otherwise, according to the custom of the country."

Maxwell gives the following additional particulars:—One kind of ganju is the following:—Supposing that a theft has taken place in a house, all the inmates are assembled and their names are written on the edge of a white cup, on which some sentences of the Koran are also inscribed. A ring is then suspended by a maiden's hair and held right over the middle of the cup. It is swung round gently

and the name which it first strikes is the name of the thief.

In another method, a sieve (nyiru) is used. Some mystic sentences are written on this utensil with turmeric (kunnyit). All the household being assembled, a man grasps the nyiru by the edge and holds it out flat. In a short time it is seen to wave up and down, and presently pulls away from the man holding it, who follows its lead until it reaches and touches the thief. There are many other modes of detecting criminals.

Ornithology.—The ornithology of the Malay Peninsula has been but slightly worked in a systematic manner. For very many years, birds have been exported from Malacca; they comprise only a limited number of species, mostly bright coloured, collected, as a rule, within a radius of about thirty miles from Malacca. Not unfrequently, however, the collections are supplemented by birdskins brought to Singapore (by boats from Celebes, &c.), sold there, and have thence found their way into the collections of the dealers at Malacca, as have also birds picked up by junks trading to the Nicobars, Andamans, Sumatra, &c. This foreign element in the local collections has caused a great deal of confusion, for the birds were exported without any record from whence they came originally, and getting into the hands of ornithologists, were treated as species occurring in the Malay Peninsula. This was all the more apt to occur as naturalists of half a century ago attached but little weight to locality, and it is only of late years that the great importance of the undoubted locality of specimens has been recognized.

In the list of the birds of the Malay Peninsula, published by Mr. A. O. Hume (and compiled by Mr. J. Davison), in "Stray Feathers," an endeavour has been made to eliminate as thoroughly as possible errors thus produced. Lieut. Kelham has published some exhaustive and interesting papers on the subject in the *Ibis*, which

were reproduced in the J. S. B. R. A. S.

It is only in the western half of the Peninsula that any ornithological work has been accomplished; the eastern half and the central hilly region are to the present day zoologically a terra incognita. Even in the western half much still remains to be done, and would well reward a thorough exploration.

In the list referred to, 475 species of birds are recorded as known for certain to occur in the Peninsula. A few years' systematic work would probably raise the

number to over 600 species.

On looking at the list, it will be seen that certain genera (represented in some cases by several species), which occur in the Himalayas, Burma, Siam, and Cambodia, and again in Sumatra, are in the Malayan Peninsula not represented at all, or are so by only one species These genera will, most assuredly, when the country

has been further explored, be found represented either by species identical with those occurring in the above-named countries, or by closely allied ones peculiar to the Peninsula.

The list of sea-birds and waders is very meagre, but undoubtedly further exploration will greatly enhance their number. Many species could have been added to the list with the certainty that they do occur, but as they have not been actually recorded, they have been omitted. At present only ten species of the

former and twenty of the latter are noted.

The Raptores, or birds of prey, are well represented, thirty-one diurnal and twelve nocturnal species being recorded. The bulbuls number twenty-eight species, the woodpeckers twenty-two; the Nectarinde—an order including the sun-birds, spider-hunters, and flower-peckers—number twenty-six species; twenty species of pigeons and doves; fourteen of rasorial birds, including one pea-fowl, four pheasants, two jungle-fowl, five wood-partridges, and two quails; twelve species of kingfishers; ten of hornbills; eight of barbets; seven thrushes; and seven pittas, or, as they are commonly called, ground-thrushes. Of the great family of cuckoos, twenty-three species occur, and of these thirteen are true cuckoos, depositing their eggs in the nests of other birds, and not taking any part in the rearing of their young; the remaining ten species build nests, and bring up their young.

The Cypselidæ, or family of swifts, number eleven species, the most interesting of these being Peale's swiftlet, and the large swiftlet, both being species that make the edible nests used by the Chinese. The most beautiful of the group is the moustached tree swift (Macropteryx comatus), a most lovely little

bird.

Only two paroquets, one parrot, and two loriquets have been recorded from the Peninsula, and of these the Indian loriquet (Loviculus vernalis) only just

straggles into the extreme north of the Peninsula.

Of the remaining genera, some are well-known and showy birds, like the trogons, bee-eaters, and minivets, but only a few species occur in each genera; others, like the great family of Babblers, contain numerous species, but they are, as a rule, birds of inconspicuous plumage and skulking habits.

Of some genera like the Hoopoes, Nuthatches, and Honey Guides, only a

single species has been recorded as occurring in the Peninsula.

Perhaps the most interesting bird in the list is Geocichla avensis—Gray's pied ground-thrush. This species was described by Mr. Gray in 1829 from a native drawing, which drawing was reproduced in Cuvier's "Animal Kingdom." The species remained undiscovered for fifty years, when in 1879 Mr. A. O. Hume secured a specimen from the collections of Mr. Fernandez, one of the dealers in birdskins in Malacca. The specimen was said to have been shot in Rembau, and it is up to date the only specimen known to naturalists. It is now in the Hume Collection in the British Museum.

Birds which attract sportsmen only will be found noticed in their alphabetical

order.

Orpiment, or Sulphuret of Arsenic, is not a native product of any part of the Malay Peninsula, but it is, notwithstanding, well known to the inhabitants, and immemorially imported, being the produce of Lao, and coming direct from Siam and Pegu. The name by which it is known is warangan, from the Javanese warang, a collyrium, of which it was, most probably, an ingredient.

Otters (Měměrang) (Lutra chinensis).—Otters are common and appear to be

of the same species as that found in China.

Owl, called from its silent flight the burong hantu, or ghost bird; also known as ponggok. Familiar in Malaya as in most other countries.

Ox (Bos).—Exclusive of the buffalo, which is doubtful, two species of the ox are found in the wild state. One of these is called by the Malays saladang,

and exists in the forests of the Malay Peninsula. The other is the Bos sondaicus, or Sunda ox, which also exists in the Peninsula. It is a large, massive, and powerful animal, of a light-brown colour, with the hips and legs of the male of a clear white. It is the same species which is found in the forests of Pegu, up at least as far as Martaban.

The common ox, varying in race in the different countries, is found in the domestic state in the Peninsula, and in all the considerable islands of the Malay Archipelago. The source of the domesticated ox of Malaya is as obscure as its origin everywhere else. The Sunda ox cannot be the source from which it has sprung, as, according to the statements of Dutch naturalists, it has been ascertained, after many trials, to be as incapable of domestication as the American bison. It is, notwithstanding, certain, that a fertile cross between it and the domestic cattle has been long propagated, and forms a distinct breed, known by the same name as the wild cattle. In Malay, there are two names for the domestic cattle—sapi and lembu—and wherever the ox is domesticated, it goes under one or other of these. The Malay has no specific name for the wild cattle, to which they give the same as to the domestic, adding the epithet utan, or wild. The Javanese name for the wild cow-jawi—the Malays use for neat cattle generally. All these words are native, and afford no clue to the origin of the domesticated cattle. Some have fancied them to have been originally imported from the country of the Hindus, but this is mere conjecture.*

Oyster (Tiram).—The larger number of varieties known to conchologists are found in Malayan waters from the pearl to the edible varieties.

Pabei.—Mt. and pass on W. side of Sri Menanti, Negri Sembilan, the latter giving access to Gunong Pasir.

Pachut.—V. in W.C. Perak, lying between Gunong Tujoh-blas and the W. bank of the Perak R.

Padang.—V. on the coast of Muar, about 5 miles S.E. of the entrance of the R. Muar.

Padang.—V. on S. side of entrance of Endau R., extreme N. of Johore.

Padang Chachar.—A plain on the borders of Malacca and Rembau, so called from a *chachar* tree growing there. In former years, the Malacca and Rembau authorities occasionally met here for political interviews.

Padang Kamunting.—V. on W. side of Balik Pulo district, S.W. C. Penang.

Padang Kladi.—Small V. in the Durian Tunggal district, C. Malacca.

Padang Pandang.—V. on S. bank of Upip R. close to the coast, extreme N.W. Kedah.

Padang Pulei.—Large V. on N. bank of Muda R., about 17 miles from its mouth, Kedah.

Padang Sebang.—District and important village in the Naning territory, N. Malacca.

Padang Sebang.—A small V. in district of same name, N. Malacca.

Padang Semei.—V. on E. bank of S. Rui, the W. source of the Perak R., near the boundary between Kedah and Reman.

Padang Tangala.—V. on E. bank of Perak R., 3 miles above Bota, W.C. Perak.

Paddy or Padi.—Rice in the ear or unhusked. Paddy-field, padang bindung. (See Rice.)

HILL-PADI (Padi umah).—A crop of this is taken only once every eight or ten years, the ground being then allowed to revert to secondary jungle, which, at the end of the period named, is burned down, the ashes acting as a fertilizer.

Paddy-Planting.—The life of a paddy planter is monotonous in the extreme, and were it not for the amusements he indulges in, his existence would be truly wretched. After the first fall of rain, which indicates the approach of the wet season, his first care is to clear the fields of grass and weeds. This is done with an instrument called tajak; it resembles a scythe, the blade is short, heavy, and wedge-shaped, and the handle is short and fixed at right angles to the blade. It is used with both hands, is raised above the head, and brought down with a swing to the ground; its weight and sharpness renders it a very effective instrument; it cuts down everything as it falls, and sinks several inches into the ground, uprooting the weeds. The latter are then drawn to the sides of the fields out of the way, and the ground is ploughed with a very primitive instrument called tangula; it is nothing but a crooked timber with a short and long leg, the former is pointed and shod with iron, the latter has a bar of wood fastened across the end. to which men or buffaloes are yoked; those that cannot afford cattle are obliged to dig their fields with spades. The ground is then cleared of any weeds that may be left with a rake or pangaru; finally, a curious roller, with six or seven sharp edges, resembling the cogs of a wheel, is drawn over the fields to crush the lumps of earth.

The work of the males now ceases. The women sow the grain in a nursery, and when the plants are about a foot high, they are transplanted and put into the ground, about two feet apart, in bunches of three or four plants, and in regular rows about two or three feet apart, so that when the paddy grows up the field may be easily traversed without injury to the plants. In about four months the paddy is fit for cutting, when the women and children reap and store it. The planter experiences much trouble as the paddy begins to ripen, and incessant watching is required to prevent birds picking the grains out of the ears by day, and pigs uprooting the plants by night, or trampling them down by running over them. Small watch-houses are erected on the outskirts of a field, and in each a watchman takes his stand. From watch-house to watch-house lines are led, to which branches of trees, leaves, rags, &c., are attached, and the watchers incessantly move these lines to frighten the birds away. The latter, however, soon get accustomed to the contrivance, and cling to the ears of paddy most pertinaciously until actually put to flight by the presence of women and children, who go about the fields with branches of cocoa-nut leaves to drive the birds off; their labour is incessant and excessive, they run about the fields screaming and yelling, and some carry short sticks which they beat together to assist in frightening the birds. The birds that are most numerous and troublesome resemble the common house sparrow; another species is a grey bird with a whitish head and a black ring round the neck.

If the field happens to be near the jungle, horns are blown at intervals during the night to frighten wild hogs off. Bats also do much harm by burrowing in the fields and thereby injuring the roots. The possession of a wild rat is considered very fortunate; it is supposed to exert a strange influence over all others of his kind, and the owner believes that by placing him in a cage on the field no rat will

hort the paddy

The paddy is usually stored in the ear, and when rice is required for consumption, a sufficient quantity is taken from the store-house and beaten on the ground till the grains are cleared from the stalks. They are then husked in a rice-pounder.

or alu (literally a pestle).

The mortar is made from a short piece of timber about two feet high and eighteen inches in diameter, and hollowed out; in it the paddy is put and beaten with a beater made of wood about 4 feet long and 5 inches in diameter at the extremities, which are bound with iron; the centre is made small enough to be grasped by the hand. The labour of husking paddy is also consigned to women. Those that possess much paddy-land obtain a large supply of grain annually, but

they merely store a sufficient quantity for the use of the family, and the remainder they dispose of to wholesale dealers. A simple method of separating good from indifferent paddy is the following:—A platform or stage is erected, about 8 or 10 feet from the ground, and when a moderate breeze is blowing the paddy is poured from the top of the stage, the wind carries away all the light useless grain, and the good paddy falls on mats which are spread below the stage to receive it. After the paddy has been stored, the labours of the men cease, the females husk the paddy and prepare food for their families, so that until the paddy-planting returns, the males have nothing to do but amuse themselves.

Those that have not enough ground to supply them with sufficient rice for the year, obtain a living by house-building, labouring on the sugar plantations, and by

following other avocations.

From the irregularity of the seasons, it is impossible to say when sowing and reaping time begins or ends. In the month of May and June, the fields are usually cleared; in July, the paddy is sown; in a month or six weeks it is transplanted from the nursery, or original beds, to the fields; and in January or February it is cut and stored. (See Sickle.)

Padi Bird.—A wader inhabiting the swampy rice grounds of the Peninsula. It is much esteemed as an article of food by the Chinese.

Pagoh.—A village in Segamat on the Muar River, Johore.

Pahang.-One of the Eastern, and the longest State in a N. and S. direction

in the Malay Peninsula. It is the " Pam" of the Portuguese.

Position.—It extends from 2° 40′ to 4° 35′ N., and has a seaboard of about 130 miles, the whole country (including two chains of islets at an average distance of 25 miles from the coast) giving a computed area of 11,000 square miles. It is bounded on the north by Kelantan and Tringganu, on the east by the China Sea, on the south by Johore and the Negri Sembilan, and on the west by Sungei

Ujong, Selangor and Perak.

History.—But little is known of the early history of the State. Forty or fifty years ago, Pahang was a reputed dependant of Johore, although at the time of the conquest of Malacca by the Portuguese, the Prince of Pahang appears to have been independent; for he is stated by their historians, under the name of "Pam," as having been present in Malacca during the combat which ended in its capture, being there for the purpose of espousing the daughter of the king. Of late years, the country has made good progress. The present Sultan, who attained his position in 1862, signed a treaty in 1868 defining the boundaries between Pahang and Johore. In 1886, in pursuance of an agreement entered into with Sir Frederick Weld, a British officer was appointed to aid the Sultan in his administration, but a misunderstanding ensued, and it was not until September, 1887, that a satisfactory arrangement was arrived at. In 1888 a Chinese British subject was murdered at Pekan, the capital, under circumstances which involved our interference. These resulted in the appointment of Mr. J. P. Rodger as British Resident in 1888. In 1892 fresh disturbances arose, but were terminated without serious results.

Geology and Mineralogy.—The predominant rock is slate, but granite, sandstone, limestone, quartz, and schist abound, while traces of volcanic action at some remote age are shown by the presence of basalt, trachyte, &c. As regards its mineralogy, the State has always possessed a high reputation for its product of gold and tin. Though during recent periods these have been but little sought, the wonderful old gold workings which exist in its interior, discovered by Messrs. Knages and Gower, show that, wild, desolate and abandoned as the greater portion of it now appears to be, it must, at some very remote time, have been well known and populated. Mr. Knages said, in his report to Sir Frederick Weld, the then Governor of the Straits Settlements, that they found, situated far in the

jungle, a hill perforated with pits to a depth of over 160 feet extending for miles, and dug so closely together that there was only room for one man to walk between them. He added: "We could not dig one of these pits for less than \$6,000; and there are not only hundreds but thousands of them. It must have taken centuries to have done all this, and thousands of men; but who they were, and how they were fed in this dense jungle, and what became of them, must, I fear, remain a mystery for ever."

At the present day, says Mr. Skinner, "the principal gold mines are in the valley of the Pahang at Lipis, Jelei, Semantan, and Luet; gold is also found as far south as the Bera. There is also a mine of galena on the Kwantan at Sungei Lembing; and tin is found throughout the country, both in the neighbourhood of the gold mines above-mentioned, and in places like the River Triang and the River

Bentang, where gold is not worked.

Since these remarks were penned, some six or seven years ago, mining enterprise in Pahang has made some remarkable strides. The Pahang Corporation has opened tin mines at Sungei Lembing and Jeram Batang, another mine at Kabang having also been commenced. These mines are situated in the Kuantan district, and from which 367 tons had been exported up to the end of 1892. The gold-bearing districts, Punjom and Raub $(q.\ v.)$, have, however, attracted far more attention from European capitalists. The former exported 4,553 ounces in 1893, while Raub, which laboured under many disadvantages, produced 5,500 ounces in the four years ending 1892, and the returns for 1893 show a yield for that year of 4,881 ounces. The Selensing mine (Malayan Pahang Concession) is giving a fair yield, 1 oz. 16 dwts. to the ton of ore having been got from the 1892

crushings.

Of the "mineral" States, Pahang is, by the Malays, placed first, and Kelantan next to Pahang, and then Patani; all these, and these alone, have galena as well as gold and tin. Gold is found in Pahang almost exclusively in the central line of the State—at Paso on the Bera, at Luet, the Jelei, the Kelau, the Lipis, and its feeder the Raub, &c. Whatever the explanation may be, it is worth noticing here, as it has been noticed before, that the principal gold-workings of the Peninsula lie almost entirely along a not very wide line drawn from Mounts Ophir and Segamat (the southern limit of the auriferous chain), through the very heart of the Peninsula, to the Kalian Mas or gold-diggings of Patani and Telepin in the north. The best tin-workings of Pahang lie near the Selangor hills on the River Bentong, and near the famous gold-workings at Jelei and Talom. Pahang tin is said to be the only tin on the east coast which can rival that of Perak and Selangor in whiteness and pliancy.

CLIMATE.—This does not appreciably differ from that of other portions of the

Peninsula, and is considered healthy.

Fauna.—This is much the same as that of the other States, elephants however being plentiful, while on W. side of the Peninsula they are scarce. The State has not yet been systematically explored by naturalists. The elephant, by the way, is not domesticated, nor is the bullock used for agricultural labour, the buffalo alone being the animal availed of. In the way of vegetable products, rice and jungle produce are alone cared for, enough of the former being, in ordinary years, grown for home consumption. Of the latter, timber, rattan, gutta-percha and dammar, are the most important. A small trade in these is carried on with Singapore. The Pahang Exploration and Development Company has established a saw-mill at Kwala Pahang, and is doing well, 718 tons of timber being exported to this country in 1892.

POPULATION.—"Pahang," says Mr. SKINNER, "is far from being a populous country, even according to the low standard of the Peninsula, but there are a good many prosperous Malay settlements, and not least in the extreme interior. In fact, the River Lipis, an upper feeder of the Pahang, which flows down from the moun-

tains of Ulu Selangor, as also the districts of Jelei and Temling, a little further down the main stream, are said to be more thickly inhabited than any other part of the country. The Malays may be put at 50,000 for the whole of Pahang; the Chinese miners and shopkeepers at 10,000; and the Sakei, who are believed to be numerous in the unexplored southern region, at 3,000. The total is thus some 63,000 in all, or a population of about seven to the square mile." Later estimates place the probable figure for the entire population at 72,000.

While the Malay settles down on one of the banks of the numerous rivers, and builds himself a house, the Pahang Sakei (says the late Mr. KNAGGS) "lives in a perfectly wild state. Dirty and unwashed, he travels from place to place in search of certain roots and plants which he learns abound in the new

localities."

GOVERNMENT.—The Sultan exercises absolute sway over the whole population of the State, assisted by three or four powerful chiefs up country; and slavery is a recognized institution. It was the exactions of these chiefs, coupled with the absence of protection, that prevented the development of the country, not only by the natives themselves, but by enterprising Chinese, who would go anywhere to make money; but the State being now under British protection matters are improving. British capital has of late begun to flow that way for the development of the extensive concessions which the Sultan has given-as he evidently wishes to see his country follow in the footsteps of, and prosper like, the Protected States of Perak and Selangor—but, like many Orientals with similar aspirations, not knowing how to go about it.

REVENUE.—The revenue for 1892 amounted to \$49,480, while the expenditure was \$206,780, a loan of \$785,660 having been advanced by the Government of the

Straits Settlements, bearing interest at 4 per cent. per annum.

Topography.—Principal Places:—The capital of the State is Pekan, a few miles from the mouth of the River Pahang; the other chief places in the country are Cheno, some way up the main river; Temerelo, near the River Semantan; Tan-

jong Besar, on the River Lipis; and Jelei, the gold-mining centre.

RIVERS.—The principal rivers are the Pahang (which is shallow, but the most important R. in the Peninsula), the Rumpen, and the Kuantan, the first-named having large tributaries, such as the Triang, the Lipis, and the Semantan. None of the rivers are deep. The Pahang River drains a great length of country, as explained above, and, in its course, receives important feeders from the most opposite directions-from the mountains to the north, the south, and the west. The lower part of the stream, below Kwala Bera, flows for nearly 100 miles due east, through a very flat and marshy country. The river and its feeders here become wide and shallow, opening out into spaces like small lakes. The country between Pahang and Rumpen is particularly level, and the three main tributaries from that region—the Bera, the Cheno, and the Cheni—are all noted for such lakes. That of the Bera is the largest sheet of inland water in the Peninsula, but its shores, like the Cheni, are only inhabited by Sakei. The Cheno lakes, on the

contrary, are inhabited by Malays.

The following notes on Pahang were kindly furnished by the late Mr. WALTER KNAGGS :- "The journey up the Pahang River is exceedingly interesting, the graceful bends of the rivers constantly bringing into view charming scenery, and the shores being lined with villages embedded in fruit-trees, with intermittent runs of virgin jungle. This enchanting spectacle fails, however, ashore, the houses being

badly built and dirty, and soap being conspicuous by its absence.

The Pahang is about 2 miles wide at its mouth, but, owing to the enormous quantities of sand (derived from the alluvial gold and tin workings which used to and still exist, although to a very limited extent, up country) which has accumulated in it, it is only navigable, at ordinary seasons, for boats of very light draft, for about 300 miles.

The river, which is for a long way up fully a mile broad, is dotted with numerous small islands, which display every variety of tropical plants, and add materially to the beauty of the scene. The river is navigated by boats which draw but little water. They are provided with a cover to keep off rain and sun, and are poled up against current at the rate of from 12 to 15 miles a day, but a light-draft steamer has just been put on by the Punjom Mining Company, which can cover 6 miles per hour against the current.

PLAINS.—The land bordering on the sea-coast is low and swampy and admirably adapted for paddy-growing. Higher up in the interior it becomes hilly—the hills rising generally a conical shape out of low swampy ground—which is generally cultivated if near a river. Some of these districts, such as the Lipis and Chika, are very picturesque; and enormous quantities of paddy might be grown all over the

country were it sufficiently populated.

Mountains.—"The highest summit in the Peninsula is believed to be Gunong Tahan, said to be 50 miles north of Jelei, which has not been ascended, or even seen by Europeans except at a great distance, but which, it is almost certain, reaches a height of between 10,000 and 12,000 feet. This is the highest point of a range which is the real back-bone or central chain of the Peninsula at its widest point. It is situated to the east of the upper waters of the River Pahang, and can probably be best reached from the Ulu Temling (or Tembeliang), a feeder of the Pahang, near Jelei. The geological formation of the hills consists, so far as is known, of granite, sandstone, shale, and clay. Some of the islands, as Tioman and Tinggi, consist partly or entirely of trap rock.

The next highest summit is to be found on the opposite side of the Pahang valley, in the neighbourhood of Gunong Raja, near the Selangor boundary. Other high hills are found in the eastern chain, from which flows the River Cherating (called the Serting near its source), the Tringganu River Dungun, and the Kelantan River Lebih; and in the Bertangga hills, further south, on the right bank of the River Pahang, which is believed to supply the Cheno lakes. There is, still further south, another high hill from which the Rumpen flows—Gunong Gayong."—(SKINNER's

Geography of the Malay Peninsula.)

Pakolah.—A V. in N. of Province Wellesley on the S. bank of the Muda R., the population in the neighbourhood being considerable. It lies 21 miles 6 furlongs from Butterworth.

Paku (lit. Nail), the generic Malay term for ferns. Also the name of a small but elegant palm growing from 3 to 4 feet high.

Pala Pasir.—V. on left bank of Perak R., about 3 miles above Bota, W.C. Perak.

Palei.—A small V. between Umbei and Sirkum, S. Malacca, about ½ mile from the coast.

Paloh Kochek.—A Jakun V. on W. bank of R. Sembrong, N. Johore.

Paloh Ranch.—V. on W. bank of R. Madek, 3 miles below its junction with the R. Kabang.

Paloh Tampui.—V. on S. side of bend of R. Sembrong, N. Johore, inhabited by Jakuns.

Palupah,-See BERTAM.

Pamur.—The process of veining or watering a kris. Newbold describes the process as follows:—"Place on the blade a mixture of boiled rice, sulphur and salt, first covering the edges with a thin coat of virgin wax. After seven days immerse the blade, after removing the composition, in the water of a young cocoanut or pine-apple juice for seven days longer, and brush it well with the juice of sour lemon. After the rust has been cleared off, rub it with arsenic dissolved in lime-juice, wash it well in spring water, dry and anoint with cocoa-nut oil."

Panarikan.—In Jumpol, Negri Sembilan, S.W. of Pahang.

Panchong.—That portion of the sarong which is left hanging over the breast of a woman—the usual way of wearing that garment when going to bathe.

Panchor.-V. 1 to 2 miles above Johore Lama, E. bank of Johore R.

Panchor.—An imp. V. on the E. (or at the spot S.) bank of the Muar R., in Johore, lat. 2° 6′ N., long. 102° 45′ E., about 14 miles from the entrance of the river.

Panchor.—V. on a point of the Malacca coast 51 miles N.W. of Tanjong Kling.

Pandan.—A species of pandanus, the leaves of which furnish a fibre used by the Malays for ropes, &c. The flower is scented and the roots are used for rope, basket-making, &c.

Pandan.—District in S.W. Singapore on R. of same name, E. of R. Jurong.

Pandang Besar.—A village in the Melakek district of Malacca.

Pandanus (Mangkwang).—The fruit of a species of pandanus known as mengkwang lankawari grows in some parts of the Peninsula. It is occasionally eaten after cooking, but has very little taste. Monkeys are extremely fond of it.

Pandas.-A village on the W. side of Selitar or Sletar, Singapore.

Pangawa.—A title applied to certain members of Malay Royal families.

Pangolin (said to be derived from the Malay word penggiling, to roll up) Philodotus indicus.—One of the scaly ant-eaters, often known as the manis. It is slow in movement, but very strong, and can easily be tamed.

Panjat.—In Perak and some other portions of the Peninsula is used to signify the forcible entry into a house for the purpose of securing as a wife a girl already refused to the intruder by her relations. See N. & Q. with No. 17 J. S. B. R. A. S.

Pankalan (prop. Pengkalen) Bata.—V. on W. bank of Muar R., in N. Muar.

Pantai Kerechut.-V. in N.W. Penang, Teluk Bahang district.

Pantai Mas.—V. on W. coast of Penang, about 1 mile below Tanjong Kaloh.

Pantang Gahuru.—A language similar to the above, used by searchers for gahuru or lignum aloes.

Pantang Kapor.—See Camphor Language.

Pantay.—An important V. in N. Sungei Ujong, lat. 2° 51' N., long. 101° 56' E.

Pantei.—Coast, beach, shore. Used in names of places.

Pantei Achen.—An indentation in the W. coast of Penang a little over 2 miles N. of R. Penang.

Pantei Remis.—V. on N. coast of Dinding territory about 1 mile below Bruas R.

Panti.—V. in S. Johore on E. bank of Johore R., just below its turn S. to the sea.

Panting Pahat.—Mt. and valley in Rembau, Negri Sembilan (not marked in map S. A. S.). Padi and fruit cultivated in the latter. Sparsely inhabited.

Pantun.—This word is Malay, and may be translated epigram. It is a quatrain stanza, in which the alternate lines rhyme, the two first containing a

proposition, and the two last its application. The application or point, however, must not be obvious, but obscure, so as to try the ingenuity of the party to whom the pantun is addressed, so that, in fact, the pantun is a kind of enigma or riddle. These riddles are favourite pastimes of the Malays. The following are translations of three of these:—"The waves beat white on the reach of Katawan, day and night without cease. The garden is white with blossoms, but among the flowers, one only is love-inspiring." "The diamond falls in the grass, and there still glitters, but love is like dew on the grass. It vanishes when the sun appears." "The peacock nods its head; the peacock that perches on the battlement. When her locks wave, new beauties shine in her face."*

Papaw or Papaya (Mal. papúa or buah bětek) Carica papaya.—This tree abounds in the British Settlements and in portions of the Peninsula, but whether it was introduced or is indigenous seems to be uncertain. It is, at all events, a well-recognized native product, the fruit being exposed for sale in large quantities. The ripe papaw, the fruit being known as kětéla by the Malays, somewhat resembles a melon in shape and internal appearance, but, beyond being considered very whole-some, does not appear to possess exceptional properties. The unripe fruit, on the other hand, produces a juice of the most remarkable nature, and I offer no apology

for making the following quotations regarding it:-

Mr. T. Christy, in his "New Commercial Plants and Drugs," says:—"This drug has been found to have the property of digesting living tissues, such as adenomata and cancers; and it has been suggested that it might prove an excellent remedy for the false membranes of croup, and diphtheria, and for worms. A recent report of Dr. Albrecht, of Neuenburg, speaks very highly of the effects of Papayine (as Papayine-syrup) in cases of simple dyspeptic and catarrhal, gastric, and intestinal disturbances of small children in absence of deeper anatomical lesions. Both vomiting and undigested food are said to rapidly disappear after a few teaspoonfuls have been administered. Dyspeptic adults are also said to derive great benefit from the use of this remedy."

In a further issue he says:—"The important property possessed by the juice of this plant, of rendering tough flesh tender, has long been known to the natives of tropical climates, but the statement has, until lately, met with a considerable amount of incredulity on the part of those who have not witnessed the

phenomenon

"In the 'History of Barbadoes,' Griffith Hughes says of the juice of the papaw-tree, 'The juice is of so penetrating a nature, that if the unripe peeled fruit be boiled with the toughest old salted meat it quickly makes it soft and tender.' Browne, in his 'Natural History of Jamaica,' says, that meat becomes tender after being washed with water to which the juice of the papaw-tree has been added, and if left in such water ten minutes it will fall from the spit while roasting, or separate into shreds while boiling. Holden states, that a joint of meat hung to a branch of a tree is rendered tender. In Quito, according to Karsten, the use of carica juice when boiling meat is a common one. Drury, in 'The Useful Plants of India,' states that old hogs and poultry which are fed upon the leaves and fruit, however tough the meat they afford might otherwise be, are thus rendered perfectly tender and good, if eaten as soon as killed, but that the flesh passes very soon into putridity."

The following is quoted from the Globe, London newspaper:—"If the art

The following is quoted from the Globe, London newspaper:—"If the art of training consists mainly in the method of managing the digestive organs of the patient, it is possible that 'papaine' will, before long, be recognized as a useful auxiliary in the dieting of competitors. It was stated at the last meeting of the Chemical Society of France that a learned academician, M. Wurtz, had completed the experiments announced by him a year ago to the Academy of Sciences on the uses and virtues of this new product. Papaine is composed of the juice

Par

extracted from the fruit of a tree called the papaw-tree. The juice is subjected to various processes, more or less unintelligible to the vulgar mind, and then mixed with a large proportion of water, when it exhibits strong powers of artificial digestion, and produces some results which are certainly curious even if they are not destined to become particularly useful in the medical world. In the most successful of his experiments, M. Wurtz diluted two grammes of papaine, which he was obliged to use in a somewhat impure state, owing to the impossibility of freeing it entirely from the foreign substances adhering to it, in a glass containing 200 cubic centimètres of water. Into the bath thus prepared was introduced an ill-fated frog, weighing 50 grammes, which was left to be operated upon by the spontaneous effects of the liquid. In two hours the wretched occupant of the bath began to show signs of his impending fate, his skin being gradually worn away by the action of the papaine. Four hours more elapsed, and the muscular action of the beast appeared to be paralyzed. His movements became slack, and soon after ceased altogether. The next stage was the gradual disappearance of the body itself, which faded away, as it were, after remaining in the shape of a sort of film, the conformation of which grew every minute less distinct. On the morning of the following day the frog had altogether disappeared."

The name of Papua (New Guinea) is alleged to be derived from the quantities of this fruit grown in the island. The word papua has become to mean "frizzled hair" on account of the way the Papuans wear their hair.

Mr. Cantley, in his report for 1886, noticed another species called the

Mountain Papaya (Carica candamarcensis), which has been introduced, but a proper place to plant it had not yet been procured. He adds:-" It would, no doubt, grow admirably on the Thaipeng Range in Perak at about four thousand feet elevation, or on the Selangor hills, and be within range of practical use. The fruit of the mountain papaya had some of the flavour of a peach and a very agreeable odour. Some of the papaya plants I observed had partly left Mother Earth and were establishing themselves as sub-epiphytes, growing with but scanty support and fruiting freely in the crevices of stone walls, &c."

Paps.—Two hills about 200 feet high near the coast of Kelantan, about

lat. 5° 3' N. and long, 102° 24' E.

Paps, The.—A hill 300 feet high on the coast of Kelantan just inside another hill of 400 feet called the Wedge, about 9 miles S.E. of Kelantan. These are given as marked on the charts, but some confusion between the two probably prevails.

Para.—V. on S. bank of Bernam R. about 18 miles from its mouth, N.

Selangor.

Paradise, Birds of, generally called in the Peninsula Burong mati-having never been seen alive by the natives except as an article of trade.— (imported only into the British Settlements and Peninsula).-The first mention made of these remarkable birds is by PIGAFETTA, who informs us that the King of Bachian, one of the true Moluccas, gave the companions of Magellan a pair of them, along with a slave, and two bahars-or nearly 1,000 pounds weight-of cloves, as a gift to the Emperor Charles the Fifth. "He gave us besides," says he, "two most beautiful dead birds. These are about the size of a thrush, have small heads, long bills, legs a palm in length, and as slender as a writing quill. In lieu of proper wings they have long feathers of different colours, like great ornamental plumes. Their tail resembles that of a thrush. All the other feathers, except those of the wings, are of a dark colour. They never fly, except when the wind blows. They informed us that these birds came from the terrestrial paradise, and they called them *Bolondinata*, that is 'Birds of God.'"— Prima Viaggio, p. 156. The name of the bird, as given by Pigafetta in this account of it, is properly burong-dewata: and I have no doubt was correctly

enough written by the author, but corrupted in transcription. It is the Malay name, and signifies "bird of the gods;" that is, of the Hindu deutas or deities. The name of manuk-dewata is Javanese, and has exactly the same import. These are common names for a family of birds of which there are several species; but they are names given by the strangers who traded with the Spice Islands, to which the prepared birds were brought from their native country—New Guinea—as they still continue to be. The Spaniards or Portuguese evidently paraphrased the Malay or Javanese name into Ave de Paraiso, conformably to Pigafetta's account of their origin, and hence the "Birds of Paradise" of the European languages. Before the arrival of Europeans, the Malay and Javanese traders seem to have brought the birds of paradise to the western emporia of the Archipelago from the Spice Islands, most probably for sale to the Chinese, for such an article would not have been in demand either by Hindu or Mahommedan consumers. Eighteen species are described by Wallace in his "Malay Archipelago."

Parang.—The wood-cutter's knife of the Malays. It is broad at the point, and tapers inwards towards the handle, thus resembling the Chinese executioner's sword in shape. The greatest weight being near the end of the blade, it is a powerful weapon.

Parcelar Hill.—A hill on the I. of Langat, at the mouth of the Jugra R., Selangor. (According to the Admiralty charts, this is erroneously placed on S. A. S. map, and is synonymous with Bt. Jugra, $8\frac{1}{2}$ miles further E.)

Parit.—A drain, ditch, trench, moat, canal. Often occurs in combination in the names of places.

Parit Buntar.—The most northerly settlement in Perak, being close to Nebong Tebal, the S. district of Province Wellesley. Seat of a magistracy, hospital, &c., and the capital of Trans-Krian district.

Parit Malana or Melana (both spellings given in the maps).—A district in C. Malacca, nearly due N. of Malacca about 9 miles.

Parit Siam.—V. on E. coast of Kahang R., E. Johore, 2 miles below its junction with the Sembrong R.

Parrot.—See Lory. Numerous varieties, but none of very bright plumage, exist, and are regarded only as articles of food.

Parsees.—A few Parsee merchants and employés are resident in the Straits Settlements, where they maintain the same high character they have earned elsewhere, as liberal and well-conducted citizens. They are fire-worshippers, and trace their origin to Persia. But large numbers of the race have been so long settled in India as to regard it in the light of a native country. The names of Sir Jamsetjee Jeejeebhoy and other leading men of this nationality, are sufficiently well known to most Eastern readers, and in a smaller way their countrymen have been equally conspicuous for generosity and public spirit.

Parut.—A cocoa-nut shell used for a game in which the shell is taken between the feet, and sent as far backwards as possible by a twist of the foot.

Pasal.—Small V. close to Umbei Police Station, and ½ mile from the coast, on the high road to Merlimau, S. Malacca.

Pasir.—Sand, or reach of sand. Of constant occurrence in the names of places, such as Pasir Panjang, &c.

Pasir Bangsal.—The shore E. of Changi Police Station.

Pasir Blanda.-V. on S. coast of Penang, Teluk Kumbar district.

Pasir Dingin.-V. on E. bank of Triang R., W. Pahang.

Pasir Gadabu.—V. in N.W. Perak, 2 miles S.E. of Tanjong Piandang.

Pasir Garam.—V. on W. bank of Perak R., 7 to 8 miles below Bota, in S.W. Perak.

Pasir Ikan Mati, -V. near extreme S.E. point of Penang.

Pasir Itam.—A V. on an island of same name on the coast of W.C. Perak, about 11 to 12 miles S. of Kwala Larut.

Pasir Kijang.-V. on S. Bank of R. Sembrong, N. Johore.

Pasir Kulim. -V. on W. bank of Perak R., just above Kota Lama, in N.C. Perak.

Pasir Labah.—Coast between Sungei Bajau and Sungei Tengah, W. Singapore.

Pasir Lanun.—The name of the beach inside Blair's Harbour at S.E. extremity of coast of Pahang.

Pasir Pandak.—V. on W. side of extreme S.W. promontory of Penang.

Pasir Panjang.-V. in S.W. Penang at foot of hill of same name.

Pasir Panjang.-V. on the shore of S. Dinding territory opposite the main island.

Pasir Panjang.—District on S.W. shore of Singapore. V. and Police Station of same name.

Pasir Panjang.—Reach and V. on E. bank of Perak R. just above Bandar Baru Island.

Pasir Plekat.—The shore of N.W. Changi district, N.E. Singapore.

Pasir Sala.—V. on W. bank of Perak R. about 4 miles above Bandar Baru in S.W. Perak.

Pasir Serkat .- V. on S.W. coast of Johore 3 miles N.W. of T. Bulus.

Pasir Telor .- V. on E. bank of Perak R. 3 miles S. of Bota.

Passir.—A mountain in Rembau, Negri Sembilan (not marked in map S. B. R. A. S.).

Pata.—District in N.C. Patani. Galena mines exist in the neighbourhood.

Patani.-V. on the E. bank of Johore R. 3 miles above Johore Lama.

Patani.—The name of the most northerly of the Malay States, on the E. side of the Peninsula, said to be derived from pah-tani, i.e., "Tani's father," the founder having a son of that name.

Position.—Between 6° 20' and 7° N.; bounded on the N. by Senggora and the Gulf of Siam, on the E. by the China Sea and Kelantan, on the S. by Kelantan,

and on the W. by Kedah.

History.—As with most of the Malay States, its history is very obscure. A small factory was established by the English in 1610, but this was abandoned in 1623.

Newbold, in his "History of the Malayan States of the Peninsula," furnishes the names of nineteen princes of two dynasties who reigned in Patani. At the usual estimate of 20 years to a reign, this would give a total of 380 years for the history of the State; but as it has, chronologically, neither a beginning nor an end, the statement is of little value. The country was invaded and subjugated by the Siamese in 1786, but achieved a sort of independence until 1832, when it was again overrun and divided into nine districts mentioned below. These States (which, for geographical reasons, are all included under the name of Patani) are under the general control of Senggora, the S.E. seat of the Siamese Government.

Geology and Mineralogy.—But little is known of the physical aspect of the interior. Tin, lead, and galena are mined, and the districts of Jalo and Legei are supposed to be the richest in minerals.

CLIMATE.—Being exposed to the winds of the Gulf of Siam and China Sea, the climate is somewhat cooler than that of the W. side of the Peninsula: otherwise there is but little difference between Patani and its neighbouring States.

FAUNA.—Similar to that of Pahang. No details are to hand.

AGRICULTURE.—Rice appears to be raised in fair quantities, and fruit is cultivated as in other parts of the Peninsula. Too little is known of the country

to speak with any certainty of its agricultural resources.

TRADE.—A fair amount of trade is carried on with Singapore and Bangkok, as also with the neighbouring Siamese and Malayan States. The exports are tin, lead, gutta, salt fish, tiles, earthenware, and timber. The active commercial and shipping business is controlled by a "Capitan China."

POPULATION.—Roughly estimated at 75,000 to 100,000, though CARL BOCK in 1884 placed it, from Siamese information, at 200,000. The Malays are more numerous and the Sakei less so in Patani than on the other side of the Penin-

sula.

GOVERNMENT.—The Rajah is the reputed chief of the nine divisions, and is under the suzerainty of Siam, whose Administrator resides at Senggora.

REVENUE.—No statistics available.

Topography.—Since the country's invasion and subjugation by Siam in 1832, it has been broken up into the four seaboard States or divisions, lying from north to south in the following order:—Nong-chik or Tujong, Patani, Jembu, Sai; and five interior divisions—Tipah, Chenai, Jalo, Reman, Ligei. Of these, Reman is, even excluding any part of the Perak watershed, the most extensive, and Patani,

with its seaport, is probably the most populous.

The largest and perhaps the most important of the provinces at this time is Reman, lying to the south-east of the river, and bordering on Perak, with which it is closely connected by ties of intercourse and common interest. It is the most Malayan of all these States; but its Malay Raja is, like the rest, responsible to the Chow Kun, or Governor of Senggora, and must look to be confirmed by the King of Siam. Kota Bharu, some miles on the east side of the Patani River, is his residence; and the population of the country is to be found chiefly in this neighbourhood and near the upper valley of the Perak, which river the Reman people use for exporting tin, &c. The boundary with Perak, near which are the valuable tin mines of Kroh and Intan, already mentioned in connection with Kedah, has yet to be determined.

Jalo, situated principally to the north-west of the River Patani, near the head-waters of the Perak, lies under the eastward cliffs of the bold range of Bukit Besar. Jalo is believed to be one of the richest mineral countries in the whole Peninsula, having abundant galena, tin, and gold already worked at some points by the Chinese. Like the other mineral countries, it is intersected by remarkable

limestone formations. The southernmost of the nine provinces in Sai.

The galena mines of Patani, which a few years ago attracted much attention in Singapore, lie near the small town Banisita. This is situated in a picturesque amphitheatre of hills, through which the river flows, about 45 miles distant from the town of Patani in a straight line, but double that distance by river.

The area of the whole of Patani is about 6,000 square miles, nearly half of

which is believed to lie in the two provinces above described.

The Bay of Patani is formed by the projection of a narrow strip of land about 7 or 8 miles in length, which, connected with the mainland to the eastward, bends round to the north-west like a horn, and protects the roadstead, so that vessels can at most seasons ride in safety; which accounts for the high estimation in which it was held by the early navigators. The western extremity of this projection is called Cape Patani. The town and port of Patani is almost all that is left unchanged of the former important State of that name. It was, and still is, the chief town of the whole of this country. It is situated about 2 miles from the river's mouth, on the south-east side.

RIVERS.—Two considerable rivers—the Patani and the Telopin—rise in the same hills and flow nearly parallel to the sea, through a country for the most part flat, but with isolated cliffs and hills. The River Patani is a long but shallow river which retains the same name throughout its whole length. Its source is said to be in the mountain Jambul Merak (peacock's crest), about 5° 35′, from which also the northern tributaries of the Perak flow; thence it has a northerly course and falls into the Gulf of Siam in 6° 55′ N. The upper waters of the Rivers Patani and Perak are a labyrinth of streams forming the head-waters of the river system of this part of the Peninsula. The River Kelantan is also said to take its source in the same region.

The Patani has an extensive delta, intersected by numerous creeks. Kwala Tujong to the north is the most important estuary, and is navigable as far as Kwala

Nong-chik (Nochi), where it bifurcates from the Patani.

MOUNTAINS.—No mountains of considerable elevation exist, but the Jalo district

is very hilly, and there are isolated elevations elsewhere.

COMMUNICATION WITH OTHER PORTS.—This is by sailing boats or prahus only, and Patani is practically cut off from southern ports during the prevalence of the S.W. monsoon.—(Skinner's Geography of the Malay Peninsula.)

Patani.—The capital of the State of that name, about 4 miles from the entrance of Patani R. on E. bank. Numerous Chinese have settled here. The Malay V. is known as Kota Rajah Patani. The population of the town consists of Malays, Chinese and Siamese, the Malays preponderating, the Rajah himself being a Malay.

Patchouli (Pogostemon patchouli) has been introduced and grows freely with but little care. The leaves command \$17 per picul. Plants raised from seed are reported to be scentless. Cuttings only should be used.

Pattas.—V. 3 miles N. of Klang R. and about the same distance from the coast, Selangor.

Pawang or Poyang.—The Pawangs are a class of men endowed with the power of performing the functions of priests, teachers, physicians, and sorcerers. Under any of these titles they have not much to do amongst the members of their own nation; many of them do not believe that the Pawangs have any supernatural power as sorcerers or as priests, nor do they attribute any efficacy to the acts they perform under these two titles. Many others have great doubts on the subject; however, some of them certainly acknowledge in them some extraordinary power, more or less. The *Pawangs* themselves, at least those I have seen, have very little confidence in their own ability, either in their capacity of sorcerers or physicians. Though their knowledge be much circumscribed, they are generally more clever than their countrymen, and in every kind of sickness they are called upon. Their prescriptions are always accompanied with some superstitious practices, without which they are supposed to be of little or no effect. But it is amongst the Malays that their skill is much in honour, and their persons objects both of veneration and of fear. The Malays are ridiculously superstitious on that point; they have a firm faith in the efficacy of the supplications of the Pawangs, and an extraordinary dread of their supposed supernatural power. The Malays imagine that they are endowed with the power of curing every kind of sickness, and of killing an enemy, however distant he may be, by the force of spells; and with the gift of discovering mines and hidden treasures. It is not uncommon to see Malay men and women, at the sight of a Benua pawang, throw themselves on the ground before him.

I could not ascertain the ordinary way for becoming a *Pawang*, nor discover any ceremony by which the *Pawangship* is entered upon: it appears very probable that uncommon natural ability, which is found from time to time in a few of the *Benuas*, gives a sufficient right to exercise the functions of such ministry. The right of inheritance seems also to be looked for as contributing much to the claim of being

a Pawang. In the absence of more positive information on the subject, I will here quote a passage from Lieutenant Newbold:—"The soul of a Pawang after death is supposed to enter into the body of a tiger. This metempsychosis is presumed to take place after the following fashion :- The corpse of the Pawang is placed erect against the projection near the root of a large tree in the depth of the forest, and carefully watched and supplied with rice and water for seven days and nights by the friends and relations. During this period the transmigration (believed to be the result of an ancient compact made in olden times by the Pawang's ancestors with a tiger) is imagined to be in active operation. On the seventh day, it is incumbent on the deceased Pawang's son, should he be desirous of exercising similar supernatural powers, to take a censer and incense of kamunian wood, and to watch near the corpse alone, when the deceased will shortly appear in the form of a tiger on the point of making a fatal spring upon him. At this crisis it is necessary not to betray the slightest symptom of alarm, but to cast with a bold heart and firm hand the incense on the fire; the seeming tiger will then disappear. The spectres of two beautiful women will next present themselves, and the novice will be cast into a deep trance, during which the initiation is presumed to be perfected. These aërial ladies thenceforward become his familiar spirits, by whose invisible agency the secrets of nature, the hidden treasures of the earth, are unfolded to him. Should the heir of the Pawang omit to observe this ceremonial, the spirit of the deceased, it is believed, will re-enter for ever the body of the tiger, and the mantle of enchantment be irrecoverably lost to the tribe."-Rev. P. FAVRE in J. I. A.

"The spells are of various kinds, operating in different ways, and rapidly or slowly. The most noted is the tuju (derived from the word 'to point'). The Pawang takes a little lilin sambang, or wax, that has been found in a nest the bees themselves have abandoned. Over this he mutters a spell, and waits his opportunity to menuju, because, to ensure its success, he must not only be able to see the victim, however distant, but there must be a strong wind blowing in the direction of his residence. When such a wind rises, the Pawang takes the wax, places a vessel of water, with a lighted candle or two before him, mutters an incantation, and fixes his eyes intently on the water. If he can see the image of the victim distinctly in the water, he throws the wax into the air, and the wind instantaneously transports it to the victim, who feels as if he were struck by something. Sickness follows, which is either prolonged, or followed by speedy death, according to the exigency of the spell." Counter spells, however, will, it is believed, avail to render the Pawang's

effort useless.

Pawangs were in former days always employed to secure good fortune for newly-opened mines, which they pretended to obtain by various ceremonies. Of late years, however, the belief in their powers has almost died out.

Paya Bakong.—Small V. about 1 mile W. of R. Duyong, S. of Durian Tunggal district, S. Malacca.

Paya Blantei.—Small V. in Batu Berendam district, S. Malacca.

Paya Dalam.—A small V. in the Ayer Pah Abas district, Malacca.

Paya Dato.—Small V. in the Pigoh district, N. Malacca.

Paya Gemok.—V. about half way on the road from Merlimau to Chinchin, S. Malacca.

Paya Jakun.—V. 3½ miles N. of Merlimau, S.E. Malacca, on the road to Chinchin.

Paya Junuong.—V. 51 miles N. of Merlimau, S.E. Malacca, on the road to

Paya Lebar.—District and V. in E. Singapore, the latter being on the high road to Sirangoon. A Police station, Government bungalow, and Roman Catholic church add importance to the village.

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Paya Luas.—V. on the boundary line between Johol and Malacca, on the road to Chindras.

Paya Rumput.—An important V. 7 to 8 miles N. of Malacca-town.

Payong, in Malay, an umbrella. This is the universal badge of rank from the prince to the humblest office-bearer among the civilized nations of Malaya, and stands instead of the crowns, coronets, stars and ribbons of the nations of Europe. The quality of the party is expressed by its size, colour, or material.

Peacock, in Malay, mārak. The bird known by this name is the Pavo muticus of ornithologists, and a distinct species from the Indian one, which is that of our poultry-yards. It appears to be confined to Java, Sumatra, and the Malay Peninsula, and has never been domesticated by the natives. The neck of the Malay species is covered with green instead of blue feathers, and the crest differs in form from that of the Indian species. It is said to be good eating.

Peacock-Pheasant.—A handsome species with a short tail, the feathers occillated or marked with eyes. Abundant throughout the Peninsular jungle.

Peak I .- See Pulo TEMBAKOL.

Pearl (Mutiara), and Mother-o'-Pearl (Siput mutiara).—Not found on the coast of the Peninsula; but as these ornaments are largely used by the native races, the following article from CRAWFURD is quoted :- " Pearls worth fishing are found in the seas about the Arrow Islands, and in those of the Sulu Archipelago, but none in size or quality to be compared with those of the Menar or Persian Gulfs. Mother-o'-pearl oysters are found in the same situations and on the coasts of several of the Bisaya Islands of the Philippines much more abundantly. From Manilla there are yearly exported about 200,000 pounds weight of them. Mr. WINDSOR EARL has given the following very satisfactory account of the fishing of the Arrow Islands on the coast of New Guinea :- But the great sources of wealth are the pearl and tripang banks, which lie on the eastern side of the group, and are often several miles in width, being intersected by deep channels, some of which will admit vessels of burden. The pearl oysters are of several varieties. First, the large oyster with its strong thick shell from six to eight inches in diameter, which furnishes the mother-o'-pearl shell of commerce. These are obtained by diving and are highly prized, being nearly always in demand at Singapore for the European and Chinese markets. This oyster produces few real pearls, but gnarled, semi-transparent excrescences are occasionally found on the surface of the inner shell, which are so highly esteemed by the Chinese that they often fetch enormous prices. The other description is the small semi-transparent pearl oyster, having the inner surface of the shell of a bluish tint. The shell is of small value as an article of commerce, but the oyster itself often contains pearls which, although individually of no great value, are so numerous as amply to repay the labour of collection. Pearls of sufficient size to undergo the process of boring are sometimes found, but the greater portion are what go by the name of seed-pearls, and are only marketable in China, where they are much valued as a medicine when pounded and mixed with some liquid.'—Journal of the Indian Archipelago, Vol. IV, p. 490. The names for the pearl in Malay and Javanese-muti, mutya, and mutyara-are all Sanskrit, and I am not aware that in any of the Malayan languages there are native names for it. Occasionally the Persian word lulu is used. The name for the mother-o'-pearl oyster-indung-mutyara, is exactly equivalent to our own, for the Malay word indung signifies mother or matrix. From this we may suppose that both the pearl and mother-o'-pearl were most probably made known to the Malayan nations by the Hindus. It may be remarked, that the pearl-fishing of the Sulu Islands was certainly carried on before the arrival of Europeans, for they are mentioned by the indefatigable Barbosa. 'Going on,' says he, 'in a northerly direction towards China, there is another island abounding in the necessaries of

life called Solar (Sulu), inhabited by a Gentile people, almost white, and in person well made. They have their own proper king and language. In this island is found much gold by washing the soil, and over against it, the people go to fish small pearls, and even find occasionally larger ones, fine as to colour and roundness.'—
Ramusio, Vol. I."

Pearls, Breeding.—A belief that a certain variety of pearl is able to reproduce itself is firmly implanted in the minds of all seaboard Malays. The question has never been authoritatively settled, but the following extracts from an article written by the compiler and published some years ago may be of interest:—

"The pearls in question are reputed to come chiefly from Borneo and Java, although found in nearly all islands of the Archipelago, and even in Singapore; there does not appear to be any specific native name for them as distinguished from ordinary pearls. As regards appearance, those shown me resemble the ordinary jeweller's pearl in look, though slightly more irregular in shape. The largest of regular shape I have yet seen is something over $\frac{3}{16}$ inch in diameter, though an irregularly formed one is over $\frac{1}{4}$ inch in length, by $\frac{3}{16}$ in width, while the smallest is a mere pin-point of microscopic dimensions. As regards substance, they are alleged to present exactly the same laminated section as the ordinary pearl when cut, and a lady, resident in this colony, informs me that Professor HUXLEY examined one at her request, and subjected it to numerous tests, of which he reported the result to be that it was absolutely indistinguishable from the ordinary

pearl used for jewellery.

"The process by which reproduction takes place involves only very simple preparations. Four or five large-sized pearls (most people have begun with three) are placed in a small chip or other box with as many grains of uncooked white rice as the experimenter chooses—from 15 to 30 are usually used. Absolute freedom from disturbance is, by some, alleged to be necessary for the formation of the new pearls, while others deny that this makes any difference if they are not unduly handled or shaken. If examined at the end of a certain period (about a year), objects resembling small seed-pearls will be found strewn about the bottom of the box, while in many cases the original pearls themselves will be found to have increased in size. If again left untouched for a further period of six months or a year, and then examined, some of the seeds will be found to have become larger, while fresh seeds will have formed. Each grain of rice now presents a curious appearance. A small circular bite seems to have been taken from the end of each, the number of seed-pearls agreeing with the number of grains thus affected.

"The lady resident above referred to having kindly offered to show me her collection, I saw it at the end of December last. It consisted of about five large or medium-sized pearls, and, as nearly as could be estimated, about 120 small-sized pearls, varying from the most minute speck to a size large enough for use in certain descriptions of jewellery. Every grain of rice was, so far as I could see, marked as before described—looking, in fact, as if some beetle had gnawed away a portion of its end. She informed me that the larger pearls she showed me had been in their present box for about twenty years; that she had only put four or five into the box when it was just closed; that, except to show to persons interested, the box had always been kept shut; that any tampering with it had been impossible—to say nothing of the fact that no one was likely to have strewn seed-pearls in it for the purpose of playing a practical joke which might not even attract attention for

a lengthened period.

"Shortly after seeing the pearls above mentioned, good fortune led me to inquire of Dr. Rowell, the Principal Medical Officer of Singapore, what he knew about the matter. It so happened that I could not have applied to better authority, Mrs. —— having for some years possessed and bred the pearls in question. I give

her experience in her own words, her kindness in furnishing the account being most generously supplemented by her sending the box containing the pearls for my inspection. Mrs. — writes as follows:—'I had three "Breeding Pearls" given me in June or July, 1874. On the 17th July I shut these three up with a layer of cotton-wool above and below them and some few grains of a very fine rice (called here "Pulot" rice?). On the 11th of July, 1875, we opened the box in the company of two or three friends, and we discovered twelve of sizes—the three original ones standing out distinctly by their greater size; though some of the newly-bred ones were by no means insignificant to look at. One or two were about the size of a pin's-head and perfectly round. The rice looked crumbly and wormeaten.

"'The size of the three breeding pearls both my husband and I thought considerably larger. I had made a rough drawing of their appearance and size, and you can see the boxes for yourself.

"I have started afresh again with five big ones lately given me, three of the old originals, and I think the fifth is one of those bred in my box. But this I could not vouch for.

"'I send the two boxes, and shall be glad to have them back when you have done with them.'

"I may add that the rice in the boxes sent was all 'bitten away,' as in the other case. I feel certain that the 'bite' has been produced by some living agency, and that it could not have been produced in any other way.

"Having been informed that Mrs. —, of the local girls' school, could give me some information on the matter, I called on that lady, and she kindly told me all she knew. This was exactly to the same effect as above described, with the further item that 'breeding pearls' were in all cases originally taken from pearl oysters, and that, when about to 'breed,' a small black speck made its appearance on some portion of the pearl, which speck continued to be visible so long as the breeding process continued. I then wrote to a gentleman who, I was informed, had himself bred a considerable number—Mr. H. B. Woodford—who very kindly furnished me with a series of notes, which I transcribe in almost his own words:—

"Breeding pearls are found in several of the oyster and clam species, including those known as Tridacnæ, with a fan-shaped shell. The shells yielding them abound chiefly on the coast of Borneo, but they are also found throughout the Malayan Archipelago and even in Singapore. I found one at Sanah Merah Kechil beach. Many people believe that they come to better perfection if kept in seawater. I have reared mine in closed boxes, with Pulot rice strewn loosely around them, and the whole covered with a layer of cotton silk, though Mr. L. J. Scheerere has successfully reared some in fresh water. I am not able to say what is the average percentage of these pearl-producing shells, but out of fifteen or twenty I picked up at Tanah Merah, I only came across one. Mr. P. Marcus tells me he has extracted them from all descriptions of bivalve shells, the larger the shells the larger being the pearls. In one case he took a very large one from the Tridacna gigas, or giant clam (of which a specimen may be seen at the foot of the stairs leading to the Raffles Library).

"'The pearls when discovered are usually found imbedded close to the valves of the shell, though in some cases found adhering to the fish. There appears to be no certainty as to size, the breeding pearls varying like the ordinary ones, though the rule as to the largest being contained in the largest shells does not, in the latter case, hold good. They are almost invariably spherical when found, but, when commencing to breed, change their shape to a more or less irregular oval, with layers of scales on them visible to the naked eye. In some cases the scales are themselves spherical.'

"As regards the time occupied in 'breeding,' Mr. Woodford names a very

much longer period than that specified by the other correspondents who have so kindly answered my inquiries. He states that it usually takes eight years for a seed-pearl to increase to four times its original diameter, i,e., about \(\frac{1}{6} \) inch, though he has seen one over \(\frac{1}{4} \) inch in measurement produced in that period.

"After a certain time (which appears to be uncertain), 'breeding pearls' die and change their lustrous colour to a dirty flake white, the outer scales appearing to have peeled off. Mr. Woodford attributes their formation to insects, though this otherwise feasible theory is at variance with all received beliefs as to the

formation of the pearl within the oyster.

"Several other residents have informed me that they have seen breeding pearls and their young (if the term be admissible) under circumstances which left no doubt as to the bona fides of their exhibitors. The Hon. J. M. Vermont, M.L.C., of Province Wellesley, informs me that he is certain of the fact that all above stated is true, it agreeing with his own experience. Admiral Keppel, Sir J. Brooke, Major McNair, and other writers have noticed the belief in their published works."

It is, however, only fair to give the views of so distinguished a scientist as Professor Owen on this subject. The following is his letter on the subject, which

appeared in Land and Water in December, 1878:-

"The glass tube now before me, so kindly provided by Her Highness the Ranee of Sarawak as a test of the credulity of the inhabitants of the British Isles, contains a few genuine seed-pearls of the Meleagrina and five small marine shells—Cowries or Cypræa, sub-genus Trivia of Gray, which represent the rice. The specific distinctions of these small trivia are so minute that this individual species has been from time to time variously described. It is the Cypræa oryza of Linneus and of Lamarck; C. intermedia of Kiener; C. insecta of Mighele, and will doubtless receive other designations from daring conchologists, who delight in a religious dissent from the opinions of their predecessors. The so-called rice is a marine shell of the genus Cypræa, the end or apex of each example carefully filed or ground off to represent the effect of having been fed upon by the pearls. The whole is a deliberate and barefaced imposture, and it is to be hoped that when some generation hence this miserable myth again crops up in the repetitive operations of history, some more powerful pen than mine may find employment in denouncing the shameless attempt to impose upon the credulity of the scientific world."

Now it so happens that this letter was not seen by the compiler of the present work till many years afterwards, or he would have forwarded some of the rice which he saw with the pearls shown him. He can only aver that he is positive that no shells of any species were present. Some one must have played an unintentional practical joke on Her Highness the Ranee—probably in total ignorance of the fact that the rice was in any way needed for the purpose of transmission to Europe. An endeavour is now being made to obtain some to send to Europe. So many people of good standing can testify to the facts, that the presence of the shells need not affect the question.

Pedas.—V. on W. border of Rembau, Negri Sembilan, at the source of Sungei Pabei.

Pedra-Branca or the White Rock of the Portuguese navigators, a well-known landmark 32 miles distant from Singapore. It is thus well described by Mr. Windsor Earl:—"Pedra-Branca is a detached rock 24 feet in height above the level of the sea, situated nearly in the centre of the eastern entrance of the Straits of Malacca, which has been the leading mark for vessels entering or leaving the Strait for ages past. The main channel, which lies immediately to the north of the rock, is four miles wide in the narrowest part. A lighthouse of dressed granite 75 feet in height is erected on the rock, and at that time probably the

most perfect of the kind ever constructed to the eastward of the Cape of Good Hope. The light, which is regularly illuminated, is on the revolving principle, attaining its greatest brilliancy once in a minute as the concentrated rays strike the eye of the spectator. It is visible from the deck of a ship at the distance of 15 miles, when it disappears below the horizon, but it may be seen much further from the masthead, as its brilliancy is so great that the horizon is the only limit to its range. The reefs and dangers which beset the eastern entrance of the Straits of Malacca are all within the influence of the light as visible from a ship's deck."

Pekan.—The capital of Pahang, about 4 miles from the mouth of R. of same name on the S. bank. It is described as flourishing, but with no particular claims to attention.

Pelam.—Large V. at junction of stream of same name with Dengin R., 2½ miles E. of Province Wellesley frontier, Kedah.

Pelandok.—See Mouse-Deer.

Pelas Negri.—"Cleansing the country." An ancient ceremony performed about once every seven years in Perak to ensure prosperity. A description is given in "Notes and Queries" with No. 16 J. S. B. R. A. S.

Pelisit or Bajang.—Evil spirits which take demoniacal possession of human beings.

Penaga.—The chief station of the northern district of Province Wellesley, 8 miles 4 furlongs from Butterworth. It has a population of upwards of 1,600. including many Chinese and Kling shopkeepers and tradesmen. The Malay agricultural population in the neighbourhood is very considerable. A Police station of brick, the lower room of which is used as the magistrate's court, accommodates an inspector and a small force of native police.

Penaik.—A V. in Jumpol, one of the Negri Sembilan.

Penang Island and Town.—Originally named Prince of Wales' Island and George Town. The former designation has fallen into disuse, the word "Penang" being now applied to the Island. The meaning of the name Pulo Pinang is Betel-nut Island.

Position.—Penang is situated at the N.W. end of the Straits of Malacca, 360 miles from Singapore, and is separated from the mainland of the Peninsula by a channel, about 2 miles broad, forming a safe and spacious harbour, and distant from the nearest point of Sumatra about 150 miles. The insular shore of the harbour—the site of the fort and town—lies in N. lat. 5° 25' and E. long. 100° 21'. Annexed to it is Province Wellesley (q. v.), which, although under

the same Government, is geographically distinct.

Penang was taken possession of as a British Settlement on the 17th day of July, 1786, there being at the time only 58 inhabitants, who were fishermen. The British Government of India had been long desirous of possessing a commercial emporium, but, above all, a naval station at the eastern side of the Bay of Bengal, and the chief instrument it employed in carrying this object into effect was Francis LIGHT, the master of a merchant vessel. The question of the formation of such a Settlement was, on the representation of this gentleman, first entertained and resolved upon under the administration of the able, active, and ambitious WARREN HASTINGS, although not carried into effect until that of his immediate successor. Mr. Light had been in the habit of trading with the Siamese possessions on the Bay of Bengal, and with Kedah and other Malay States on the western side of the Peninsula. He first recommended, for the locality of the future Settlement, the larger island of Junk Ceylon—the Salang of the Malays—belonging to the Siamese, and finally, Penang, an almost uninhabited island belonging to Kedah, itself a tributary of Siam. A romantic story long obtained currency that Mr. Light had married the daughter of the King of Kedah, and received with her as a dowry the Island of Penang, which he sold to the East India Company. There was no foundation of truth in this tale. The wife of the enterprising adventurer was neither a princess nor a Malay, but a Mestizo-Portuguese of Siam, and the Raja of Kedah did not give his desert island to any one, but sold it to the British Government for the payment of a quit-rent of 10,000 hard Spanish dollars a year, which sum is at the present day paid to his descendant. Francis Light, the agent in this transaction, became the first Governor, under the title of Superintendent, planted the colony, and carried on its administration until 1793, when he died at his post.

When Penang was first occupied, it was an entire forest throughout, without a rood of cultivation, or an inhabitant, with the exception of a family or two of migratory Malay fishermen, whose huts were on the beach near which stands now George Town. In 1800, the main called Province Wellesley after Lord Wellesley, afterwards Duke of Wellington, was annexed to the island, having been purchased from the King of Kedah for the consideration of 2,000 Spanish dollars, about £430 sterling, or little more than a penny an acre, which was probably fully as

much as it was worth to the vendor.

Penang continued to be the principal Settlement until 1837, when the seat of Government was transferred to Singapore. Its history since that date has been that of the Settlements generally. Its revenue and trade have improved to a surprising extent, but, as a subsidiary Colony, its fortunes have not presented any feature of striking interest, excepting as regards population and revenue, which have exceeded even the sanguine expectations of its founder. In a despatch to the Indian Government, he gives the following summary of the advantages to be expected from his colony, for such, in reality, it was:—"A harbour with good anchorage, secure from bad weather, and capable of containing any number of vessels; an island well watered, of excellent soil, capable of containing 50,000 people, and abounding in all necessary materials for their service and security; a port favourable to commerce, the present imports amounting to upwards of 600,000 dollars per annum; a place of refuge for merchant ships, where they may refit and be supplied with provisions, wood and water, and protected from the insults of enemies; and an emporium, centrically situated, where the merchants of all nations may conveniently meet and exchange their commodities."

Geology and Mineralogy.—The formation is granitic, covered in many places with a sharp sand or stiff clay, the produce of the decomposition of the granite. Above this again comes a coat of vegetable mould of greater or less thickness. With the exception of a plain about three miles in depth, upon which stands the town and environs, the whole of the island consists of hills with narrow valleys.

No minerals of commercial value are found in Penang.

CLIMATE.—The influence of the regular monsoons is more distinctly felt at Penang than in the most easterly part of the Straits of Malacca, owing to the wideness of the latter to the west, and vicinity to the Bay of Bengal. During the north-easterly monsoon, from November to March inclusive, clear settled weather prevails, and in the south-westerly, from April to October, the rains take place. But neither rain nor drought are of long continuance. The average heat of the year at the level of the sea is 80°, and at the height of 2,500 feet, the highest inhabited point, 70°, the annual range being about 20°. Wherever there is a free ventilation, the climate is equal in salubrity to that of any other tropical one, but in a few close valleys wanting this advantage, the malaria is deemed poisonous, and such localities, few in number, are not inhabited by Europeans.

FAUNA.—Of mammals, the principal species are monkeys, loris, wild pig, and two species of viverrida—the musang and binturong. The ornithology calls for no special remarks. The island is a happy hunting ground for the entomologist, numerous fine species of Lepidoptera frequenting the hills. The botany of Penang is perhaps better known than that of any part of the Peninsula, and, for the area involved, is particularly rich. Palms, bamboos, banana, and other fruit-trees and

nutmegs clothe the hillsides, while ferns are also plentiful. The high land permits the cultivation of many flowers and other plants which will not thrive in the flat

level lands of Singapore or Malacca.

AGRICULTURE AND PRODUCTS.—As evinced by its name, the chief product of Penang is the betel-nut, which, with all kinds of fruit and nutmegs, is the only indigenous article of trade. Nutmegs were at one time a most important branch of industry, but the blight, which simultaneously affected the whole Peninsula, destroyed it. Their cultivation has, however, now been resumed, and Penang nutmegs stand high in the market. There is no agriculture properly so called. Pepper was at one period of its early history produced to the extent of three and a half million pounds annually. But the competition of other places, notably of Netherlands India, proved fatal, and it is now only cultivated in small patches and is not classed

as an article of export trade.

TRADE.—In 1789, or within three years of its establishment, its founder reported the imports of Penang to be of the value of £130,000. In 1854, or in sixty-five years' time, they were of the value of £581,240. But in the first of these years, Penang was the only British port in the Straits of Malacca, and its imports represented, therefore, the whole British trade of the Straits. In 1854, it was competing with two other British Settlements as an emporium, the joint imports of the three Settlements in that year having amounted to £4,923,237, or to near thirty-eightfold what they were three years after the foundation of Penang. In 1885, the imports of Penang alone were valued (taking \$6 = £1) at £5,528,243, and the exports at £5,989,584, while in 1892 the figures had risen to imports £6,903,596 and exports £7,279,136. The same articles of course find entry, to a large extent, under both headings; but an aggregate trade of over fourteen millions sterling annually is of no mean importance.

POPULATION.—In 1792, or within seven years of its establishment, Penang had a population which, only 58 on our taking possession, had increased to 7,000 resident inhabitants, or, including public establishments and sojourners, 10,000. By a census taken in 1810, the population, which now included the annexed territory on the continent at the time of its occupation, nearly as destitute of inhabitants as was the island itself, amounted to 31,600. In 1827, it rose to 55,354; and in 1851, sixty-five years after its foundation, to 111,096, this last extraordinary augmentation having been, in a good measure, caused by migrations from the neighbouring Malay State of Kedah, laid waste by Siamese invasion. The census of 1881 gave 190,597 as the total, of whom only 674 were Europeans, viz., 565 males and 109 females. Of the total, 67,820 were Chinese, 84,724 Malays, and 25,049 Tamils. The Jawi Pekan, or half-breed Klings and Malays, numbered 5,462. The total

population (census of 1891) was 235,618.

GOVERNMENT.—Penang was governed by a Lieut.-Governor from 1867 (when it became a Crown Colony) till 1880. This officer held the second official rank in the Straits Settlements, and used to act for the Governor in his absence, but since 1880 the title has been changed to that of Resident Councillor, with a corresponding decrease in status. Two unofficial members of Council are chosen from Penang.

REVENUE.—The revenue for 1892 amounted to \$1,304,003. These figures include Province Wellesley, which, for administrative purposes, is regarded as a portion of the Settlement of Penang. The expenditure is included in that of the

other Settlements.

TOPOGRAPHY, &c.—Penang is almost entirely mountainous, the only plain being at the N.E. corner of the island, upon which stands George Town. A ridge, of which the highest point is 2,500 feet, and upon which stands the signal-station, Government bungalow and convalescent home, with some nine or ten private residences at lesser elevations, occupies the N.W. centre of the island, and is known as "The Hill." This, having an average temperature of 70° only, is much availed of

by those needing change of air. A very well-kept experimental nursery garden

occupies one of the valleys about half-way up.

In former years, Penang was a favourite sanitarium for Indian officers. The channel between the island and the mainland forms an almost land-locked harbour, to which access is practicable from both sides, though vessels drawing over 20 feet take the northern channel. The anchorage is good, with good holding ground in from ten to eleven fathoms of water. The spring tides rise about 9 feet, and run 3 knots an hour. At neaps, the rise is about 7 feet. There are no piers or wharves for vessels, lighters only being employed for cargo. The number of vessels which entered the port in 1887 was 2,507, of 1,452,475 tons, and employing 105,714 men. Almost all steam-vessels entering Singapore touch also at Penang, with the exception of those of the Messageries Maritimes.

Penang possesses very good hotels—in marked contrast to her southern neighbours. A commodious town-hall gives accommodation to the public library, while the esplanade, upon which the building looks, gives ample room for cricket and lawn tennis. There is no Government-house, and the only public accommodation for distinguished visitors is at the fort or at the Government bungalow on the hill, or the "convalescent bungalow," which officials are allowed to occupy in turn for a fortnight at a time. About four miles from the town is situated the botanical garden, at the inner extremity of which is the well-known waterfall. It was, about eight or nine years ago, contemplated to utilize this for the production of the electric light, and a concession to that end was actually obtained; nothing, however, came of it.

The Malay quarters and general hospital are situated about three miles from the jetty, on large airy spaces, and N. of them is the race-course, which is well

adapted for its purpose.

The distance from the town of Penang to the foot of the hill is a little over 4 miles. From the foot of the hill to the Government flag-staff, on the top of the hill, 3\frac{3}{4} miles. The base of the hill is best reached by Hack Gharry from Penang. The ascent can be made in two ways, viz.: On horseback (pony), or by chair, carried by coolies. When made by the latter, the time occupied between the foot of the hill and the summit—say the flag signal-staff—is usually about one hour.

The charge for a pony up the hill is $\$1\frac{1}{2}$, and the same for the mount down. The charge for a chair coolie up is 35 cents, and a similar charge for the journey down. From five to eight coolies are required for each chair, but, of course, this is regulated by the weight of the person to be carried. Before ascending the hill it is necessary to make arrangements with either Messrs. Hin Lee and Co., or Boon Tek and Co., who will provide the necessary ponies or coolies at the foot of the hill.

Persons from a distance renting a hill-bungalow have to take their own staff of servants with them, otherwise they may experience considerable inconvenience on their arrival. Local firms provide the necessary supplies of fresh provisions daily

through a coolie, whose charge is 35 cents for each trip up the hill.

At the Flag-signal House, beside the Government Bungalow, there is a telephone which can be used by persons residing on Penang Hill. The charge for telephoning a message of twenty words to the town of Penang is 25 cents, and 10

cents for every additional 10 words or part thereof.

Buildings, &c.—Fort Cornwallis, at the N.E. point, was erected shortly after we took possession. It is needless to say that it is now useless against modern artillery; but it would be useful in case of a native *émeute*. Except the town-hall, Government offices, and court-house, there are no public buildings. Neither the Protestant nor Catholic churches are in any way remarkable. Many of the Chinese Babas live in handsomely appointed residences.

COMMUNICATION between Penang and the mainland opposite is maintained by steam launches running to Butterworth, Prye River, Bukit Tambun and Nibong Tebal, from which latter place a launch plies to Parit Buntar, the frontier Settlement of Perak. Chinese sampans can also be obtained whenever needed. Almost all steamers bound eastward and homeward touch at Penang.

Pulo Jerejak, an island lying off the S.E. coast of Penang, contains the leper

asylum of the Settlements.

Penari.—V. 7 miles of Jugra R. on the N. bank of its Langat branch, S.W. Selangor.

Peng Kang.—A S.W. district of Singapore, bounded on the E. by the R. Jurong.

Pengarong.—V. and plantation on the coast of S. Johore, about $1\frac{1}{2}$ miles E. of Johore Hill (marked Punjerung on the Admiralty Charts).

Penggaga.—The name of a small serrated semi-circular leaf which grows as a weed, used for making sambal to curries, &c.

Penghulu.—Headman of a district, or bagan as it is called in Province Wellesley. The Penghulus are elected by the neighbours and confirmed by the Government, which gives them a badge and certificate to that effect.

Pengkalan or Pengkalen.—"A mart." Of constant occurrence in the names of places.

Pengkalan.—A V. in the Gading forest reserve, N.C. Malacca.

Pengkalan and Pengkalan Awur.—Two small V. on N. bank of the Malacca R. in Parit Melana district, C. Malacca.

Pengkalan Balak.—An important V. in the Sungei Bharu Tengah district, N.W. of Malacca. On the beach about ½ mile from the high road from Linggi to the town, the main road here strikes to the N., reaching Malacca vid Sungei Bharu. But a second-class road joining the other at Ayer Berendam cuts off much of the distance.

Pengkalan Balak.—Small V. on the high road to Machap and close to Gading about $2\frac{1}{2}$ miles N. of Durian Tunggal in C. Malacca. It is included in the tin-bearing district in the map.

Pengkalan Batu.—V. on S. side of Klang R., Selangor, nearly opposite Daman Sara.

Pengkalan Batu.—V. on the Muar side of the Kessang R. about 1 mile from the entrance.

Pengkalan Bharu.—V. on S. side of Raya R., C. Perak. Sakei tribes inhabit the ranges in the neighbourhood to the S.E., and tin mines exist at a short distance S.W.

Pengkalan Bukit.—V. on E. side of Sembrong R. about 6 miles N. of its junction with the R. Kahang, N.E. Johore.

Pengkalan Chongal.—V. S. of Chendriang R., E.C. Perak, about 9 miles N.E. of Bandar Baru.

Pengkalan Denei.—The S. side of a small reach in the Sembrong R., running E. and W., about 3 miles below its junction with the Endau, N.E. Johore.

Pengkalan Gajah.—V. on W. side of junction of Sembrong and Kahang R. with Endau R., N. Johore.

Pengkalan Halban.—V. on the Perak R. a few miles below Teluk Anson in Perak. It was the last station held by the Dutch in that State, and was deserted in 1783, but subsequently re-settled.

Pengkalan Kacha.—V. on W. bank of Perak R., C. Perak, about 8 miles E.S.E. of Blanja.

Pengkalan Kenalan.—V. on E. bank of R. Sembrong 3 miles above its abrupt turn N. in Central Johore.

Pengkalan Kijang.-V. on E. bank of Sembrong R., N.E. Johore.

Pengkalan Kompas.—On the Linggi R., Sunghei Ujong. At one time the principal port of the State, but now greatly superseded by Port Dickson.

Pengkalan Lama.—A good-sized village about 1 mile N. of Tanjong Kling, Malacca.

Pengkalan Lanjut.—Reach of the Sembrong R. running E. and W. about 3 miles below its junction with the Endau, N.E. Johore.

Pengkalan Minyak,—Small V. on the Duyong R., Malacca, and about $4\frac{1}{2}$ miles from its mouth.

Pengkalan Ombei.—V. on E. bank of Johore R. about 5½ miles above Johore Lama.

Pengkalan Pandan.—V. N. of Langat R. not far from Kajang, Selangor.

Pengkalan Pelepah.-V. on E. bank of Endau R., N. Johore.

Pengkalan Pomang.-V. on E. bank of R. Sembrong, N. Johore.

Pengkalan Tampoi.—Small V. N. of Batu Berendam district, S. Malacca, about 7 miles N. of the town.

Pengkalan Tiram .- V. at the mouth of the Kessang R., on the Muar side.

Pengkalan To'oh .- V. on E. bank of R. Madek, E. Johore.

Pengkalan Tungkis.—V. at the turn of the R. Sembrong N. in Central Johore.

Pengkalan Upai.—V. near the mouth of the Kessang R., between Malacca and Muar on the Malacca side.

Peninjan.—V. about 2 miles on W. bank of Linggin R. near its source in S.C. Johore.

Pentland Range.—Hills in E.C. Penang, the highest elevation being 1,895 feet, in Paya Terubong district.

Pepper (Piper nigrum).—In Malay lada, is extensively cultivated in the British Possessions and Protected States, and to a limited extent in other parts of the Peninsula. The demand, however, greatly exceeds the supply, and Penang and Singapore are collecting centres for the trade with Europe. Black pepper is converted into white by soaking the green berry in water, and, after the skins have become softened (about 7 or 8 days is the usual time for soaking, in running water), macerating them by hand until the two outer coverings are removed and the "silver skin," or that immediately covering the actual berry, is exposed. The price of both qualities varies considerably. In 1883 it averaged \$15 and \$21 per picul for black and white respectively. At the time of writing it is \$8.90 and \$16.50 per picul. A few Europeans have commenced the cultivation, but it is chiefly in Chinese hands. Sirih, used for chewing with betel-nut, is a variety of the pepper plant.

Perak.—[The information given hereunder is chiefly taken, by permission, from the account compiled by Mr. L. Wray, Junior, for the Indian and Colonial Exhibition, and the Hon. A. M. Skinner's "British Connection with Malaya." Other papers laid under contribution are acknowledged elsewhere. The matter has been re-arranged to suit the plan of this work.]

Position.—The State is situated between 3° 45′ and 5° 29′ N. lat., and 100° 22½′ and 101° 40′ E. long., its coast line occupying a large proportion of the

western side of the Peninsula. It is bounded on the N. by Kedah and Province Wellesley, on the E. by Patani, Kelantan, and Pahang, on the S. by Selangor, from which it is divided by the R. Bernam, and on the W. by the Straits of Malacca.

HISTORY.—According to local native tradition, the district of Bruas, on the coast of Larut, was a place where a kingdom and Raja were first established in Perak. Temong, a few miles above Kwala Kangsa, on the Perak River, was after-

wards the seat of Government.

Early in the sixteenth century, after the capture of Malacca by the Portuguese, and the flight of Sultan Mahomed to Johore, a prince of the Royal line of Malacca and Johore established himself in Perak as Sultan, and the members of the Royal Family now living claim to be descended from him. In subsequent years Perak was twice invaded by the Achinese, and Rajas and chiefs were carried in captivity to Sumatra. One of these was a Perak prince who was afterwards Sultan of Achin, and became famous under the name of Sultan Mansur Shah.

About the year 1650, the Dutch established, by virtue of a treaty with Achin, a trading station on the Perak River, and acquired a monopoly of the tin trade, which even then was of some importance. In the following year, their factory was attacked by the Malays, and the Dutch were cut off to a man. The Dutch trading station, though again established, was abandoned several times, owing to the hostility of the Perak people. The Island of Pangkor, or Dinding, was, about 1670, occupied by the Dutch, but was abandoned in 1690, and their fort, of which the ruins remain to the present day, was blown up in the last century.

The last Dutch station in Perak was on the Perak River, at Pengkalan Halban, some miles below the present town of Teluk Anson, but it was deserted in 1783, though re-settled some years afterwards. The Dutch were finally ejected by the English, under Lord Camelford and Lieutenant Macalister, in the year

1795.

Perak was subdued by the Siamese in 1818, but by a treaty between the East India Company and Siam in 1824, its independence under British protection was secured. From that time until 1874 there was little political communication between Perak and the British Settlements in the Straits of Malacca. In the latter year, internal disturbances and piracy on the coast of Perak, which injuriously affected the neighbouring Settlement of Penang and the coasting trade in the Straits of Malacca, were put an end to by the intervention of Sir Andrew Clarke,

R.E., G.C.M.G., then Governor of the Straits Settlements.

A British Resident and Assistant Resident were, at the request of the Sultan of Perak, appointed to aid in establishing and maintaining a proper administration, while their powers and other matters were determined by a treaty concluded at Pangkor on the 20th January, 1874. The first British Resident, Mr. J. W. W. Birch, was murdered by the Malays while bathing at Pasir Salak, on the Perak River, on the 2nd November, 1875. A force sent to apprehend the murderers was resisted, and it became necessary to bring troops from India and China to obtain redress and secure order in the State. All the murderers were arrested and punished; but, as it was found that many of the principal chiefs had instigated or been privy to the crime, it was found necessary to banish the Sultan (Abdullah) and three chiefs to the Seychelles, while the ex-Sultan (Ismail) was sent as a State prisoner to Johore.

Raja Muda Yusuf, son of a previous Sultan, was then created Regent of Perak, and in February, 1877, Mr. Hugh Low (now Sir Hugh Low, K.C.M.G.), was appointed Resident of Perak. After Sir Hugh Low's appointment, there was no disturbance of the peace, while the State made remarkable advancement. Mr.

F. A. SWETTENHAM, C.M.G., succeeded Sir Hugh in 1891.

Geology.—Of the geology of Perak little is at present known. There are few

exposures of rock, and no cuttings or mines in the proper sense of the term, and almost the whole country is covered with dense impenetrable forest, so that the difficulties in the way of acquiring exact information are very great. The formations that have been observed are granite, gneiss and quartzites, slates, sandstones, clays and crystalline limestone, quaternary deposits, including river gravels

and beds of clay, sands and tin-bearing drifts.

Between the crystalline limestone (which from its position and from the apparent total absence of organic remains, may be assumed to be of great age) and the quaternary deposits, there is a vast gap in time, which has sufficed in other countries for the formation of the whole secondary and tertiary series of rocks. The question naturally arises: Have these rocks or any of them been formed and subsequently removed? or has this country remained dry land for all these countless millions of years? At present no certain traces of the action of the sea have been found, and it need not be said that the sea always leaves such a wealth of organic remains, that there can be little doubt in respect of any rock which has been formed by its agency.

It is not yet clear whether the limestone is older than the beds of clays, slates, and sandstones, or the reverse. No exposure has yet been examined by a geologist where a junction of these rocks is visible. The only evidence at present is a specimen of rock obtained from such a junction, and it seems to point to the greater age of the slates; but of course it is hard to judge from a small specimen. The tinbearing drift is distributed sometimes over limestone, and at other places on clays, slates, sandstones, or granite; so that no deduction can be drawn from its position.

The main ranges of mountains are composed almost exclusively of granite. Small hills and the spurs of some of the ranges are formed of slates, sandstones, and clay. These latter formations may be from several hundred to perhaps two thousand feet in thickness, but nothing is definitely known on this point yet. The limestone forms ranges and isolated hills of from a few hundred to one thousand

feet in height.

All the palæozoic rocks have been much distorted, tilted, and altered by the upheaval of the granitic ranges, and it seems probable that heat action has indurated those portions of the limestone which yet remain scattered over the country; otherwise it is hard to conceive why small isolated masses of rock of 1,800 to 2,000 feet in thickness should have withstood the denuding action of water, while for miles around there is no trace of the formation of which they were once a part. But, presuming some such hardening action to have taken place, and remembering the vast ages which have elapsed since the formation of these rocks, and during which erosion has taken place, there is no difficulty in understanding the appearance they now present.

In Kinta, fragments of water-worn trap-rock are often met with in some of the tin-workings. They were first noticed in 1883, and specimens were forwarded to the Perak Museum at that date. A little later, when cutting a road near Papan, a section of the rock itself was exposed. The only other evidence of volcanic action yet brought to light is a small patch of trap which occurs on a spur of granite hills between Changkat Serdang and Kurau in Larut.

There are several hot springs in the State, and one visited in Upper Perak had a temperature of between 90° and 100° F., and smelt strongly of sulphuretted hydrogen, and the water having a bitter taste. This spring rises through a greenish-grey compact translucent silicious rock, which has probably been deposited by the spring's own action. Similar rock has been found at hot springs in Kinta, and does not appear to have been met with where such springs do not exist. A sample of the water not having been examined, no reliable idea can be formed of its properties; but the natives believe that its use will cure rheumatism and diseases of the skin. These springs are much frequented by elephants, rhinoceroses, and other wild animals.

One of the most important geological facts in regard to Perak which has come to light up to the present time is the evidence of a recent subsidence of the coast line to the extent of 105 feet, or more. A few years ago a boring was made to a depth of 105 feet at Matang, about 8 miles up the Larut River, and a section was made from it, which shows that within quite recent times an important alteration of level has taken place. The ground at the place is 6 feet above the present high-water mark. Down to a depth of 17 feet from the surface, the formation is marine, but below that beds of sand, clays, and gravels, with leaf-bands and pieces of wood, are met with, of the same nature as the drift near the hills, and containing a small quantity of fine tin-sand; these beds extend down to a depth of 105 feet, and probably much further. It therefore appears that there has been a subsidence of at least 105 feet since the deposition of the tin-bearing drift of Larut. An alteration of level of this extent must have made some important geographical changes in the configuration of the Straits of Malacca.

In the first 17 feet of marine deposits, there were found sixteen species of molluscs, all identical with species now inhabiting the sea of the coast. In the remainder of

the bore, no animal remains were discovered.

According to Malayan tradition, some small hills near the mouth of the Perak River, which are now some miles inland, were formerly islands. This points to the rapid formation of the sea-swamps subsequent to the depression of the land, and

to the comparatively recent date of this change of level.

MINERALOGY.—The principal product of Perak is tin, and it was the presence of this metal which first attracted Chinese to the State. Disputes with reference to the possession of mines ensued, followed by bloodshed and failure of the Malay chief to preserve his authority. An appeal was then made to the British Government for assistance, and the present system of protection established by treaty. Since that time (January, 1874) the Revenue has increased considerably; the export on tin contributing most largely to that result. The ore is found in the form of "stream tin." The output of tin has risen from a monthly average of less than 100 tons in 1874, to 16,528 tons in 1892, of which Kinta produced about 11,500 tons, the remainder being chiefly exported by Larut. The total exports in 1893 from the whole State was 14,496 tons of tin and 4,356 tons of ore, the duty on which was \$1,345,000. Almost all the tin has been raised by Chinese miners with the most primitive appliances, and although, no doubt, much metal has been and is still lost by the imperfection of their methods of workings, yet, at the same time, owing to their inexpensive system and the lowness of the wages paid to the overseers, &c., land which would not pay Europeans to work, has given Chinese a profitable return. Of the European Companies lately started, however, the French one, which works the Lahat and Kliang mines, gives promise of great success. About 9,000 tons of metallic tin were produced by this Company in the year

The tin-fields of Larut, which may be taken as typical of those of the rest of Perak, form a strip of land of from two to three miles broad along the base of a range of granite mountains. These alluvial flats are composed of layers of clays, sands, and gravels, with beds of peat, containing the stumps of trees and fallen tree-trunks, marking former swamps and levels of the plain. The tin-bearing stratum rests on a stiff grey or white clay bottom, and varies in thickness from a few inches to six or eight feet, and even more. Sometimes the stratum is divided by a layer of clay. The whole of the plains are composed of the detritus of the granite and the palæozoic slates and sandstones which form, or have formed, the ranges of hills. The tin is not evenly distributed over the plains, but is found to follow the lowest parts of the clay bed, or, in other words, the beds of the ancient rivers. The tin-sand is, as a rule, coarse-grained near the hills, and finer as it recedes from them. No lodes have as yet been discovered in the State, but specimens have been found which show that there must be large and rich veins near some of the present work-

ings; one block of tin ore, now in the Perak Museum, weighing 184 lbs., and larger ones have been found in the same mine.

The method of working the mines is to remove the earth covering the tinbearing stratum. That is what is called the "over-burden" or "stripping," and varies from three or four to thirty feet in thickness. The work is usually done by contract in the Chinese mines. The tin-bearing layer called the "wash dirt" is then raised to the surface and washed with a stream of water in long wooden coffin-shaped boxes. The tin-sand being more than twice as heavy as the clay and gravel with which it is mixed, stops in the upper part of the box, while the lighter parts are carried away by the stream of water. The tin-sand is re-washed by hand in large wooden dishes, and is then sold to the smelters. The wash contains about one to two per cent. of ore on an average. There are portions of it which contain sometimes as much as twenty-five per cent., and, on the other hand, very poor parts which hardly pay for the trouble of washing. The shifting and raising of the earth in the mines is all done by digging with large hoes called changkols, and the earth is then filled into baskets, two of which are carried by each man by means of a yoke or stick over his shoulder. The water is pumped from most of the mines by Chinese overshot water-wheels, and endless chain pumps. In the larger mines steam-engines are used in conjunction with centrifugal pumps.

The Chinese mines are worked on the truck system, all food and other necessaries being supplied by the mine owners or money advancers. Some mines are carried on which could not pay if the profits from the sale of food, &c., to the coolies did not come into the advancers' hands. The commonest arrangement is called the co-operative system, where all the coolies have a share in whatever profit is made after repaying the advancers' loans, and settling with him for the value of food and

other supplies.

The tin-sand after being re-washed is smelted in rude wind furnaces, charcoal being used as fuel. The loss of tin is rather high in the poorer class of ores when treated in these Chinese furnaces, and the slag is several times re-smelted; but it seems very problematical whether this loss is sufficient to ensure success to European smelters, when the first cost and working expenses of both systems are taken into consideration. This question is now being tested, as costly smelting works have been erected in Larut and Kinta, but it is too early to form any definite idea of what will be the result. Should the European methods be found to pay, the Chinese are too keen as men of business not to adopt them, and they will always be able to work at cheaper rates than Europeans can. The real difficulty, however, is that a large quantity of ore is required to keep this expensive machinery working, and in the purchase of that ore the European finds himself heavily handicapped.

Gold.—Upper Perak and Batang Padang produce a limited quantity of gold. It is associated with the tin-sand in the alluvial drifts, as a rule, and the tin-sand is re-washed to separate it. There are no statistics to show the amount of gold that has been raised up to the present time; some of the tin-sand gives as much as 6 ounces to the ton, and some "wash" recently examined gave 7 dwts. per ton. Some quartz leaders showed as much as 132 ounces of gold per ton of rock, but nothing has been done to prove the extent of the lode. It would be undoubtedly a calamity to the State if a rich gold-field were discovered, because it would cause an influx of the most dissolute and lawless class of Europeans, and the effect would be, as it has always been in other countries, most demoralizing to the native population.

Lead.—Galena of very good quality has been found and worked in Patani, and should the territory which is claimed by Perak be restored, a large amount of lead may be confidently expected to be raised. Carbonate and phosphate of lead are also found in considerable quantities. The galena is said to carry a paying per-

centage of silver.

IRON.-Ores of this metal are to be had in many parts of the State, but would

not pay to work, as there is no coal, notwithstanding what had been stated to the contrary by writers of books of travels.

Precious Stones.—No diamonds, rubies, sapphires, or other precious stones

have yet been discovered in Perak.

Marble.—There is an abundance of fine marble scattered over the State, some of it very handsomely veined with grey, red, and black, some again is nearly black, veined with white, while other kinds are mottled with different shades of greys and olive-greens, and in Kinta there is some pure white marble. In many places the limestone mountains are near navigable streams, and there would be no difficulty in rafting down any quantity of the stone to the coast for shipment, if a market for it could be obtained. In Penang and Singapore, the houses of the wealthier classes are largely decorated with marble, which is now all imported from China. At present the only use which is made of the inexhaustible supply of this handsome and valuable material, is the conversion of a small quantity of it into lime at Gunong Pondok. The lime is of good quality, but, like all lime made from marble, is in the form of powder, and is therefore hard to burn, and inconvenient to transport, though not more so than the shell lime, which is generally used in the Straits Settlements for building purposes. When quarries are opened, as they are sure to be sooner or later, it will be possible, with a liberal use of this beautiful and lasting material, to vastly improve at moderate cost, not only in Perak, but in Penang and Singapore, the present class of unattractive buildings.

GRANITE.—The granitic ranges of which so large a portion of Perak consists afford an unlimited store of this useful stone. The granite that is worked near Thaipeng and at Bukit Gantang is of a grey colour, and rather large-grained. It is quarried for road-making, Blake's crusher being used to reduce it; blocks are also cut for building purposes, culverts, and land-marks. The work is principally carried on by convicts, a quarry having been opened near the gaol at Thaipeng, with a tramway running into the gaol-yard, where the rough blocks of stone are dressed.

China Clay.—In most of the tin-fields of Perak the stratum underlying the "wash," or tin-bearing deposit, is pure white China clay or kaolin. There must be millions of tons of this material in Perak, but it is doubtful if it could be worked with profit, on account of the cost of transport to Europe. If Chinese potters could be induced to start works here, a large trade might be carried on with such fine material to work upon, and white fire-bricks could be made of the refuse. Bricks are made from the same stuff in Cornwall, in the China clay-works, and sell for a high price, being used both as fire and as ornamental building bricks.

BRICK EARTH.—Plenty of good brick clay is scattered over the country, and the material for making fire-bricks is also to be had in abundance, as mentioned above. Very fair bricks are now made in Perak, and sell for about \$7 per 1,000; but they are small, and, like everything of Chinese manufacture, are susceptible of great improvement; and when the clay is weathered, well mixed, and moulded, and the bricks are equally burned, they will be of excellent quality. Tiles have not yet

been made here, but there is no reason why they should not be.

Pottery.—The manufacture of pottery is confined to the Malays, and is only carried on in a small way in two or three districts. It is mostly unglazed, or only glazed on the lower part. Some of the shapes are very graceful. The patterns are pressed into the work by means of stamps, and tools are used to produce dots and lines. Raised work is also employed in decorating the ware, being put on in strips after the vessels are formed. Stamped raised work does not seem to be employed.

FAUNA.—This is the same as that of the rest of the Peninsula, the buffalo, elephant, rhinoceros, and tiger being found in the jungle districts. In entomology the State is particularly rich. The botanical products of commercial value are noticed under the head of Products and Trade. In ophiology no species unknown in the neighbouring States have been observed, but there is doubtless room in all departments for fresh discoveries.

Agriculture.—At the present time a comparatively small area is under agricultural treatment. This is accounted for by the thinness of the population (15 per square mile) and the ease with which the natives can get the necessaries of life, either by working occasionally in the mines, or cultivating a small patch of garden and rice land. The cost of living to a Malay is only about three to four pence a day; and wages, which are governed in a great measure by the proximity to the chief mining districts, range from one to two shillings per diem. When wages are reduced, as they will be by a more extensive immigration of Indian and Chinese labourers, the cultivation of rice, sugar, pepper, tea, coffee, nutmegs, cocoa-nuts, ginger, cacao, &c., will no doubt be largely carried on; but now, when it is possible to earn in a day enough money to procure six days' food, it is not to be supposed that the Malays, who are naturally indolent to a degree, will turn their attention to the growing of produce, except for the supply of their own wants.

PRODUCTS AND TRADE.—Rice.—Rice is at present the staple agricultural product, and is planted in two ways; it is called either hill, or wet, paddy, according to its situation. The growing of hill paddy is discouraged by the Government, because it leads to the destruction of large quantities of valuable timber, and spoils the land for any other purpose for seven or more years afterwards. Only one crop is taken from the land, and then it is allowed to grow up in jungle again. Wet paddy is grown on the plains, and by means of artificial irrigation the fields are kept flooded with water while the rice is growing. The ground is prepared by cutting the weeds, &c., on it, letting them dry in the sun, and then burning them off; the ground is next turned by rude wooden ploughs drawn by buffaloes, and the young rice plants (which have been raised in a nursery) are planted out in the fields by women and

children.

Manure is quite unknown in rice culture in Perak, and after several years' cultivation, fields are sometimes, but not necessarily, allowed to lie fallow for several

seasons before they are planted up again.

Indian Corn.—This grain is grown in considerable quantities, but it does not flourish to the same extent as in colder climates. It is rarely that more than two cobs are borne by one plant, and very often only one is produced. The corn is mostly eaten by Malays before it is ripe, the whole cob being boiled for that purpose. A few years ago some superior varieties of maize were introduced from America, but they have not done any better than those commonly grown here.

ROOT CROPS AND VEGETABLES.—The former comprise sweet potatoes, yams, caladium, bulbs, cassava, and several others. They are only produced in sufficient quantity to supply the local demands. Potatoes will not grow, except on the mountains, but the market is well supplied by those imported from India and Australia. Other vegetables, such as onions, cabbage, lettuce, beans, egg-fruit, cucumbers, vegetable-marrows, pumpkins, &c., grow freely, but cabbages, radishes, carrots, French beans, tomatoes, asparagus, and other European vegetables, can only be raised with care from imported seeds, and usually at a considerable elevation.

The natives eat many leaves and plants that they find in the jungle, but Europeans, with the prejudices which they have to unknown and unfamiliar dishes, rarely ever taste these vegetables, and nothing has been done in the way of trying to improve by cultivation the most promising and delicate-flavoured of the plants; but, judging from what has been accomplished in Europe with many of our garden plants, there seems to be a fair field for investigation in this line, and a want which

is now felt might be satisfied.

FRUITS.—Owing to the highly-coloured descriptions that travellers have given, tropical fruits are supposed by the great majority of English people to be far finer, richer and better in every way than those grown in colder climates; but such is not the case; and though Malayan fruits exceed English fruits in size, and often in strength of flavour and odour, a strawberry, pear, or peach is, in the judgment of Europeans, quite unequalled by anything grown in Perak. The two Malayan fruits

that stand out prominently are the mangosteen and durian. The latter has often been described, but its smell and taste are not to be put into words. Many people can never bring themselves to taste it, but, when once this repugnance, which is caused by the overpoweringly offensive odour, is overcome, a liking for it is almost sure to follow. Among Easterns, of all nationalities, an insatiable craving for it seems to exist, and during the season those who own many trees live almost entirely upon the sale of durians. The owners build themselves little houses perched on high poles near the trees, and arrange strings with wooden clappers and other noiseproducing instruments attached to them, to drive away the animals which, undaunted by the thorny covering of the fruit, would otherwise strip the trees. Bears and squirrels are the chief thieves, but Malays say that tigers are also very fond of the fruit. Whether this is a fact or not remains to be proved; but certain it is that elephants, cattle, goats, horses, dogs, and monkeys eat them whenever they get a chance. The tiger is more probably attracted by the men and animals who seek the fruit.

Mangoes, langsats, bachangs, tampunei, rambei, shaddocks, rambutans, pulasan, papaya, guavas, pine-apples, dukus, tampuei, bananas and plantains, water-melons, limes, oranges, jack-fruit, custard apples, sweet and sour sops, are the principal remaining kinds of fruits that may be mentioned. The oranges are in most cases inferior to those which are to be had in England, and the mangoes are not to be

compared with those of Bombay, Siam, or Manila.

One great want is a fruit that will cook well, and make tarts and preserves. The pine, sour-sop, banana, rambutan, the guava and the mango are the only ones that are available for this purpose, and Europeans have to fall back on tinned and

bottled English fruits.

BARK USED FOR TANNING.—Considerable quantities of bark under the name of kulit-kayu, i.e., bark, are exported from the mangrove swamps that line the seacoast of Perak. The trees which produce it are species of the genus Rhizophora. The mangrove forests which cover these sea-swamps are called bakau by the Malays, and the bark kulit bakau. There are many other barks which are used for the same purposes, but they are not exported at present. Of these samak-pulat, klat, paga-anak, kulim, sabanoh, and samak-raia are said to be the best for tanning.

RATTANS.—Canes are collected and exported to a moderate extent—over 7,000

dollars' worth are stated to have been exported in 1892. They grow wild, and no attempt has ever, as far as is known, been made to cultivate them, though there seems to be no reason why they should not be planted and give good returns.

Rotan samambu (Calamus scipionum) is known as the Malacca cane, and is exported in considerable quantity for the purpose of being made into walking-sticks. It is used locally for the handles of the baskets used in tin-mines, and the frames of rattan chairs. Many other kinds of rotan are used as walking-sticks; among others rotan manch and rotan dudok may be mentioned. For other purposes, such as baskets, mat and chair-making, house-building, and the thousand and one uses that the natives put this plant to, rotan sega, rotan ayer, rotan batu, rotan sindek, rotan dahanan, rotan tiga sagi, and many others are used.

Rotan sega, before the introduction of matches, was in great request from the comparative ease with which fire may be obtained from a strip of it by rapid friction round a piece of dry wood. The dye "dragon's blood" is obtained from the fruit of Calamus draco, called by the natives rotan jernang, and is used by them in staining articles, such as the rushes of a bright red colour used in mat-making.

Bamboo.—This gigantic grass grows luxuriantly throughout the State. There are about twelve varieties cultivated, or rather planted by the Malays, about an equal number growing wild in the forests. Its uses, like those of the rattan, are so numerous that it is impossible to enumerate them all. They range from housebuilding materials to the principal ingredient in a bamboo curry, and the young tender shoots thus treated make an excellent dish.

COTTON.—The tree-cotton (Gossypium arboreum) is grown to a limited extent in Perak, but nothing like systematic cultivation has ever yet been attempted here. Silk-cotton, the produce of Eriodendron anfractuosum, is also grown in Malaya, and is largely used for stuffing mattresses, pillows, &c. A species of the genus Bombax, also yielding silk-cotton, grows wild in the jungles, and attains vast dimensions. If produced in sufficient quantity, silk-cotton seems well adapted to form an ingredient in the better-class paper, and the seeds, which contain a very large percentage of sweet pleasant-tasted oil, might be turned to some account.

SUGAR.—Sugar is an important item of export, but recent statistics are wanting. Its cultivation has not been extended to the remainder of the State yet, but there is an almost unlimited quantity of land suitable for its growth on the mangrove swamps bordering the sea, and on the slightly undulating lands

adjoining.

The low price that sugar now commands in the European markets has injuriously affected the production here, and has led to the closing of some estates. The sugar is produced almost entirely by the Chinese, who, in some cases, employ European engineers in the works, but a European Company has made successful efforts to open a large estate on the Gula River. Palm-sugar is made in small quantities from the Arenga saccharifera, the cocoa-nut and other palms.

COFFEE.—In the gardens of the Malays, native coffee of very fair quality is produced, and on the experimental hill-gardens, opened by the Government of Perak and private enterprise, the cultivation of both Arabian and Liberian coffee

seems to be an assured success.

The greatest difficulty hitherto has been the high wages, and an insufficient supply of suitable labour, but the Government has recently (under the new Indian Immigration Enactment) brought over some coolies from India under agreement to work at a much lower rate of wages, and the planting industry now offers investors a reasonable chance of fair profits. It may be suggestive to importers of coffee in Europe to mention, that while the berry is not always used by the Malays, a sort of tea made from the roasted leaves of the bush is often preferred by them for their own drinking.

Tea.—This has only been grown experimentally as yet. There are about 50 acres of Assam Hybrid on the Government hill-gardens, at elevations varying from 1,600 to 3,000 feet, and this is pronounced by competent authorities to be doing as well as any in Ceylon. The tea made from the leaves is also of good quality, but none has yet been cured or sent to market to try its value. There is fine land in the low country suited to tea cultivation, and what has been planted on the plains

has grown most luxuriantly.

COCOA AND BETEL-NUTS.—Cocoa-nuts were exported from the Krian district to the value of \$50,000 in 1892, but in the other districts the production was no more than enough to supply the local demands. Many young plantations will soon, however, be coming into bearing in Larut and other places. Betel-nuts (Areca catechu) are not produced in sufficient quantity to supply the wants of the State, but can be grown to any extent.

Indigo is cultivated and manufactured by the Chinese in Krian, and there is a large and increasing export. It is used locally in dyeing the dark blue cloth

that is almost universally worn by the labouring classes of Chinese.

Tobacco, Gambier and Pepper.—All of these products are grown to a small extent by the natives and in sufficient quantities to show the suitability of the soil and climate to their cultivation.

Nutmegs, cardamoms, patchouli, citronella, khus-khus, and lemon grass flourish wherever planted. Several kinds of nutmegs and cardamoms grow wild in

the jungle and are collected by the natives for sale.

INCENSE, CAMPHOR AND DAMMAR.—Incense-trees are plentiful in some parts of the jungle. Large nurseries have been made of these trees, and many thousands

of plants have been used for planting out on the waste lands of Larut. The camphor-tree is also said still to grow in some parts of Perak. Formerly it was abundant, but it has been almost exterminated by the collectors in the more accessible parts of the country. Gharu, or eagle wood, is also occasionally met with. Resin, known here and in the market as dammar, or damer, is produced by many kinds of trees. The principal are dammar mata kuching, dammar meranti, dammar laut, dammar degou, dammar batu. The stone-resin is found in the beds of tidal rivers

India-Rubber.—There are to be found growing in the forests of the State, besides the well-known *Ficus elastica*, a tree which attains immense dimensions, several creepers belonging to or nearly allied to the genus *Willoughbeia*, which produce india-rubber of excellent quality. The collection of the gum has, however, been prohibited, as it was feared that the trees and plants would be exterminated if the ruthless destruction so long practised by Malays was allowed to continue. The South American caoutchouc-producing trees, *Hevea Braziliensis* and *Manihot Glazovii*, have been introduced into Perak, and have grown into large trees of 40 to 50 feet in height, although as yet comparatively young.

in height, although as yet comparatively young.

Animal Products.—These are not important at the present time, the natives having little or no idea of raising or improving stock. The cattle are as a consequence few in number, of inferior quality, and for the most part imported. Buffalo hides are exported to the value of about \$3,000 annually. A small quantity

of elephants' tusks and rhinoceros' horns are also exported.

Fisheries.—Malayan waters, both salt and fresh, contain many excellent fish, such, for instance, as the red and grey mullet, the pomfret, blânak, pàsir, slanqin, bidah, těngah, and klâh. A considerable trade is done in salt fish, about 50,000 dollars' worth being exported annually. Dried prawns and blachang (an odoriferous condiment made of decomposed prawns) are also exported to a large extent annually. Sharks' fins, a delicacy much relished by the Chinese, are procured in a quantity that shows how unsafe the seas of this neighbourhood are. 7,115 dollars' worth of fish-maws, which are used by the Chinese in the manufacture of soup, were exported in 1884, and later returns show about the same figures.

Birds' Nests.—In the caves of the limestone hills, the swallow (Collocalia linchi, Hors.) builds its much-sought-after edible nests. Up to the present time, however, these nests have not been collected in the State, except by the Sakeis in Upper Perak, to a small extent. This neglect seems to be attributable to the apathetic indolence of the Malays, and possibly to the fact that the nests are but

few in number, and of inferior quality.

Bats' Guano (Tahi Klawer).—To the same caves, enormous hosts of bats resort in the daytime to sleep, and, as a consequence, the floors of these caverns are lined many feet thick with their excrement. As yet these stores of manure have been almost untouched; but the guano is not rich in nutritive properties.

BEES'-WAY, HONEY AND LAC, OR LAK, are collected in small quantities. Bees have not yet been domesticated in Perak, nor has any attempt been made to cultivate the trees on which the lac insect is found in the jungle, though both

subjects seem well worthy of attention.

POPULATION.—This consists of Malays, Chinese, Tamils, other Indians, Europeans, and Aborigines. By the census of 1891 the population is shown to be as under, 156,408 being males, and 57,846 females:—

Malays		***	***	***	96,719
Chinese		***	***	***	94,345
	her Indians		***	***	15,269
Aborigines	***	***	***	***	5,779
	other Malay race	8	***	***	1,483
Europeans an	d Eurasians		***	***	659

214,254

The Aborigines, of whose numbers no estimate is possible, are either Sakeis or Semangs (q. v.). But we may quote a few paragraphs from his interesting compilation. The Sakeis, he says, are short, but the men are strongly built, and in colouring they are rather lighter than the Malay. When not artificially coloured a yellowish-brown, their hair is black, rather long and wavy, and stands out from the head. They can hardly be said to wear any clothes, a strip of bark cloth and a few rude ornaments being all that they consider necessary. The blow-pipe, or sumpitan, with its small poisoned darts and rude bamboo-pointed spears, constitute their weapons. They have considerable taste in decorating these and the few simple utensils that suffice for their wants. Even bamboos in which they cook rice, and which are only used once, are sometimes elaborately decorated with incised patterns. Nearly every tribe (and they are broken up into many) has a dialect of its own, showing that intertribal communication is rare.

In some parts of Perak the general appearance of the Sakeis is not much unlike that of the Malays of the interior, for the latter people had been, up to the time of the arrival of the English in Perak, in the habit of making raids on these aborigines, and the captives taken became the slaves, and in the case of females the concubines, of their Malay captors. This custom, carried on for a long series of years, introduced a large admixture of Sakei blood into the Malay population. In consequence of the ill-treatment which these people have suffered from the Malays, they are very shy, and avoid strangers with the instinct of wild animals. Malays are Mahommedans, and it was not considered a crime to kill an unbelieving Sakei, any more than it was to kill a dog or other animal; this state of things

existed down to about the year 1874 or 1875.

The Semangs inhabit the country to the west of the Perak River and are smaller than the Sakeis, but are rather darker and more negroid in appearance, with close curly black hair. They use bows and arrows in addition to the blow-pipe. They are said to have no permanent abodes, and not to plant any rice or other grain, but to lead a purely nomadic life in the jungles, living on what they can kill with their weapons, and on wild fruits, leaves and roots. They chew the green leaves of tobacco, but prefer cured tobacco when they can get it. Neither Sakeis nor Semangs have any idea of a Divinity, but they have a strong belief in good and evil spirits.

GOVERNMENT.—The Government of the State is carried on by a Council of

State composed (in 1892) as follows:-

His Highness the Sultan (Raja Idris, K.C.M.G.), the British Resident, the Secretary to Government, the Orang Kaya Datu Temenggong (Hassan), the Orang Kaya Datu Raja Mahkota, the Panglima Kinta (Yusuf), Toh Muda (Wahab), and three leading Chinese (Capitans Cheng Ah Kwee, Chin Ah Yam and Khoo Boo Ann); and a large staff of European and Malay officials immediately subordinate to the British Resident. The Resident is appointed by Her Majesty's Principal Secretary of State for the Colonies, and acts under the instructions of the Governor of the Straits Settlements. It may be observed that the various departments—Judicial, Police, Land, &c., are directly modelled upon those of the Straits Settlements, whose laws and ordinances have, to a very large degree, been adopted, so that a more or less complete assimilation has been arrived at.

The military force of Perak is nearly 1,000 strong; about eight-tenths of the rank and file are natives of Northern India, and the rest are Malays. The officers are British, holding, or who have held, commissions in Her Majesty's army. The force is thoroughly armed and drilled, and possesses a number of Field and Machine guns, in the use of which the Artillery section is thoroughly efficient. The Thaipeng detachment furnishes a fire brigade. The State has five steam

launches, available for police, surveying, and general service.

REVENUE.—The revenue and expenditure for various years is as follows:—

				Revenue.		Expenditure.
1879	•••	•••		\$388,372	•••	\$ 369,707
1881	•••	•••	•••	692,861		652,938
1882	•••	•••	•••	905,385	•••	918,914
1883	•••	•••	•••	1,474,330	•••	1,350,610
1884	•••	•••	•••	1,532,497	•••	1,481,470
1885	•••	•••	•••	1,650,334	•••	1,600,115
1886	•••	•••	•••	1,688,276	•••	1,465,325
1887	•••	•••	•••	1,827,476	•••	1,550,489
1888	•••		•••	2,016,240	•••	1,709,260
1889	•••	•••	•••	2,776,583	•••	2,090,116
1890	•••	•••	•••	2,504,116	•••	2,447,929
1891		•••	•••	2,324,981	•••	3,146,139
1892	•••	•••	•••	2,689,565	•••	2,049,490

TOPOGRAPHY (GENERAL).—The coast line is about 90 miles in extent, the greatest length of the State in a north and south direction is 120 miles, and the breadth, in an east and west direction, 90 miles. It is estimated to contain 7,959 square miles, or 5,087,597 acres. That is to say, it is about the size of Wales and Monmouth joined together. It has been estimated that there are on the mountain ranges of the State 1,451,770 acres above 1,000 feet elevation available for cinchona, coffee, tea, &c., and that between 1,000 feet and the plains there are 588,422 acres suited to lower cultivations, such as Liberian coffee, tea, cacao, cardamoms, &c.

RIVERS.—The State is well watered by numerous streams and rivers, of which the River Perak is the most important. This river runs nearly south until it turns sharply to the westward and falls into the Straits of Malacca. It is navigable for about 40 miles from its mouth by steamers of 300 to 400 tons burden, and for another 125 miles by cargo boats. The upper part of the river is rocky and abounds in rapids, and consequently, except for small boats and rafts, is impracticable.

The Kinta, Batang Padang, and the Plus are the three large tributaries of the Perak River, and all are navigable by cargo boats. These rivers rise in the main mountain range and flow west and south until they fall into the parent stream

Of the other rivers, the Bernam, Dinding, Bruas, Larut, Sapetang, Kurau and Krian may be mentioned. The Bernam River is two miles wide at the mouth, and is navigable for steamers to a greater distance (about 100 miles) than any other river in the Peninsula. Matang, on the Larut River, was, until the opening of the railway to Port Weld on the Sapetang River, the chief port of the District of Larut.

MOUNTAINS.—The mountain ranges, which occupy a great portion of the State, reach in some places altitudes of 7,000 and 8,000 feet, and run mainly in a north-west and south-easterly direction. They form two principal chains, besides a few detached groups. The larger of these is a portion of the backbone range of the Peninsula, and forms the eastern boundary of this State. The lesser (of which the highest points are Gunong Bubu in the south (5,450) and Gunong Inas in the north) rises in the southern portion of Larut and runs in a N.E. direction through the State to its northern boundary. Between these two ranges lie the valleys of the Perak and Kinta Rivers, themselves divided by a still smaller chain of hills, the highest point of which is Gunong Meru, about 3,500 feet.

CLIMATE.—The climate of Perak is good, the temperature in the low country averaging from 60° Fah. in the night to 90° Fah. in the heat of the day. The average mean is about 70° Fah. in the night, and 87° Fah. in the day. Nights are uniformly cool. At 3,000 feet, the average is 65° Fah. at night to 73° Fah. in

the day. The rainfall varies considerably, Thaipeng, the capital, registering occasionally as much as 200 inches, but the average elsewhere is about 90 inches. There is no true rainy season, but the wettest months are September, October, November, and December, and the driest are February, March, June, and July.

The seat of Government is at Kwala Kangsa, situated on the right bank of the Perak River, about due east from the port of Teluk Kertang, from which a good road leads to it, crossing the western range of mountains at Bukit Berapit. The distance is 23 miles.

The residence of H.H. the Sultan is at Syong on the opposite bank of the river, which is about 200 yards in width, with groves of cocoa-nuts and fruit-trees indicating the villages of the Malay population. The surrounding scenery is very beautiful.

The British Residency is at Kwala Kangsa, where is also a rising village; and as extensive tin deposits are known to exist in the neighbourhood, and are worked by 2,000 Chinese at Salak, it is probable that the very central position of Kwala Kangsa will cause it soon to become a place of some commercial importance.

The most important provinces of Perak are Larut and Kinta, which have tin deposits of great richness. Larut is most advantageously situated in respect of commercial intercourse with the British port of Penang, which is about 60 miles off. It is under the charge of the Assistant Resident, and its chief town, Thaipeng, is the head-quarters of the Military Police, and of the chief departments of the State. British Officers (Magistrates and Collectors) and detachments of Police are also stationed in other important districts.

1. Teluk Anson, the chief town on the Perak River, and centre of the inland tin trade.

2. Bernam, the southernmost district of the State, in the interior of which land has been taken up by English coffee planters.

3. Kinta, the chief inland tin-mining districts.

4. Krian, an agricultural district adjoining Province Wellesley, the seat of extensive sugar cultivation.

5. Selama, seventy miles up the Krian River, a flourishing mining settlement. Public Buildings, Roads, Railways, Telegraphs, &c.—Public Buildings.—A large number of important public buildings have been constructed in the various district head-quarters, but the principal buildings are erected at Thaipeng, the capital of the State. Of these the following may be mentioned—the prison (where permanent wards on the separate system are now completed), hospitals with accommodation for 1,000 patients, barracks for the Perak Sikhs, markets, police stations, court-house, treasury, post, and other Government offices. A permanent library and museum has been built. Waterworks supply the town of Thaipeng, the gaol, hospitals, and other buildings with excellent water in ample quantity.

Roads.—A great deal of road construction and river clearing has been done in the last ten years. Excellent metalled carriage-roads connect Teluk Kertang, Matang, Thaipeng, Kamunting, and Kwala Kangsa, while from this last centre 50 miles of bridle-road have been completed towards the northern limit of the State; a road 150 miles in length joins Kwala Kangsa with the eastern boundary at Ulu Bernam, while a branch one of 24 miles runs from Tapa to Teluk Anson. These roads are all graded to nothing steeper than 1 in 20, and will be converted into cart-roads as the traffic justifies the increased expenditure. An unmetalled cart-road runs from Simpang on the Matang-Thaipeng road across the railway to Krian and the western boundary of the State at Parit Buntar; the Krian District also contains many miles of similar roads. Other short sections of cart and bridle-roads have been constructed in many parts of the State. In all there are 700 miles of metalled roads.

RAILWAYS.—In 1881, a trial cutting was made beetween Port Weld (then known as Sapetang) and Thaipeng, the chief town of Larut, a distance of eight miles. The jungle was felled, and the line commenced the following year. Owing to the unstable character of the ground, which consists of sea and fresh-water swamps, with a little solid ground at the Upper or Thaipeng end, vast quantities of earth have had to be taken down from Thaipeng to make the embankment, and the line has proved much more difficult and costly than was at first anticipated. The line, which is of the metre gauge, was opened for traffic on the first of June, 1885, and the Port is now within half-an-hour's journey of the principal town of the State. It will remain to be seen whether rice and other provisions can be profitably carried by rail to, say, the tin-mining districts of Kinta, and the tin brought down to the coast, at a cheaper rate than is now paid. In those districts where there is no river transport, this might be possible, but in those more favourably situated it seems doubtful. This, of course, only applies to the financial side of the question; but what would be considered a failure, if the line belonged to a private company, might be a success as a State undertaking, for many places which would not pay under present conditions, could, with cheap transport, be profitably worked for tin, and the increased yield of metal might produce, directly or indirectly, sufficient revenue to more than justify the outlay for the construction of a line. The line was extended to Kamunting, a mining town, in 1890, and thence to Ulu Sa'petang.

During 1893 two new lines have been completed and opened for traffic, viz., from Teluk Anson to Tapah and from Batu Gajah to Ipoh. These are to form portions of the trunk line from Thaipeng (or practically Port Weld) to Teluk Anson, thus traversing the State from N. to S. It is as yet too early to predict their

financial success, but of that little doubt exists.

Telegraphs.—Until the year 1884, the only telegraph lines in existence in the State were those running between Matang, Thaipeng and Kwala Kangsa, a total distance of twenty-six miles. These lines, which met at a place called Simpang, were in a most defective state as regards insulation and resistance, and

from their peculiar arrangement were most difficult to work.

In August of 1884 a new line was opened to Krian, following the main road. This line has iron tubular posts, and white double invert insulators and No. 6 galvanized iron wire. The Matang and Kwala Kangsa branches have also been divided so as to form two separate lines. A line has been laid to Port Weld from Thaipeng, following the railway, and the line to Krian has been extended to Kwala Prai in Province Wellesley and thence to Penang by cable, so that Perak is now in direct communication with the Eastern Extension Submarine System. Another extension of 45 miles was completed in 1885, from Kwala Kangsa to Kinta; and further sections—Tapa to lower Perak, 24 miles, and Kinta to Ulu Bernam, 100 miles, have also been completed. The total length of wires is now about 500 miles.

Communication with other Ports.—Daily by small steamers between Penang and Larut, and every few days to all the ports N. of Bernam R. A steamer runs to Teluk Anson from Penang every four days. There is also frequent communication by steamers running between Penang and Singapore.

Peral.—Small V. on W. bank of Sembrong R., just below its junction with the Endau, N.E. Johore.

Perasap.—Incense pots used by the Malays in offering thanks to God for safe journeys, &c.

Perhentian Manggis.—V. in C. Johol, Negri Sembilan.

Permatang.—The name applied to the ranges of low sand-hills, which, as in Province Wellesley, mark the ancient sea boundaries, and are found at numerous points inland. They are bare of herbage, the cocoa-nut alone thriving amidst the sand and shells of which they are composed.

Permatang Bertam.—V. in N. division of Province Wellesley, 9 miles 6 furlongs from Butterworth, and 4½ miles from the coast; said to derive its name from a tree which furnishes the material for plaiting a sort of mat. [See Bertam.] The site of a Police station formerly, which has now been moved 1½ miles to the N.

Permatang Bindahari.—The most N. settlement in Province Wellesley 12 miles 4 furlongs from Butterworth. The village is an important one and lies on the Muda River $2\frac{1}{2}$ miles from its mouth, opposite the Kedah town of Kota, which is of some little importance as a timber mart. Permatang Bindahari is the site of our most N. Police station in the Province. A good deal of smuggled opium finds its way across the Muda in this neighbourhood, while as gambling is licensed at Kota, large numbers of natives resort thither to play without molestation. There used to be considerable saw-sheds here, a large quantity of timber being brought down the river.

Permatang Binjai.—V. in N. district of Province Wellesley, about 8 miles from Butterworth. There are large rice-fields in the neighbourhood and rice-cleaning mills are run by Chinese.

Permatang Damar Laut.-V. in S.E. Penang, S. of Bayan Lepas V.

Permatang Maklom.—An important V. 4 miles 2 furlongs from Butterworth in N. district of Province Wellesley. Roads run from this—N. to Penaga, E. to Aur Gading, and W. to the main road along the shore. It is $1\frac{1}{2}$ miles from the beach.

Permatang Mangis.—V. in N. division of Province Wellesley, about 9 miles from Butterworth and 3 miles from the coast. A direct road formerly existed from this, striking that from Permatang Bertam about a mile N. The road continues through small Malay holdings on both sides for rather more than a mile further, and then enters the dense but low brushwood jungle which surrounds and partly chokes the lagoons. The latter consist of a chain of ponds or small lakes of fresh-water extending nearly across the entire northern part of the Province in a line parallel with the Muda River, which lies about a mile to the north. In fact it is a backwater of that river, and may formerly have been an independent channel. The average depth is six to eight feet during the dry season, and they are said by the natives to be navigable at all times, but boats are very rarely used, as the navigation is much impeded by jungle, while the natural productions are few and of little or no value.

A platform bridge crosses a narrow but deep channel which joins the eastern and western lagoons, and the road then turns to the right and runs along the northern edge of the eastern lagoons, where there is a ridge of whitish clay not unlike the bank of a river. About half a mile beyond the bridge to the left of the road among the paddy-fields, there is an artificial mound of cockle-shells, twenty feet high, supposed to be a sepulchral mound or barrow of the Semangs, a negro race formerly occupants of the country. A mound of the same description has been opened at Goa Guppa on the Muda River, and human remains have been found in it. The road now runs nearly west along a ridge or narrow plain of stiff whitish clay to the north of the Leher Ikan Mati Lagoons, passing a bend of the Muda River at Tikum Batu, at a distance of one mile and a quarter to the remains of a former establishment of convicts employed in making the roads.

This road is much frequented by Malays from Penang and the S. portions of the Province proceeding to Muda to purchase cattle and buffaloes from Patani.

Permatang Pasir.-V. in W. Penang, in Sungei Rusa district.

Permatang Pasir.—V. 7 miles up the Linggi R., the landing-place for steam launches from Malacca, &c. It has a Customs and Police station. A very good road, 22 miles in length, goes from here to Rassa.

Permatang Pauh.—V. 3 miles 33 furlougs from Butterworth, Province

Wellesley, and about half a mile from the Serai ferry. It is the most populous place in the district lying between the Prai and the Juru, and extends more than a quarter of a mile along the road running north and south from Lalang ferry to Bukit Tengah. This was formerly the only road from Butterworth towards the southern district, but the new road from Kwala Prai direct to Bukit Tengah now absorbs the traffic. There is a Police station here, near the spot where the eastern road crosses. The country hereabout is well cultivated, many Chinese as well as Malays being engaged in rice-planting, while the permatangs are covered with cocoa-nut and other fruit-trees.

Permatang Sina.—V. on the Junjong R., $10\frac{1}{2}$ miles from Butterworth, Province Wellesley, reached by a road branching off the high road at Junjong Mati.

Permatang Sintoh.—V. in N. division of Province Wellesley about eight miles from Butterworth and two from the coast. This is a thriving place and was formerly the site of a police station.

Pernoh.—A small V. near W. bank of the Umbei R., in Malacca, about $8\frac{1}{2}$ miles from Malacca-town.

Perompak.—Pirate.

Peselangan.—V. in C. Johore, not far from the supposed source of the Kahang R., and at the source of the R. Linggin a branch of the Johore R.

Pheasants abound in the jungle, including the beautiful Argus pheasant (burong kuang). The golden, silver, Amherst, and other Chinese varieties are, however, unknown.

Phi.—V. on E. side of Titi Wangsa, S. Kedah.

Phlox, Drummondii and other varieties of Phlox flourish well from seeds brought from Europe.

Pichit.—To knead the joints and body, much as in the process of shampooing. This treatment is constantly resorted to to cure rheumatism and other complaints, and some of the native women are very dexterous in applying it.

Pickles (Jerok).—Green mangoes only are pickled (as we understand the word) by the Malays.

Pidgin English.—Not used in the Straits except by a few Cantonese carpenters, &c. Those curious on the subject will find an exhaustive article on its peculiarities in Vol. II, J. S. B. R. A. S., p. 168.

Pigeons (merpati) with the green punei and large varieties (pergam) abound in the jungle. They are excellent eating and afford good sport.

Pigeon Orchid.—A pretty orchid with a white flower remotely resembling a pigeon in shape. It is singular from the fact that all plants in about the same latitude flower on the same day. Plentiful in the Settlements and Peninsula.

Pigoh.—A district about 18 miles from Malacca-town on the high road to Tabu.

Pila.—A V. on the N. border of Rembau, inhabited by a poorer class of people. Cattle and poultry are plentiful and cheap.

Pilah.—Kwafa and village at the S. border of Jumpol, Negri Sembilan, on a small stream drawn in map S. A. S. as an affluent of the Muar. Padi is largely cultivated. Inhabitants well disposed. Cattle and poultry cheap.

Pilgrim.—See Haji.

Pilgrimage.—Since the conversion of Malays to Mahommedanism, pilgrimages to Mecca have been frequent. Steamers now annually convey vast numbers of Malays, and the business of "pilgrim-broker" is said to be a profitable one. Very large numbers of would-be hajis come from the Archipelago, and only come to Singapore and Penang because they are the steamers' ports of call.

The performance of the pilgrimage is designated naik haji in Malay, and brings with it enhanced social consideration. The returned pilgrim wears the Arabian costume with a green turban, and is much looked up to. Even with the facilities afforded by steam, the journey is said to be a hard one, especially the Arabian portion.

Pillow Fish (Ikan buntal).—This fish has a beak, somewhat like a parrot's, and possesses the property of inflating itself into globular form when alarmed, the whole skin setting up an array of spines. It is not eaten.

Piña Cloth,—Manufactured from the fibre of pine-apple. This fibre has, in a small way, been prepared for decades past, both in the Peninsula and the British Settlements, but has never (as in Manila) assumed the importance of a recognized branch of commerce. The little obtained has, as a rule, been exported to China. (See Fibres.)

Pinang (Betel).—See ARECA PALM.

Pinang Tunggal.—The last village of any importance towards the N. and S. boundary line between Province Wellesley and Kedah. It lies on the S. bank and a reach of the Muda R., and is 25 miles 5 furlongs from Butterworth.

Pinding.—Answers to the brooch or belt buckle, and is of silver or gold, frequently ornamented with diamonds or other precious stones. Chiefly worn by Malayan women of rank, or the wives of rich Chinese.

Pine-Apple.—The fruit par excellence of Singapore, where plantations furnish immense quantities for export, one preserver alone sending away one million yearly. The Javan and Mauritian varieties, which have a whiter flesh than the Singapore pine-apple, are by some deemed superior. (See Fibres.)

Pipe Clay is found in Singapore and at various places in the Peninsula. It appears to be a variety of Kaolin (q, v).

Piracy.—The only word for pirate in Malay is perompak, and for piracy, perompakan; the former word meaning to rob or plunder generally. Happily the crime is now almost extinct. As an indication of the way it formerly flourished, the following extract, from the first volume of the J. I. A., may be

interesting :-

In 1847, as may be ascertained by reference to the pages of the Singapore Free Press, from forty to sixty pirate prahus issued from Balinini, and ravaged a great portion of the Archipelago, swept the Straits of Banka, burnt a village not far from Singapore, carrying off a portion of the inhabitants into captivity, and exchanged shots with a Dutch fortress on the coast of Borneo. Eleven of these prahus were attacked by the H. C. Steamer Nemesis, and the largest of the number taken was judged by Captain Grey, Captain Wallace, and most of those aboard, to be 80 feet in length, and to have fully a complement of 80 men. This prahu was unluckily burnt and sunk during the action, after a desperate resistance, but a boat of the second class captured was 70 feet long and 12 feet broad, and it was deposed by the principal persons present that the average number of the crews was forty men to each of the eleven prahus, and that they each carried from four to six guns. The largest boat mounted an iron nine or ten-pounder, besides six or eight small guns, and the number of rifles as well as the skill of the owners in their use, was proved by the list of the killed and wounded in the English boats.

Forrest, in his "Voyage to New Guinea," as early as 1775, gives (at page 225) the dimensions of a pirate prahu, which he actually measured. "She was," he writes, "from stern to tafferil 91 feet 8 inches, in breadth 26 feet, and in depth 3 feet 3 inches." Her complement was ninety men, and she could "row with forty oars or upwards of a side." She has engaged and captured a Dutch sloop,

and brought 70 slaves to Mindanao.

Owing to the extreme shallowness (and consequently small tonnage) of these

boats, it was maintained by home writers that as they could not measure more than eight or ten tons, they were unable to carry such enormous crews as were represented. To this argument the writer of the article from which we have quoted

made the following reply:-

"This very 'herring boat,' however, which the writer asserts could not accommodate more than 15 men apiece, are a class of vessel of which he is evidently totally ignorant, and it will be worth while to describe a boat of the class certainly not ten tons, and allow the writer to judge how far his conclusion is correct. Two hundred vessels of the sort, some larger some smaller, are to be found in the Sarebus rivers, but as a type we prefer to take the measure of a Sarawak boat, which is now lying in that river, and which may be seen by any person curious enough on the subject; her length is 60 feet, her breadth 9 feet 6 inches, and her depth 2 feet 6 inches. Nevertheless this 'herring boat' (which in tonnage carries absolutely next to nothing) has a regular complement of 60 men, and sometimes more. The writer, however, positively asserts, and would have us believe, that a boat of eight or ten tons cannot accommodate more than 15 men!"

It was undoubtedly owing to the exertions of Sir James Brooke that piracy was virtually abolished in these seas. Isolated cases, however, still occur, one having been perpetrated so recently as the close of 1886, off the coast of Province Wellesley. It is many years, however, since a foreign vessel was attacked, the general use of steam having aided the result. Pirates as a class no longer infest Malayan waters near the Peninsula. On the Sumatran coast it would, however, appear they still flourish. No longer ago than July, 1887, the Austrian authorities published warnings to the effect that no trading ships should attempt to sail in the waters east of Sumatra unless escorted by men-of-war, there being numerous pirates in those waters. Landing without military escort was also said to be most dangerous, the Dutch authorities declining to take any responsibility.

Pirling.—A somewhat high hill in Naning, the surface showing a good deal of laterite. Covered in parts during the unfrequently recurring seasons with hill paddy (*Padi umah*).

Pirman.—The aboriginal (*Benua*) term for God. *Jewa-jewa* is his archangel, through whom alone mortals may address their petitions, this function being usually undertaken by the *poyang* (priest and sorcerer).

Pisang.—The Musa (banana) of botanists. A very large number of species exist under various fanciful names, such as pisang raja, batu mas, bringin, tandok, panggang, kling, klat, masak hijau, běmban, ijau, gading, rotan, brangan, jarum moniet, pahit udang, kling, pendek, utan susu, abu,=kling, jari buaia, &c., but there are no English equivalents in common use. About eight varieties are commonly sold, but a very much larger number exist. Amongst the translations of the vernacular distinctions are:—egg, gold, finger, king, sultan, stone, sweet, monkey, &c.

Pisang, Pulo.—Literally "banana island," is the name of no fewer than six different islands, or rather uninhabited islets of the Malayan Archipelago, extending from Sumatra to the Moluccas. The name pisang is one peculiarly belonging to the Malay language, all the other tongues having their own separate names for this fruit; so that the name, applied to the names of places, points to the extent of Malay navigation. Except for navigation, the islands which bear this name are of no importance whatever.

Pisau Raut.—A knife used for planing rattans.

Pitcher Plants.—See NEPENTHE and MONKEY CUP.

Pitfalls (Pēlūbang) are commonly used for trapping large game. A pointed

bamboo is usually placed upright in the bottom, and a much respected Catholic priest met his death by falling into one near Batu Kawan many years ago.

Plantain.—Although botanists declare the banana and plantains to be the same plant, all housekeepers will define the plantain as a fruit which never becomes sufficiently ripe to eat without cooking. The Malays call it pisang raga, and entertain the same idea. It has a flower (known as jantong) at the end of the fruit-stalk quite differing, to the ordinary eye, from that of the banana.

Plantain Fibre.—See FIBRES.

Plantain Hill.—Two hills in N. Sungei Ujong, and lying 8 miles apart on either side of Rassa, are so marked.

Plough (Těnggala).—The Malay plough is a very rough affair, and is usually drawn by buffaloes. It consists of a heavy pole with a wooden fork to act as coulter, and having a bar inserted at an oblique angle to serve as a handle. The clods are subsequently broken by dragging over them a heavy beam.

Plumbago was discovered in Selangor by Major McNair in 1854, but has never been worked.

Poetry.—The poetry of the Malays is designated Pantun, or verses. Some of these show poetical feeling, while others are of course merely rhyming descriptions of scenery or events. (See Pantun.)

Poho.-V. on W. bank of Pahang R., C. Pahang.

Poisons (Rachun).—The Malay women are credited with an extensive knowledge of vegetable poisons, and with using them to remove obnoxious individuals. The subject of Malay poisons has never been fully dealt with, and but little is known regarding them by Europeans. The two most familiar are the *ipoh* or *upas* and certain species of datura. Datura stramonium grows in the jungle. A very singular mechanical poison is also alleged to be in use, viz., the tiny black specks found under the sheath-leaves at the joints of bamboos. These under the microscope are veritable barbed arrows, and, if mixed with a person's food, are alleged to resist the action of the gastric juice and to work their way into the intestines, &c., and, by setting up inflammation, cause death.

Polecat.—See Musang.

Police.—The police of the British Settlements consists of Europeans, Malays, Klings, and a few Chinese in the following proportions:—

				1	Officers.	No	n-com. Officers and Men.
Singapore a			slev	***	11 13	***	897 816
Malacca	***	***		***	5	***	314
					29		2,027

Polo, Marco.—Appears to have referred to Malacca in his notice of Malacur, and it is described as being at once an island, a state, and a town. "The people," he says, "are governed by a king, and have their own peculiar language. The town is large and well built. A considerable trade is there carried on in spices and drugs, with which the place abounds. According to the usual reckoning, Malacca at the time in question had been founded only forty years." His work contains notices of Sumatra, &c., but does not otherwise touch upon matters embraced in these pages.

Polygamy is sanctioned by religion and custom amongst the Malays, but is the exception rather than the rule, not above from five to ten per cent. indulging in more than one wife. It is not uncommon to find that a man has been the

husband of four or five women, all living, but divorced in favour of the last wedded.

Pomegranate (Buah delimah).—The fresh roots of the male plant are used to make an infusion that is a specific as a vermifuge.

Pondok.—Strictly speaking, an umbrella-shaped hut of palm leaves, so made as to furnish a roof and wall under which one can sit or lie. Used by the *Orang Sakei Liar* of the Peninsula. In a secondary sense, a shed or hut. Often used in the name of places.

Pondok Kompas.—District in E.C. Malacca just above Kessang, and immediately S. of the Jus forest reserve. V. of the same name in the district on the high road from Kessang to Nyalas.

Pondok Panjang.—The site of a tapioca plantation in Malacca, in the Lundu district.

Pondok Panjang.—V. on the road leading from Cheban to Nyalas, E. Malacca.

Pondok Tanjong.—V. on N. bank of Kurau R., N.W. Perak.

Pondok Upih.—District in S.W. Penang, W. of Relau.

Ponggol.—V. in N.E. Singapore, N. of district of same name. A Police station is situated 1 mile N. of the village.

Pongsu Sa'ribu.—A waste tract of land about 8 miles from Butterworth, Province Wellesley, and 2 miles from Malakoff Estate; so called from the numerous ant-hills (basut) abounding on it.

Population.—The general population of the Peninsula is a mere matter of conjecture.

The population of the British Settlements at the present time, by the census of 1891, was officially estimated as follows:—

Singapor	re	•••	•••	•••	•••		184,554
Penang,	Province	Wellesley	and the	Dindings		*	235,618
Malacca	•••	•••	•••		•••		92,170
							512,342

(For details see next page.)

POPULATION OF THE COLONY IN THE YEARS 1856, 1866, 1871, 1881, AND 1891 RESPECTIVELY.

Settlements.	. 1856.	1866.	1871.	1881.	1891.	
Singapore		(97,131	139,208	184,554	
Penang, Province Wellesley, and the Dindings	248,000	273,000	133,064	190,597	235,618	
Malacca		Ų	77 ,756	93,579	92,170	
Total	248,000	273,000	307,951	423,384	512,342	

DETAILS OF POPULATION OF THE STRAITS SETTLEMENTS. (APRIL, 1891.)

Nationalities.	Singa	PORE.	PROVINCE	Island, Wellesley ndings.	MAL	TOTALS OF THE THREE	
	Male.	Female.	Male.	Female.	Male.	Female.	SETTLE- MENTS.
I. EUROPEANS AND AMERICANS:-							
Resident Population	1,434	868	527	302	66	47	8,244
Floating Population	1,734	48	169	1	19	2	1,978
Prisoners	10		9		_	_	19
British Military	1,134	26	188	5	_		1,853
Total Europeans and Americans	4,312	942	893	808	85	49	6,589
II. EURASIANS	1,764	1,825	824	888	821	985	7,057
III. CHINESE :-							
Cantonese	15,750	7,647	12,726	4,688	818	384	42,008
Hokkiens	41,776	4,080	21,212	3,034	4,230	427	74,759
Hylams	8,596	115	2,783	67	4,353	24	15,938
Khehs	6,558	844	6,345	871	1,793	325	16,736
Straits-born Teo Chews	6,084 21,682	6,721 2,055	8,047 18,456	8,934 762	2,226 806	2,745 30	84,757 43,791
Total Ohimon	100,446	21,462	69,569	18,351	14,226	3,935	227,989
		21,102		10,001			
IV. Malays and other Natives of the Archipelago:—				1			
Ahowiginag			12	22	59	49	142
Achinoco	2	_	569	154	1	2	528
Rovenage	1.808	869	83	8	141	18	2,927
Bugis	864	775	116	75	9	8	1,842
Dyaks	43	53		l _'''	`	_ ~	96
Javanese	6,056	2,485	1,634	621	345	86	11,227
Jawi Pekans	156	146	4,170	4.429	100	83	9,084
Malays	11,940	10,761	47,638	47,393	83,268	36,159	187,159
Manilamen	30	4	27	5	2	_	68
Total Malays, &c	20,899	15,093	54,049	52,707	33,925	86,400	218,078
V. Tamils and other Natives							
of India : Bengalis, &c	2,728	724	1 410	K01	1.477	07	K 607
Rurmaga	13	13	1,410 60	591 91	147 2	27	5,627 179
Parsons	41	13	3	91	ه ا	_	57
Tamils	10,171	2,332	25,156	8,934	1,055	416	48,064
Total Tamils, &c	12,953	3,082	26,629	9,616	1,204	443	58,927
VI. OTHER NATIONALITIES:-	<u> </u>						
Africans	9	4	15	5	2	_	35
Anamese	16	16	33	ĭ		2	68
Arabs	503	303	291	276	53	42	1,468
Armenians	36	32	6	8	8	1	81
Egyptians	1	-	_	_			1
Japanese	58	229	1	20	2	15	825
Jews	106	84	61	94	_	-	345
Persians	4	5	-	-			9
Siamese Singhalese	80 143	131	457	448	. 19	4	1,128 252
	<u> </u>	16	56		18		
Total other Nationalities	956	820	920	864	76	71	8,707
GRAND TOTAL	141,330	43,224	152,884	82,734	50,337	41,833	512,842

Porcelain and Pottery.—All the more civilized inhabitants of Malaya have possessed immemorially the art of fabricating a coarse unglazed pottery, much resembling that of the Hindus, but not borrowed from them, judging by the native names connected with the art. For either pottery or porcelain there is no common native term, but a great many names to distinguish the vessel or utensil made from them, these often varying in the different languages. A coarse domestic earthenware is of much less general use among the Malays than the Hindus, its place being frequently taken by the coarse porcelain of China, which has been imported for ages. Fragments, or even entire vessels of it, have been found in ancient ruins, and when Singapore was established by ourselves, specimens were found along with ancient Chinese coins of the tenth and eleventh centuries.*

Porcupine (Histrix).—The porcupine of Malaya differs but little from the African porcupine long naturalized in Italy. It is the landak of the Malays, who assert the existence in the Peninsula of two species which they distinguish by the epithets of great and small.

Port Weld.—The coast terminus of the railway to Thaipeng, Perak, formerly known as Sapetan, just above the entrance of the Larut R., W. Perak.

Information regarding the railway will be found under the article Perak.

Portugal, Portuguese.—The Portuguese made their appearance in the waters of the Archipelago under Sequeira in 1509, twelve years after their arrival in Calicut. The insults which they then received, and perhaps provoked, led, two years after, to the conquest of Malacca, and from that event is to be dated the commencement of their domination, which virtually termiated with the loss of the same place in 1641. Thus the supremacy of the Portuguese lasted in all 130 years. Their territorial possessions comprehended only the principality of Malacca, and the Clove and Nutmeg Islands, but even in these their sovereignty was never peaceably established, for throughout they were involved in hostilities with their nominal subjects, or with neighbouring Native States. Notwithstanding, however, their short and disputive power, it must be observed that they have left behind them more marks of their dominion than the Dutch. The facts which attest this are the number of words of their language which have been naturalized in the languages of the Archipelago, and the number of converts to Christianity. These results are most probably attributable to the greater congeniality of their manners and language with those of the Archipelago, and to the spirit of propagandism being far more active with them than with their successors in power. A large number of most useful members of the communities in the Straits Settlements are of Portuguese descent.*

Potah Teluk.—Beach 4 mile below Pasir Panjang Police station, S.W.

Singapore.

Potato.—The American potato, Solanum tuberosum, the ubi êrôpa of the Malays, equivalent to the European "yam," was first introduced by the Dutch, and in comparatively modern times. It is not much cultivated in the Peninsula, the

chief supply for the British Settlements being derived from China.

Prai (or Prye) River.—The principal river of Province Wellesley, Butterworth being situated 1½ miles to the N. of its mouth. It rises, as regards two of its streams, in the extreme N.W. just beyond the Kedah boundary line, but one is connected with the Muda River, whence it runs in a S.W. direction to the sea. Vessels of good draught can enter its embouchure, on the S. side of which is the Prai dock, where the smaller steamers and launches frequenting Penang resort for repairs. The river is crossed about half a mile above the dock by the steam ferry bridge, and near Permatang Pauh by a pontoon bridge which can be opened to allow large cargo boats to pass.

allow large cargo boats to pass.

At the time the British obtained possession of Penang a fort existed at Kwala
Prye occupied by an officer of the Raja of Kedah. Certain acts of his being

inimical to the Government, a brig-of-war and a boat flotilla were sent to reduce it, which service was successfully accomplished. The fort was destroyed and no traces of it (as such) at present exist.

Prau or Prahu is in Malay the generic name for any vessel, whether rowing or sailing. The different sorts are distinguished by specific names, according to form, size, use, and nationality. It is also the castle in chess.

Prawn (Udang).—Several varieties, some of immense size, are found in Malayan waters and are always on sale.

Prigi Datu.—V. in the Pigoh district, N. Malacca, on the high road from Malacca-town to Tabu.

Prince of Wales' Island.—This was the name given to Penang, or Pulo Pinang, by its English founders—an unmeaning piece of flattery to the Prince of Wales of the day, the future George the Fourth. (See Penang.)

Pringgit.—The Malay corruption of *Feringhi*, or unbeliever, formerly applied to the Portuguese. The term has, however, of late years been replaced by *Serani* (q. v.). A pretty village, locally called Dusun Pringgit, exists on the borders of Rembau and Malacca. It is properly marked as Dusun Feringgit on the maps.

Pringgit.—V. 21 miles from Malacca-town, of which it lies north.

Printian Lingga.-V. in E. of Sri Menanti, Negri Sembilan.

Printian Pahon.—Pass in the Mts. N. of Sri Menanti, Negri Sembilan.

Proverbs, Malay.—The earliest known collection by a foreign hand is by M. KLINKERT, a Dutch gentleman, published in 1863. The Abbé FAVRE'S "Dictionary" contains also a large number. The general reader, however, will prefer to turn to the three articles by the Hon'ble W. E. MAXWELL, in the J. S. B. R. A. S., No. 1, p. 85, No. 3, p. 19, and No. 11, p. 31, in which he quotes 573 proverbial

sayings, prefacing them with the following remarks:-

"The genius of the Malay language is in favour of neat, pithy sentences, and it abounds, therefore, in these crystallizations (if the expression can be permitted) of primitive wisdom and humour, though in this respect it is said to be inferior to the Javanese. Some open up perfect pictures of certain phases of rural life, and indeed are scarcely intelligible except to those whose knowledge of the country and mode of life of the people enables them to appreciate the local colouring. As a proof of their popularity, I may instance the frequent quotations of proverbs in the Malay newspapers which were started in the Colony of last year, and of which no less than three in the native character are now published weekly in Singapore. One can seldom take up the Jawi Perânakan without finding an argument clenched, or an adversary answered, by some well-known ibârat (proverb), or perupamaan (similitude), a dictum of some forgotten sage from which there is no appeal."

It would of course be impossible, within the limits of a mere dictionary, to quote many proverbs in extenso, but we may add the following from Mr. MAXWELL'S highly interesting articles as giving a glimpse of the "spiciness" which underlies

Malay sayings :-

"As to the proverbs themselves, I think I may fairly claim for the Malays that their sayings, besides being pointed and idiomatic, sometimes embody thoughts and ideas well worthy of Western races. Pride and honour are impressed in such maxims as bir putch tulang jangan putch mata, 'let the bone whiten but not the eyes' (No. 230), and mahu kah orang menghujankan gorannya (No. 170), 'will a man put his salt out in the rain?' (i.e., expose his family secret to public ridicule). 'Do not worship the rich or contemn the poor' (No. 210) is a maxim worthy of the free and independent spirit of the Malay, and I know no Oriental race who carry it out better in practice. Sneers at the assumption of the nouvean

riche, and instances of a truly conservative belief in good blood and good breeding, are plentiful. The successful adventurer is the 'blind man who has just found his sight' (No. 20). Kachang lupakan kulit, 'the bean forgets its pod' (No. 126), conveys a similar sarcasm aimed at the meanness which would attempt to conceal a humble origin. So 'a broom bound with silk thread' (No. 100) is the most indulgent comparison which a Malay can find for a person dressed above his rank.

"The phenomenon of a henpecked husband, which a Mahommedan country might hardly be thought to afford, is hit off in a very neat and concise proverb, kamudi deri haluwan, 'steered from the bow' (No. 141). It is by no means rare to find Malay wives possessed of quite sufficient energy and spirit to take command in the house."

It would be easy to multiply quotations, but these must suffice. The papers are eminently worth perusal.

Proverbs, Chinese.—Collections of these will be found in Mr. Scar-Borough's work, 1876 (so named), an article in the *China Review*, Vol. III, No. 3, p. 129, and in the "Folklore of China" (Hongkong, 1876), p. 151.

Province Wellesley is a strip of land situated on the coast of the Peninsula, opposite Penang. It is bounded on the N. by the Muda River, on the S. by the Krian province of Perak, and on the E. by Kedah. Its northern extremity is in 5° $40\frac{1}{2}'$ N. and its southern boundary line is in 5° 8' N., giving an actual length of $32\frac{1}{2}$ miles by latitude, but the coast line is about 45 miles. Its extreme width is 13 miles (at Kwala Muda), and its least (at Byram Estate) $7\frac{1}{4}$ miles. It is in reality a slice of the Kedah territory acquired by the British authorities to render more secure the tenure of Penang.

HISTORY.—Province Wellesley, then of less area than now, was originally ceded by the Raja of Kedah in 1798, though it was not regarded as properly annexed until 1801. In 1831 its limits were extended, and its tenure better defined by treaty with the Siamese Government, and in 1867, by a further cession by the same Government, the boundaries were further extended. In 1874, by treaty with Perak, another slice (the Trans-Krian) was added, since which time the Province has existed as above defined.

Geology.—The land is so low-lying that, except as regards the few hills, which, like all others in the neighbourhood, are more or less of laterite or ironstone formation, little can be said. Here and there granite crops out, but it would scarcely be correct to call the formation granitic. Under this head we quote the remarks of Mr. Earl, written in 1852, as those of an experienced observer:— "The entire coast of the northern division, from the mouth of the Muda to the mouth of the Prye, presents a fine sandy beach, backed by a permatang, or sandridge, generally covered with cocoa-nut trees, under which the Malay fishermen delight in fixing their dwellings, the situation being peculiarly favourable for carrying on their operations. Within the sand-ridge there is a payah, or swamp, varying in width from a few score yards to several furlongs, well adapted for the culture of rice, and almost invariably appropriated for that purpose. Behind this rises a second sand-ridge, followed by a second swamp, and so the country alternates from narrow ridges of sand, studded with cocoa-nut trees and Malay dwellings, to expansive paddy-fields for several miles inland, when the country becomes a little more elevated, and was covered with forest when the Province was first ceded. This uniformity is interrupted towards the northern part of the district by a chain of lagoons running parallel with the Muda, of which they now form a back-water, and may have once been an independent channel of that river. The permatangs sometimes attain an elevation of eight to ten feet above the level of the high water, but beyond this there is no high land throughout the northern district.

"The sea-coast of the southern division of the Province, on the other hand, is everywhere fronted by extensive banks of slimy mud, which are left uncovered at low-water spring tides. These are backed by broad belts of mangrove, beyond which the system of permatangs and payahs continues as in the northern division and extends as far inland as the base of the hill range. This division also differs from the other in being studded with detached hills, which may safely be called isolated, as there can be no doubt whatever that they were really islands at the comparatively recent period when the low lands were covered by the sea."

MINERALOGY.—No mines of any importance have been discovered in the Province. Tin undoubtedly is present in places, and minute traces of gold are

also visible, but practically speaking there are no minerals worth working.

CLIMATE.—There is no appreciable difference between Penang and the Province, except that the latter is open to the sea-breezes, which, owing to its hill, do not reach Penang. The range of the thermometer is, therefore, slightly lower than in Penang. As regards Europeans, it is fairly healthy, epidemic diseases appearing only on the plantations where large bodies of natives are massed together.

FAUNA.—The remarks offered regarding other portions of the Peninsula apply to the Province. Tigers, it may be noted, have almost disappeared before cultiva-

tion and population.

AGRICULTURE.—The inhabitants of Province Wellesley are essentially agricultural, rice being the chief staple. Sugar, tapioca, tobacco, &c., are, however, cultivated (we, of course, except the great sugar estates from these remarks), and the ordinary Malay raises enough for his simple wants. Sugar-cane is grown in large quantities at the estates under European management referred to below, but the native planter only raises enough for home consumption.

Products.—Nothing, except sugar from estates under European or Chinese management, comes under this head. Rice is produced in sufficient quantities for home consumption, but is not an export. None of the jungle products, such as gutta-percha, &c., are found in quantities sufficient to justify export. There are,

however, probably several sources of india-rubber still undiscovered.

TRADE.—None, except as regards sugar and tapioca. The import trade, consisting only of fruits, potatoes, &c., is not sufficient to justify notice at

length

POPULATION.—The Province contains about 80,000 inhabitants. The proportion of Malays is greater in the northern district than elsewhere, as the nature of the country is peculiarly favourable to the mode of life in which they most delight. Their dwellings are erected on the permatangs, or sand-ridges, under the shade of the cocoa-nut trees, with which they are thickly studded, and the bulk of the male population is employed, during the intervals of planting and reaping the paddy lands, in forming and tending the fishing weirs, which extend far out to sea on the bank that lines the shore, and which yield an abundant harvest of excellent fish at all seasons of the year. There are upwards of 900 fishing boats in this part of the Province. Shrimp-catching is also an important branch of industry on the sandy shore between the Muda and the Prye, the mode of catching them being precisely similar to that adopted at the mouth of the Thames. The shrimps, which are taken in large quantities, are made into a paste called balachong (q. v.). a sort of "caviare," which is much relished by the Chinese, and forms an article of export. There is also a large proportion of the native Indian population in this district, the Bengalis being mostly breeders of cattle in good circumstances, while the Klings are chiefly employed as coolies on the sugar and tapioca plantations. The number of Chinese in the north is not so great as in the more southern districts, but they are generally above the rank of field labourers, being mostly employed as shopkeepers, hawkers, or manufacturers of cocoa-nut oil. In the

districts lying between the Prye and the Junjong, the bulk of the population is still Malay, but the proportion of Chinese and Klings is greater than to the north, as many of the former are employed as planters of rice, sugar-cane, fruits, and spices, while there are no less than three European plantations—two of sugar-cane and one of the cassava-root from which tapioca is manufactured. In the district south of the Junjong, where the culture of sugar-cane is more extensive, the male population of Chinese is considerably greater than that of Malays, and the large number of Kling coolies greatly increases the proportion of foreigners. The European population here is also four times greater than in the northern and central districts.

GOVERNMENT.—Province Wellesley is a dependency of Penang, and the chief local authority is the Senior District Officer, whose functions are those of Magistrate of Police, Commissioner of the Court of Requests, and Collector of Land Revenue. He resides at Butterworth, immediately opposite Fort Cornwallis, where the Government Offices and Hospital are situated. Junior Magistrates are stationed at Bukit Mertajam, Bukit Tengah, and Nibong Tebal, the three sub-districts of the Province. An European Inspector of Police resides at each of these places, and small detachments of police, under native officers, are stationed at most of the principal villages. All the various Police stations throughout the Province are connected by telephone or telegraph.

Each bagan, or district, has a Penghulu Mukim, or native headman, who is generally selected from among the most respectable of the Malay inhabitants, but they rarely take any part in public matters, the appointment having come to be regarded rather as an honorary distinction than as a responsible office. On the banks of the Muda, however, where there is only a single Police station, the Penghulu Mukims are still a recognized institution, and most of the petty disputes

among the people of the villages are decided by them.

REVENUE.—This is included in that of Penang. The chief source is from land, but there are no published statistics to show whether the Province aids or

decreases the Penang returns.

Topography.—The Province is divided into three districts—the Northern, which comprises the districts of Muda (of which Penaga' is the chief centre), Teluk Ayer Tawar and Bagan Tuan Kechil, with some smaller bagans between, and those of Dalam and Luar extending to the N. bank of the Prye River, the Central, which comprises the Bukit Mertajam, Bukit Tengah, and Prye districts; and the Southern, including Bukit Tambun, Batu Kawan, Krian and Trans-Krian. Many other districts, however, go to make up the entire area, those named being the principal. Butterworth, in the N. division, is the principal head-quarters of administration and police. It comprises a Senior District Officer's, Police Superintendent's, Colonial Surgeon's, and Superintendent of Works' residences, a courthouse, hospital, police quarters and public works offices, and is neatly laid out. A public bathing-house is situated on the beach.

Penaga in the Northern district is a large village of some 1,500 or more inhabitants. It is the seat of a court-house and Police station, the District Officer attending weekly to hear criminal and civil cases. Bukit Mertajam is the court centre of the central district. Bukit Tambun is the head-quarters of the Southern district—the Nibong Tebal station and court being under the same jurisdiction. The places above-mentioned will be found described at sufficient length in

their alphabetical places.

CULTIVATION.—The flat portions of the Province are chiefly devoted to the cultivation of rice, though many tapioca and sugar plantations, under foreign and Chinese management, exist in various localities. The numerous hills on the border line between the Province and Kedah add greatly to the beauty of the land-scape. Viewed from Penang Hill, the Province appears to be a well-cultivated and well-watered plain backed by lofty hills. A considerable portion of the coast is

sheltered to seaward by the Island of Penang and affords secure anchorage at all seasons of the year. At Prye Point, immediately opposite to the town of Penang, a line-of-battle ship could lie within a cable's length of the sandy beach. A narrow but deep channel between banks of sand and mud extends from this point southward to the Kra islands off the entrance of Sungei Jajawi. A settlement of Achinese is successfully cultivating pepper at Ara Kuda.

Schools.—Some forty vernacular boys' schools and three girls' schools exist and do good work. A few Tamil schools also exist under foreign supervision.

RIVERS.—The Muda, which bounds the Province to the north, is a fine freshwater river, the stream being generally so strong as to prevent the sea-water from entering. A vessel drawing 9 feet can cross the bar at high-water spring tides, but the river is only frequented by boats which bring the produce to Penang. This river is the only high road towards the interior in the northern part of the Province. The Prai (or Prye) River, whose mouth is nearly opposite to the town of Penang, is accessible to ships of burthen, as there is no bar at its mouth owing to the protection afforded from the swell of the ocean by the island. This river is much broader than the Muda for some distance up from its mouth, and accessible to steam launches for a considerable distance. The upper part of the Prai River abounds with the nipah, or salt-water palm, from which the attap, or palm thatch, is made, and the Malay population hereabouts is chiefly employed in its manufacture during the intervals of paddy-planting. The Juru, next in order south, flows past Golden Grove estate and is navigable for boats as high as Bukit Tengah. The Jejawi is in reality an arm of the sea which makes Batu Kawan an island, but has two or three rivers flowing into it which make the water at low tide brackish. The Krian was, until thirteen years ago, the southern boundary of the Province, but the acquisition of Trans-Krian placed the dividing line some three miles further south.

Subjoined is a list of the principal plantations and villages in the Province, the majority of which will be found mentioned at length in their alphabetical

places :-

Alma Estate. Ararendang. Aur Gading. Badak Mati. Bagan Ayam. Boya. ** Jawi. Jermal. Lalang. Luar. Serai. 23 Tuan Kechli. * Batu Kawan. Musang. Bukit Indramuda. Jelutong. Junjong. Juru. Mahminah. Merah. Mertajam. Minyak. Tahgagar.

Bukit Tambun.

Ferry. Tengah.

Butterworth.

* Caledonia Estate. Duraka Juru Estate.

Goa Kepah.

* Golden Grove.

Jawi Estate.

" River.

Juru Bridge.

" Estate.

River.

Kalapa Batas.

Kota Aur.

Kubang Prye.

Semang.

* Krian Estate.

River.

Kwala Prye.

Labu Meriam.

Labu Mesiid.

Laher Bubu.

^{*} These estates are owned and managed by Europeaus.

Laher Ikan Mati.	Pulo Kra,
Lalang Ferry. Macham Bubo.	,, Mertajam.
	Rantau Panjang Krian
Malakoff Estate.	" Panjang Muda
Mamadin Creek.	Samagaga Dalam.
Mangkoh Village.	Sempang Ampat.
Merbau Kudong.	Sesat Village.
Muda River.	Sungei Bakau.
Nibong Tebal.	" Daun.
Pakolah.	T) ₁₁₀
Permatang Bertam.	Dumales Torres
" Bindahari.	
Riniai	" " Prye. " Kechil.
Knohing	,,
Maklom.	" Mangkoh.
	" Puyu.
" Mangis.	", Tumbus.
" Merbau.	Taseh.
" Pau.	Tebing Tinggi Bridge.
" Senah.	Teluk Ayer Tawar.
" Sintoh.	,, Remis.
" Toh Glam.	Tikum Batu.
Penaga.	Val d'Or.
Pinang Tunggal.	* Victoria Estate.
Prye River.	1350210
= -,	•

^{*} These estates are owned and managed by Europeans.

PLANTATIONS IN PROVINCE WELLESLEY.

Names of Estates.									Acres.		
	1	Under Cultiva- tion.	Total.	Management							
Malakoff—Tapioca	and o	790	2,600	European.							
Alma—Tapioca, co	coa-n	ut, and	d tea	•••	•••	•••	•	1,000	2,600	"	
Caledonia—Sugar				•••		•••	•••	1,162		1	
Victoria—Sugar	•••	•••	•••	•••	•••	•••	•••	650	1,077	"	
Jolden Grove—Sug		•••	•••	•••	•••	•••	•••	500	1,200	,,,	
Byram—Sugar `	•		•••		•••	•••		700	•••	",	
Prai—Sugar	•••	•••	•••		•••	•••	•••	1,600	5,200	",	
								Orlongs.	-,	"	
Batu Kawan—Suga	ar					•••		1,000	4,500	,,	
nkerman-Cocoa-		nd pad		•••	•••	•••	•••	400	400	"	
llydesdale—Sugar			•••	•••		•••	•••		•••	Chinese.	
Val d'Or—Sugar	•••	•••	•••	•••			•••		•••		
Simpang Ampat—			•••	•••	•••	•••	•••	1 1	•••	"	
Krian—Sugar		•••	•••	•••	•••	•••	•••	l l	•••	,,	
Trans-Krian-Sugs		•••	•••	•••	•••	•••	•••		•••	",	
									***	"	
(Cocoa	-NUT	PLANTA	TIONS.							
Teluk Remis	•••	•••	•••	••	•••	•••		160 Orlo	ngs.	European.	
Anson Dale	•••	••	•••	•••	•••	•••	•••	180,	,	Chinese.	
Aur Gading	•••	•••	•••	•••	•••		•••	850 Acre	98.	European.	
Sungei Kechil	•••	•••	•••	•••	•••	•••	•••	1,100 ,,		Chinese.	
seng Leong	•••	•••	•••	•••	•••	•••	• • • •	2,400 ,,		,,	

Pualing.—A considerable village in the Melakek district, N. Malacca, formerly part of Naning. It is on the high road from Malacca-town to Tabu and about 20 miles from the former.

Puasa, Bulan.—The fasting month of the Malays, answering to the month Ramadan. The day succeeding its expiration is a hari raya, when everybody puts on his best clothes, bathes, and gives such alms as he can afford. A second feast, called hari raya haji, is held on the tenth day of the month Zil Hayjah. Both are observed as great holidays.

Publications.—The following is a list of the pulications in the Straits Settlements:—

SINGAPORE. Official. Administration Reports Annual. Annual Department Reports ••• ••• Blue Book • • • ••• Civil Service List ,, Council Proceedings Weekly. Government Gazette ••• ••• ••• Ordinances Annually. ••• ••• Postal Express ... Daily. ••• ••• Postal Guide Quarterly Returns of Imports and Exports ... Quarterly. Yearly Annually. ••• Non-Official. Daily Advertiser Daily. Exchange Market Report Weekly. ••• ••• Exchange Shipping Report Daily. Fraser & Co.'s Exchange Circular Weekly. • • • ••• ••• Jawi Peranakkan (Malay Newspaper) ... • • • Half-yearly. Journal of the Straits Branch R. A. S. ••• Lat Pau (Chinese Newspaper) Daily. Singapore Daily Imports and Exports ••• Daily and Weekly. Singapore Free Press and Mercantile Advertiser ••• Singapore and Straits Directory Annually. ••• Singapore and Straits Diary ... ,, Singapore and Straits Almanack ••• ••• Singapore Weekly Herald Weekly. ••• ••• ••• Singai Nesam (Tamil Newspaper) Daily. Straits Advocate Weekly. Straits Produce ... Quarterly. • • • Straits Times Daily and Weekly. ••• Straits Law Journal and Reporter Quarterly. PENANG. Non-Official. Import and Export List Daily. ••• Olaga Naison (Tamil Newspaper) Weekly. ••• Straits Independent Bi-weekly. Penang Market Report ... Fortnightly. Pinang Gazette ... Bi-weekly. •••

Puchong Kanow.—V. on N. bank of Pahang R., C. Pahang. [814]

Puchut Muka (*Pale-faced*).—A name given to the point nearest Pulo Betong, W. coast of Penang, by the sea-rover RAGAM, because, as tradition says, his wife became pale with fright at a heavy sea encountered in passing it.

Pudah.—A sort of pandanus resembling the bungkwang, and which like it furnishes a fibre from its leaves.

Pulau.—V. and site of a Police station in the Pulau Sebang district, N. Malacca.

Pulau.—Small V. on W. bank of Malacca R., about 3 miles E.S.E. of Payah Rumput. (This spelling is retained as it is so marked on all the maps, but should be *Pulo* for the sake of uniformity.)

Pulau Biuku.—V. on S. side of R. Sembrong, N. Johore.

Pulei.—A V. and hill in Tampin, about 4 miles N. of Malacca territory.

Pulo signifies an island, or, more correctly, an islet, for it is rarely applied to any of the larger islands, the idea of insularity in regard to which is scarcely consistent with the state of knowledge, even of the more cultivated nations of the Archipelago. It is also applied to places inland, but on what grounds it is difficult to say. It is of very frequent occurrence from one end of the Malayan Archipelago to the other, and even where the Malay language is not vernacular, and points, of course, to the extent of the navigation that was familiar to the Malays. The word is spelt "Pulau" in official publications.

Pulo Aniol.—A small island 8½ miles S.E. C.S. of Malacca.

Pulo Awar.—Vulgarly Pulo Aôr, or Awar Island (Awar being the name of a large species of bamboo). It is the most southerly of a chain of islets lying off the eastern coast of the Malay Peninsula, and distant from it 30 miles. Pulo Awar, a mass of granite, is about 3 miles long and $1\frac{1}{2}$ broad. It has two peaked mountains—one 1,521 feet and the other 1,852 high. The inhabitants, amounting to 1,400, are Malays; and, whatever their character in former times has been, they have, since the establishment of commercial intercourse with Singapore, become peaceable traders and industrious fishermen. The only article cultivated by them is the cocoa-nut palm, which grows luxuriantly, even as high as 1,000 feet above the level of the sea. The nuts and their expressed oil are exported to Singapore to be exchanged for rice, clothing and other necessaries. The island is subject to the Raja of Pahang. It is the landmark of shipping in taking a departure from and making the Straits of Malacca. North latitude 2° 30′, east longitude 104° 35′.

Pulo Ayer Chawan.—The S.W. and largest of a group of islands off the Tanjong Gul district, S.W. Singapore.

Pulo Ayer Limau.—The N. of a group of islands off S.W. Singapore, just opposite Tanjong Kling in Tanjong Gul district.

Pulo Ayer Merbau.—One of the group of islands separated from S.W. Singapore by the Silat Sembilan.

Pulo Babi.—The name of a group of islets S.S.W. of Pulo Siribuat, off the E. coast of Johore. The principal island of this name is $2\frac{1}{2}$ miles by 1 mile in size. Pulo Babi Tengah and Pulo Babi Ujong are the names of two islands in the vicinity (sometimes called N. Babi and Mid Babi).

Pulo Bakong.—Small I. in the Perak R., about $5\frac{1}{2}$ miles above Bandar Baru I., S.C. Perak.

Pulo Baltu Rakil.—Small I., E. coast of Patani.

Pulo Bandar.—Small I. in Perak R., off the S. point of Bandar Baru, S.W. Perak.

Pulo Batil.—Small I. in the Perak R., C. Perak, just below Teluk Prang.

Pulo Bedung.—See P. REDANG.

Pulo Beralah.—An I. at the extremity of a group, some 30 miles in extent, off the S.E. coast of Johore and opposite a promontory of the same name.

Pulo Berhala.—I. off N. Cape, Kemaman.

Pulo Besar.—An I. 7 miles S.E. of Malacca.

Pulo Betong,—I. and district in S.W. Penang. The former 1 mile N. of the shore. V. of same name on the coast opposite the I., so called from a species

of gigantic bamboo growing there.

Pulo Bidan (Midwife Island).—The nearest to Penang of a group of four islands known as Pulo Bunting, 14 miles N. of Penang. It is about 1 mile in length by $\frac{3}{4}$ mile in breadth, thickly wooded to the water's edge. The geological formation is greywacke and ironstone, on the latter of which rests stratified limestone of a bluish-grey colour traversed by veins of quartz and calcareous spar. Inhabited by a few Malay fishermen.

Pulo Biskol.—Small I. in a group separated from S.W. Singapore by the Silat Sembilan.

Pulo Bismut.—Small I. in a group separated from S.W. Singapore by the Silat Sembilan.

Pulo Blana.—The S. of a group of 11 islands lying off the E. coast of Johore.

Pulo Blanja.—Small I. in the Perak R. just below a V. of same name, C. Perak.

Pulo Borong.—Small I. at mouth of Patani R., N. Patani.

Pulo Bota.—Small I. in the Perak R. just below V. of same name, W.C. Perak.

Pulo Brahamana.—A small I. in the Perak R., just below Bota, W.C.

Pulo Brani.—I. between Blakang Mati and the Teluk Blangah district, S. Singapore. It forms the S. side of New Harbour.

Pulo Buaya (Boya in the S. A. S. map).—I. in the Perak R. about 4 miles S. of Kwala Kangsa.

Pulo Bukum.—One of a group of islands lying S. of Silat Pandan, 2 to 3 miles S.W. of Singapore. Pulo Bukum Kechil close to and S. of above.

Pulo Buloh.—Small I. between mouths of R. Buloh and R. Buloh Kechil, Kranji district, N.W. Singapore.

Pulo Bunting (Pregnant Island).—One of a group of four small islands, the nearest being 14 miles N. of Penang. That most remote has given its name to the group from its fanciful resemblance to a woman enciente lying on her back. It is of nearly oval shape, thickly covered with wood, about $1\frac{1}{2}$ miles long by 1 mile broad at its widest part. It is precipitous on its N.W. side, in all other places the forest extending to the beach. The rocks are granitic, large veins of quartz traversing them in all directions.

The four islands are called Pulo Island (midwife island), Pulo Panggil [the man sent] to call [the midwife] island, Pulo Sonsong (the messenger's companion).

and Pulo Bunting.

The legend accounting for the name given to the Bunting Islands is that, some thousands of years ago, there dwelt on the coast of Penang an ill-natured demon. One day, walking on the beach, he saw a princess lying on the sand in the pains of childbirth. She had sent a messenger to call a midwife, but he was so long gone that she sent another, who outran him and was returning with the midwife when the evil genius transformed them all into hills. That of the princess was called Bunting, the next Sonsong or the convoy, Panggilan the messenger, and Bidan

the midwife. The legend adds that at this period the hills formed a portion of the mainland.

Pulo Burong.—Small I. surrounded by a reef between Tioman I. and the coast of Pahang.

Pulo Busing.—The W. of the groups of islands due S. of Pasir Panjang, S. Singapore, and separated from Cyrene Shoal by Silat Pandan.

Pulo Buton.—Two islands forming the W. of a group lying off N.W. Kedah. It lies 30 miles from the mainland.

Pulo Chandiot.—Small I. in the embouchure of the Pahang R.

Pulo Chikukoh.—A small I. chiefly of sandstone with small quartz veins, situated off the S. face of Singapore.

Pulo Damar.—I. in bay W. of entrance to R. Jurong, S.W. Singapore.

Pulo Datoh.—V. on N. bank of Pahang R. between the Loui and Pemangan R., C. Pahang.

Pulo Dendong.—V. on W. side of R. Sembrong 5 miles from its turn N. in C. Johore.

Pulo Dochong.—An I. off the S.E. coast of Pahang forming one of a group of eleven.

Pulo Dodol.—A small I. 5 miles S. of Umbei, Malacca.

Pulo Ecotabu.—Small I. S. of P. Redang (q. v.).

Pulo Gajah.—(I. marked "Stenan" on the Admiralty Chart.) I. and some islets just S. of Point Selantie, N. Johore.

Pulo Gajah Stenan.—The tenth from the N. of a group of islands lying off the S. coast of Johore.

Pulo Geeit.—Petty I. 4 miles due S. of Tioman I.

Pulo Goal.—The name of a small I. near the Babi group off the S. coast of Johore.

Pulo Gulu.—Small I. about 10 miles from nearest point of coast, Kelantan.

Pulo Gurong.—The name of a small I. near the Pulo Babi group off the E. coast of Johore. Height 319 feet.

Pulo Hantu.—One of a group of islands lying S. of Silat Pandan, 3 to 4 miles S.W. of Singapore Harbour.

Pulo Hantu.—A small island off S. coast of Teluk Blangah district, Singapore, the name however being, as is customary in similar cases, applied to the mainland, immediately adjoining which is the site of the New Harbour Company's premises. The island itself is owned by the executors of the late Mr. Whampoa, and still has on it the remains of a bungalow erected very many years ago.

Pulo Jawa.—An I. 1 mile due S. of Malacca flag-staff.

Pulo Jerejak.—I. off E. coast of Penang opposite the Relau district. The leper hospital of the Straits Settlements and Penang quarantine station are established on this island.

Pulo Jong.—Small I. in group S. of Silat Pandan about $3\frac{1}{2}$ miles S.S.W. of Singapore Harbour.

Pulo Jong.—Small round I. 75 feet high and $\frac{1}{2}$ mile N. of Pulo Sabarut, S. of Singapore.

Pulo Kaban.—The fifth from the N. of a group of islands off the S.E. coast of Pahang.

Pulo Kalabang.—The name of a small I. N. of the Babi group off the E. coast of Johore.

Pulo Kalang or Kalam.-I. at mouth of R. Klang, Selangor.

Pulo Kambiri.—I. in the Perak R. 2 miles N. of Kwala Plus, N. Perak.

Pulo Kampong Ekor.—Small I. in the Perak R. marked Pulo "Sehmat" in the Admiralty Chart, just above Teluk Prang in C. Perak.

Pulo Kanching.—I. in the Pahang R. about 4 miles W. of junction of R. Pahang and Pahang Tuah. A V. of same name on N. bank.

Pulo Kandang Merhom.—Small I. in the Perak R. opposite Batu Gajah, W.C. Perak.

Pulo Kapas.—I. 6 miles from the coast of N. Kemaman.

Pulo Katta.—I. off the Point of same name S. extremity of the Dinding (mainland) coast.

Pulo Keban.—I. off Peniabang Point, N. Johore, and forming with the mainland Blair Harbour.

Pulo Kechil.—Small I. in the Pahang R., about 13 miles from its mouth.

Pulo Kendi.—("Waterpot Island," but called by Europeans "Saddle Island,") about 2½ miles from S.W. point of Penang and about 2 miles in circumference, thickly covered with jungle and a few large trees, which, on the N. side, approach within a few feet of the water. There are numerous caves and fissures into which the sea rushes with a hollow sound. The action of the water at the edge has given the rocks the appearance of lava. A full description of its geological structure is given in the "Misc. Papers on Indo-China," Vol. I, p. 208, but they are of no general interest except to specialists.

The native legend of its creation is that the famous rover RAGAM, when passing the spot, dropped his kendi, or waterpot, overboard, and that it was immediately

transformed into the island in question.

Pulo Kenning.—V. on W. bank of Pahang R., C. Pahang. Pulo Ketam.—Small I. S.W. of Pulo Ubin in the old Strait.

Pulo Kompet.—The second of a group of islands lying off the S.E. coast of Pahang.

Pulo Koringo.—Small I. E. of Pulo Redang (q. v.).

Pulo Kra.—Two islands lying W. of Batu Kawan, Province Wellesley, and forming a portion of the Province. The rocks nearest the shore are, like those of Batu Kawan, granitic. The islands generally, each about 1 mile long by 400 yards broad, are composed of fine soft clay with ferruginous (laterite) veins. Iron pyrites are also found. There are about 500 inhabitants on the islands, the S. being the seat of a thriving village. A Police station has been erected there. [See "Misc. Papers on Indo-China," Vol. I, p. 209, for an interesting article on the geology of the islands.] It was once worked for gold, but not successfully.

Pulo Kubo.-Small I. in the embouchure of the Pahang R.

Pulo Labas.—Small I, off N.W. coast of Tioman I. about 25 miles from the nearest coast, Johore.

Pulo Laddas.—The S. of a group of islands lying off N.W. Kedah, 24 miles from the nearest mainland.

Pulo Lalang Layer.—The third from the N. of a group of islands lying off the S.E. coast of Pahang.

Pulo Langkawi, called in our charts "Lancava," is a considerable island on the western coast of the Malay Peninsula, having several smaller ones contiguous to it to the south, named the Ladas, which signifies the pepper-islands, so called more probably from their number than their produce. Langkawi and all the islands contiguous to it form part of the territories of the Prince of Kedah. They

lie between the sixth and seventh degrees of north latitude, and the ninety-ninth and one hundredth of east longitude. Langkawi is about 25 miles in length from east to west, and about 10 from north to south. The land of all the group is high and level, and the geological formation, like that of the adjacent continent, plutonic, consisting of granite and mountain limestone. Both Langkawi and the larger islands of the group are inhabited by a Malay population.

Pulo Lantinga.—An I. off C. coast of Kelantan about 12 miles N.E. of S. entrance of Kelantan R.

Pulo Layer.—I. 11½ miles N.E. by E. of mouth of Endau R., Pahang.

Pulo Lima.—Small I. nearly due S. of Pulo Tinggi, E. coast of Johore.

Pulo Limo (Limau?).—Small I. close to P. Redang (q. v.).

Pulo Lumut.—I. at the mouth of the Klang R., Selangor, its N. shore forming a portion of the embouchure.

Pulo Manei.—Small I. in the Pahang R., E. Pahang.

Pulo Mati Anak.—V. on E. bank of R. Sembrong about 5 miles N. of junction with R. Kahang.

Pulo Mau.—The eighth from the N. of a group of islands lying off the E. coast of Johore.

Pulo Mensirip.—The name of a small island near the Babi group off the E. coast of Johore.

Pulo Merambong.—L in fairway of W. entrance to Old Straits between Johore and Singapore.

Pulo Merapi (Pigeon Island).—Situated near the S. extremity of W. coast of Penang, is of small size, and thickly covered with jungle. It is entirely composed of coarse grey granite, the rocks at the base assuming most fantastic forms. A good deal of mica is found in the granite.

Pulo Merlang.—Group of small islets S. of Siribuat Islands about 2 miles.

Pulo Mertang.—Three small islets S. of P. Siribuat off the coast of Pahang.

Pulo Nangka.—A small I. 5½ miles S. of Umbei, Malacca.

Pulo Obin.—See Pulo Ubin.

Pulo Opeh.—An island lying 31 miles due E. of Malacca flag-staff.

Pulo Pahang Permandi.—Small I. in Johore R. about 8 miles above Johore Lama.

Pulo Panggil.—One of the Bunting group (q. v., as also Pulo Bidan) chiefly of limestone with isolated strata of grey marble. About 16 miles N. of Penang. Uninhabited.

Pulo Pangkor.—The name of the larger Dinding Island N. of entrance to Perak R.

Pulo Panja.—Small I. in the Perak R. off S. Pt. of Bandar Baru I., S. Perak.

Pulo Panjang.—An island 2 miles S. by E. of Malacca flag-staff.

Pulo Paya.—Petty I. off W. coast of Tioman I.

Pulo Pemanggil.—I. 10 miles S.E. of Pulo Tioman.

Pulo Peniabong.—Small islet on E. side of Pulo Tinggi, N. coast of Johore.

Pulo Penyuso.—A small rocky island off the point of the same name, S. Johore.

Pulo Perhintian.—Group of islands 9 to 10 miles off the coast of N. Kelantan.

Pulo Pier.—Three small islands 14 miles W. of entrance to Kedah R.

Pulo Pinang.—Small I. S. of P. Redang (q. v.). (See also Penang.)

Pulo Pisang.—Small I. in the Perak R. above Bota, W.C. Perak.

Pulo Pisi.—The W. of a group of islands separated from the Tanjong Gul district, S.W. Singapore, by the Silat Sembilan.

Pulo Pochong.—Small I. below Risang Pt., N. Johore.

Pulo Propoh.—Small I. at mouth of R. of same name, S.W. Singapore.

Pulo Rawah.—The name of a small island close to the Babi group, off the coast of Johore.

Pulo Redang Besar.—I., the largest of a group off the S. entrance of the Kelantan R., C. Kelantan.

Pulo Redang Kechil.—I. about 9 miles S. of above, known to the Malays also as Pulo Bedung.

Pulo Renget (Besar and Kechil).—Two islands on N. side of St. John's I., S. of Singapore.

Pulo Rimau.—An island situated about \$\frac{1}{4}\$ mile from the S.E. corner of Penang. It is oblong in shape, about 1 mile in length by \$\frac{1}{3}\$ mile in breadth; is bold and rocky, except on the N. side, covered with wood, and composed entirely of fine grey granite. Its importance to mariners lies in the fact that on it is erected the lighthouse, which is the principal guide to vessels entering the harbour formed by the strait between Penang and the mainland.

Pulo Rumput.-V. on S. bank of Pahang R., E. Pahang.

Pulo Runcan (185 feet high).—Close to N.W. end of Pulo Senang, S.W. of Singapore.

Pulo Sabarut (78 feet high).—I. 31 miles W. by S. of W. St. John's L., S. of Singapore.

Pulo Salang.—An island lying 8 miles S.E. of Malacca and 1½ miles E. of the Leper Hospital (P. Sirembong).

Pulo Saluk.—Small I. 90 feet high, the S.W. limit of the Sinki Strait, W. of Singapore.

Pulo Santo.-A small islet E. of Pulo Siribuat on the coast of Pahang.

Pulo Santu.-Small I. E. of Pulo Siribuat.

Pulo Sebang.—A district in N. Malacca, S. of the Tampin frontier of Rembau.

Pulo Sebarok, or Middle I. The S.E. of a group S. of Silat Pandan, and 4 miles nearly due S. of W. entrance to Singapore Harbour.

Pulo Seburus (Dalam and Luar).—Two islands in a group, of which the last named is the most E., separated from S.W. Singapore by the Silat Sembilan.

Pulo Sehmat.—See Pulo Kampong Ekor.

Pulo Sekra.—The S. of a group of islands separated from S.W. Singapore by the Silat Sembilan.

Pulo Sekukor.—I. off S. Point of Blakang Mati, about half way between it and St. John's I.

Pulo Semakan.—One of the group of islands S. of Silat Pandan, and about 4 miles S.W. of Singapore Harbour.

Pulo Sembilan.—A group of islands off the S. point of entrance to Perak R., the nearest being 10 miles from the coast.

Pulo Sembilan.—I. in a bay of S.W. Singapore, at the head of which lies the V. of Tanjong Gul. It gives its name to the Silat Sembilan or Straits, between it and a group of islands lying off S.W. shore of the island.

Pulo Senang.—About 1 mile in extent, and 133 feet high, close to N.W. of Rabbit and Coney (q. v.).

Pulo Serayah.—One of a group separated from S.W. Singapore by the Silat Sembilan.

Pulo Serimbun.—Small I. N. of R. of same name in N.W. Singapore, in the old Straits.

Pulo Sibu.—The most S. of the inner chain of islands extending S. from Pulo Tinggi off the E. coast of Johore. It is but a few yards in breadth in some places, and has but little water on it in dry weather. Its extreme height is 553 feet. It produces edible birds'-nests and beche-de-mer, but not in large quantities. The inhabitants were formerly reputed to do a little quiet piracy.

The group, forming a chain extending in a S.E. direction from the above

island off the E. coast of Johore, is also known as Pulo Sibu.

Pulo Siking.—Small I. S. of Silat Pandan, and about 4 miles S.S.W. of Singapore Harbour.

Pulo Siranggong.—Small I. 3 mile N. of entrance of Siranggong R., N.E. Singapore.

Pulo Sirembong.—An island $6\frac{1}{2}$ miles S.E. of Malacca. The Leper Hospital of the Settlement.

Pulo Siribuat.—The principal of the inner chain of islands near Tanjong, Peniabong, Pahang. It consists of two islands joined at low water by a coral reef. Is of safe approach all round, with 14 to 15 fathoms close to the shore. The two islands measure 3 miles E. and W. and $1\frac{1}{2}$ miles N. and E. Extreme height 748 feet.

Pulo Skijang.—Name of the group off S. Point of Blakang Mati I., S. Singapore, of which St. John's is the most important. The name is commonly applied to St. John's Island itself.

Pulo Skijang Berak.—I. S.W. of St. John's I., S. of Singapore, and separated from it by ‡ mile channel.

Pulo Sonsong.—One of the Bunting group (q.v.), and about 19 miles N. of Penang. About $1\frac{1}{2}$ miles by 1 mile in area. Chiefly of argillaceous rock, traversed by veins of quartz. It possesses numerous caves. Uninhabited.

Pulo Tallong.—I. off the W. extremity of Teluk Sera, N. Dindings Territory.

Pulo Tekong.—The largest outlying I. of Singapore, N.E. from Changi district about 2 miles. Large V. and Police station on W. side.

Pulo Tekong Kechil.—Small I., W. of above about a quarter of a mile.

Pulo Tembakol or Peak Island.—A quarter of a mile E. of St. John's I., S. of Singapore.

Pulo Teretek.—A large I. the N. of a group lying off N.W. Kedah. Inhabited by Malays. It is 11 miles from its N.E. point to the mainland.

Pulo Tiga.—I. in, and kampong on E. bank of Perak R., $10\frac{1}{2}$ miles below Bota, S.W. Perak.

Pulo Tikus (Rat Island).—About a mile from N.E. point of Penang. It

is a barren rock of white granite with a little vegetation. It gives its name to the district of Penang opposite to which it lies.

Pulo Tikus.—Small I. 20 miles S.S.W. of entrance to Kedah R.

Pulo Tikus.—I. off N.E. coast of Penang. An obelisk on it marks the N. limit of Penang Harbour. About $\frac{5}{8}$ mile from the nearest point of the Island Tanjong Tikus. V. of same name over $2\frac{1}{2}$ miles from Penang Jetty.

Pulo Timmukul.—A small island off the S. face of Singapore, about 60 yards in diameter and 50 feet high, composed of sandstone and clay.

Pulo Tinggi (literally "High Island") is the name of the most southerly of a group of islets close to the eastern coast of the Malay Peninsula, towards its extreme end, and belonging to the State of Pahang. It is a mass of trap and porphyry, rising to the height of 2,046 feet above the level of the sea, and covered with forest. Along with the islets near it, it contains a population of 300 Malay fishermen. North latitude, 2° 17′.

Pulo Tinggi.—A high island covered with forest, 10 miles S.W. of Pulo Babi, off the E. coast of Johore. Good water is found on its W. side, where there is a good anchorage. There are several small islets in its immediate vicinity, but they are of no importance. These are all included in the Pulo Tinggi group with another chain stretching southward. Extreme height 2,046 feet. Edible birds'nests are found upon the island.

Pulo Tioman (often misspelt "Timoan" and "Timun").-This is the name of the largest of a chain of islets, lying off the eastern coast of the Malay Peninsula, and towards its southern extremity, belonging to the State of Pahang. It lies between north latitudes 2° 44' and 2° 54', is about ten miles long, and from five to six broad, and, as far as examined, consists of a mass of trap rock, bold and precipitous, presenting views not only picturesque but grand. Such is the account given of it by a most intelligent and judicious writer in the Journal of the Indian Archipelago, Mr. J. Thomson, who visited it in 1849. Several of its peaks rise to a respectable height above the level of the sea. [The heights given are:—Middle Peak, 3,444 feet; N. Peak, 3,209 feet; Asses' Ears, N., 2,525 feet, S., 2,294 feet.] "On the southern shore of Tioman," says Mr. Thomson, "are two remarkable peaks, or pinnacles, called by the English the 'Asses' Ears,' and by the Malays Chula-naga (chula, a horn, and naga, the fabulous snake or dragon of the Hindus). They rise out of the spur of one of the southern mountains, at about 1,500 feet above the level of the sea, and from this height, on one side, they spring perpendicularly 1,000 feet. They form a most magnificent feature in the aspect of the island, and cannot be beheld without wonder and awe, even by the most unsusceptible." In another place he observes, "Tioman being mountainous and bold in its configuration, and abounding in lofty pinnacles, peaks and precipices, naturally inspires feelings of wonder, not unmixed with awe, when closely approached. These emotions may be occasionally heightened, if the observer, when nearing it, experiences, as was the case with us, a heavy squall, which covers the towering masses, wrapping the whole in gloom, exaggerating their apparent heights, when these can occasionally be discovered through the lurid haze. It is, therefore, not to be wondered at, that we find this island to be the subject of mythic tradition. The feelings which the scene inspires in the breasts of the simple races that inhabit these parts have sought expression in figurative language, what it would be otherwise difficult to explain, or which would, at least, have required a lengthened description. Tioman has been pictured as a dragon, the most hideous and powerful monster of tradition. Whether the myth had or had not its origin in a metaphor, the native now literally appeals to the peaks and ridges, in which he seeks to discover a similitude to the various parts of the monster, in order to give evidence to the traditions which spring from the prior idea."

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Tioman produces nothing for exportation but swallows' esculent nests, rattans, and dammar—all wild products of the rocks or forests. About 1830 the whole population of this comparatively sterile island amounted only to 50 souls. Most of these were seized and carried off as slaves by the corsairs of Mindanao, and the remainder abandoned the place. About 1839 it was re-occupied, and during Mr. Thomson's visit, ten years after, the population was reckoned to be 200, or about one-seventh part of that of the smaller, but more fertile, Pulo Awar. At present the population is estimated at 500.

Pulo Tokong Yu.—An island off Pahang, the extremity of a group acknowledging that Government.

Pulo Tolie.—Small island close to N. end of Pulo Tioman, 28 miles in a N.E. direction from nearest coast of Johore.

Pulo Tomei.—Small island in Pahang R. 5 miles W. of junction of Rivers Pahang and Pahang Tuah.

Pulo Tonas.—The fourth from the N. of a group of islands lying off the S.E. coast of Pahang.

Pulo Trus Labis.—A small island in the Muar R. between Muar and Johore about 5 miles above Lungga.

Pulo Tudong Kaban.—The sixth from the N. of a group of islands lying off the S.E. coast of Pahang.

Pulo Ubin.—An I. at the E. entrance of the "Old Strait" between Singapore and Johore. It derives its chief importance from the granite quarries farmed out by the Government. Within recent years it has been extensively planted with coffee, &c. The rocks on the S.E. face present interesting geological features.

Pulo Ular.—One of the group of islands lying S. of Silat Pandan, about 3 miles S.W. of Singapore Harbour.

Pulo Undan.—A small I. 7 miles due S. of Umbei, Malacca.

Pulo Upil.—The seventh from the N. of a group of islands lying off the E. coast of Johore.

Pulo Urum.—Small I. N. of Pulo Tekong.

Pulo Varella.—I. 16 miles off the coast of Pahang, 39 miles N. of the entrance to Endau R.

Pulo Yu Besar (216 feet) and Kechil (209 feet).—Two small islands of the Redang group off the coast of Kelantan.

Pumice Stone, in Malay batu timbul, or floating stone.—Pieces ejected from Krakatoa in the Straits of Sunda have been found off the coast of the Peninsula.

Punggor.—V. close to hill of same name 3 miles in a direct line N.W. of Nyalas and situated in the Jus forest reserve, N. Malacca.

Punggor.—V. on the coast of Malacca between the S. high road and the shore about 7 miles from Malacca-town.

Punggor.—A small V. in the Tanjong Rimau district, N. Malacca.

Pungo Mt.—N. of Johol, Negri Sembilan.

Punjom or Penjom.—The seat of a gold mine at Kwala Lipas on the River Jellei in Pahang, lat. 4° 12′ N., long. 102° 8′ E. A concession was granted to a Company which commenced work in 1885, but was not successful in obtaining profitable results. The Company was reconstituted in 1891, and the mines were placed in charge of Mr. T. Blamey, assisted by a staff of nine Europeans, and employing about 200 Chinese and Malays. The gold is found in quartz leaders traversing masses of clay, slate, and a good proportion of free gold is present in the

ore, which is fairly traceable. The first shaft sunk was 110 feet deep, from which levels at 50 and 100 feet were driven. A new shaft has since been sunk, and the old one deepened. An old Chinese mine exists at Panggong Jalis about ½ mile away.

The yield for 1891 was 2,322 ounces, and in 1893 4,553 ounces; the prospects

of the present shareholders seem good. (See also Pahang.)

Punkah.—The Hindostani name of a large palm-leaf fan the stalk of which is rested on the ground while the leaf itself is waved behind the party to be fanned. The word is now applied throughout the East to the swinging frames with cloth vallances fitted in European houses.

Puppet Shows.—Almost the only resemblance to a theatrical representation among the recreations of the Malays is a rari, or puppet show, the only difference being that in a puppet show the figures are seen and in this their shadows are. The show is called wayang kulit, or leather puppets. It is exhibited in a rough shed which has a flooring raised about three feet from the ground; the building is usually twenty feet square and enclosed on three sides, the front alone being open; across this opening a white sheet is stretched on which the shadows of the puppets are thrown and seen through by the audience; the latter sit or stand in the open air. The show seems to be of Hindu origin, if we may judge from the strong resemblance the figures bear to the representations of gods and goddesses worshipped by the Hindus of India; it is probably obtained from Java. The figures are made of buffalo hide, and the arms alone are movable; they are moved by slips of wood attached to them, which are very clumsily contrived, and as thin shadows are seen with the puppets the effect is very much destroyed. Various scenes of a domestic nature are exhibited, and they take the shape of a play, but with no definite plot running through or connecting the different scenes. The following is a specimen. An old man appears weeping for a long-lost son, and moves to and fro for some time bewailing his loss; the showman speaks each figure's part and alters the tone of his voice to suit the age of the speaker; a second figure comes on, representing a young man armed with a kris, who endeavours to pick a quarrel with the first comer, and the conversation is witty and characteristic, eliciting roars of laughter from the lookers-on; a fight ensues, and the old man is wounded; he falls and cries out that were he a young man, or if his lost son were present, his adversary should not thus triumph over him. In his conversation he happens to mention his son's name; the young man intimates that his name is the same, an explanation ensues, and it ends by the old man discovering in his late adversary his long-lost son. The old fellow weeps and laughs alternately, caresses his son frequently, and declares they shall never part again; the scene ends by the youth shedding tears over his late inhuman conduct, and he finally walks off with the old gentleman on his back. The conversation is carried on solely in the Malayan dialect. Warlike scenes please the most; a warrior comes on the stage and challenges his invisible enemy to mortal combat; suddenly another figure comes on at the opposite side and a desperate fight ensues, which lasts for a very long time, and ends in one of the combatants being killed. Occasionally a battle in which ten or twelve figues join takes place, and for hours will the Malays look on at such scenes. The show concludes with an exhibition of various animals—deer, horses, tigers, crocodiles, &c., also birds and fishes. The figures are perforated to represent the eyes, shape of the dress, &c. At the back of the shed, concealed by the sheet, sit the musicians, who keep up an incessant din on drums and cymbals.-J. D. VAUGHAN.

Purlis .- V. on S. bank of R. of same name, N. Kedah.

Putrana .- A chair of state, such as that used by Malay Rajas.

Puya Ikan.—Small V. 31 miles N.E. of Malacca.

Python (Ular sawah).—Specimens as long as 22 feet have been captured in Singapore and Johore, and the natives aver that this snake reaches a length of 30 feet. Their estimates of size, however, are proverbially untrustworthy. The female lays about 200 eggs at one time, all of which are attached to each other by a glutinous substance, the whole thus forming a mass, round which the snake coils herself for incubation. Pythons live chiefly upon pig, small deer, fowls, &c. Some years ago a woman was attacked by one in a hut at night, the reptile having got her hand down its throat before her cries roused her husband, who succeeded in killing the reptile. It is, however, probable that it was only in quest of a stray fowl, and that it mistook the woman's hand (which was hanging over the edge of the bed place) for its usual prey. A good-sized specimen was caught at the Singapore waterworks several years ago. A specimen 18 feet long, kept in the Botanic Gardens, in 1879 was foolishly irritated by a partly drunken soldier who entered its cage. He was seized by the snake and received a squeeze from its coils, which, though no bones were broken, would probably have been fatal had he not been rescued in time.

The above remarks apply to the *Python reticulatus*, or diamond-marked python, of which the prevailing colours are black on an olive ground. But another exists—the *Python curtus*—of which only one specimen has ever reached Europe. It has similar markings on a reddish ground, seldom exceeds three to four feet in length, and has so short a tail that it is known to the native as *Ular bantal*, or the pillow snake. Nothing is known of its habits. I obtained one specimen (dead) from the late Inspector of Police de Fontaine—a live one he also promised me escaping the same night. I was subsequently able to purchase one, which was sent to the Zoological Gardens in charge of a friend, but died on the passage home. A specimen in the Raffles Museum has lost much of its colour from immersion in spirits.

Quail (Burong puyuh) are very plentiful in the lower lands of the Peninsula and are shot and captured in large numbers. They are trained like cocks for fighting purposes amongst the Malays, being very pugnacious birds.

Quicksilver (Raksa).-Known only as a foreign import.

Quill Reed (Beesha Rheedii).—Introduced into the Singapore Botanic Gardens from Travancore.

Quiver (Terkas).—The Malay quiver for the sumpitan arrows (the only one now used) is a joint of bamboo.

Rabbit and Coney.—Two small islands, the latter of which has on it the Raffles Lighthouse (q. v.).

Rachun.-See Poisons.

Radish .- See VEGETABLES.

Raffles, Sir Thomas Stamford, was the son of the commander of a West India merchant ship, and born at sea off the island of Jamaica on the 15th of July, 1781. After a very imperfect education, he was entered as a clerk in the secretary's office at the East India House, at the early age of 15. In 1805 after serving nine years at the India House, he was appointed deputy-secretary to the Government of Penang, at the time with barely 30,000 inhabitants. This placed him in a position to obtain an acquaintance with the Malay language, and to acquire the friendship of the celebrated orientalist, Dr. John Leyden, who had visited the island in quest of health. In 1808 the destruction of Malacca and the deportation of the population was resolved on, but on the representation of Raffles it was abandoned.

In 1811 an expedition for the conquest of Java, and the other possessions of the Dutch in the Archipelago, was prepared by the British Government of India, and Sir Stamford Rapples repaired to Calcutta, and tendered his services, which were gladly accepted. Sir Stamford was appointed secretary to the Governor-General, who himself accompanied the expedition in person. In this capacity he acted until the conquest was completed on September 18, 1811, when he was knighted and appointed nominally Lieutenant-Governor, but in reality Governor of Java and all its dependencies, with, as matters turned out, the unlucky exception of the Spice Islands, which had been captured the previous year, and placed under a distinct authority. Regarding his career in Java, Crawfurd observes:—"In Java Sir Stamford found the government still conducted on the old and vicious principle of commercial monopoly and forced labour, and, intrepid innovator as he was, he overthrew the whole system. But he was not so successful in the more difficult task of reconstruction. Many errors were committed both by himself and by the officers who served under him, of whom I was one. The changes from one scheme to another were too frequent, the drafts on the treasury of British India became burthensome to it, and Sir Stamford, after an administration of four years, was removed by the government of the Marquess of Hastings, the successor of the Earl of Minto."

After his removal from the government of Java he returned to England, and during his short stay there published his "History of Java," a work which, although hastily written, is replete with valuable information; and a lasting monument of his ability and industry, the more meritorious when it is considered that the materials for it were collected amidst the distractions of a most stirring and busy administration. In 1817 he was appointed to the Government of Bencoolen, with the title of Lieutenant-Governor. This poor settlement, however, afforded no scope for his ambition and activity. He betook himself, therefore, to the study of natural history; made an enterprising journey into the interior of Sumatra, visiting a part of that great island which no European had ever seen before, and with the view of establishing a commercial emporium and free port in a convenient and central position, he proceeded to Bengal, and laid his scheme before the Marquess of Hastings. This gave rise to the establishment of Singapore, where the British flag was first hoisted on 29th January, 1814, the Colony being formally proclaimed as such on 6th February, 1819. The Settlement may be well termed the most enduring monument of his reputation. In carrying his plan into execution, he encountered obstacles which would have discouraged and baffled a man of less determination, but he was rewarded with a success which was almost immediate, for in his last visit to it in 1823, he saw a miserable village of piratical Malay fishermen already converted into a prosperous commercial community.

men already converted into a prosperous commercial community.

Sir Stamford Raffles finally left Singapore on June 9th, 1823, visiting Bencoolen on the way. On the 2nd of February, 1824, he embarked with Lady RAFFLES in the Fame for England; but the same evening the ship was burned, and Sir Stamford Raffles suffered the irreparable loss of all his papers, drawings, and natural history collections. On the 8th of April, he embarked in the Mariner for England, where he landed safely on the 20th of August, Continuing the study of natural history, through his indefatigable activity the Zoological Society and Gardens were formed. His slender frame and weakly constitution contrasted with the energy and activity of his mind. His health had never been good, and on the 5th June, 1826, he died suddenly, from the effect of an abscess on the brain. Activity, industry, and political courage were the most remarkable endowments of his character. In the transaction of public business he was ready, rapid, and expert—partly the result of early training, but far more of innate energy and ability. He was not, perhaps, an original thinker, but readily adopted the notions of others-not always with adequate discrimination. Thus, without much time for examination, seeing it lauded by its partisans, he adopted and at once carried into execution, among the then five millions of inhabitants of Java, the fanciful and pernicious Indian revenue system called the Ryotwarry, and saw it break down even before he had himself quitted the administration of the island.*

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Sir Stamford Raffles' statue at Singapore was unveiled on the celebration of Her Majesty's Jubilee, on the 28th June, 1887.

Raffles Lighthouse.—On Coney Island, S.W. by S. 71 miles from W. entrance to Singapore Harbour; so-called after Sir Stamford Raffles. The lighthouse exhibits a fixed white light 105 feet above high water, and visible 12 miles.

Raga.—The wicker ball used by Malays. It is chiefly used as a shuttlecock, being struck by the heel with considerable dexterity by good players.

Rainfall.—In 1848 the average rainfall was reported by Dr. LITTLE to be 92.697 inches for Singapore. Penang Hill gave 116.10 inches; Penang Plain, 62.5 inches; and Province Wellesley, 79.1 inches. About the same proportions have usually obtained, i.e., 5.75, 7.25, 4.15, and 4.63, roughly speaking. The following is the return of total rainfall for 1891:—

Singapore	•••	•••	•••	•••	99.70 inches
Penang	•••				93.99 ,,
P. Wellesley	•••	•••			75.05 ,,
Malacca	•••	•••			78.35 ,,
Dindings	•••	•••	•••	•••	99.09

The average rainfall in Perak is given as from 60 to 90 inches.

Raja.—This Sanskrit name for a king or sovereign prince is current nearly throughout the whole of Malaya, usually as a synonym with a native word, or with the well-known Arabic one of Sultan.

Raja Ali.—Imp. V. in S.E. Perak on the W. bank of the Slim R.

Raja di Raja or Raja Shabandar.—The head of riverine matters in certain of the Native States.

Raja Itam.—V. in a peninsula formed by a bend of the R. Bernam, S. Perak, 3 miles from Sabba in Selangor. Site of a Police station.

Rama.—This Hindu demi-god, and all the personages of the Sanskrit poem which take their names from him, with his own adventures in search of his stolen wife Sita, are nearly as familiar to the Malays as they are to the Hindus themselves. The Javanese have poems, both in the ancient and modern tongue, narrating the adventures of Rama, and from these have been formed romances in prose by the Malays. These adventures, too, form the most frequent subject of the drama of both people.*

Ramaning Chandong.— A petty village on the borders of Malacca and Rembau.

Ramie (Urtica tenacissima).—The same fibre from which the grass-cloth of China is manufactured. Colonel Low, in his work on Penang and Province Wellesley, alludes to the same plant, and by the same name (Ramee), as yielding a sort of hemp; and observes that it might be easily manufactured into the linen which in China is called grass-cloth. "The Chinese here," he adds, "call the plant Cho, and allege that it is the same as that which grows in China, where it is used for making the cloth just mentioned."

Ranchong.— The name of a small kris resembling a stiletto.

Ranjau.—Sharp stakes or irons stuck in the long grass outside a stockade so as to wound the feet and legs of an attacking party. Gang robbers also drop bundles of them when retreating under police pursuit, so tied that the points of some stick up. They are much dreaded by the Malays, who will hesitate to pursue thieves if the cry is raised that they are dropping ranjaus.

Rantau.—In Malay, signifies, literally, the reach of a river or of a narrow strait, and from thence a district or country. It is the specific name of one of

four low islands close to the eastern coast of Sumatra, opposite to that portion of the Malay Peninsula which lies between Malacca and Singapore. The island is about forty-five miles long and fifteen broad, in its widest part. The few inhabitants consist of Malays, and the chief if not the only produce for exportation is crude sago, sent to Singapore to be there manufactured by the Chinese.

Rantau.—Large V. half way between Rassa and Linggi, Sungei Ujong.

Rantau Panjang.—V. in the Ayer Pah Abas district, Malacca. Rantau Panjang.—A bend of the Endau R. in S.E. Pahang.

Rantau Panjang or Long Beach.—A portion of the Muda River 14 miles 3 furlongs from Butterworth, Province Wellesley. It is about $1\frac{1}{2}$ miles long, and at its E. end the river recurves to the S.W., thus making Penang Hill appear a portion of an inland range. Shortly turning again to the N.E., the river forms a peninsula on its N. side, across which a canal, dry at low water, was cut some thirty years ago by a Kedah chief.

Rapa.-V. in N.W. Rembau, Negri Sembilan.

Rasau Busu.-V. on W. bank of R. Endau, N.E. Johore.

Raspberry.—Not indigenous; but, as numerous wild plants are to be met with on Penang Hill, it was probably introduced in former years by some European resident. The fruit, however, like that of the strawberry in these latitudes, is tasteless.

Rassa.—The most important V. in Sungei Ujong, and the residence of the Collector and Treasurer. It possesses several very good Chinese shops, where all descriptions of canned meats, preserves, milk and wines (even champagne) can be purchased. About a mile N. of it lies the Klana's house, the Residency being 2 miles further. A good road connects it with Permatang Pasir (7 miles from Kwala Linggi), the usual landing-place from the steam launches plying to Malacca, &c.

Rasse (Viveria malaccensis).—Rasa in Jav., whence its English name, and musang dibat in Malay. The larger of the two true civets inhabiting the Peninsula. It furnishes the well-known scent in large quantities. It is difficult to tame, and the natives allege that salt poisons it. Its fur is rather coarse and of a warm greyish-brown in colour, upon which are eight parallel lines of elongated dark spots.*

Rat.—The common brown rat is frequent all over Malaya—wherever there is a considerable population. In Singapore, until the formation of the British Settlement, there were very few, but immediately after, they appeared in vast numbers. The Malay name for the rat is tikus, and it is the same for the mouse, for there is no distinction between them, except as large and small. It seems probable that the word tikus belonged, originally, to the mouse only, as being indigenous, and that the brown rat was brought to the islands, as to other countries, from the continent of India, although there be no record of the time or manner of its introduction.

Rattan (Calamus sp.).—The rotan of the Malays. A creeping plant abounding in the jungle of the Peninsula and Archipelago, having a prickly outer skin, which is stripped off, when the interior shows the familiar "cane" of schoolboy days. A list is subjoined of those known to trade in Singapore, with their approximate values per picul of 133½ lbs.:—

			3	Dols.	Dols.					Dols.	Dols.
Banjermassin	***	***	***	5.00 1	0 7.00	Common black, S	Straits		***	-	-
Baram, Straits			***		-	Colie	***	***	***	6.50	-
Belangan Jahut	***	***	***	6.50	-	" Jahap	***	***	***		
Bintulu Sarawak Butangan Saga	***	***	***	6.75		Pasir	***	***	444	6.75	to 7.50
Dusangan baga	414	***	311	2.00	F35	Endau Sega Ayer		***	***		_

				Dols.	Dols.	l					Dols.	Dols.
		•••	•••	5.75	to 6.00	Pasah Li	ngga		•••		_	
Tambi Tunting	•••		•••	7.00		Pasir Lui		•••	•••	•••	6.50	_
,, Straits	•••	•••	• • • •	_		,, Pakk	ir, clea			pore	10.00	_
Kanarah	•••	•••	•••	3.00	_	,, Saga				٠	_	_
Kemaman			•••	2.00	to 2.50	Pontiana		ous)	•••		3.60	
,, white,	Strai	ts	•••	6.00		Sambas,			•••		_	
Kola Waringin,		•••	•••			Sandakar	1	•••		•••	4.50	to 9.00
S	aga	•••	•••	_		,,	Chuch			•••		
Dodona Com		•••	•••	3.00	to 6.00	,,	cleane	d in S	ingapo	re	_	_
Pahang white, Str	aits		•••	_	_	Sarawak	•••	•••			3.00 1	io 3.50
" Sag	a.		•••	6.00		Semanbu	•••	•••	•••		_	_
Pagattan Lunting	+	•••	•••	6.00	_	Tanah Pu				•••	_	_
Palembang, clean	ed in	Sings	pore	6.00	to 9.00	,,		abu`		•••	4.75	
,, Saga			•		_	"						

Four species of Calamus and two of Calamsogus (also a rotan) are cultivated in the Singapore Botanic Gardens—Calamus rotan, Calamus arborescens, Calamus fasciculatus, and Calamus longiceps; with Calamsogus hernifolius and Wallichifolius.

The rotans of the Peninsula, however, though but few appear to have become articles of commerce, are as various in name as those above specified, which, as will be noted, are largely from Netherlands India sources. A native list furnished by Mr. D. F. A. Hervey in the J. S. B. R. A. S. is as follows:—Rotan tunggal, rotan batu, rotan krei (or kral in Pahang), rotan lebun, rotan tawar or getah, rotan bakau, rotan layar, rotan prut ayam, rotan manau, rotan chinchin, rotan hudang, rotan hudang tikus, rotan peledas, rotan lilin, rotan sabut, rotan dahan, rotan sengkelah, rotan buah, rotan semambu, rotan dudok, rotan chichir, rotan segar, rotan segei, rotan lichin, rotan kikir, rotan sega, rotan sega badak (grows near water), rotan jernang, rotan senenyer or bras, rotan dini (grows near the sea), and rotan perdas.

Raub.—A gold-bearing district in Pahang close to the Selangor frontier (lat. 3° 50′ N. long 102° E.). A concession to work the mines was availed of by a syndicate in 1889, but, like that of Punjom, it did not at first prove profitable. The syndicate was not long since reconstructed, the former manager, Mr. Bibby, still retaining his position. The workings are situated in very swampy ground, so that it is difficult to keep them free from water. In November, 1891, the principal drives known as Raub Hole were flooded and collapsed, but with better pumping appliances the present prospects seem favourable. Raub Hole was an excavation about 40 feet deep, 60 wide and 100 feet long, and had been mined by Chinese and Sumatra Malays for some 50 years. A new shaft 170 feet deep was sunk, and from this most of the ore crushed is procured, while more recently another shaft of similar depth has been sunk on the Raub Hole lode. In Mr. Rodgers' Report on Pahang for 1892, he gives the outturns of gold from these mines in less than four years at 5,500 ounces—a highly favourable result; 4,881 ounces were produced in 1893.

Rawa.—Immigrants from Sumatra who have crossed to Perak and Selangor. They are reported as rather enterprising. Like the Mandelings, their original habitat adjoined that of the *Battas*, who have the reputation of being cannibals.

Raya.—V. on S. coast of Sungei Ujong 3½ miles W. of Kwala Linggi.

Raya, Hari.—The name of the day succeeding the "month of fasting"—bulan puss—and that of the 10th day of the month Zil Hayjah. They are both feasts, the former as a rejoicing that fasting is over, and the latter in honour of Abraham's offering up his son, though Ishmael and not Isaac is maintained to have been the intended victim. Animals sacrificed at this feast will, it is believed, aid the true believer in crossing the bridge of death after his demise.

Rayet, Orang.—Inhabitants of the banks of the Palong R., a tributary of the Muar R. in the State of that name.

Recko.—An important V. on S. bank of Sungei Langat, Selangor, about 5 miles from the Sungei Ujong frontier. Tin mines exist here.

Red Fish. - See MALACCA FISH.

Relau.—The district in S. Penang opposite Pulo Jerejak.—V. of same name in C. of district.

Relau Semut.—A Chinese smelting furnace without blast. R. Tongkah is the Siamese (often called Hokienese) furnace for the same purpose. It is iron bound and built on a stand, the foundation being iron rice pans.

Religion.-The religion of the Malays is Mahomedanism pure and simple.

Reman.—One of the nine districts of Patani, q. v.

Rembau.—One of the Negri Sembilan lying between Sri Menanti, Johol, Malacca, and Sungei Ujong. It has two divisions, viz., Rembau Ulu and Rembau Hilir, comprising some eight tribes with elective chiefs called *Batins*, who are under a *Penghulu*, or headman, also elective. Besides Malays, the population—about 10,000—comprises *Udais*, *Jakuns*, and *Sakeis*. The Malay inhabitants are reputed to be somewhat superior to their Johol neighbours.

Rengkong.—V. on W. bank of Kinta R. and 3 m. N. of Ipoh on the E. bank, C. Perak.

Reptiles (see Ophidia, Crocodile, Frog. &c.).—A very complete catalogue of the then known reptiles of the Peninsula and Settlements was published by Dr. Cantor some forty years ago, and has been republished by the S. B. R. A. S. in 1886. Very few additions have been made to it since that date, and it may be taken as giving a fair idea of the subject even at the present day. The paper being easily obtainable by specialists, it is not here quoted.

Rewards for destruction of animals and reptiles. The following table shows the amounts given:—

				8
Tigers, full grown		***		50.00
Tigers, half grown			***	15.00
Bears and Panthers, full gro	wn	***		20.00
Bears and Panthers, half gro		***		10.00
Crocodiles, Pythons (Uler				
kinds of Snakes:-Tedo	ng Sendok,	Tedong	Selah,	
Tedong Mâtahâri, Kâtam	Tebu, Kâpal	k Bâkau, I	Kâpak	
Api, Uler Pûnti, Uler Blêr	ang Selimpa	t—		
Under one foot in leng	h	***	23.6	0.25
Under one foot in leng 1 foot and under 5 feet		***	***	0.25 0.50
				20000
1 foot and under 5 feet	***	***	***	0.50
1 foot and under 5 feet 5 feet and under 8 feet	t		***	0.50 0.75

Rheumatism.—Common amongst the Malays, who resort to a process called *pichit* to cure it. This consists in kneading the joint or part affected till the pain ceases.

Rhinoceros (Bádak).—Two species are known, named respectively the Javan and Sumatran varieties, the former with one, and the latter with two horns projecting from the nose. The horn is not attached to the skull, but is a mere growth from the skin. Both species are smaller and less ferocious than that of India. The two-horned variety is that found in the Peninsula, and, unlike its

Indian congener, which is alleged to successfully hold its own against the elephant, will turn tail before a wild dog.

Rice (padi and nasi).—Two modes of cultivation are in use—the "dry" and the "wet." The former is adopted on the hill-sides, and the latter in the plains. Major McNair states that the wet system was introduced by the Indians into Sumatra, whence it spread to the Peninsula. At the time of the autumnal rains, the grain is sown thickly in nurseries, whence, after attaining a height of seven or eight inches, it is transferred in clusters of six or eight into holes dibbled in the marshy surface, in rows about a foot apart. The rice grounds at this period present the appearance of inland lakes. After the rice reaches the ear, further water is injurious to it, and heavy rains sometimes spoil the crop.

There are many varieties of "black," "white," and "red" padi (the name applied to rice in the husk). Of the black sorts, the varieties known as maiyong sedawa and pulut soh are chiefly cultivated; of the red, those known as krani and pulut istra; while a blackish red variety is known as pulut jagong. Of the white sorts, which alone find their way to Europe, those known as pulut galah, pulut bunga melong, pulut padang trap, pulut maiyong serai, and pulut maiyong teluk ikur are the commonest. But some idea may be formed of the vast number of varieties when it is stated that the Raffles Museum contains over eighty different sorts from Siam, which, however, pretty fairly represent those of the Malayan States. Oddly enough the Kling coolies of Penang and Province Wellesley prefer the black rice to the white. The husking leaves a certain portion of the black skin adherent, and when boiled the rice looks anything but inviting.

Husking is usually effected by large lever hammers working in a stone pan, and worked by the husker throwing his weight alternately beyond and on the fulcrum. In some few cases, water and steam-power have been adopted by the richer Chinese, while the Malay or Kling seldom gets beyond a simple rough pestle and mortar, enough for one meal only being husked at a time. The padi husks when calcined form a remarkably hard silicious powder, used for cleaning knives,

&c., by servants in European employ.

The grass and other weeds which spring up after the rice harvest is over is dug into the ground as manure, thus saving any expense under this head.

Rilit.—Small V. on W. bank of Raya R., C. Perak, about 8 miles E. by N. of Kinta.

Rim.—District in E. part of Malacca between Kesang and Chabau and N. of Jasin. Jungle V. in the same district, which is mainly forest.

Rimau.—Tiger. Applied to both tigers and leopards, but by the Malays (who believe that a tiger understands human speech) never used in the jungle. They speak of him as the Tuhan utan = "lord of the jungle."

Rimau-Kambing (literally tigers and sheep).—A game in which four tigers have to "eat" twelve sheep, somewhat resembling our "Fox and Geese."

Rimba.—Forest or virgin jungle.

Rimba Panjang.—A tract of jungle land E. of Kota Lama and 8 to 10 miles E. of the Perak R. in C. Perak.

Rimba Panjang.—V. on the road from Chabau to Nyalas in E. Malacca.

Ringga.—Properly a camel's pannier, but applied to those used on elephants.

Rings are favourite ornaments with the Malays, who even will wear glass if precious stones are not within their means. They are generally of very low touch gold.

Ringworm (Kûrap) is known to the Malays, and as they regard it with indfference its spread is sometimes abnormal.

Rite Pula.—V. on S. of Langat R. near its junction with the Jugra R., Selangor.

Rochor.—The N.E. district of Singapore town, bounded E. by the Kalang R.

Rocky Point.—On the coast of N. Pahang, 6 miles S. of R. Cherating.

Rokam.—A fruit resembling a gooseberry in flavour; said to be extremely dangerous in its unripe state.

Romania or Ramenia Point.—This is the name given in our maps to the most south-easterly point of the Malay Peninsula, and consequently of the Continent of Asia. It is in N. latitude 1° 21′. The origin of the name is unknown, but probably Portuguese. In Malay it is called Tanjong-panyuso, literally 'wetnurse cape.' The whole country near this last joint of the tail of Asia, the fertile mother of so many civilizations, is a continuous forest, without human inhabitants, and the abode of the tiger and wild boar. The point itself is the S.E. extremity of a bold rocky promontory of plutonic origin. It is generally, but erroneously, called the S. point of Asia, that distinction (if we except Singapore) belonging to Tanjong Bulus, the left point of the W. entrance to Johore Strait or Silat Tambrau.

Romances.—See LITERATURE and BIBLIOGRAPHY.

Rosary.—The Malays wear a sort of rosary of beads for use in repeating their prayers.

Roses.—Numerous varieties of rose have been introduced into the Settlements by foreign residents, but in time they invariably become weedy, and the flowers tend to revert to the uncultivated form. For some years, however, they flourish fairly well and are much-esteemed additions to the flower vase. Two or three owners of gardens in Singapore have grown them with gratifying success.

Raw Island .- Small island off N. coast of Patani.

Ruby.—Known to the Malays as batu delima, or yakut; but no mines exist in the Peninsula, the stones seen being imported.

Rumah Hantu.—A haunted house. Applied by the Malays to Masonic lodges. (See Hantu.)

Rumbiah.—A village in Malacca on the road to Naning (J. I. A., Vol. VI. p. 369, not laid down in map S. A. S.). It is in the Bringin district, and was a great point of departure for early explorers of the territory and adjacent states. It lies about 11 miles N. of Malacca-town.

Rumput.—A small V. in N. of Tangga Batu district, Malacca.

Rusa Grass Oil.—See Oils.

Sa'batu.—V. on the road from Merlimau to S. Rambei, extreme S.E. of Malacca territory, about 3 miles from the former V.

Sabba.—Important V. and Police station on S. bank of Bernam R., N. Selangor, about 15 miles from the mouth.

Sabet.—A sickle used for cutting padi.

Sabimba.—An aboriginal tribe transferred from Battam to the S. coast of Johore in 1846 by the then *Tumungong*. They were entirely forest people, but alleged that their ancestors came from Celebes and were wrecked on Battam, where they remained cultivating the ground. Unfortunately, however, they were so harried by pirates that, in despair, they at length foreswore all civilization, making a vow never again to form *ladangs*, live a settled life, or even eat the domestic fowl, the crowing of a cock having sometimes betrayed their dwellings to the pirates. An interesting account is given of them at pp. 294 et seq., Vol. I, J. I. A. They have, however, now almost become merged in the surrounding Malays, and retain but few tribal distinctions.

Sabusah.-A hill in Padang Sebang district, N. Malacca.

Sacrifice.—In Malay the word sambalih signifies "to sacrifice with religious rites," and sambalihan, a derivative from it, is "a sacrifice or immolation." These words, which are native, are now used for the slaughter of animals with the forms of the Mahommedan religion, but what kind of sacrifice they referred to before conversion to this faith it is difficult to conjecture. It cannot have been the self-sacrifice of the widow or concubine on the funeral-pile of the husband, for that is known by a different name—bela—signifying "expiation or atonement." The Arabic word for a sacrifice or atonement—kurban—is occasionally employed.*

Sago, Pearl, is thus prepared:—The bundles, covered with paim leaves termed tampins, received from the grower, having been placed in heaps in the shed, the first step is to open them, cast the contents on a plank frame about 12 feet square, surrounded by a rim rising about 2 inches from the surface. The sago, massed together by having remained compressed in the tampin, is here broken

up by the common changkol.

The first process to which it is subjected is that of a thorough washing. For this purpose strong tubs are employed, about 32 inches deep, 40 inches in diameter at the top, and 6 inches more at the bottom, bound by three hoops of about six thick rattans twisted together. A piece of thin coarse cloth is fastened by its four corners over each tub, and hangs loosely into it. The moist sago being poured into this strainer, and there broken and bruised by the hand, is agitated until all its fine particles pass through the cloth and descend to the bottom of the tub, while the fragments of leaves, fibre and other impurities which remain in the cloth, are shaken into a round mass, which is thrown aside. The sago is next stirred about with an oar for about an hour, after which it is left to stand about twelve hours, when the water is ladled out, and the sago, which fills about half the tub, is removed to undergo the last purifying process which precedes the granulation. This is effected by an arrangement of troughs in which the finer powder is deposited, while any impurities are carried away in the stream of water.

In order to give it the degree of dryness required, it is removed from the troughs and exposed for one day to the sun in lumps about a cubic foot in size, which are placed in tables standing in the open air. It is next carried to the large shed, where it is thrown in a heap on a long table, and broken down into a pulverulent state. It then passes through an oblong sieve, 30 inches by 20 inches, of which the bottom is formed of parallel fibres from the stem of the cocoa-nut leaf, kept in their positions by strings which cross them at distances of about 2 inches. The lumps which do not pass through the long interstices between

the fibres are thrown back into the heap.

The granulation or pearling now takes place. The sifted sago is placed in a cloth, of which the ends are tied to a long stick and which is kept expanded in a bag shape by a short cross stick. A horizontal vibratory motion is given to this, the whole mass being kept in constant agitation, and every part successfully driven along the sides of the bag. This lasts for about a minute, when the now granular sago is again passed through a sieve similar to the preceding one, but the smaller grains which pass through are those which are now rejected. Those that remain are transferred to a circular sieve, of which the bottom is formed of fine strips of bamboo crossing each other. The grains that pass through the square holes thus produced form the pearl sago of commerce in the unroasted state.

produced form the pearl sage of commerce in the unreasted state.

The reasting takes place in a row of iron pans, each about 2½ feet in diameter, which are built into a platform of masonry about 15 feet long and 4 feet in breadth, covered with flat tiles. The pan rests in an inclined position partly against the back of the platform, which rises about a foot above its level, and partly on a small prop of brickwork on the right side, an offshoot from the wall. Into the top of

this prop a plate is sunk in which a cloth saturated with wood oil-minyak krueng -is kept. Behind each pan is an open furnace mouth, and a man constantly attends to the fires, keeping them supplied with a few billets of bakau wood, and regulating them with a long two-pronged fork, so as to maintain a moderate heat. The pan being gently rubbed with the cloth, a man who sits in front of it on a low stool placed on the platform pours into it a quantity of granular sago. This he slowly stirs for a short time with a wooden implement, called weah, having a sharp curved edge. More sago is poured in until it amounts to about two chupaks, when, as it hardens, he uses the weak more freely. After about three minutes' roasting, it is removed to a table and passed through a round sieve similar to that before described. The grains that adhere to each other are thrown aside, and those that pass through form a smoking heap, which is allowed to lie undisturbed for about twelve hours. The grains are about the same size as they were before roasting, and some retain wholly or partially their white or mealy appearance, but the great part have become translucent and glutinous, and all have acquired a certain degree of toughness, although still soft. The final process is another roasting, which renders them hard and tough, and greatly reduces their size. The pearl sago thus prepared and fit for exportation is put away in large open bins ready to be transferred to boxes or bags when sold.

The method of making pearl sago, which we have described, appears to have undergone no improvement or change whatever since it was introduced into

Singapore in 1819. The manufacture is entirely in Chinese hands.

Sago Palm (Sagus Rhumphiana and S. Lævis) flourishes when planted in the flat and marshy portions of the Peninsula and Settlements, but, although plentiful in various portions of the Malay Archipelago, does not appear to be indigenous to the mainland. Most of that exported from Singapore is imported in a crude state from Siak and other Dutch possessions, and granulated by Chinese workmen so as to form the pearl sago of commerce. It is somewhat surprising that, considering the suitable land available (which must amount to hundreds of square miles), larger plantations have not been tried. The tree takes from seven to fifteen years (according to various authors-the local estimate is from eight to twelve) to come to perfection, and, being cut down and split, the pith-like interior is scraped out and treated in running water until only the fine flour remains. It will give some idea of the temptations to cultivate sago, to quote the following from an article written many years ago in the J. I. A.: - "The sago-tree, when cut down and the top severed from it, is a cylinder about 20 inches in diameter and 15 to 20 feet in height. If we assume 20 in. by 15 ft. to be an average size, the contents will be nearly 26 bushels, and allowing one-half for woody fibre, there will remain 13 bushels of starch, 700 pounds being equivalent to 12½ bushels. The enormous rate of this produce may be realized if it be considered that three trees yield more nutritive matter than an acre of wheat, and six trees more than an acre of potatoes. An acre of sago, if cut down at one harvest, will yield 5,220 bushels, or as much as 163 acres of wheat, so that, according as we allow 7 or 15 years for the growth of a tree, an acre of sago is equal in annual produce to 23 or 10 acres of wheat."

The following is a description of the tree and the mode of obtaining the farina,

from the same source :-

"It shows itself at first, and for a long time afterwards, merely as a bush or shrub, consisting of different upright branches, which are about 15 or 16 feet high, green, concave in the inner side, convex on the outer, and smooth. On the lower part of these, long small thorns are seen, which stand in order above each other like needles, the middle being always the longest. The leaves, which are very long and small, stand out on both sides of these branches, are longer, broader, and thinner than those of the cocoa-nut, and have on the sides soft, erect spines. In due time there rises from the bush a stem, which, having reached twice the height of a

man, gradually loses its thorns, except those above, which also afterwards gradually fall off. The branches, which become tolerably thick, have a broad base called gururu, about three feet long and a foot broad, being almost like a gutter, which surrounds the stem and the next branch, and decreases to its top. The upper part of the branch is called gabba gabba, and is about the thickness of the arm at its top and much thicker below.

As long as the stem is immature, the thorny branches at the bottom protect it from the wild hogs, who would otherwise batten on the meal. It gives no fruit until all its strength is expended and its death approaches, and when the branches are strewed with meal, at which time small fruits like round pigeon eggs show themselves in great number at its top, like a crown. These are green, and when

ripe sour, and they finally become yellow.

The sago-tree, whose appearance when it has attained its full growth has much that of the *qomuti* tree, is cut down at the bottom of the stem. The greater or less adaptation of the ground regulates its speedy or slow development; its full development may, however, be placed at about 10 or 15 years. The natives know this period from the appearance of the fruit at the top of the tree, and then call the tree masak (ripe). The tree requires very little care in rearing it, only attention must be given that it is not covered by creeping plants, and that the feet of the trees be kept somewhat clear of high weeds that the growth of young shoots may not be hindered. A full-grown tree of good quality may generally be valued at a sum of f8 copper, and a medium tree at f5 copper. The sago-tree being cut down, the mealy substance inside is taken out and prepared for use and transport in the following manner:—The stem is cut with the parang into pieces of a fathom in length, which are split through the middle and cut up, and are always carried with great care to a running water. To separate the meal from the shell, the native uses an indigenous adze (nany) which is of the following description: a piece of bamboo, 3 inches in circumference and 2 feet long, is pierced with a slanting hole, in which another piece of bamboo, like a chisel and sharpened at the broad end, is stuck and fastened to the other with a string. For the cleaning of the sago, that is to say, to separate the meal from all impurities and woody particles, an apparatus is used called the satrany; it consists of the end of a large old sago stem already properly excavated by nature, fitted at the broadest side by means of bamboo pegs to a bag of the bark of cocoa-nut (runut); the satrany thus provided is laid upon two wooden forks about 3 or 4 feet high, the open end being considerably higher and placed under a stream of water running very gently from a bamboo pipe, while right opposite the other end a long and very strong stick is stuck in the ground, and bent till its upper extremity is brought to the level of the runut, to which it is fastened. The runut is thus always kept in a state of tension, when the sago meal, mixed with water, is pressed by the hand against it. The meal passes through the runut, while the coarse matters (ela) remain in the sago trough, and serve as food for pigs and poultry. [On the ela, when thrown aside in heaps, a kind of mushroom grows, which forms an agreeable dish; and when the trees rot, there also grow in the rotting parts, as well as in the crown, fine, fat whitish sago worms with brown heads, which the natives roast on skewers, and devour as a great dainty; but the heads are taken off and then they are eaten by some Dutchmen also. But I cannot say how they taste, for I never had an inclination to try them.

The sago pressed through the satrany is received into the goti, which also rests on two forks stuck in the ground. The goti is a portion of a split sago trunk, of which both ends are made watertight by sago leaves and the spongy substance of the gomuti, or the bark of the kayu putch tree. The goti always receives such a supply of water from its upper extremity that it remains full, and gently overflows at the low end, thus allowing the heavy farina to sink, while any woody particles that have been pressed through the runut are carried off by the water.

This simple operation, called pukul sago, or striking the sago, being performed,

the farina is taken out of the *goti* and packed in cylindrical baskets made of sago leaves, ready for exportation. These baskets, which are all nearly of the same size, are named *tumang sago*."

Sagueir.—A fermented liquor from the palm-tree, which is used much like beer in some portions of the Archipelago. It appears to be less strong than the "toddy," so well known.

Sai.—The southernmost of the nine districts of Patani. A V. of same name on E. bank of Telupin R. [This is also the Siamese name of Kedah.]

Sakei or Sakai (both spellings are used by very recent writers).—The aboriginal tribes who claim to be the original possessors of the soil, and chiefly inhabit the less accessible portions of the Peninsula. The Orang Semang appear to be a tribe of the same origin, and are found in the same line of country, but confine themselves to the mountains, while the Sakei inhabit the plains. Very full descriptions are given of both in the pages of the J. S. B. R. A. S., especially in No. 2, pp. 208 et seq. For the purposes of this work, it will be sufficient to quote an interesting account which appeared in the Field newspaper:—

"The Semang and Sakei, as they are termed by themselves, claim by tradition to be the aborigines of the Malay Peninsula, and to have settled down in their present locality after years of travel in an endeavour to reach the end of the land. The inroads of the Malays have driven them from the borders near the sea to the centre of the country, where still exist the primeval forests in which they can remain unmolested by their fellow-men, whom they fear more

than the wild beasts with whom they live.

"The features of the Sakei, or 'plains' men, are those of the negro, and it is a matter for students of the dispersion of races to decide how and from whence come the dark skin, woolly hair, flat noses, and thick lips, so prevalent amongst the Sakei of the Malay Peninsula. The true Semang, on the other hand, has a complexion of a light copper colour, brown straight hair, and a clear skin.

"The two tribes speak different languages, but follow the same mode of life, and are on amicable terms. The Semangs keep almost entirely to their mountain jungle, while the Sakei occasionally issue from their plain retreats to hold com-

munication with the Malays.

"The first occasion in which I had a view of these interesting specimens of humanity was in the year 1864, while on a tour of inspection at the head of the Selama River, a branch of the Krian, which latter was the boundary, prior to the Perak war, between that country and the British possessions near its mouth. On arriving at a Malay kampong close to Gunong Inas, a high peak of the centre mountain range, I learnt that there were a number of Sakei in the neighbourhood, and, of course, at once expressed a wish to see them, and accordingly sent a mutual Malay friend to ask the chief if he would come to see the orang putch, or white man.

"The chief, who gloried in the name of *Tuboo*, or sugar-cane, was about 5 feet 3 inches high, of a dark-brown complexion, with very flat features, and grizzly hair, which would vie with a negro's in twist. His frame was spare to a degree, but hard; his muscles knotted and visible in every portion of his light figure, which still retained the elasticity of manhood, notwithstanding his age, which must have been about fifty-five or sixty. His eyes, small and piercing, moved about in a restless, suspicious manner, which nothing could prevent, and in this feature the Malays are wont to recognize a wild man.

"I was told that when a man wanted to marry, he first of all spoke to the girl; if she agreed, he then went to the father and mother, taking some jungle produce as a gift. The terms of purchase were then arranged—usually a piece of iron, some roots and flowers; and when these were forthcoming, a day was fixed for the ceremony, which consisted simply of a feast in the neighbourhood of an ant-hill (where

the Malays suppose that spirits reside), after which the couple leave and proceed to some favourable spot for their honeymoon, returning at leisure to the tribe. It is a most peculiar feature with these people that the marriage law exists at all; and further, the stringency which attaches to it is astounding. Polygamy is allowed, but is seldom practised; while the punishment for adultery is death—usually carried out by a relative, who invites his victim to a hunting excursion, and, after tiring him out, beats his brains out with a club while he is asleep, and leaves him to rot on the earth, denying to his remains the rough sepulture given to those who die in an honourable way, whose remains are laid on a log of wood, in a sitting posture, and buried a foot or two under the ground. . . . I made strict inquiries as to their belief, naturally concluding there would exist some idea of a Supreme Being; but, to my surprise, these people had no idea of a God; they had no representative caves or sacred spots; nothing was looked upon as supernatural; they did not bother themselves to imagine a cause for thunder or lightning, or sun or moon, or any of the phenomena which one and all give rise in other savages to poetical ideas of dragons, combats, and destroying spirits. The Sakeis were born, lived as best they could, died, rotted, and there ended. They build no houses, seldom stop more than two days in one spot, and pursue a thoroughly nomadic life, having no flocks or herds, existing from hand to mouth, but free, and this they prize to a wonderful degree."

The Sakeis are divided into Sakei jinak and Sakei liar, meaning respectively "tame" and "wild Sakei." The former imitate the Malay dress when in Malay villages, but the liar adhere to the narrow girdle of bast or cotton stuff fastened round the waist and drawn up through the legs—both sexes adopting this latter custom. The women are frequently tattooed, and perforate the cartilage of the nose, in which a porcupine quill is often inserted. The liar are also at constant feud with the Malays, with whom, unlike the jinak, they seldom have commercial

dealings.

Sala.—See Bertam.

Salak.—V. about 4 m. E. of Perak R., N. Perak, not far S. of Kwala Plus, at the foot of a hill where tin is found in sufficient quantities to repay mining.

Salt (Garam in Malay) is not manufactured, except in very small quantities, in the Peninsula. The supply is derived from Java, the Philippines and India.

Saltpetre.—The name for this commodity in Malay—indeed, with some corruptions, in all the languages of the Malay and Philippine Archipelagos—is sandawa. It is obtained from the decomposed dung of birds and bats in caves. To what purpose it was applied before the knowledge of gunpowder, is uncertain, but probably to the manufacture of fireworks. It is entirely a native word.

Samagaga Dalam or Kapala Batas.—A populous V. 6 miles N.E. of Butterworth, Province Wellesley, between Permatang Kuching and Ara-Rendang.

Sambals.—This is the Malay name of certain relishes eaten with curry, and the list is, practically, almost inexhaustible. Those made with chilies are known as chabei besar or kechil, while many fish figure also, such as ikan sembilan, ikan jinehak, ikan mas, &c. Some twenty or thirty names might be given, but they are mostly of local pplication, according to the place where the name is current.

Samei.—Small rough mats made of *nipah* leaves used for the same purpose as *kajangs*.

Sampa.—A sort of rinderpest which attacks buffaloes. It has been very prevalent in Pahang.

Sampan.—The Chinese word for boat, which has passed into Malay. A large description, having a serpent for a figure head, is called sampan naga, the

latter word being Sanskrit—a queer combination in Malay. As a rule, sampan is applied to small boats only, larger ones being called prahus.

Sandal Wood.—Imported only from other places in the Archipelago.

Sandstone is abundant, especially in Perak, but is seldom worked. Opposite Penang and to the northward it prevails, associated with clays and shales, as also in Selangor and Johore.

Sang Kelembai.—A legendary personage connected with various Malay myths. (See N. and Q. with No. 15 J. S. B. R. A. S.)

Santan.—The scraped-up kernel of cocoa-nut, used in curries, &c.

Santee R.—At the extremity of Silat Tembrau, or Old Strait, between the I. of Singapore and Johore.—J. I. A., Vol. I, p. 342.

Sapan Wood (Casalpinia sapan).—Grows in abundance on the Northern borders of Malacca and elsewhere in the Peninsula. Its original habitat is reputed to be the East Indies.

Sapphire (Batu nilam).—Imported only.

Sarong.—See Dress. The word is also applied to a sword-sheath and the webs of spiders and other insects.

Sarong Lang .- V. on E. bank of Telupin R., N.E. Patani.

Sasat.—A V. about 4 miles 2 furlongs from Butterworth, Province Wellesley, in the Bukit Tengah Road.

Savage.—The only term for savage in any of the languages of the Malay Archipelago is equivalent in English to "men of the woods, or forests." This in Malay, is orang utan, our well-known orang-utang. The word dayak seems more especially restricted by the Malays to the wild people of Borneo, Sumatra, and Celebes.

Saw (Gugaji).—The Malay saw is drawn upwards to use like those of many other oriental nations. Foreign tools are, however, now-a-days, almost exclusively used.

Sayong.—V. on E. bank of Perak R., opposite Kwala Kangsa, C. Perak, the residence of the Sultan of Perak.

Scarecrows.—These form most important adjuncts to Malayan agriculture, the abundance of seed-eating birds rendering them even more necessary here than at home. Add to which the ubiquitous sparrow is as plentiful in the Peninsula as in any part of Great Britain. One very common plan is to stretch a series of strings to which are tied feathers, cloth, &c., &c., from a common centre, where a Malay boy or girl in the scantiest of raiment "plays spider," and agitates the whole at each pull. In Chinese tilled fields, a scarecrow remotely resembling the cultivator is erected, or a couple of split bamboos are so fixed that by pulling a string from a distance, one is made to rattle against the other and so frighten away the birds. Bamboo and paper windmills are also used.

Scent (Bau-bauan).—The Malays make a scent of the flowers known as bunga melati, b. tanjing, and b. ilang ilang, but they are not much esteemed by Europeans.

Scorpions (Kalajinking) are found in most parts of the Peninsula and Settlements, but are not so plentiful as to cause serious annoyance.

Sea, the Ocean.—The Malay has three words for the sea, namely, laut and tasek, which are native words, and luji, which is Arabic, the last of rare use. The native words laut and tasek are of very wide currency, being found in nearly all the languages of the Malay Archipelago. In Malay all that is connected with the sea, as might be expected with the language of a peculiarly sea-faring people, has a

copious phraseology. Thus, there are specific terms for interior and seaboard, for going with or against the current, for current, tide, ebb and flow, for cove, islet, strait, various kinds of shoals, dry land, the correlative of sea or water; not to mention the enumeration of winds, which amount to no fewer than sixteen.*

Sea Fans.—These beautiful structures, belonging to the order Gorgoniacea, abound on the southern coasts of the Peninsula, but at Singapore have almost entirely disappeared to satisfy the greed of native fishermen, who found a ready market for them amongst European visitors to the port. They are of various colours—orange, vermilion, blue, black and white being the commonest—and consist of branches resembling those of trees, of coralline structure, covered by a sort of rind or bark. The latter is the layer of a living colony, and in nature is covered with polypes. A good deal of exposure to sun and air is necessary before they can be used as ornaments.

Sea Serpent.—This (possibly) mythical monster has been reported as seen in Malayan waters. Capt. Webster of the S.S. Nestor and his officers, crew, and passengers saw one in September, 1876, between Penang and Malacca. Capt. Douglas and his boat's crew reported a similar appearance off the coast of Perak. While a party of excursionists saw one between Pulo Ubin and Singapore some five years ago. Persons interested in the question are recommended to read Mr. C. Gould's "Mythical Monster," W. H. Allen & Co., 1886.

Sea Slugs.—See Tripang.

Seal Bluff or Cone Hill (675 ft.), near the shore of S. Kelantan, half way between the Tringganu and Kelantan Rivers.

Seaweed.—See Agar-Agar.

Sebang.—Formerly the principal village of Naning, in the Padang Sebang district, N. Malacca.

Sebrang Gajah.—A small V. 1 mile W. of the Kesang R., in E. Malacca, about 3 miles S. of Chinchin.

Sebrang Gajah.—A V. on W. side of Malacca River in Sungei Petei district, C. Malacca.

Secret Societies.—The Straits Settlements and Native States have, ever since the settlement of Chinese in these latitudes, been honey-combed with secret societies, which, until about fourteen years ago, set the local Governments at defiance. It was not until after the riots in 1872, that the matter was taken seriously in hand. The appointment of Mr. Pickering, in the first instance, as interpreter, and subsequently as Head of the Chinese Protectorate, organized in 1877, and which has since become one of the most important departments of the Government service, aided as he has been by gentlemen of high education and attainments, resulted in these societies being brought under control, and the peace of the colony thereby vastly improved. Full particulars of the Tien ti hui, or parent organization, are given in Mr. G. Schlegel's "Hung League" (Batavia, 1866), and Mr. Pickering's articles in the J. S. B. R. A. S. The societies then (1888) recognized in Singapore were:—

Number of Registered Members. Ghee Hin (Hokkien) 14,962 (Hailam) 4,763 do. Ghee Hock 12,507 ... Ghee Khee Kwang Hok... 5,23512,537 Hok Hin ••• ... ••• ••• Kwang Fui Siu 4,071 ••• ••• ••• ••• ... 6,518 Song Peh Kwan ••• ••• ••• ... •••

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					Nun	aber of	Registered Member	rs.
Hong Ghee Ton	g	***	***	***	***	446	402	
Lee Seng Hong							407	
Yet Tong Kun			***			***	415	
Heng Sün				***			559	
In Penang the follow		ocieties	-					
Ghee Hin		***	***				59,470	
Twa Pek Kong	***						17,628	
Ho Seng		***					12,402	
T'sun Sim							2,359	
Hai San				***			722	
In Malacca the num					***	222	1000	
Ghee Hin							5,355	
		***				90	448	
and amount	100						1000	
do. Maca Hei San				***	***		448 490	

Mr. Pickering described these secret societies rather as large friendly societies than as political organizations, and this is doubtless correct. But that they frequently combined to shelter criminals and so defeat the ends of justice can hardly be gainsaid. Although theoretically all "lodges" are held in the jungle or mountains, and the ritual bears special reference to these surroundings, they in fact took place at Hui Kuan, or meeting houses, one belonging to each lodge.

The officials of a lodge were as follows:-

1 Toa Ko, or Grand Master.

1 Tsong Li, or General Manager. 1 Sien Seng, or Van Guard.

1 Ang Kun, or Red Baton or Executioner. Tsam Hoa, or Councillors (number varies).

Thih pau chhau oe, or District Headmen (number varies).

In addition to the Chinese societies, two organizations known as the Red Flags and White Flags existed amongst the Kling, Jawi-pekan, and Malay inhabitants, though forbidden by the Government and suppressed whenever their existence became known. It was illegal for a British-born or naturalized Chinese or other subject to join any of these societies. All secret societies have since 1891 been nominally suppressed, deportation being resorted to in the case of bad offenders.

Sedin.—Important V. on the Dingin R., S. W. Kedah, 5 miles from Province Wellesley frontier.

Segamat.—Important V. on E. bank of Muar R. just above the junction with it of the Segamat R. The most important place in S. Pahang.

Seine.—See Fishing.

Selama.—The principal V. in N.W. Perak, on small R. of same name.

Selangor.—Position.—The protected Native State of Selangor, containing a total area of about 3,000 square miles, lies on the western coast of the Malay Peninsula, and is bounded by the protected Native States of Perak on the north, and Sungei Ujong on the south, extending inland to the mountains in the centre of the Peninsula, which divide it from Pahang and Jelebu.

HISTORY.—Little is known of the early history of the State, but the Malay Rajas of Selangor long bore a bad reputation among their neighbours, and were notorious for the fierceness of their internal quarrels and the audacity of their piracies.

The series of struggles between various native chiefs, which brought the State under the more immediate notice of the British Government at Singapore, commenced in the year 1867, when Tunku Dia Udin, a brother of the Sultan of Kedah, married a daughter of the Sultan of Selangor, and was appointed by him

to be his Viceroy. The authority of Tunku Dia Udin was not recognized by Raja Mahdi, a grandson of the late Sultan of Selangor, and a fierce contest was waged between these two chiefs from 1867 to 1873. The Sultan was powerless to put an end to this prolonged strife, in which not only Malay Rajas, but even Chinese miners took an active part, and the struggle was carried on with varying success until 1873, when the Bendahara of Pahang, at the instance of the Government of the Straits Settlements, sent assistance to Tunku Dia Udin, by means of which he was enabled to obtain a complete victory over the rebels, and at least a temporary cessation of hostilities.

The occurrence of an atrocious case of piracy off the Langat River in the following year led to the direct intervention of the British Government; and shortly afterwards, at the request of the Sultan, Sir Andrew Clarke, then Governor of the Straits Settlements, sent Mr. J. G. Davidson, first Resident of Selangor, and Mr. F. A. Swettenham, an officer of the Straits Settlements, to assist the Sultan in the administration of the Government, since which time (1874), the peace of the State has not been disturbed, and its prosperity has steadily increased.

Geology and Mineralogy.—The State embraces a large amount of alluvial plain with but few hills. In the higher portions, tin is found in abundance, the export for 1893 amounting to 190,505 piculs, valued at \$8,748,884. The alluvial lands are eminently suitable for agricultural purposes, and are gradually attracting a desirable class of settlers, the Malays here, as elsewhere in the Peninsula, being content to cultivate only just enough for home use.

CLIMATE.—There is no perceptible difference between that of Selangor and

the adjacent States.

FAUNA.—The same remark applies to the Fauna. Elephants are numerous in the N.E. districts, a little N. of Ulu Selangor, but are not found further S. Other animals appear to be distributed in the same proportions as throughout the rest of the Peninsula.

AGRICULTURE, PRODUCTS, &c.—The soil produces coffee, cocoa, pepper, sago, gambier, and tapicca, with of course sugar, and tobacco for domestic wants. The jungle produce is, as elsewhere, rattans, gutta, garroo-wood, &c. Grants of land on special terms have been made for planting purposes.

TRADE.—The principal exports are tin, hides, garroo-wood, tapioca, canes, rattans, and gutta; the principal imports, opium, salt, salt-fish, rice, oil, tobacco, and tea, and from the commencement of the year 1885 all duties have been

abolished, with the exception of those on tin and opium.

The imports for 1892 were valued at \$7,393,679, and the exports at \$8,060,428. Tin and tin ore showed an increased value of one and a half million dollars over 1891. Pepper, another export, exceeded the 1891 figures by two and a half times. Tapicca doubled the value of the previous year. Other exports, however, showed a falling-off.

POPULATION.—A census taken in 1884 showed the total population amounted to 46,568 persons. The last census taken on the 5th April, 1891, gave a total of 81,592, of whom 67,051 were males, and 14,541 females. The various nationalities represented were as follows:—

Chinese	•••	•••	•••	•••	•••	•••	•••	50,844
Malays	•••	•••	•••	•••	•••	•••	•••	23,750
Europeans	(190)	and E	urasian	s (167)	•••	•••	•••	357
Aborigines						177). D	vaks	
(47).	Javane	se (1.1	11). Jar	wi Peka	ns (9)	•••		2,796
Tamils (3,	082) a	nd othe	r nativ	es of Ir	dia (5	10)	•••	3.592
Manilamer	1 (32).	Arabs	27). Ja	panese	(68).	Siames		-,
Singh	alese (106). N	fiscella	neous (13)	•••	• (•),	253
~6	 (.00), =		3417	10,	•••	•••	
			L.	D41]				

At the close of the year 1887 the population was estimated at 97,100 persons, and it is now probably 110,000.

Most of the Europeans are connected with the Government service, but a few

are engaged in mining and planting, and as contractors.

The majority of the Malay population is composed of emigrants from Sumatra and other neighbouring States, the native population having been greatly reduced during the prolonged disturbances which led to British intervention in With the exception of a small number of traders and miners, these Malays are exclusively employed in planting and fishing.

The Chinese who, both as traders and miners, form the most important element of the population, are emigrants from the south of China, and are chiefly composed of Hakkas (Khehs) and Cantonese. They now number rather more

than 50,000 persons.

There is, however, a considerable number of Hok-kiens and Tie-chews, of

whom the former are mostly traders, and the latter market-gardeners.

The Indians are nearly all Tamils from Southern India, who have previously resided in the Straits Settlements. They are chiefly coolies, but comprise, among

their numbers, a few traders and money-lenders.

The Sakeis of Selangor are divided into nine tribes, under headmen called Batins. They chiefly obtain a livelihood by collecting gutta, rattans, and other jungle produce; but some of them plant hill padi and tapioca, burn charcoal, and wash tin from the rivers; and they have all claims on numerous orchards, to which

they migrate during the fruit season.

GOVERNMENT.—The Government consists of the Sultan, advised by the British Resident, who is directly responsible to the Governor of the Straits Settle-

ments, and assisted by the State Council.

The State is divided into the following six Collectorates.

1.—Kwala Lumpor, the central district where the Residency and principal Government offices are situated, and which also contains the richest tin mines that have yet been developed.

2.-Klang, the principal port, situated about 14 miles from the mouth of the

Klang River.

Kwala Langat, an agricultural district, in which the Sultan resides. 4.—Kwala Selangor, containing the most important fisheries in the State. 5.—Ulu Langat, an inland mining district on the borders of Sungei Ujong.

Ulu Selangor, a district adjoining Perak, containing much valuable mining

land, as yet comparatively undeveloped.

Each Collectorate is under the charge of a European Collector and Magistrate, from whom the native Penghulus (in charge of the districts into which each Col-

lectorate is subdivided) receive their instructions.

The law and procedure administered in the Courts are practically the same as those in the Colony of the Straits Settlements, and the powers of a Collector and Magistrate are almost identical with those of a Magistrate and Commissioner of the Court of Requests in the Colony. The decisions of the Magistrates are subject to revision by the Resident, and again by the Sultan in Council.

The Police force consisted, at the end of 1892, of a Superintendent, three European officers, 21 Sikh non-commissioned officers, and 163 men, with 69 Malay

non-commissioned officers, and 417 men.

REVENUE.—The following shows the rise in annual revenue and expenditure of the State between 1876 and 1892:-

	Revenue.		Expenditure.
	\$		8
1876	 193,476	1	191,174 .
1892	 2,135,448	1000	2,044,115
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Communication.—There is frequent and regular communication by means of coasting steamers between the Straits Settlements and Selangor; and from Kwala Lumpor a system of cart and bridle-roads extends to the boundaries of Perak,

Sungei Ujong and Pahang.

A line of metre gauge railway, to connect Kwala Lumpor and Klang (a distance of 22 miles) was opened for traffic early in 1887. A line from Kwala Lumpor to Rawang (20 miles) was opened on 7th November, 1892, and short sections to Serendah and Kuala Kubu have just been completed. The net profit on railways for 1892 was 11.04 per cent. Extension to Pahang is hoped for shortly. In connection with the railway, two lines of telegraph have been constructed, viz., from Kwala Lumpor to Klang, 22 miles, and from Kwala Lumpor to Malacca, 113 miles.

Selangor Hill (430 feet high), on the coast of that State, about 22 miles N.W. of Klang.

Selat.—A strait, or narrow. See under SINGAPORE.

Selat Dili.—A stream connecting the Sukun R. with the main R., Kinta, S.C. Perak.

Selat Luna.—A narrow in the Kinta R. about 9 miles above Bandar Bharu Island, S.C. Perak.

Selat Pandan.—Strait separating a group of islands which lie due S. of Pasir Panjang, from Oyrene Shoal, which is 1 mile near the S. shore of Singapore.

Selat Sembilan.—The passage, ½ mile broad at the widest part, between the Tanjong Gul district, S.W. Singapore, and a group of islands exceeding nine in number however.

Selat Sinki.—The strait by which Singapore New Harbour is approached from the W.; 4 miles long, and 3 mile broad at narrowest part, marked by beacons on the reefs.

Selat Tebrau. - See OLD STRAIT.

Selendang.—A pretty sash of delicate texture worn by women over the shoulder or round the waist.

Selitar.—Three districts in N. and N.E. Singapore, divided into Selitar Proper, N. Selitar, and E. Selitar. R. of same name divides the N. and E. districts.

Selitar, Orang.—The aborigines of Selitar in Singapore. Some forty years ago they numbered about 200 souls, but death and intermarriage have removed them. None of pure blood are now known to exist. See pp. 202 et seq. Vol. I, J. I. A.

Semang.—A name applied by the Malays to a negro-like race found in the mountains of the Peninsula. According to most writers, they differ considerably from the Sakeis or Jakuns, being about the same size as Malays. They are of very dark-brown complexion, with flat noses, thick lips, and large mouths, the hair being long and in tufts. Their origin has not been satisfactorily settled. M. Mikluho Maklay is of opinion that they are only a variety of the Sakei, and that the latter word in the centre of the Peninsula is only the equivalent of Semang further N. This is open to question, although all writers agree that they have customs almost in common. (See Sakei.)

Sembawang.—A district in N. Singapore, having numerous gambier and pepper plantations.

Sempang.—V. on E. bank of Selangor R., opposite Bukit Jelutong.

Sempang.—A V. 1 mile from the S. coast of Malacca, and 1½ miles from Merlimau, situated on the high road from Malacca-town to the latter place.

Sempang.-V. in S.E. corner of Sungei Ujong.

Sempang Ampat.—The head of navigation of the Bernam R., Selangor.

Sempang Ampat.—V. and Police station, 12 miles 3 furlongs from Butterworth, Province Wellesley, on the high road between Bukit Minyak and Bukit Tambun. Sempang means "cross-roads," and the four referred to in the name are Bukit Minyak, Tasek, Bukit Tambun, and Sungei Bakap. A triangular-shaped estate, bounded by two of these roads, with the Sungei Bakap road forming the base, is called Sempang Ampat Estate.

Sempang Ampat Junjong.—An island formed by the course of the R. Junjong, just above Bukit Tambun, Province Wellesley. That portion of the river surrounding its N. bank is called Sungei Junjong Mati.

Senelling.—V. and mountain S. of Jumpol. The latter said to be the highest mountain between Malacca and Pahang.

Sengai.-V. on E. bank of Johore R., just behind Johore Lama.

Senggang.-V. on E. bank of Perak R., C. Perak.

Senggora (Song Kla).—Though not strictly coming within the geographical limits dealt with in this work, Senggora overlaps them, and we therefore quote Mr. Skinner's short description in full:—"Senggora is the name of the most southerly province of Siam, and consequently that which borders on the Malayan States of the Peninsula; and it is through the Chinese Governor of Senggora that the King of Siam has hitherto exercised occasional interference with his Malayan tributaries. Its capital is on the E. coast, in the shelter of Tentalam Island. This is a large flat island, lying along the coast, with good pasturage and padi cultivation. Behind is a remarkably deep inland channel of sweet water, into which the Telung (Patelung) flows from the Kao Luang (chief mountains).

"Inland of this channel lie the small and quasi-independent Sam-Sam States of

Patelung and Plean, under a Chinese Raja.

"During the North-East monsoon there is little or no communication between the southern provinces of Siam and the capital, as the coast is a complete leeshore.

"From Senggora there is no land passage to Bangkok; but a road was made in the opposite direction, across the Peninsula to Kedah, in 1871, at the time of the King of Siam's visit to the Straits."

Senkalan.—The roller used for making curry, usually of granite.

Senna.—A favourite medicine with the Malays, that from Mecca being most esteemed. Its Malay name is daun saga.

Sensitive Plant.—This grows largely in the Settlements and Peninsula, and quickly overruns waste ground. Scores of acres on some of the sugar estates have been thus covered. Its redeeming quality is that it destroys lalang grass, the atter being the worst enemy the agriculturist has to contend with. The curious property of contracting at a touch is too well known to need detailed description.

Sepak Raga (literally to kick wicker-work).—Childish games are unknown amongst the Malays, but a pastime resembling the English football, or perhaps shuttle-cock, is indulged in by them as they approach manhood. It is called Sepak Raga, and is the only game that appears indigenous, or it may have been obtained from the Siamese. It is a common pastime in Burma, but unknown on the continent of India.

The game is played with a ball of wicker-work, which is very light and elastic, and is merely an exhibition of skill and activity. It does not require the strength and courage so requisite in the English game of football. The players are unlimited in number, and stand in a circle about six feet apart from each other.

The ball is thrown into the air, and on its descending one of the players strikes it back again with his hand, foot, elbow or knee. Sometimes the ball descends beyond the circle, and is dexterously struck back again with the sole of the foot without the player changing his position. If the players are active and expert at the game, the ball may be kept from touching the ground for a considerable time.—
J. D. Vaughan.

Serampai.—V. S. of small R. Chiko, a W. affluent of Pahang R., C. Pahang.

Seranggong.—District in E. Singapore between Teban and Paya Lebar.

Seranggong.—V. and Police station on R. of same name, N.E. Singaporc. A Roman Catholic Church and Government Bungalow exist close by.

Serani.—The name applied by Malays to the Portuguese of the Straits Settlements. It is supposed to be derived from *Nazarani*, the term used for Christians in former centuries.

Serawa Lungut (Serawa, a dish made of plantains, sweet potatoes or bread fruit; lungut, to watch expectantly). A man who says he has eaten this, implies that he has been disappointed in the hospitality he had expected, and has "dined with King Humphrey."

Serei.—V. on E. bank of Pahang R. as it trends N. in C. Pahang.

Serembang.—V. $\frac{1}{2}$ mile N. of the Resident's house, Sungei Ujong, which is 3 miles N. of Rassa. The house is in lat. 2° 43′ N., and long. 101° 54′ E. Serembang is a flourishing place largely inhabited by Chinese.

Sereting River.—An affluent of the R. Pahang, in Jumpol, Negri Sembilan. Timber, dammar and rattans abound on the banks.

Serimbun Kangkah.—V. on little R. Serimbun, N.W. Singapore.

Serindit.-V. in the environs of Malacca-town, N. of Bukit China.

Serpents.—See Ophidia.

Shafei.—The patronymic of a celebrated Mahommedan doctor, the founder of one of the four sects considered by the Arabians as orthodox. All the Mahommedans of the Indian Islands belong to his sect. He was a native of Syria, and flourished in the eighth century, or about three centuries before the earliest conversions of the inhabitants of the Archipelago to Islam. These know little about him or his doctrines.*

Shair.—A poem. A good example is the "Shair Bidasari," in Vol. I, p. 40, of the J. I. A.

Shamanism.—Exorcists, pawangs, &c., exercise considerable power over the Malays, all diseases incurable by simple medicines being referred to evil spirits.

—See sub voce in Index, "Journal Asiatic Society."

Sharks abound in all Malayan waters, sufficiently to make bathing dangerous. The common species here appears to be Cestracion philippi, identical with that of Port Jackson. The "hammer-head" and ground shark are also found. The Malays have adopted the Chinese word Yu (or have the Chinese adopted the Malay word?) to describe the animal. Sharks' fins are an important article of export to China, where they are used as the basis of a soup much esteemed for its supposed stimulating qualities.

Shastre.—This celebrated Sanskrit word is unknown in its sense of a scripture or sacred writing. In the form of sastra, it signifies, in Malay, an alphabetic character, and written language, as distinguished from oral.*

Sheep.—This animal is undoubtedly an exotic. The wool is coarse, and the natives will not eat the flesh. The name by which it is known to the Malays is the Sanskrit one—biri—although they occasionally call it "The European goat."

The word kambing, or goat, is that by which it is universally known in the British Settlements.

Shells .- See Conchology.

Shield or Buckler.—This arm seems to have been universal in Malaya, before the introduction of firearms, and is still continued by all the ruder tribes. In Malay there are no fewer than seven different names for it, four of which are native, two taken from the Javanese, and one from the Talugu. These names, however, rather refer to the different forms of it, than constitute synonyms. They are formed of rattan, wood or hide.*

Ship.—The proper name for a large trading vessel in Malay is jung, which the Portuguese converted into junco; and we, improving on this corruption, into junk. This is the word which we apply to the large trading vessels of the Chinese, which the Malays call by the name of wangkang. The Malays have not now, and seem never to have had, a square-rigged vessel. The people of the Coromandel coast—the Telingas—who traded immemorially with the Archipelago, had vessels of this class, and from them the Indian Islanders borrowed and naturalized the name kapal, which is now the accepted Malay word.*

Shooting Fish (Ikan sampit, Toxotes jaculator).—This amusing fish brings down its insect prey by "firing" drops of water at it, generally hitting the mark. It is kept as a pet by the natives, as well as eaten, being abundant in the Straits. A smaller variety, prettily marked with black and white, is called the ikan paus, and is only from 3 to 4 inches long, and is more common in Siamese than in Malayan waters.

Shrimps and Prawns.—These are very numerous along the coasts of the islands of both Archipelagos, under the name of udang, in Malay. They form, almost everywhere, a very material portion of the animal food of the people. The form in which they are commonly used is that of a paste, formed by mashing them, well known to the Malays under the name of bělachan, turned by Europeans into balachong. This is used as a condiment, and forms a very material article of native trade between the coasts and interior.

Shuttlecock.—See SEPAK RAGA.

Siak.—The junior officer of a mosque, under the Bilal. He has charge of the building and performs the minor offices.

Siamese.—Large numbers of Siamese are found in the Native States, and at one time the language was current as a vernacular. It has, however, now been so largely superseded by Chinese and Malay that its acquisition is no longer of practical use.

Sickle (Pěngětam or pěnúě).—This is used almost exclusively for rice or padi. The pěngětam is used chiefly by women, and consists of a knife edge on a thin piece of board with a bamboo handle. The sabit is the Chinese sickle answering to the pěnúě or tue, about 2 feet long, with a sharp hook at the end which will cut about ten stalks at one stroke.

Siglap.—District in E. Singapore, of which Tanah Merah Kechil is the most conspicuous portion.

Sijagup.—V. on N. bank of mouth of Perak R. about 6 miles from the sea.

Sijara Malayu (Malayan Annals).—These purport to give a history and genealogy of all the Malayan Kings. In the preface, dated 1612, it is stated that a Malay Hikayat had been recently brought from Goa, and it having been judged proper it should be altered in conformity with Malay institutions, the task had been placed in the writer's hands. His name is not given. The Sijara Malayu consists of 34 Chapters or Annals. It was translated by Dr. Leyden, and an abstract of

the translation published in the J. I. A. by Mr. T. BRADDELL, the late Attorney-General, Straits Settlements. See p. 125, Vol. V, and succeeding numbers.

Silk .- This commodity is known to the Malays by the name of sutra, which is the Sanskrit for thread or yarn. Silk may probably have been first made known to the inhabitants of Malaya by the Hindus, if we are to judge from its Sanskrit name, but in all times known to us they have been supplied with this article, raw and wrought, by the Chinese, the original inventors of silk. Pigafetta (1521) found not only the King of Borneo and his courtiers clad in silk, but the very housings of the royal elephants made of it. The same thing was found to be the case at Malacca on its capture ten years before, and Barbosa expressly names raw and manufactured silks as among the articles brought by the Chinese junks to Malacca. From the raw silk of China the Malays always wove, and still continue to do so, some strong and often rich domestic fabrics suited to their own peculiar tastes. The culture of the mulberry and the rearing of the silkworm have never been practised by the natives, whether from the unsuitableness of this branch of industry to the climate, or to the state of society, is not ascertained.*

Silver.—Veins of this metal have been discovered in various portions of the Peninsula, but not in paying quantities. In Malay the name for silver is perak, but the State so named produces only tin in any quantity. The Malay word is found as far as the Philippines in the slight disguise of pilak.

The silver with which the Malays were supplied before their intercourse with Europeans, was most probably derived from Tonquin, China, and Lao. Indeed, BARROS expressly states that the silver which Albuquerque coined money from at Malacca in 1511, came from the last-named of these countries through Siam. Ever since, or at least since the discovery and conquest of Mexico and Peru, they have been furnished from America in the course of trade, and their favourite form is the column dollar or "piece of eight" of the old coinage.*

Singapore, correctly Singapura, formerly supposed to be from the Sanskrit singa, lion, and pura, city, but really from singha, a place of call, and pura, a city. It is spoken of in the Malay annals as Tamsak. This is the name of an island, which, with the exception of a single village of poor and predatory Malay fishermen, and that only formed in 1811, was covered with a primeval forest down to the 6th day of February, 1819, and is now the first in rank of the European emporia of the Far East. Barros gives a whimsical etymology of the name: "Anciently," says he, "the most celebrated city which existed in the land of Malacca, was called Cingapura, which, in the language of the country, signifies 'false delay' (false demora)." This derivation must have come through the Malays, who, no doubt, were then, as

they now are, ignorant of the true meaning of the name.

Position, &c.—Singapore is the most northerly of the large islands of the group that, in a great measure, blocks up the eastern end of the strait which divides the Peninsula from Sumatra, leaving but narrow channels for navigation, and forming a region of straits. It is separated from the mainland by a strait generally about a mile broad, but in some parts little more than three furlongs. This is the Selat Tembrau of the Malays and the "Old Strait of Singapore" of European navigators. It was the old passage into the China Sea, but has long been abandoned for that by the southern side of Singapore. Crawfurd went through it in a ship of 400 tons, and found the passage tedious but safe. Singapore, in its greatest length from east to west, is 25 miles 6 furlongs long, and in its greatest breadth 14, having an area of 206 square geographical miles 59 square furlongs, which will make it 70 miles larger than the Isle of Wight. To the north, it is bounded by the territory of Johore, the limit between them being the continental shore of the narrow strait already mentioned. Everywhere else, the British jurisdiction extends to 10 miles from the shore of the mainland, and within this distance are contained no fewer than 75 islets of various sizes, embracing an area of 17 square miles 633 furlongs,

so that the superficies of the entire British Settlement amounts to 223 square miles.

History.—The ancient history of Singapore, says Crawfurd, is, as usual, in all that relates to native story, full of obscurity. It has been stated in native writings, that Singapore was founded by a colony of Malays from Palembang in Sumatra in the year of Christ 1160, and abandoned by them in the year 1253. The first palpable objection to this statement is that Palembang is not now, and is never known to history as having been, a country occupied by the Malays, the mass of its inhabitants being a distinct nation called the Sarawi, and its rulers immemorially Javanese. Another palpable objection is, that we have a Christian era given, without the Asiatic era from whence it is reckoned, and, indeed, what Asiatic era would it have been calculated from, for the Malays had none of their own, nor could they be supposed to have adopted the Arabian, since they did not embrace the Mahommedan religion until 116 years after the supposed date of the establishment of Singapore? If the first settlers of Singapore came from Palembang—and from its vicinity and the superior civilization of its rulers, it is not improbable they did—they must have been Javanese and not Malays. This opinion gains some support from the fact that, for the most part, the names and titles of the princes who are stated to have reigned in Singapore, not to mention the name of the place itself, are either Javanese or Sanskrit; such names, in a word, as the modern Javanese would,

under similar circumstances, have imposed.

The account given by Barros, and which he states to have been derived from the natives, makes the colony, which fled from Singapore and eventually established itself in Malacca, to have been Javanese, which is, in fact, virtually the same as the assertion of the Malays themselves, that it came from Palembang. The relics, very rude ones, discovered on the ancient site of Singapore, which is also that of the modern town, afford some corroboration of the opinion. The most remarkable of these was an inscription on a great mass of unhewn coarse red silicious sandstone at the present site of the Harbour Master's offices. This nodule was split in the centre, the two fragments lying opposite to each other, at about an angle of forty degrees, and at the base not above a couple of feet apart. The writing was on the two opposing faces of the rock, which itself seems to have been adapted for this purpose on the very spot where it lay, being still surrounded by several other masses of the same description. Nothing of the kind can be ruder. By time and the decomposition of the rock, most of the writing was obliterated, although here and there a few letters were sufficiently distinct. These were, in form, rather round than angular, and, making allowance for the material and the rudeness of the execution, they bore the greatest resemblance to Kawi, or the ancient writing of Java, the same which is found in most of the old monuments of that island. At all events, they bore no resemblance whatever to the Rejang of Sumatra, the character used by the majority of the people of Palembang, nor to the Korinchi, that in which the Malays most probably wrote before their adoption of the Arabic letters. Unfortunately this interesting relic was destroyed to make room for Fort Fullerton, and though some fragments were secured by Colonel Butterworth, and sent home, no further investigation is possible. A full account will be found at pp. 219-223, Vol. I, "Misc. Papers on Indo-China" (Trubner, 1886).

The other relics discovered are equally rude with the inscription. These were the remains of an earthen wall, a fosse, a sepulchre, and a supposed temple on the hill behind the town, on which now stands Fort Channing. Some old Chinese coins, such as formed the currency of all the civilized nations of the Archipelago, and still continue to do of some of them, we found among the ruins. The oldest of these bears the name of a Chinese emperor who died in 967 of Christ, which carries us back to some 200 years before the supposed foundation of Singapore in the year 1160. This, however, affords no evidence whatever, old Chinese coins of similar age being frequently found in the strings of cash current at the present day in China.

The remains discovered in Singapore are certainly not such as to convey a high opinion of what Barros calls "the celebrated city of Cingapura, to which resorted all the navigators of the western seas of India, and of the eastern of Siam, China, Champa, and Camboja, as well as of the thousands of islands to the eastward." Earth, brick, unhewn sandstones and wood, seem to have been the only materials made use of, and there is not a vestige of the granite which abounds in the neigh-

bourhood and is now so largely employed.

From the time of its subversion down to the year 1811, or for a period of about five centuries and a half, there is no record of Singapore having been occupied, and it was only the occasional resort of pirates. In that year, it was taken possession of by the party from whom we first received it—an officer of the Government of Johore called the Temengong. He came there with about 150 followers, a few months before the British expedition which afterwards captured Java passed the island, and this happened in the summer of 1811. The history of the formation of the British Settlement is as follows:-After the restoration of the Dutch possessions in the Archipelago, it was seen that no provision had been made for the freedom of British commerce, and various projects were suggested for the establishment of emporia within the seas of the Archipelago to obviate this inconvenience. One of these was submitted to the Marquis of Hastings, then Governor-General of India, by Sir Stamford Raffles, and adopted by him in 1818. This, Sir Stamford proceeded to carry into effect, and with the courage and promptitude which belonged to his character. Many local obstacles, by nameless parties vested with a little brief authority, were thrown in his way, but he overcame them all, and the result has been such as has been described in this article. The convenience of a port at the eastern end of the Straits of Malacca was too obvious to escape observation, and to this quarter Sir Stamford Raffles directed his attention; but in the first instance the island of Singapore did not occur, either to himself or any one else. Yet it is remarkable that in what was called a century and a half ago a "New Account of the East Indies," it is expressly pointed out in the following unmistakable words:-"In the year 1703," says the author, Captain Hamilton, "I called at Johore on my way to China, and he (the King of Johore) treated me very kindly and made me a present of the island of Singapore, but I told him it could be of no use to a private person, though a proper place for a company to settle a colony on, lying in the centre of trade, and being accommodated with good rivers and safe harbours, so conveniently situated that all winds served shipping both to go out and come into these rivers."
But this striking recommendation of Singapore was at the time unknown to Sir Stamford and his contemporaries. He had hence to grope for a suitable locality. The first place thought of was Rhio, but it was found to be already in the occupation of the Netherlands Government. The next was the Carimon Islands, out, however, of the convenient track of navigation, and here Sir Stamford and his expedition tarried three days, but found the place unsuitable. The river of Johore was then thought of, but on the way to it, the expedition touched at Singapore to make inquiry, and then, for the first time, the advantages and superiority of its locality presented themselves. A cession of a small portion of the island, to the extent of two miles along the shore, and to the distance of the point-blank range of ordinary cannon, inland, was obtained from the resident chief. This was afterwards confirmed by the Sultan of Johore, or the person whom we found it convenient to consider as such, who, on our invitation, quickly repaired to the place. The inconveniences of a state of things which, with the exception of the patch on which the town was to stand, left the sovereignty of the whole island, with its adjacent islets, to the Malay princes, were quickly experienced, and obviated by a treaty drawn up by Mr. Crawfurd in 1824 under the direction of the Earl of Amherst, then Governor-General, and this convention continues to be the tenure on which we hold the main island, with the islets and seas surrounding it, forming the limits of the British Settlement.

Singapore thus became an integral portion of the East India Company's possessions, and was administered by its officials until the Company ceased to exist in 1858. But it was still Indian territory, until in April, 1867, Singapore, Penang, Province Wellesley, and Malacca were created a separate Crown Colony under the title of the "Straits Settlements." Since that date it has been administered as follows:—

April, 1867.—Colonel (now Major-General, G.C.M.G.) Sir Harry Saint George Ord. R.E., C.B.

GEORGE ORD, R.E., C.B.

March, 1871.—Lieut-Colonel (now Major-General, K.C.M.G.) ARCHIBALD
EDWARD HARBORD ANSON, R.A., Administrator.

Nov., 1873.—Colonel (now Lieut.-General, G.C.M.G.) Sir Andrew Clarke, R.E., K.C.M.G., C.B., C.I.E.

May, 1875.—Colonel (now Major-General, G.C.M.G.) Sir William Francis Drummond Jervois, R.E., K.C.M.G., C.B.

April, 1877.—Colonel (now Major-General, K.C.M.G.) Archibald Edward Harbord Anson, R.A., C.M.G., Adminstrator.

Oct., 1877.—Sir William Cleaver Francis Robinson, K.C.M.G.

Feb., 1879.—Colonel (now Major-General, K.C.M.G.) A. E. H. Anson, C.M.G., Administrator.

May, 1880.—Frederick Aloysius Weld, Esquire, C.M.G.

March, 1884.—Cecil Clementi Smith, Esquire, C.M.G., Administrator.

Nov., 1885.—Sir Frederick Aloysius Weld, G.C.M.G. Oct., 1887.—Sir Cecil Clementi Smith, K.C.M.G. 1893.—Sir Charles Mitchell, K.C.M.G.

Geology and Mineralogy.—The plain upon which the town and suburbs stand is chiefly composed of deep beds of white, bluish, or reddish sand, averaging 90 to 95 per cent. of silica. The rest is aluminous. Recent shells and sea-mud found in this sand show it to have been formed by a retreating sea. The general composition of the island, which consists of low hills and ridges, with narrow and swampy flats intervening, is sandstone, with the exception of Bukit Timah, which is of granite formation containing about 18 per cent. of quartz. Colonel Low, J. I. A., Vol. I, p. 84, specifies eight varieties. The soil overlying the granite is rather meagre (the stone being neither very porphyritic nor micaceous and not very liable to disintegration), but it of course contains a vast quantity of vegetable mould. The sandstone is of various colours: the darker variety rapidly decomposing in situ in yellow clay, though applicable to building when fresh from the quarry. That the slightly reddish crystalline sandstone is very durable may be inferred from the fact that a rock bearing an Indian inscription of the thirteenth century existed up to about 1830, at the mouth of the Singapore River. (See Inscription.)

All the sandstones are heavily impregnated with iron, and an ironstone, known as laterite, is, to the casual observer, the prevailing mineral of the island. This occurs sometimes in veins, but more frequently in large beds on the sides of hills, and is extensively quarried for road-making purposes. It is supposed to contain manganese, and is found from the size of coarse sand to that of masses 15 or 20 feet in diameter. It is of dark clove-brown colour externally; internally it is cellular, and varies in density, being often, when freshly dug, soft enough to be cut with a knife, or hard enough to resist the pick. It is not magnetic in the mass, but when pulverized is found to contain grains of magnetic iron. It hardens considerably on

exposure to the air. The commercial value is 25 cents per cart-load.

A substance somewhat resembling soapstone, with red, white, or greenish streaks, is sometimes found amongst the clays, being rather greasy to the touch, and,

occasionally, of a fibrous texture.

The valleys or flats of Singapore have a peaty substratum, varying in thickness from 6 inches to a couple of feet. Below this generally lies a bed of cold clay, and below this a stratum of arenaceous clay. In many districts kaolin (which see) is

found in large quantities and of excellent quality. [For a lengthy paper on the Geology of Singapore, see J. I. A., Vol. I, p. 83.] See also Pulo Obin and Islands off Singapore, such as Pulo Timmukul, Blakang Mati, &c.

CLIMATE.—The climate of the island is thus described by Mr. Thomson, in the Journal of the Indian Archipelago, his remarks still holding good :- "Singapore," says he, "though within 80 miles of the equator, has an abundance of moisture, either deposited by the dews, or gentle refreshing showers, which keeps its atmosphere cool, prevents the parching effects of the sun, and promotes continual verdure. It never experiences furious gales. If more than ordinary heat has accumulated moisture and electricity, a squall generally sets in, followed by a heavy shower of rain, such squalls seldom exceeding one or two hours in duration. According as the monsoon blows, you will have the squalls coming from that direction. But the most severe and numerous are from the west, called 'Sumatras,' and these occur, most frequently, between 1 and 5 o'clock in the morning. The north-east monsoon blows from November to March; after which the wind veers round to the south-east and gradually sets in the south-west, at which point it continues to September. The north-east blows more steadily than the south-west monsoon. The temperature is by one or two degrees cooler in the first than in the last." The average fall of rain is found, from the observation of a series of years, to be 92,697 inches; and the average number of days in the year in which rain falls is found to be 180, thus dividing the year almost equally between wet and dry; the rain not being continuous, but pretty equally distributed through the year, January, however, being the month in which the greatest quantity falls. The mean temperature of Singapore is 81°-247, the lowest being 79°-55, and the highest 82°-31, so that the range is no more than 2°.76. It would appear from this that the temperature of the island is by 9°.90 lower than that of many other localities in the same latitudes. Comparing the temperature now stated with that which was ascertained 20 years earlier, and in the infancy of the Settlement, it would appear that it had increased by 2°48, a fact ascribed, no doubt, to the increase of buildings, and to the country having been cleared of forest for three miles inland from the town, the site of the observations. The general character of the climate as to temperature is that the heat is great and continuous, but never excessive, and that there is little distinction of seasons, summer and winter differing from each other only by one or two degrees of the thermometer. Thunder-showers are of frequent occurrence, but the thunder is by no means so severe as I have experienced it in Java, and seldom destructive to life or property. "That interesting and wonderful phenomenon, called a water-spout," says Mr. Thomson, "is often to be seen in the seas and straits adjacent. They ought more properly to be called whirlwinds charged with vapour. They occur, generally, in the morning between the hours of eight and twelve, and rise to the height of half a mile, appearing in the distance like large columns supporting the heavy masses of cumuli above them. In August, 1838, one passed over the harbour and town of Singapore, devastating one ship and sinking another, and carrying off the corner of the roof of a house in its course landward. No other atmospherical disturbances of any moment occur. The typhoons of the China Sea and Bay of Bengal do not reach those parts, nor are there hot winds to parch the land. The equable and quiet state of the atmosphere and seasons of these regions consequently create analogous properties in the face of indigenous vegetation. Evergreens abound; few trees shed all their leaves at the same time; and many of the fruit-trees produce all the year round. Such as have their seasons of fruit will produce crops out of season, bearing small irregular ones at intervening times. This continual verdure is, perhaps, more grateful to the stranger than to those who have been accustomed to it. To the former, it bears the pleasant appearance of exuberance and fecundity-of a region where the lofty forest not only hangs over the beach, but clothes the mountains to their tops, so unlike the sterile barrenness of higher latitudes. To the latter, the continual sameness palls the senses. They

want variety, and call for a sterile winter, only that they may renew, with doubly keen perception, their acquaintance with the beauties of returning summer, a season

that always here reigns."

Notwithstanding its heat and its monotony, the climate of Singapore is even remarkable for its salubrity; and with, perhaps, the exception of a few little-frequented spots in the interior, it is certainly free from the malaria which often infects countries apparently more favourably circumstanced. This advantage it seems to owe to its perfect ventilation by the monsoons—by land and sea-breezes—and by frequent squalls. That this is the main cause is proved by the eminently pestiferous air of a land-locked harbour at the western end of the island, and not above two miles distant from the town.

The above account, by former writers, has been quoted, with slight corrections, as fairly accurate. A later writer, however, furnished the "Singapore and Straits Directory" with observations which somewhat correct it, and in view of their

importance they are quoted hereunder:-

Considering the geographical position of Singapore, viz., in latitude 1° 17′ N., or, say 77 nautical miles from the equator, it has a wonderfully moist climate. This is chiefly due to its being within what is known as the "Rainy Latitudes," and from having large expanses of ocean on both its eastern and western sides. It is well sheltered on the north and east by the moderately high land of the southeastern portion of the Malay peninsula, which modifies the force of the north-east monsoon, and the gales of the China Sea, while to the south and west, a chain of islands act as a breakwater from the long swells and storms of the Indian Ocean.

There are no marked seasons, as are noticed in many tropical places, not even

the usual dry and wet seasons; but frequent showers of rain in every month.

From carefully kept records of observations during the past sixteen years, it is found that there is an annual average of 167 wet days. The maximum number of wet days during this period having been as many as 209 in the year 1870, and the fewest being 119 days in 1877; the average annual rainfall for the same period being 92.27 inches. It is remarkable that, so far back as 1849, Mr. Thomson, in the Journal of the Indian Archipelago, fixes the annual rainfall at 92.69 inches, which is almost the same as that arrived at now, notwithstanding the extensive clearing of forest that must have taken place during the past fifty odd years. His average number of wet days is 180, a very small difference between then and now, and easily accounted for.

Temperature.—This may be briefly stated in a tabular form as below :-

The mean maximum in the shade is		Fahr.	86°-7
Do. minimum do.		****	73°-3
	***	***	13°·4
And an approximate temperature of	***	***	80°
The highest maximum observed was	385	***	94° in April, 1878.
The lowest minimum do	***	***	63°.4 10th Feb. 1885.
The mean solar radiation in vacuo being		0.00	148°-6
Do. nocturnal do. on grass			70°-6

These figures differ somewhat from Mr. Thomson's, for he gives the maximum at 82°.3, and the minimum at 79°.5, computing the approximate at 81°.4, but this difference may be readily explained by—1st, that in his time the nearness of the forest to the Settlement caused a greater degree of coolness during the day than exists at present, thus giving a lower maximum; while this same cause hindered the free circulation of air and consequent evaporation producing rather a high minimum reading; or—2nd, that meteorological instruments had not at that time attained to the fine degree of sensitiveness and accuracy as at present.

The mornings, if not wet, are generally pleasant, and open-air exercise is an enjoyment, the temperature averaging 77°, but as the sun rises above the horizon.

the heat increases, and if the sky be clear is somewhat acutely felt. At 9 A.M. the average heat is 81°. The hottest time of the day is between 1 and 2 P.M.; by 9 P.M. the temperature is down again to 78°, the coldest time being between 3 and 4 A.M.

The direction of the winds is in accordance with the prevailing monsoon, more or less modified by surrounding or local influences. It may be generally assumed that from November to April the north-east monsoon is the prevailing wind, and from May to October it is south-west. But it is nothing unusual to have southeast, south or south-west breezes for portions of the day as early as March or April, and during the recognized south-west monsoon also, to have southerly and southeasterly winds.

The north-east monsoon is steadier; in the month of January, rather high

winds may be looked for. It is considered healthier than the south-west.

Dr. Oxley, in the Journal of the Indian Archipelago, gives the following opinion: —"May and June are less agreeable than the rest of the year from the prevalence of the southerly winds, and it is rather remarkable that the stronger these winds blow the more enervating they are. Strangers are apt to sit in this wind and call . it a fine breeze, but old residents cannot do so with impunity; on the contrary, they carefully avoid its influence. I would strongly advise all who are desirous of keeping their health to carefully exclude it, even at the expense of temporary heat and discomfort." This opinion is fully established by subsequent experience, only that one would go further and extend this period from May to September, particularly when the breeze keeps on from south or south-east. These winds are ordinarily known as "Java winds," and blow with some fierceness and unpleasant warmth from about 10 A.M. to about 1 P.M., gradually abating toward sunset, when there is almost a calm, rendering the nights close and stifling, producing a feeling of lassitude and disinclination to arise from bed in the morning. It is not unusual to hear many complain that they awake from sleep with a greater sense of weariness than when they retired to bed. Colds and fevers are more prevalent during the months of May to September than during the other months of the year.

During the south-west monsoon occasional rapidly rising squalls blow with great violence, generally between 2 and 5 A.M., and recur at almost the same time, or with but slight difference of time, for a few days. These are known as "Sumatras," and have a beneficial effect in clearing and cooling the atmosphere, though the accompanying rainfall is generally small. Occasionally there are thunderstorms, but nothing very heavy. There are also occasional heavy rainfalls at uncertain periods without reference to either monsoon. The average of such is a fall of 5 inches in 24 hours. The heaviest known is 7·10 inches, in December,

1884.

Thus it will be seen that Singapore enjoys a uniformity of climate not experienced elsewhere in the Tropics. There are no extremes of temperature as is felt in places not very distant to the north or south, where the heat during the day and the chilliness of the night are very marked, but the frequent showers of rain, promoting the growth of vegetation and diffusing moisture in the air, help to modify equatorial heat, and maintain an evenness of temperature enabling it to compare, most favourably with any other Tropical Settlement.

Yet this unchanging nature of the climate, producing as it were a "perpetual summer," has its drawback; it tends after some time to relax and enervate the body, necessitating a change for a season to some more bracing latitudes. But for all this, with ordinary care as regards living, as fair a share of health may be

expected here as in more favoured climes.

Although the conditions of European life in Singapore have ensured immunity from serious sickness, the death-rate amongst the natives is abnormally high. For 1892 the European rate was only 14.84 per mille; that of Eurasians, 20.89; Chinese, 30.73 Malays, 33.03; Indians, 29.62; and that of other nationalities,

32.09—the latter consisting largely of foreigners landed and sent to hospital from ships touching at the port.

The high figures for orientals are accounted for by the prevalence of sporadic

cholera and bowel complaints, small-pox, beri-beri, and fever.

To a considerable extent the health of the Colony depends upon the rainfall. In 1841-2-3 and 4 this was recorded as 73.126, 116.247, 92.300, and 89.117 inches. Below is a table compiled by Mr. J. D. VAUGHAN of the rainfall in town and country from 1869 to 1886 :-

05 10 1000.			Town.			Country.	
1869	***		90.63	inches.		95.56	inches.
1870	***	***	123.24	,,	***	116.93	21
1871	***	***	120.44	,,		106.94	**
1872	***		84.82	**	****	85.27	91
1873	***	***	97.20	51		91.46	
1874	***		89.45	17	***	85.84	195
1875	***		108.48	**		93.25	22
1876	***	410	101.48	31	***	91.28	35
1877	***	***	61.19	99	***	66.26	1991
1878	***	***	99.95	**		106.75	**
1879	***	***	118.53	**	***	116.96	**
1880	100	***	104.16	99.	***	116.37	11
1881	***	200	82.18	37	***	96.59	-39
1882	***	***	79.92	**		85.23	**
1883	***	1444	66.74		***	65.19	***
1884	***	***	82.51	22.	***	89.73	22
1885	***	***	71.01	22		67.63	23
1886	***	***	90.53	**	***	85.75	**
		1	,672.46			1,662.99	
		-					

The total rainfall for 1892 was 99.70 inches, the maximum fall in any 24 hours being 9.30 inches. The maximum in any one month was 21.03 inches, and the minimum (in February) 0.84. Generally speaking, however, showers are pretty

constant daily throughout the year, droughts being infrequent.

BOTANY .- A popular view of the botany of Singapore was thus given by Dr. OxLEY :- "If Nature," says he, "has been frugal in her gifts of the higher orders of the animal kingdom in Singapore, she has lavished with unsparing prodigality the riches of the vegetable one. Notwithstanding the infertility of the soil, climate more than compensates for the loss: heat and moisture cover the lean earth with unceasing verdure; and we realize what fancy paints as the most desirable of all climates—an eternal spring. But independently of its position, the botany of this place possesses several other interesting considerations. Being a connectionlink between the Indian and Australian forms, we have types of both, and many genera of either region. We observe the Indian forms in the natural families Palmæ, Scitamineæ, Aroideæ, Artocarpeæ, Euphorbiaceæ, Apocyneæ, Guttiferæ, Convolvulaceæ, Leguminosæ, all numerous. The natural families Casuarineæ, Myrtaceæ, particularly Melaleucæ and Proteaceæ connect us with Australia.'

"The plants," he observes, "which usually spring up when the primeval forest has been cut down, and where the bane of all the rest of the vegetable kingdomthe Andropogon caricosum, or Lalang grass—has not taken possession, belong to the following genera:—Melastoma, Myrtus, Morinda, Solanum, Rubus, Rottlera, Clerodendrum, Commersonia, Ficus, and Passiflora." The jungle, with the exception of its outskirts, was, at the time Dr. Oxley wrote, reputed to be unexplorable, without great risk, from the number of tigers; but, he adds:-"I have collected

between forty and fifty orchideous plants, including epiphytal and terrestrial, and about the same number of ferns. Fici are extremely numerous. Of palms, I have not seen more than twenty species, although, I believe, there are a much greater number. The most interesting of these, in an economic point of view, are the cocca-nut, the Areca catechu or pinang, the Areca sigillaria or nibong, the Sagus lævis or rambuja, the Nipa fruticans or nipa, and the Gomutus or iju. Of the natural families which most abound, the Asclepiadeæ, Euphorbiaceæ, Scitamineæ, and Urticaceæ are the chief. The forest contains an immense number of species of timber trees, most of them of great height and growth. Above two hundred have been collected, and of these about half-a-dozen afford good timber for house and boat-building. The teak is not of the number. The forest also produces the two species which yield the useful gutta-percha, and a fig which affords an elastic gum. But for use, these articles, as well as timber, are not obtained from Singapore itself, but from the wider and more accessible forests of the neighbouring continent."

ZOOLOGY.—The Zoology of Singapore is that of the neighbouring continent, to the exclusion of some of the larger animals—as the elephant, the rhinoceros, the tapir, and the ox. The largest feline animal indigenous to the island is a small leopard, called by the Malays harimau-daan, that is, "the branch" or climbing tiger. But the tiger, an animal unknown to the island in the earlier years of the British Settlement, made its first appearance five or six years after it was formed, and became too abundant. It seems to have crossed over from the continent, attracted no doubt by the sound of human voices and the lowing of cattle. It multiplied greatly, and was supposed to destroy, yearly, from two to three hundred persons, proving the greatest bane of the Settlement. Large rewards have always been offered for the destruction of tigers (\$50 per head), and a good number were captured by pitfalls, but all attempts at their extermination were, for many years, unsuccessful. The spread of population, however, had its natural result; and although specimens are occasionally met with who have swam the narrow strait between the island and Johore, there are not probably more than half-a-dozen now existing in the jungle. The channel between Penang and the main is two miles broad, and this is sufficient to exclude the tiger, for although there have been examples of individuals having crossed over, they have been in an exhausted state, and they have been immediately destroyed.

Of the natural family of Mustelidæ, there are two in Singapore—the musang of the Malays, Paradoxurus musanga, and the binturung, Ictides ater, of the size of a badger. Otters are occasionally seen along the coasts, but are rare. The wild hog is numerous, and there are five species of deer, the usual ones of the Peninsula and Sumatra, from the rusa of the size of a heifer to the pelandok, which is hardly as large as a rabbit. Among mammals, one species of bat is often to be seen, the same which is so frequent in almost all parts of the Archipelago, the kalong or Pteropus javanicus. This is about the size of a raven, and a troop of them in flight has very much the look of a flock of crows, and by a stranger may be easily mistaken for one.

"I may add," says Dr. Oxley, "in rendering a sketch of the zoology of Singapore, several species of the bat tribe, and among them that most destructive one to all fruits—the flying fox or Pteropus. Fortunately, however, they are as yet scarce, but at no distance from us they are numerous beyond count. I have seen a flock of them, while anchored in the Straits of Malacca, so large as to take several hours in passing. In the day they are seen asleep hanging in millions from the branches of the mangrove. At sunset they begin to stir, and presently they ascend into the air and wing their way to the south-east in one vast uninterrupted cloud. They pass the whole night in the jungle and plantations, devouring fruit, and as soon as dawn begins to appear, they mount the air again and return to their roosting-place. Their flesh is sometimes eaten by the natives, but no real for

smells to my mind half so rank as they do. Methinks a rat would be palatable food compared with them." These bats, in so far as the orchard is concerned, are the locust of the country, in which flights of the insect itself, as far as I am aware, are unknown. The Pteromys, or flying squirrel, the krawak of the Malays, is very frequent in Singapore, and so are three different species of monkey.

As with the larger quadrupeds, the larger birds of the Peninsula and Sumatra are not found in Singapore. It has neither their peacocks nor their pheasants, and the only birds of the Rasorial family which exist in it are two species of quail. Nearly all the web-footed birds, whether indigenous or of passage, are not to be seen. There are six different species of pigeon, from the size of our wood-pigeon to that of a thrush. Parrots are frequent, but the species only two or three. The only bird that can be called game is the snipe, which seems a stranger to no country in the world that has marshes. The birds of prey of four different genera are sufficiently numerous, and among birds of this family is that perfect type of the true falcons, the beautiful little Falco cærulescens, which, although not much larger than a sparrow, will kill and carry off a bird the size of a thrush.

Among reptiles, crocodiles are common in the salt-water creeks, and along the shores of the island, but, having an abundant supply of fish, are not troublesome to man. The Iguana lizard, the bewak of the Malays, is not infrequent, and the noisy house-lizard or tokay, the také of the Malays, so common in Penang and so much more so in Siam, is also found in Singapore. The esculent turtle is very abundant along the shores of Singapore and the neighbouring islands, and being, as food, restricted to the European and Chinese population, is the cheapest animal food in the market, one of the largest weighing several hundredweights selling for \$2 or \$3. "Snakes," wrote Dr. Oxley, "are not numerous." But in this instance the writer was at fault, forty-four species having been found to exist, of which fourteen are more or less venomous. The well-known cobra (Naja tripudians) q. v., possesses the peculiar property of ejecting venom from its mouth. The Malays say there is no cure for its bite. Those killed have measured from $4\frac{1}{2}$ to $5\frac{1}{4}$ feet in length. This reptile, being slow and sluggish, is easily overtaken and killed. When attacked, it erects the body and dilates the skin on either side of the head, uttering a noise like that of an irritated cat. If attacked, it throws, to the distance of from 6 to 8 feet, a venomous fluid of a most poisonous quality, even should it only enter the eye or touch the mucous membrane or any open sore. The Hamadryad (Ophiophagus elaps) exists, but is fortunately not common. The Bungarus is the only other venomous snake of large size, but pythons of considerable length-up to 22 feet-are frequently captured. Fish and crustaceans are in great plenty, and some 200 species will be found named in the article under this head. About half-a-dozen of these are excellent for the table, fully equal to the best fish of our own coasts. Among the best is the white pomfret of Europeans, the bawalputch of the Malays, of richer flavour than our soles and less luscious than the turbot, and the ikan merah, resembling the sam-lai of China.

AGRICULTURE, &c.—The agriculture of Singapore, although conducted with sufficient spirit and activity, is limited to a small number of objects, and nearly excludes all the cereal grasses and pulses constituting the staple articles of human food. The soil of the island, with very few exceptions, is like that of the adjoining Peninsula-unfertile; there is no natural, and therefore no cheap source of irrigation, and hence the land is incapable of furnishing a cheap supply of the main necessaries of life, which are yielded only within the Archipelago by rich volcanic or alluvial soils, assisted by a copious perennial irrigation. For such plants as rice, the sugar-cane, the indigo-plant, pulses, maize, tobacco, cotton, the soil must be considered as ill-suited. Besides want of fertility of soil, Singapore wants sufficient elevation to give a climate fit for the production of coffee. Even the nutmeg throve only when forced by rich dressing [it has since perished entirely], and the clove did not succeed at all. On the other hand, all plants which depend more on heat and moisture than on soil, flourish luxuriantly, such as the cocoa and areca palms, with the Uncaria gambir, which is indigenous. Black pepper, which is a long naturalized exotic, although it answers well, yet even it requires some manuring. In 1854, the quantity of pepper produced amounted to 3,116,533 pounds, and the betel or areca-nut to above 40,000 cwts. Among the plants congenial to both soil and climate are most of the intertropical fruits, whether indigenous or exotic. Among these the most easily reared, and even cheaper than the banana, is the pine-apple, equalling in size and flavour the finest productions of our hot-houses. The durian, mangosteen, rambutan, rambei, blingbing, and others flourish well. The mangoes are very inferior. Besides fruits, the soil and climate are well adapted to the production of the yam and tapioca, and to that of the

coarse pot-herbs which belong to the latitude.

The following remarks are made by Mr. Logan on the soil of Singapore:— "The soil is much more varied than it was supposed to be in former years, and so. far from consisting entirely of decomposed sandstone and clay-iron ore, it contains a plutonic (granitic) tract of about sixty square miles, and another in which shales Although the soils have not the fertility of the volcanic and predominate. calcareous ones which occur in many parts of the Indian Archipelago, they are covered with an indigenous vegetation of great vigour and luxuriance, supporting numbers of animals of different species. The hills of plutonic rock support dense and continuous forests composed of more than 200 species of trees, many of which are of great size. So long as the iron is not in such excess as to recompose the clay into stone, or render it hard, those soils which contain most iron are most fertile. The purely, or highly felspathic, are the worst. But even felspathic soils, when intermixed with a sufficient proportion of quartz, are, in this estimate, capable of producing an abundant vegetation. Although it is obvious to every observer that there is no kind of soil in the island for which nature has not provided plants that flourish luxuriantly in it, yet it must not be hastily concluded, as some have done, that this exuberant vegetation indicates a general fertility in the soil. It is found, on the contrary, when the native plants are destroyed and the land is employed for agriculture, that there are very few soils in which cultivated plants not indigenous to the region, but whose climate range embraces it, will flourish spontaneously. While the cocoa-nut, areca, sago, gomuti, and the numerous Malayan fruits succeed with little care, the nutmeg and clove are stunted, and almost unproductive, unless carefully cultivated and highly manured. Yet the climate is perfectly adapted to them. Place them in the rare spots where there is naturally a fertile soil, or create one artificially, and the produce is equal to that of trees in the Malacca plantations. With respect to indigenous plants, gambier, pepper, and all the fruits flourish on the plutonic hills, provided they are not too deficient in iron and quartz. The hills of violet shale, where they are not too sandy, are equal to the plutonic soil—those, namely, in which there is a sufficient proportion of hard granules to render them friable, and sufficient iron to render them highly absorptive of water, without becoming plastic. Of all the sedimentary soils, the sandstone and very arenaceous shales furnish the worst. Of the alluvial soils, the sand, particularly when it contains a mixture of vegetable matter, or triturated shells, is the proper soil of the cocoa-nut, and the vegetable mud of the When the country has been better and longer drained and cultivated, the latter soil will become a rich mould. At present it is too wet and sour to make a fertile soil. Rice is grown on some patches of it. The bluish sea-mud contains good ingredients, but the clay is in excess, and the animal matter in it appears to assist in rendering it hard and intractable, when it is not saturated with water. Even for such soils, however, nature has provided plants useful to man, for the areca and some of the indigenous fruit-trees grow well in it with little cultivation. Although there are cultivated plants adapted to every kind of soil in the island, and it has indigenous tribes of man who can live exclusively on its yams, sago, fish,

and wild animals, it is incapable of feeding a population of the more civilized races, and the latter must always be dependent on other countries for the great necessary of life—rice." [See also paragraph on the Geology of the Island.]

In the husbandry of Singapore, neither plough, harrow, nor spade are employed. All is done with the changkol, or hoe. The whole is, in fact, a garden culture, in which no great crop is cultivated giving scope for the plough, and which is perhaps best performed by the hoe, the congenial and habitual implement, for this purpose, of all Asiatic nations. With respect to tenures, wild lands, when alienated by the government, were granted in fee simple, on payment of thirty shillings an acre, if within two miles of the town, and of one-half that amount, if beyond this distance. At this simple arrangement the Government arrived at last, after the higgling and blundering of a quarter of a century, and the expenditure of vast quantities of ink and paper, and matters remained in this condition until 1883, when the present experiment of introducing the Torrens' Land Act was begun.

Manufactures, Trade, Business, &c.—The only manufactures deserving this name carried on in Singapore are those of tapioca, sago, gambier, and white pepper. The dock companies, noticed further on, produce good work in another way. Great quantities of tools, implements, swords, and wall-pieces are manufactured by the Chinese, and there is some manufacture of furniture, with some boat

and ship-building.

But every branch of industry is subsidiary to trade. Singapore is, in fact, a great commercial emporium, in which are warehoused for future distribution the staple products of Europe, Asia, and America, The town, the seat of this commerce, lies in north latitude 1° 17′, or only 77 miles from the equator, and in east longitude 103° 50′ 47″. Its locality is on the southern side of the island, on a salt creek, into which falls the brook called the River of Singapore; the commercial part of it being on the western bank, and the public buildings and private houses on the eastern, which spreads into a sandy plain, a little above the level of the sea. There is, properly, no harbour, but the bay which fronts the town, and which is also the highway through the Straits of Malacca, is a roadstead equivalent to a harbour in a region never vexed by storms. Ships of the largest burden lie in good anchoring-ground at the distance of two miles from the shore, those of moderate draught of water within a mile, and small craft close to it. The salt creek, which has a quay on the commercial side, is navigable at all times for lighters up to the warehouses of the merchants.

The commercial intercourse of Singapore is carried on with most of the European ports carrying on a distant foreign trade; with the ports of Continental Asia, from the Red almost to the Yellow Sea, including those of Arabia, Persia, Hindustan, Siam, Cochin-China, and several of China; with all the ports of the Malay Archipelago, from Sumatra to New Guinea; with the capital of the Philippines; and with several of the east and west coasts of America. In the public returns of exports and imports, these places are classed under two-and-fifty different heads. The most important branch of the trade is that with the United Kingdom, and then follow respectively the trades with Hongkong and China, with British

Continental India, with Netherlands India, and with Siam.

The staple imports from Europe (in addition to articles of domestic consumption, as tinned provisions, wines, spirits, &c.) are cottons, woollens, and metals; from the Continent of India, opium and cotton-wool for the Chinese market; and from China, coarse porcelain, silk, tea, camphor, and cassia. An ordinary price-current will contain at least forty different articles of the Malay and Philippine Archipelagos, with the countries immediately in their neighbourhood, as Tonquin, Cochin-China, Camboja, and Siam. Among these, the staples are rice, sugar, pepper, coffee, tin, gold, antimony, tortoise-shell, and fossil coal. The first appearance in commerce of several of the articles of this branch of the

trade may be said to be almost coeval with the foundation of the Settlement, or to have appeared in consequence of its existence, such as the abaca or banana hemp, gutta-percha, india-rubber, vegetable tallow, pearl and flour sago, hides, and horns.

Singapore is, in every sense, a free port, open to the flags of all nations, upon equal terms, and has continued so nearly from its foundation. There is no impost whatever, on ship or cargo, saving a small charge for the lighthouse dues. freedom, and its highly convenient position, with security for life and property, are the cause of its rapid prosperity—a prosperity of which there is no other example in the East, and which far more resembles that of an American than an Asiatic Settlement. The example of Singapore has been followed by the Netherlands Government at several points of its vast possessions in the Archipelago, and with

great, although not equal, success.

POPULATION.—In 1826, or seven years after the British occupation of Singapore, the population of the island, in round numbers, had already amounted to 13,000. In 1850, it had risen to nearly 60,000, of which 26,000 were in the town; while in 1881 it had risen to 131,208. The census of 1891 gave Singapore a population of 186,554, of whom 1,160 were Europeans, 121,908 Chinese, \$5,992 Malays, 16,035 Indians, with 1,776 of other nationalities. The ingredients of this population are very heterogeneous, and composed of no fewer than twenty-five nationalities. The languages spoken are, at least, as numerous as the nationalities. The Chinese speak five different tongues, the people of Continental India four, and those of Celebes and Java two each. Then come English, Arabic, and Persian. But the common medium of intercommunication—the language which unites all classes of inhabitants, and prevents such a variety of tongues from making a Babel of the place—is the liquid, easily-learned Malay, of which all strangers acquire at least a useful smattering.

One peculiarity of the population of Singapore deserves notice—the inequality This applies, more or less, to every class of the inhabitants. whole, the females form little over one-fourth part, or to four men there is but one woman. But the disproportion is greater in the Chinese population, for here the females form but one-fifth in the whole number. This arises from the peculiarity of Chinese emigration, which is confined largely to the male sex, and this, too, of men in the prime of life. Even many of the females classed as Chinese are not really so, but the offspring of native women married to Chinese, or their mestizo This state of things, especially in regard to the Chinese inhabitants, forming too the majority of the population, is a source of much immorality and disorder, but it is hard to say how it can be remedied. It is noteworthy that about forty years ago a number of Battas settled in Pyah Lebar and Ballestier Their descendants, though now absorbed into the general population,

show signs of their descent.

Government.—The Executive Government of Singapore is exercised conjointly with that of the other British Settlements in the Straits-Malacca and Penang, Province Wellesley, and the Dindings—by the Governor, in whom, by and with the advice of the Executive and Legislative Councils, is vested the essential attributes of the Government—those of making laws, and directing their administration. Under the Governor, at each of the Settlements is an officer, with the title of Resident Councillor. The laws are those of England, modified in so far as concerns the native inhabitants by some attention to their respective laws of inheritance and domestic usages. They are administered by a Supreme Court in civil and criminal jurisdiction, and three Magistrates, one of the latter holding a small cause court for sums not exceeding \$50.

REVENUE.—The public revenue is derived from land rents, licenses, stamps, port and harbour dues, postage, fines and fees of court; excises, chiefly on the consumption of opium and spirits; and the rent of public markets, the property of the municipality. In 1852–53 the gross amount of this revenue was £45,720, and the chief branches of it being farmed, and always by the Chinese, the nominal charge of collection was but three-and-half per cent., which was, in fact, for the most part, the cost, not of collecting, but simply of receiving the amount. The expenditure in the same year was £44,234, or £1,486 less than the income. In 1854–55 the public revenue had increased by the sum of near £10,000, the main part of it being derived from excises on articles of luxury, and from the rents of public markets, the property of Government. These taxes, with their amounts, were as follows in the year in question:—opium, £32,520; ardent spirits, £11,412; palm wine and hemp juice, £670; and public markets, £3,372; making a total of £47,874, exclusive of the sale of public lands. The revenue and expenditure for 1892 were:—revenue, \$3,652,789; and expenditure, \$4,270,575.

TOPOGRAPHY.—Viewed from a distance, Singapore presents no marked elevations, but has the unvarying aspect of one continuous forest. The surface, however, is undulating, consisting generally of rounded hills of from 80 to 500 feet high, with narrow valleys not above 15 or 20 feet above the sea-level. A chain of rather higher hills runs through the island from east to west, making the water-shed in one direction to the north, and in the other to the south. The culminating point of the land is a hill nearly in the centre of the island, called Bukit Timah, that is, "tin-hill," and this rises to the height of 519 feet above low-water mark spring

tides.

The following are the heights of the principal hills and objects in the vicinity of the town calculated from the level of low-water spring tide:—

			The state of the s	
		Feet.		Feet.
Mount Wallich		144	St. James'	54
Mount Palmer	*** ***	119	Pearls Hill	170
Pavilion		108	Institution Hill	121
Bonny Grass	*** ***	85	Government Hill (Fort Can-	
Arman Bank	'	80	ning)	156
Mount Victoria		107	Lady Hill	108
Mount Elizabeth		82	Blakan Mati, Large Hill, or	
Cairn Hill		113	Bukit Serapong	301
Mount Emily, now	Govern-		Mount Faber	300
ment Hill		135	Mount Zion	45
Mount Caroline		108	Peak Island	101
Mount Louisa		112	St. John's	189
Mount Sophia		108	Pulo Brani	161
Bukit Chermin		106	Bukit Timah	519
Dunearn		75	Claymore, Chinese Burial	
Green Hill		87	Ground	74
Monks' Hill		78	French Church Spire	161
Draycot		84	Everton	34

The island may be characterized as a vast tropical garden, except in places where the virgin jungle still exists, or where secondary jungle has taken the place

of abandoned plantations.

The town lies in a bay on the S.E. coast. The general shape of the island is that of a card diamond, and it is of nearly the some outline and area as the Isle of Wight. It is intersected by good roads, originally made, under the Indian régime, by convict labour. Changi at the extreme East, where a first-class Government Bungalow with bathing-house attached has been erected (the former edifice having been destroyed by fire early in 1887), is a favourite place of visit. Kranji in the N.W. is the ferry place to Johore Bharu. Singapore possesses but few show-places, the public Library and Museum and the Botanical Gardens alone coming under this head.

ESTABLISHMENTS.—The most prominent commercial undertakings in the Settlement to the eye of the passing visitor are the two Dock Companies. nearest the town, and the larger of the two, known as the Tanjong Pagar Dock Company, is one of the most important establishments of its kind in the East. Although it is impossible in a work of this nature to give exhaustive particulars, a few details may usefully be given. The Wharf extends to one mile and a quarter, and is divided by the entrances to the Graving Docks into three parts:—The West Wharf, over one mile in length with from 25 to 35 feet water alongside at low-water spring tides, strongly built, connected with the shore by spacious bridges and capable of berthing twenty to thirty vessels loading or discharging at the same time. The Sheers Wharf, 340 feet long, having 26 feet depth of water, with powerful boiler and masting steam sheers erected thereon, connected with the workshops by a line of rails for transporting heavy machinery and boilers. The East Wharf, 500 feet long, chiefly intended for vessels undergoing repairs or waiting to be docked, has a depth of 25 feet water outside and 16 feet inside at low water, so that vessels can lie on either side of it.

There is sufficient water for the largest ships, and the heavy swell raised in the

Roads by the north-east monsoon is barely perceptible at the wharf.

Coal Sheds, substantially built of brick and roofed with tiles or corrugated iron, and capable of storing 200,000 tons of coal, are erected in the immediate rear of the wharf, affording unusual facilities for the discharge of cargoes and for the supply of steamers.

Of the Graving Docks, the Victoria Dock, adjoining the wharf, is built of

granite throughout, and is of the following dimensions:-

Length on the blocks 450 feet. Breadth at entrance 65 ,,
Depth of water on sill at ordinary spring tides ... 20 ,,

The Albert Dock, situated 275 feet to the eastward of the Victoria Dock, is of the following dimensions:—

Length on the blocks 475 fet Breadth at entrance 60 ,,
Depth of water on sill at ordinary spring tides ... 21 ,,

Both docks are fitted with powerful centrifugal pumps, and are emptied in three hours.

Machine Shop.—One of the most complete in the East, fitted with lathes, shearing, punching, shaping, slotting, planing, screwing, and boring machines with the latest improvements, with all the necessary tools and appliances required for effecting the most extensive repairs to steamers and iron vessels of the largest class, and to boilers, &c. Blacksmith's shop and foundry attached.

The premises formerly known as the Borneo Company's Wharf, situated to the W. of Tanjong Pagar, have recently been absorbed by the Tanjong Pagar

Company.

The New Harbour Dock Company's premises, about 4 miles W. of the town, though of less size, are not less efficiently fitted with all requisites for good work. They include two docks, viz.:—

No. 1. Graving Dock.

Length, 415 feet.

Depth of water, from 14 feet to $15\frac{1}{2}$ feet.

Width at entrance, 42 feet.

No 2. Graving Dock (Granite). Length, 459 feet.

Depth of water, from 19 to 20 feet. Width at entrance, 62 feet. The machine shops are remarkably well fitted up, and the sea approach being convenient, a number of launches and other small craft are built, engined, &c., on the premises. Both companies are under exceptionally efficient management, and are connected with the town by steam tramways conveying both pas-

sengers and goods.

Other engineering establishments, however, exist, which obtain a fair share of nautical patronage. That of Messrs. Lyon & Co. also fits and manufactures a good deal of the machinery used on tapioca and sugar plantations, while a good stock of tools of all descriptions is kept on hand for sale. Messrs. Howarth, Erskine & Co., and Messrs. Riley, Hargreaves & Co., do a good deal of work for steamers, the former having recently moved into new and very commodious premises on the left bank of the Singapore River.

Most of the wood used in the Colony is obtained from the Johore Steam Saw Mills, situated at New Johore, to which there is a daily post, with communication by numerous omnibuses. The facilities possessed by the mills enable large orders to be promptly filled, while the forests of Johore supply unlimited quantities of numerous varieties of timber. It is hoped to extend the Steam Tramway to Johore before long. At present it runs only from New Harbour to Rochor, the rivalry of

the jinricksha keeping fares at a very low figure.

Singapore possesses three banks. Of these the branch of the Hongkong and Shanghai Banking Corporation, established in 1877, has achieved a remarkable success. Founded over thirty years ago, its projectors wisely placed its head-quarters at Hongkong, thus ensuring a close supervision of its local interests.

In one respect, circumstances exceptionally favoured the undertaking. Although five other banks (the Agra Bank and the Comptoir d'Escompte at that time had branches in Hougkong) had possession of the field, they appealed but slightly to local sentiment, very few shares being held locally, while the directors, meeting at home, were not closely in touch with Eastern clients. The success of the new Corporation was something at that time undreamt of in Colonial history. The shares originally subscribed for at \$100 rose within a few months to 27% premium, and within five years, despite the declaration of large dividends, the reserve fund stood at half a million of dollars. In 1866, however, the first symptoms of a check became observable. The failure of Messrs. Dent & Co., the head of which house was a director of the Bank, caused serious loss. A year or two later, large advances to the Indo-Chinese Sugar Company and other undertakings had even worse results, and in 1869, for the first time since its inception, the bank failed to declare a half-yearly dividend,

So sound, however, was its basis that, within a few months, the Bank had begun to recover its former status. Careful management had its due reward, and those who, in 1869, predicted that the shares would not for a long period again be at par, were astonished to find them within twelve months at a premium of 30°/_o. Since that period, only one serious disaster has overtaken the management by losses in Manila—partly owing, however, to a fall in exchange which could scarcely have been anticipated by the most acute managers. This, however, was boldly met; and, although it involved the writing off of some \$600,000 from the reserve fund, the latter had reached a sum which enabled the Bank to tide over its reverses and still maintain its former influential position. The shares of the Corporation are now quoted at a very high premium—the best testimony possible to the confidence felt

in its prospects and present management.

Although its head-quarters are in Hongkong, the Bank has a London Branch in Lombard Street (controlled by a frome consultative committee), which does a business not inferior to many establishments having that locality as their sole business quarters. It now possesses other Branches at Amoy, Foochow, Shanghai, Hankow, Tientsin, Peking, Yokohama, Hiogo, Manila, Ilo-Ilo, Saigon, Singapore, Penang, Batavia, Bombay, Calcutta, San Francisco, New York, and Lyons, all of which, with

the exception of Manila, already alluded to, have generally continued in a thriving condition. In China, the Bank owns palatial premises of large value. In 1867 the Corporation received permission to issue \$1 notes. So popular did these become, that the entire amount at once passed into circulation, and an additional issue was found necessary. The Corporation also prints and circulates its own \$5, \$10, \$20, \$25, \$50, \$100, and \$500 notes.

The Chartered Bank of India, Australia and China was incorporated by Royal Charter dated 29th December, 1853, with a capital of £644,000. By the first Supplemental Charter dated 20th July, 1861, the agency then existing in the Island of Singapore was converted into a Branch, with authority from Her Majesty's Treasury to establish Branches also at Penang and Malacca, and to issue notes in the three Settlements. On the 3rd November, 1863, Her Majesty's Treasury gave their assent, under the Supplemental Charter, to an increase of the Bank's capital to £800,000, at which figure it now stands. By the terms of the second Supplemental Charter dated 10th November, 1874, the then existing Charters were extended, with certain modifications, and the authorized capital was increased to £2,000,000, subject to the consent of Her Majesty's Treasury. The latest Charter followed on the expiration of the above on 29th December, 1884. The head-quarters of the Bank are at Hatton Court, Threadneedle Street, London. The Bank is governed by a Court of seven directors. The Manager has a seat on the Board. The Bank has Branches and Agencies at Bombay, Calcutta, Akyab, Rangoon, Colombo, Penang, Singapore, Batavia, Sourabaya, Manila, Hongkong, Foochow, Shanghai, Hankow, and Yokohama.

The Chartered Mercantile Bank of India, London and China (now the Mercantile Bank of India), was started in Bombay in 1857, prior to which date the title was the "Mercantile Bank of India, London and China." On the Charter being obtained, the Bank was reconstituted, and the name changed to the "Chartered Mercantile Bank of India, London and China." The Head Office is in No. 65, Old Broad Street, London. The paid-up capital was £750,000, with power to increase it to £1,500,000. The reserve fund amounted in 1887 to £105,000. The Bank had Branches in Bombay, Calcutta, Madras, Rangoon, Colombo, Galle, Kandy, Singapore, Penang, Malacca, Batavia, Hongkong, and Shanghai; but it was found necessary in the beginning of 1893 to reconstitute it under its present name of the Mercantile Bank of India.

The Steamer Companies whose vessels touch at Singapore are extremely numerous. Those most frequently visiting the port are the P. & O., Messageries, North-German Lloyds, Ocean, and British-India steamers; those of the Glen, Ben, Shire, and several other lines appearing at intervals. It may, however, be said that few weeks pass without two separate opportunities for posting mails to Europe. The Rubattino, Austrian Lloyds, Netherlands India, and Spanish Transatlantic steamers touch at Singapore, but are not such familiar sights at the wharves as those above-mentioned. The Mail services number very fine vessels, replete with every comfort, and fitted especially for the services they perform.

Of the familiar OCEAN or "Blue Funnel" line, a local branch has been established running to the neighbouring Native, Dutch, and Siamese ports. This line can be highly recommended, as can also the GLEN steamers, to those whose purses prohibit the passage home or out by the mail lines, where the larger number of passengers naturally makes the time pass with more variety.

Owing to the great use made of horses and carriages (the latter ranging from the barouche to the jinricksha) in Singapore, the manufacture of vehicles is an important industry, and a visitor to the Settlement will find a visit to the Carriage Works of Messrs. LAMBERT BROTHERS, Orchard Road, of interest.

The factory is built in the same style as a London coach-builder's, having on the ground floor two show-rooms; in one of these is shown every variety of four-wheeled

carriage from the most costly and expensive style of London hung upon patent cee springs to the small victoria phaeton largely used in Singapore; in the other show-room is shown every variety of two-wheeled vehicle from the aristocratic tandem cart and the fashionable cee spring cabriolet to the ordinary varnished Norfolk cart.

On entering their works, one is naturally surprised at the vast quantity of work there is in course of preparation, but Messrs. Lambert Brothers have not only a large trade in Singapore, but also in Deli, Bangkok, Saigon, Borneo, &c.

To indicate its extent, we may state that Messrs. Lambert Brothers have over twenty different blacksmiths' forges at work, and these keep up a merry din all the day. Two or three different natives of China will be found at work together, but side by side with them some really clever Madras workmen, who turn out work that would do credit to any first-class London house. Messrs. Lambert Brothers have also a large steam-engine on their premises, with the help of which they manage to turn out a greater quantity of work than they would otherwise do. On the same floor as the blacksmiths are the wheel-makers and body-makers. The former are as yet quite unable to make sufficient wheels to suit the requirements of the factory, but they are awaiting the arrival of new machinery. Ascending by their lift to the top floor, one finds carriages in every stage of finishing, and here are the painters and trimmers busily at work. For varnishing, Messrs. Lambert Brothers have a special room, and by this means they are able to keep the dust from their carriages during the process, thereby preserving that gloss and brilliancy which go far to make or mar a carriage.

A visit to their store-rooms leads one to feel surprise at the large number of articles required in the manufacture of a carriage. They have separate rooms for iron, for leather, for cloth, for plated goods, and for paints and varnishes.

The manufacture of furniture has, within the past few years, been rescued from the hands of the too conservative native, and, under European management, has reached a high state of development. Messrs. Powell & Co. show as large an assortment as can possibly be needed by those wanting to furnish, and have very sensibly placed their godowns in the Orchard Road at a point passed daily by nearly all the European population. Messrs. Knight & Co. have followed suit, and turn out furniture to order in a very creditable style indeed. The Asiatic is by no means a bad workman, but he needs a controlling head whenever anything out of the beaten track has to be done.

Ice being a prime necessity in the Tropics, the Singapore Ice Company was formed to render the Settlement independent of the imported article, and the supply is fairly good. In a similar way the Singapore and Straits Aerated Water Company manufactures excellent soda-water and all other effervescing drinks at reasonable prices. The latter Company has numerous competitors, but only one receives any share of European patronage.

Of Insurance Offices, the Singapore Directory contains so copious a list that it would seem as if every European association were represented. The one, however, claiming special attention is the "Straits" Insurance Company, the shares of which are largely held in the Colony.

Journalism and printing are worthily represented by the Singapore Free Press and Straits Times (both of which publish daily and weekly editions). The Jawi Peranakan in Malay, the Lat Pau in Chinese, and a third journal in Tamil, cater for the reading public of those communities respectively. Most excellent work is turned out by the Singapore and Straits Printing Office, and some smaller offices manage to get a share of job-printing required. Messrs. Kelly & Walsh are the principal booksellers.

In the way of Stores, Singapore is very well provided. Messrs. John Little & Co. may be regarded as the Wm. Whiteley of the Settlement, almost any article needed being procurable at their large establishment in Commercial Square, where

a courtesy lamentably deficient in the large "Stores" at home is unfailingly displayed to customers. Messrs. Katz Brothers have also a very large assortment of goods, as have also Messrs. Sayle & Co., Limited. It seldom happens that any article needed cannot be got at one of the three. Messrs. Robinson & Co. deal in sartorial goods only. The principal Chinese tailor is Chong Fei (opposite the Hotel de l'Europe), but a large number of Chinese work well and cheaply in the same way.

SOCIAL ASPECT.—Turning now to the Social Aspect of the Settlement, the following details will be of interest. The Government is administered by a Governor aided by an Executive and Legislative Council, and is accommodated in the following offices:—The Colonial Secretariat, Treasury, Audit Office, Public Works and Survey, Land, Chinese Protectorate, Marine, Post, Supreme and Magistrates' Courts, Education, and Police. Two public and one Pauper Hospitals (the former including a lock hospital) accommodate patients. The Pauper Hospital is supported chiefly by voluntary contributions. A spacious Lunatic Asylum affords accommodation to some 200 patients. A large Gaol at Sepoy Lines receives both criminal and The Municipal Office, controlled by Commissioners, with an civil prisoners. Engineer and Assistant, and a salaried Secretary, is housed in the Town Hall. Two more departments, chiefly supported by the Government, viz., the Botanical Gardens and the Raffles Library and Museum, complete the list of official departments. The Consulates include those of Austria-Hungary, Belgium, Brazil, China,* Denmark, France,* Germany,* Italy,* Netherlands,* Portugal, Russia, Siam, Spain,* Sweden and Norway, and the United States* (those with asterisks being salaried and official). The Religious Element is represented, as regards Protestantism, by a Bishop (non-resident), Archdeacon (who is Colonial Chaplain), and an Assistant Clergyman, who are in charge of St. Andrew's Cathedral, † and the missions attached thereto; and by a Minister of the Scotch Presbyterian Church. The Catholic persuasion is represented by a French Vicar-Apostolic and Bishop, with a Cathedral and four smaller churches in charge of missionaries; and by a Portuguese Vicar and his coadjutor with a single church. The Armenian and Jewish communities have each their place of worship. EDUCATION is provided for by one public undenominational school (the Raffles), the Convent, St. Joseph's Institution, and St. Anthony's School (the three latter Catholic), and many native schools under Government supervision. LITERARY INSTITUTIONS are represented by the Raffles Library and Museum, the Straits Branch of the Royal Asiatic Society, the Singapore Debating Society, the Celestial Reasoning Association, and the German Reading Club. Of Clubs proper, there are the Singapore,* Cricket,* Recreation,* Rowing, Sporting, Tanglin,* and Teutonia,*—the five marked * possessing suitable buildings for their members. The last two-named are in the Tanglin district, about $2\frac{1}{4}$ miles from town. The Masonic Association embraces a District Grand Lodge, and a Royal Arch Chapter. There is an efficient Fire Brigade; while the characteristics of a thriving city are further exemplified by the existence of philanthropic and other associations, such as the MARINE ASSOCIATION, SAILORS' HOME, SAILORS' REST, STRANGERS' FRIEND SOCIETY, DEBATING and MUTUAL IMPROVEMENT societies, &c. It will be seen from the foregoing brief summary, that Singapore takes a worthy place amongst her sister cities in the East.

† The Cathedral was designed by Lieutenant-Colonel Macpherson, R.A., and built by Captain McNair, R.A., and G. Bennett, Esq., Executive Engineers of Singapore. The foundation stone was laid on March 4, 1856, His Honour E. A. Blundell being then Governor of the Straits Settlements, and the building was finally completed on January 25, 1862. Major-General Cavenagh was Governor at the time. It was, however, opened for divine service in 1861, and was constituted the Cathedral Church of the diocese in 1870. Its present Bishop is the Right Reverend G. F. Hose, D.D., by the title of Bishop of Singapore, Labuan and Sarawak. Archdeacon Meredith is the Colonial Chaplain, and the Reverend W. H. Gomes Assistant Clergyman. The Cathedral is in the Gothic style of architecture, and doubtless, from the frequent rains that fall here, impresses the beholder with the idea of greater age than it really possesses.

Purely Mercantile Interests are watched over by a Chamber of Commerce and Exchange. But it will probably be most convenient to subjoin the following table showing the average divisions of business in the Settlement during the past few years :-

Accountants	3 Insurance Agencies 120
Advocates and Solicitors	9 Iron and Brass-founders (see En-
Aërated Water Manufactories	6 gineers)
Architects and Surveyors	4 Jewellers* 7
Arms, Dealers in*	3 Lithographers* 2
Auctioneers	3 Livery Stables 3
Bakers*	3 Marine Surveyors 2
Boarding Establishments	3 Medical Practitioners (non-official) 9
Boiler-makers	6 Milliners (see Drapers)
Bookbinders*	2 Music Teachers 4
Booksellers	3 Nurses and Midwives* 9
	13 Opium Merchants 8
Butchers*	2 Piano-forte Repairers and Tuners 5
Confectioners*	2 Photographers* 3
Contractors (Engineering)	3 Precious Stones, Dealers in 1
Carriage-builders*	1 Printers* 7
Chemists and Druggists	7 Sail-makers 2
Cigars, Dealers in	4 Ship-builders 4
	22 Ship Chandlers 5
Dispensaries	7 Stationers 5
Docks	5 Steamship Company Agents 34
Docks (under Companies)	3 Storekeepers* 7
Drapers and Dressmakers*	3 Surgeons (see Medical)
Engineer firms	7 Tailors* 5
Estate Agents	3 Tiffin-rooms 1
Fruit Preservers	F The Joseph Louis
	o Undertakers"
Furniture Dealers	7 Watchmalana# 7
Furniture Dealers Horse Repositories	The state of the s

These returns naturally fluctuate from year to year, but the foregoing list gives a fair idea of the classification.

The occupations above-named against which an * appears, are also followed by a large number of natives in a petty way. The above figures are taken, with some slight corrections, from the Straits Directory, and represent firms or individuals well known to foreigners, most of them being advertisers in the local prints.

The principal Chinese Firms average in number 66, and the Chetty Firms 28. The total number of Cocoa-nut, Tapioca and other Plantations on the island

number 22.

The legal profession flourishes, despite the large number of members of the Bar who find occupation in the Settlement. Assize courts are held every two months, the judical staff comprising a Chief and three Puisne Judges, of whom two are usually absent at Penang.

Sirih.—The leaf of the betel pepper masticated with betel-nut (tobacco and gambier being sometimes added) and prepared lime throughout Malaya. The mixture causes the saliva to assume a blood-red colour, and the teeth become blackened. It is noticed, however, that betel-nut chewers seldom suffer from toothache.

Sirih Utan, or Basik (q. v.).

Sirkum.—V. half way between Umbei and Sempang, S.E. Malacca, about I mile from the coast.

Sisters, The.—Two small islands, not quite 1 mile to W. of W. St. John's I., S. of Singapore.

Skin-Diseases.—See Cutaneous.

Slate is found in most places, the best yet discovered being in Perak. It has not yet, however, been worked to any extent.

Slavery.—In Malay there are six different names for a slave, and there is even one for the "slave of a slave." The most frequent in Malay is hamba. This, as well as all the others, is used as a pronoun of the first person in addressing a superior. In Malacca, when first discovered, all labour appears to have been performed by slaves, a fact which not only implies a very rude state of society, but also a paucity of population in relation to the land, or, in other words, comparative high-priced labour. "The Malay nation," says Barros, "as they live by trade and no other pursuit, so are they the most luxurious people of these parts, and the proudest in their settlements. All with them is nobility, and this proceeds to such a length that you will not find a native Malay who will carry on his back his own or any other man's property, however much you may offer him for doing so."—Decade II. Book 6. Chapter 1.

Slaves are of two classes—bondsmen and bond-debtors—the first called in Malay tabusan, which signifies the object purchased or redeemed, and the last iringan, which means a follower, or retainer. The distinction between the slave and the freeman (mardeka), is distinctly enough drawn by the Malays, but yet the line is not so offensively drawn as to view the first as a mere chattel, for the slave can possess and inherit property, purchase his freedom, and has, in other respects, his prescribed rights. The only description of slaves that had not the power of redeeming themselves, appears to have been those of the king. The real condition of the slave may be seen from incidental notices of them in collections of the customary laws, and the following are examples from those of Johore: -- "If a slave cut and wound a freeman, he shall be condemned as a slave for life to the king." "If a freeman wound a slave, he shall be fined to the extent of one-half the value of the slave, or, if very poor, in the sum of ten mas." "If a slave give a freeman a blow on the face, the offending hand shall be cut off." "If a freeman give a slave a blow on the face, without any provocation on the part of the slave, he shall be fined, if poor, five, and if rich ten mas. But if the slave have been insolent, the freeman in such a case shall be held blameless." "If a slave, whether male or female. strike another slave a blow on the face without offence given by the latter, the offender shall be fined to the extent of half the price of the slave assaulted." "If a slave give abusive language to a freeman, he shall receive a blow on the face, or have a tooth extracted." "If a slave commit a murder, it shall be lawful for a third party to put him to death, provided the act shall have taken place in a remote part of the country, where there is difficulty in securing the person of the offender. But if the crime be perpetrated near a public authority, the slayer shall be fined five tails and one paa, because he has killed the slave without leave of his owner or the permission of the public authorities. However, in this last case, should the slave have been mortally wounded, it shall be lawful to put him to death."

"If a freeman kill a slave of the king (hamba-raja) he shall be fined the value of the slave seven times sevenfold, and if he cannot pay the fine, he may be either put to death, or be condemned to be for ever, with his family and relations, slaves to the king. But, if the slayer of the king's slave be a man of high rank, he may not be put to death, but fined to the extent of one kati and five tails of gold. In case, however, such great personage shall have killed the slave for some crime, then no notice shall be taken of the matter." "If a slave commit a theft, and is seized and put to death in the act, the slayer shall pay a mulct equal to half the value of the slave, to be shared equally between the master of the slave and the magistrate,

for the offence of the slayer consists in not informing the magistrate."*

One circumstance, probably, mitigates the condition of slavery among the Malays, that the master and slave are almost always of the same race, that there is no broad disparity in their conditions, such as exists in civilized communities, and that the severe labour of a calculating taskmaster is never exacted. Debt slavery, however, has been largely abolished in the Native States since they came under British influence.

Sletar. - See ORANG.

Slim.—Important V. on R. of same name in S.E. Perak.

Sling.—In Malay ali-ali, although used, does not seem to have been a favourite weapon with any class of the inhabitants. One is tempted to suspect that this may have arisen from the scarcity of pebbles in countries covered with forest, and of which the shores consist of mangroves or sand. The blow-pipe for shooting arrows, and the bow and arrow, the materials for both of which are so constantly at hand, seem naturally to have taken its place.*

Smabok.-V. 21 miles from Malacca, E.N.E., 13 miles from the coast.

Small-Pox.—This epidemic is well-known to the inhabitants of Malaya, and, of all the maladies with which they are afflicted, it has proved the greatest scourge. By the Malays it is called *chachar*, and also *katumbuhan*, the last of this signifying a sprouting or efflorescence, evidently taken from the eruption. Of the origin of the small-pox, or its first appearance among them, the people themselves, as might be expected, are wholly ignorant, and from the names we learn nothing, except that, being purely native, they do not point to a foreign origin for the disease. Some European writers have fancied that it was introduced by the Arabian traders, but had this been the case, it is probable it would have had an Arabian name, or at least such a name as would give some indication of its being exotic.

Snake.—See Ophidia, Cobra, Bungarus, Python, Hamadryad, &c. The following amusing article on snake-catchers appeared in a recent issue of the *Pinang Gazette*:—

"Many residents may be unaware of the fact that every week numbers of snakes are brought into Penang by natives, for the sake of the Government reward. These men are professional snake-catchers, just as there are rat-catchers in Islington. They go into the jungle to catch, alive, any herpetological specimens they can, the bigger the better. Unlike Josh Billings, when they 'see a snaix hed stickin out of a hole,' they don't say 'that hole belongs to that snaix.' The Ular sawah tedong and tedong selar, python, cobra di capello, and hamadryad are valued, like a Life-Guardsman, according to their inches. For one under a foot long the captor gets 25 cts.; if over 1 ft. and under 6 ft., 50 cts.; 5 ft. and under 8 ft., 75 cts.; 8 ft., and under 10 ft., \$1.50; 10 ft. and under 14 ft., \$5. These are the rates. When one thinks of the uncertainty of the life, the possibilities of being 'assimilated' by some 30 ft. python, or the chances of being bitten, which would mean an agonizing, if speedy, death, alone in the jungle, the snake-hunters are not too well paid. They are strange fellows too. One will bring into the police-station a bag with perhaps thirty snakes, principally cobras, all unwounded and fanged, but apparently stupefied-'charmed,' he will tell you. They stretch themselves conveniently out, hardly making a sinuous motion afterwards. This week there were 98 ft. of venom lying innocently in a batch in the police-station compound. When they have been measured, and the total reward calculated, the snakes have to be disposed of. But the snake-catcher is not also the snake-killer. On no account would be dispatch them—like a policeman who would arrest, but would not hang, a murderer. So he pockets his fee and walks off, leaving his scaly captives to be knocked on the head by some native policeman. Occasionally a monster eleven or twelve feet long will be brought, and before now pythons of nearly three times that length have been boastfully borne by a couple of men through the streets coiled round a bamboo. Having regard to the number and deadly nature of the serpent tribe generally, the wonder is that so few lives are lost through their bite. The public is indeed indebted to their courageous, unostentatious, low-caste exterminators About fifty species, of which some sixteen are venomous, inhabit the Peninsula and Settlements."

Snake-Bite.—The Malays believe in the use of a mineral resembling the well-known Indian snake-stone, regarding which, however, Europeans are somewhat incredulous. The Chinese in the Straits, when bitten, at once take some tobaccopipe scrapings, or even pure tobacco, and after soaking it for a few minutes in arrack drink the whole off, the result, as alleged, being always complete recovery Experiments made by the Government of India, however, go to show that nicotine has no effect as an antidote. But it is at least curious that death from snake-bite is almost unknown in an island containing sixteen venomous species. The Chinese allege that they are most usually bitten by the *Bungarus fasciatus*, known in India as the *Krait*.

The best known cure at present is the administration of strong doses of ammonia in water, or of raw brandy or whisky. If symptoms of intoxication appear, the patient is safe. It should be added that, so far as is known, there is no cure for a person who receives the *full dose* of a cobra's venom. But in numerous instances a portion goes into the clothes or is otherwise wasted, the mere act of throwing back the head at times causing the animal to eject the fluid. It is, therefore, always worth while to try curative measures.

Snipe (Tettrok or burong berkik) abound in the swampy rice-grounds of the Peninsula, Province Wellesley, perhaps, affording the best sport. There are, however, few places where, during the season, a good bag cannot be got.

Soldier.—The only word for soldier in Malay is soldado, from the Portuguese, but warrior is translated by penjurit. The Sanskrit word satriya, or chatriya, is sometimes used in the same sense. No class equivalent to our soldiers exists amongst the Malays.

South Cape or Tanjong Puling.—In N.E. Pahang and, except T. Kuantan 15 miles S., the most E. point of the territory.

South Hummock.—Hill 9 miles from the coast of Sungei Ujong, near the source of the Lukut R.

South Mound.—An eminence in the range nearest the sea, in Perak.

Spear, Lance, Javelin (Lembing or Tombak).—Weapons of this class, from their simplicity and the abundance of materials for them, must have been, after clubs, the earliest weapons used, and notwithstanding the introduction of firearms, they still continue in present use, even among the most civilized tribes. The half-savage inhabitants of the little island of Maktan in the Philippines, encountered, defeated and slew MAGELLAN and several of his companions, with no other weapon than bamboo spears, sharpened at the end and hardened in the fire; and long spears were the chief weapons of the Javanese when they made a show of encountering the British troops in 1811, near three centuries later. The Malay spear, or lance, is about twelve feet long, and is armed with a simple iron pike. In the hands of resolute men, disciplined, and acting in unison, this would have been a formidable weapon; but it is probable that effectual discipline never existed. A phalanx of men thus armed, says Crawfurd, resists the spring of the tiger with great ease and without any risk. The most general name for the spear is tumbak, which I take to have been originally Javanese, the people of Java having been, as we find from Barbosa, the great manufacturers of warlike weapons, even for the Malays, before the arrival of Europeans. In describing the trade of Malacca, after enumerating other commodities imported by the Javanese vessels, he says: —"They also bring many kinds of arms for sale, such as spears, shields, and swords with handles worked in marquetrie (kris?)." In the polite language of Java, the name for the spear is the same which expresses "steel," and in the languages of Celebes, it is the same which the Malay and Javanese expresses "iron," the reference, in both cases, being to the principal part of the weapon—the pike. For the javelin, or half-pike, the Malays have the name lambing. The metal ferule joining the spear-blade to the shaft is called sampak. Amongst the Chinese even now sharpened nibong sticks do duty as spears.*

Spice.—See Nutmeg, Clove, Allspice, &c.

Spiders.—The remarks made about other departments of Natural History apply to the Arachnidæ in full force. The naturalist has here a perfectly unexplored field. Even Mr. Wallace dismisses this large family in a few lines at pp. 433 and 467 of his valuable work. It must suffice to say that the house and field spider are well represented—the latter often by species of the most brilliant colouring. The field and grass spiders are equally plentiful, amongst them being a species of mygale with thick hairy legs and a hard carapace, which a pin or needle can scarcely penetrate, and the "trap-door" spider which constructs its beautifully finished nests on level grass plots. Several species inflict a severe bite, which, though reputed venomous, has never been proved to be so on satisfactory evidence.

Spolit.—District in N. Penang S. of Taiwan.

Squirrels (*Tupei*).—Several species of squirrel are found in the Peninsula, the most noteworthy being *Pteromys petaurista*, or flying-squirrel, which has a membrane between the fore and hind legs which acts as a parachute. Very pretty varieties, resembling in shape, but more beautifully marked than, the home species, are also found.

Sri Bulema.—The principal V. in Rembau, lat. 2° 37' N. and long. 102° 14' E. (app.).

Sri Lemak.—V. in N. Rembau, Negri Sembilan.

Sri Lemanti.—State and V. in the centre of the Negri Sembilan, now the residence of a Collector and Magistrate, who advises the rulers of the nine States. (See Negri Sembilan.)

St. Jarammio.—V. about 3 miles N. of Malacca-town on the E. road leading to Batu Berendam.

St. John's Hill.—At the E. end of Malacca-town. Ruins of Portuguese and Dutch forts still exist here.

St. John's Island (Palu Skijang).—I. 1½ miles S.E. of Blakang Mati, used as a quarantine station for Singapore.

Steel.—Known to the Malays as baja, or by the Telinga word kaluli, the latter seldom used. Appears to have been a native invention. Most of it used to be imported from Java, and even now native steel is in greater demand than foreign for krisses and spear-heads.

Stick Insects.—An insect precisely resembling a twig of dried wood, and sometimes from 8 to 10 inches in length. It is one of the *Phasmidæ* or Spectre insects, and is probably the most curious specimen of the insect world. It is found throughout the Peninsula, but the best specimens captured have been found in Malacca. The eggs resemble the seeds of a plant. The Malays call stick insects lipan bara.

Still (Kukus).—A rude arrangement of tubs and pipes precisely similar in general shape to our own. Kukus also means a retort.

Stockades (Kubu).—In some cases these consist of stout pieces of hardwood laid side by side; but in most instances two rows of sharpened stakes are driven into the ground at an interval of four or more feet, and the interior is filled with mud and stones; outside this a ditch about 5 feet is dug, the earth not used

for making the wall being thrown outwards. They are frequently defended by rajans or caltrops (q. v.).

Stone Implements, such as axes and adzes, appear to have been in use some centuries ago, and are still to be found in Malay houses preserved as heir-looms.

Straits Branch of the Royal Asiatic Society.—Founded 4 Nov., 1877. (See JOURNAL.)

Straits of Malacca.—The sea between the Malacca Peninsula and Sumatra, conventionally known as "The Straits."

Straits Produce.—The general term applied to rattans, gambier, pepper, nutmegs, tapiocca, gutta-percha, &c. &c., which form the natural produce of the countries adjoining the Straits of Malacca.

The following is a list of the principal articles of produce exported from Singapore to the United Kingdom, and known as "Straits Produce":—Black pepper, borneo-rubber, cloves, cocoa, coffee, copra, cubebs, cutch, dragon's blood, essential oil, flake tapiocca, gambier, gamboge, gum benjamin, gum copal, gum damar, guttapercha, hides, horns, illipe nuts, india-rubber, lead-ore, long pepper, mace, Malacca canes, mother-of-pearl shells, nutmegs, pearl sago, pearl tapiocca, rattans, sago flour, sapan-wood, sticklac, tallow, tapiocca' flour, tea, teel-seed, tortoise-shells, white pepper, wood oil.

Straits Settlements.—These include Singapore at the extreme S., Malacca in the S.W., The Dindings in W.C., and Penang with Province Wellesley in the N.W. coast of the Malay Peninsula, with the Cocos Islands (q. v.). As each Settlement is dealt with in full under its respective heading, it will only be useful to give a short summary of certain statistics.

PRODUCTS AND TRADE.—The former will be found described for each place, while a general list is given under STRAITS PRODUCE. The grand total for all the Settlements of Imports and Exports for the past two years were:—

	1886.	1887.	1891.	1892.
Imports,	\$121,544,218 .	\$142,322,920 .	\$144,864,526.	\$ 150,073,923.
Exports.	\$ 104,122,274.	\$ 121.341.211.	\$ 134.283.145.	\$14 3,011,967.

GOVERNMENT.—A Governor (who is Vice-Admiral and Commander-in-Chief), having under him a Colonial Secretary with a dormant commission as Deputy Governor, an Executive Council of nine other official members, and a Legislative Council of the same with seven unofficial members. Of the latter, the Chambers of Commerce at Singapore and Penang nominate one member each. Of the former, one is Resident Councillor at Penang and one at Malacca. Departments:—Common to nearly all British Crown Colonies, the head of each residing in Singapore.

A Chief Justice and three Puisne Judges sit in the Supreme Court at the three larger Settlements, and all four (or three of them) constitute the Court of Appeal,

A Municipality exists in Singapore, Penang, and Malacca. Under a new Ordinance, passed in 1887, the President is a paid officer nominated by the Governor, and the other Commissioners are one-half elected by the ratepayers of the various Settlements, and the other half nominated by the Governor.

REVENUE.—The total Revenue for 1892 was \$3,652,789, and the expenditure \$4,270,575. The balance to the credit of the Colony on the 1st January, 1893, amounted to \$674,682. The Protected States have a joint revenue of over \$3,100,000.

Detailed information will be found in the various articles in other pages.

Means of Mail Communication.—Communication is maintained between the Straits Settlements and—

England and Europe.—By the weekly mail steamers (contract time by the [371] B B 2

Messageries Maritimes from Singapore (not calling at Penang), vià Marseilles, 30 days; by the P. and O. Company's steamers, from Penang, the nearest port, vià Brindisi, 29 days), and by steamers of the North German Lloyds, Ocean, Glen, Ben, Shire, and other lines, at more or less regular intervals; and by the Spanish Transatlantic, Rubattino and Austrian Lloyds steamers.

Ceylon.—By the P. and O. and Messageries mail steamers weekly; time by the Messageries Maritimes from Singapore (not calling at Penang), 5 to 6 days; by the P. and O. Company's steamers, from Penang, 5 days; from Singapore, 7 days; and

by many of the other steamers named above.

Calcutta.—By the opium steamers, once a month; time from Penang, the nearest port, about 9 days; and by fortnightly steamers of the British and Netherlands India Companies; time about 13 days from Penang, touching at Rangoon and other places.

Batavia.—Weekly mails by the steamers of the Messageries Maritimes and Netherlands India Steam Navigation Company, and frequent communication by-

other steamers; time about 3 days.

Hongkong.—By the P. and O. and Messageries mail steamers weekly and by frequent trading steamers; time from Singapore, the nearest port, 5 to 8 days according to the monsoon,

Saigon.—By the Messageries mail steamers and occasional private steamers;

time 3 to 4 days.

Manila.—Fortnightly by the steamers of Messrs. Reyes, and monthly by the Spanish Transatlantic steamers; time from Singapore, the nearest port, 5 to 6

days.

Australia.—To Brisbane and Sydney, viâ Batavia and Torres Straits, by the steamers or the British India Company, monthly; time to Brisbane from Batavia, 20 days. By P. and O. Company's steamers to Melbourne, viâ Galle, bi-monthly; time 27 to 30 days. To Western Australia by a subsidized steamer about once in two months.

There is also constant steam communication between Singapore, Penang, and Malacca, and between those places and the ports of the Protected Malay States, also with Bangkok, Saigon, and the principal ports in Borneo, Java and Sumatra.

Sudu Tandok.—A spoon for administering medicine to children.

Sudu Tulang.—An ornamental spoon used occasionally for administering medicine to children.

Sugar-Cane is largely cultivated in Province Wellesley, but in the other British Possessions and in the Malay States in small patches only. The annual out-turn from Province Wellesley is about 11,500 tons, representing the produce of some 9,000 acres, divided amongst 12 to 15 plantations. The machinery of the mills under European management is of the latest and best description, but the natives cultivating small holdings still adhere to the primitive buffalo-mill.

The two varieties of cane in general cultivation are Yellow Mauritius and Striped Bourbon. The Chinese cultivate what planters call the Otaheite variety, but principally for eating. The Selangor cane formerly in cultivation has now entirely disappeared. Some 33 other varieties are now under experimental cultivation at the Penang Gardens nursery, and many of these are also being tested at the Botanical Gardens, Singapore. They have not, however, as yet any commercial

importance.

The Malays, who cultivate the cane in small patches, have a number of names for the different varieties, viz., Tebu (the generic name for cane) itam (black cane); T. betong, a very thick species; T. telor (the egg cane); T. muris (the Mauritius cane); T. salah (the white-skinned thin cane); and T. Gajah (the elephant cane). T. telor appears to answer to the Otaheite cane, but T. muris is that most commonly cultivated.

Sugar Palm (Arenga saccharifera).—This is still used as a source of sugar manufacture in the Cocos Islands, but has been replaced by that from the sugarcane in the Peninsula. The tree is not unlike the cocoa-nut in general appearance, but furnishes a toddy superior to that from the last-mentioned tree.

Suku.—Lit. a branch of a family, hence a tribe. The headmen in the Native States under Penghulus are called Suku-Suku.

Suloh Kakingan Tua.—V. in the Sungei Bharu Ulu district, N.W. Malacca.

Sulphur.—In Malay balerang, is imported chiefly from the volcanic islands of the Archipelago.

Sultan.—This Arabian title, first taken by the celebrated Mahommed of Ghizni, the early Turkish conqueror of India, fell quickly into disesteem even among the Turks themselves, having been assumed by many of their petty princes, as we find from Erskine's "History of the House of Timur." Many of the native princes of the Malay Archipelago assumed it, after their conversion to Mahommedanism, in lieu of the Sanskrit name of Raja, or the native ones of Datoh and Pangeran. Thus Barros informs us that the petty princes of Pasé and Pedir, in Sumatra, had assumed it before the arrival of the Portuguese, and so had three of the petty princes of the Moluccas, although, when the Portuguese saw these islands first, their inhabitants had been barely eighty years converted to Mahommedanism. The Javanese princes of Mataram took it in 1535, and maintained it for some time, and it is still the title of one of the two native princes of the interior of the island. It was taken, also, by the princes of Bantam, and the only considerable independent Malay prince of Borneo now goes by it. The title has lately been assumed by the rulers of Pahang and Johore.*

Sumpitan.—Usually made of Kayu jati, Kayu dammar laut, or Bulu timiang, a species of bamboo. A hollow tube from which small arrows or clay balls are propelled by the breath. Still used by aboriginal tribes as a weapon, but amongst the more civilized Malays abandoned to children. (See Arms.) The sumpitan of the aborigines of the Peninsula, unlike that of the Dyaks, which is bored in solid wood, consists of two timiang bamboos, one within the other. The darts or arrows (damak) are made of the stem of the bertam leaf, 10 inches in length and 1/16th in diameter at the base, whence they taper to a very fine point. The base is inserted into a cane of Kayu tutu (which is very light and porous) so as to fit the bore, while the point is dipped for nearly an inch in ipoh poison, said to be made by taking ipoh root and wood limes and tuba, the whole being bruised, boiled and strained. Arsenic is then added, and other drugs are sometimes mixed with it. The preparation has the consistency of chandu. A nick is cut below the poison to ensure the head of the arrow breaking off in the wood.

A writer in the J. S. B. R. A. S. gives a different account of the poison, which

is subjoined hereunder:-

"The chief ingredient of this poison is the juice of the well-known Upas tree of the Javanese, the Antiaris toxicaria. With this juice a great many other substances are mixed, the number and nature of which depend partly on chance, and partly on the science of the preparer. The poison-fangs of different kinds of snakes, the juices of a number of trees and fruits, even arsenic, which the Orang Utan jina get in exchange from the Malays, are mixed up together. It thus comes to pass that the arrow-poison not only of every small tribe, but of every individual Orang Utan is made of different materials, and that, in consequence of this, the effects are very different. The effect on man is certainly very deadly and very rapid; thoroughly trustworthy Malays in different parts of the Peninsula say that they know from actual observation that a man who has been wounded is not able even to finish his siri, but is seized with violent cramps and severe vomitings and

so dies. In some experiments made upon animals, the poison had a very rapid

effect, even when administered in very small doses.

It should be mentioned that specimens sent to Europe fail to produce any toxic symptoms whatever. But this is in accordance with the native assertion that the poisonous properties rapidly disappear—a month's old preparation being useless.

Sungei.—In Malay, a river. As rivers nearly throughout Malaya have no specific names, but take them from the places through which they pass, and as the Malayan nations dwell almost always on rivers, the word is of very frequent occurrence in the name of places.

Sungei Allakan.—Petty N. affluent of the Bernam R., 2 miles E. of Kwala Slim.

Sungei Alu.—Petty E. affluent of Bidor R., S. Perak.

Sungei Anak Ayer Krian.—A petty affluent of the Klang R., entering about 6 miles below Kwala Lumpor.

Sungei Anak Endau.—Small R. flowing from the W. into the Endau R. near its mouth, in S.E. Pahang.

Sungei Ara.—The upper portion of R. Keluang, in S.E. Penang. V. of same name on S. bank about $1\frac{1}{2}$ miles from E. coast.

Sungei Arang.—One of the sources of the Lebih R. (q. v.).

Sungei Arus.—Small N. affluent of the Selangor R., about 17 miles from the mouth.

Sungei Assam.—Small affluent of Linggi R., Sungei Ujong, about 10 miles from its mouth.

Sungei Atap.—Petty stream in N. Singapore.

Sungei Atap Layar.-Small W. affluent of R. Endau, N. Johore.

Sungei Ayer Batu.—A petty affluent of the Klang R. about 4 miles from Kwala Lumpor.

Sungei Ayer Galas.—Petty N. affluent of the Klang R., Selangor.

Sungei Ayer Itam.—The name of the upper portion of the E. Sungei Pinang.

Sungei Ayer Itam.—A small R. in W. Penang, E. branch of Sungei Gagah.

Sungei Ayer Itam. - Petty E. affluent of the Bidor R., S. Perak. -

Sungei Ayer Raja.—Petty stream in Pasir Panjang district, S.W. Singapore.

Sungei Ayer Rawa.—V. on E. bank of R. Sembrong, 4 miles above its abrupt turn N. in C. Johore.

Sungei Ayer Tawa.—Small E. affluent of the Dinding R., S.C. Dindings.

Sungei Ayer Tengah.—Small stream flowing into the Lukut R., S.C. Sungei Ujong.

Sungei Badak.—Small V. on W. bank of Malacca River, in the Blimbing district.

Sungei Badang.—Petty E. affluent of Dingin R., with V. of same name near by, 4 to 5 miles E. of Province Wellesley frontier, Kedah.

Sungei Bahan.—(Marked Buah on the local map.) Petty stream flowing from W. into Old Strait, Johore.

Sungei Bajan.-Small R. in Tengah district, W. Singapore.

Sungei Bakal.—A petty E. tributary of the Sereting R., S.W. Pahang.

Sungei Bakau.—Small E. affluent of the Perak R., C. Perak.

Sungei Bakau.—Small R. and V. in Province Wellesley.

Sungei Bakau.—A small affluent of the Bera R., just behind its junction with the Pahang R., C. Pahang.

Sungei Bakau.—A small affluent flowing from the N. into Muar R. in S.W. Pahang.

Sungei Balana Yam.—Small S. affluent of the Selangor R., about 7 miles W. of High Peak, E. Selangor.

Sungei Baling.—R. rising in Central Kedah and flowing into the Muda R.

Sungei Baloh.—Small R. 4 miles S. of Tanjong Puling in N.E. Pahang.

Sungei Bamap. -Petty stream in N. Pulo Ubin.

Sungei Banmar.—Petty affluent of Chandriang R. in E.C. Perak.

Sungei Banting.—Petty R. and V. on S.W. coast of Selangor, about 7 miles from entrance to Bernam R.

Sungei Baran.—Small affluent of R. Endau, N. Johore.

Sungei Barong.—Small R. half way between Tanjong Puling and the Kuantan R., N.E. Pahang.

Sungei Batam Bidi.—N. affluent of the Kinta R., about $3\frac{1}{2}$ miles above Bandar Baru I., S. Perak.

Sungei Batam Papan.—Rises in N. of Sungei Ujong and crosses the frontier of Selangor. It is the S. source of the Langat R.

Sungei Batang Malacca.—The name applied to the Malacca River for about 8 miles from its source in the Jus district, whence it flows in a W.S.W. direction before turning southwards towards the sea.

Sungei Batang Padang.—One of the four principal tributaries of the Perak River, rising in the Mts. of same name. It joins the Bidor 5 miles about E. of Durian Sabatang, and the tide is evident for about 4 miles beyond the junction. General course S.W. in S.E. Perak.

Sungei Batu.—Petty N. affluent of Bidor R., S. Perak.

Sungei Batu.—Two streams flowing from the E. and W. respectively into the Kinta R. in C. Perak are thus named in the S. A. S. map.

Sungei Batu.—A petty stream flowing into a N. affluent of the Klang River, and one of its sources in S.E. Selangor.

Sungei Batu.—Small stream on S. coast of Penang.

Sungei Batu Ampar.—Small R. in N.W. Kedah about 12 miles S. of R. Lungu.

Sungei Batu Feringgi.—Small R. in N. Penang.

Sungei Batu Poho.—Small E. affluent of the Pahang R. where it trends N. in C. Pahang.

Sungei Batu Sawang.—R. in Enas territory, N. of Johore, Negri Sembilan.

Sungei Bau.—Small R. flowing from W. into the Old Strait, S.W. Johore.

Sungei Bawang.—Petty E. affluent of the Kinta R., S. Perak.

Sungei Bayan Lepas.—Small R. in S. Penang, flowing N. to S. through district of same name.

Sungei Bedil,-Petty E. affluent of Johore R., about 8 miles above Johore Lama.

Sungei Behei.—Small S. affluent of R. Sembrong, N. Johore.

Sungei Beko or Pau.—A branch of the R. Batu Pahat falling into its junction with the R. Sembrong, according to the map.

Sungei Bekum .- Petty N. affluent of the Bidor R., S. Perak.

Sungei Bemban.—A small affluent of the Linggi R., opposite Niato.

Sungei Bengkong.—Small E. affluent of Muar R., in W. Johore, just below Tikam.

Sungei Bengkwong.—Petty E. affluent of Selangor R., E. Selangor.

Sungei Benut.—R. on W. coast of Johore, 25 miles from Tanjong Bulus, and 35 from W. point of Singapore.

Sungei Bera —Small affluent of the Sereting R., 10 miles below its junction with Pahang R., and joining the lake of the same name.

Sungei Berati.—Small stream in Tanjong Gul district, S.W. Singapore.

Sungei Berbera.—Petty stream in N.W. Kedah, 3 miles N. of the Lungu R.

Sungei Bernam.—R. dividing Selangor from Perak, about ³/₄ mile wide for the first 11 miles from the sea. Its principal source is in Ulu Selangor, in the range of hills between Selangor and Pahang.

Sungei Bertaya.—Small R. W. of Bukit Chermin, S. Singapore.

Sungei Betok.—Small N. affluent of R. Sembrong, N. Johore.

Sungei Betong.—Small affluent W. side of Linggi R., about 4 miles above Linggi, Sungei Ujong.

Sungei Bharu.—A small river giving its name to four surrounding districts, 4 miles from Linggi, in N.W. corner of Malacca. A V. on the N. bank goes by this name also.

Sungei Bharu.—An important village in Malacca lying on the boundaries of Sungei Bharu Ulu and Sungei Bharu Tengah and on the high road from Linggi to Malacca. A mosque lies just N. of the village.

Sungei Bharu Ilir.—A district in N.W. Malacca below Sungei Siput and E. of Linggi.

Sungei Bidor.—The S. branch of the Perak R. joining the Batang Padang R. about 5 miles E. of Durian Sabatang. It rises in the Mts. of same name.

Sungei Bil.—Petty E. affluent of the Slim R. in S.E. Perak.

Sungei Binchang.—Petty S.E. affluent of the Bidor R. near Durian Sabatang, S. Perak.

Sungei Blakang Mati.—Petty stream in S.E. corner of I. of same name.

Sungei Blantar.—Small R. in Johore, entering Strait between Pulo Ubin and the former.

Sungei Blat.—Petty E. affluent of R. Madek, E. Johore.

Sungei Bluan.—Petty N. affluent of the Batang Padang R., E.C. Perak.

Sungei Blukang.—Petty stream flowing into the mouth of Old Strait, S.W. Johore, about 11 miles from Tanjong Bulus.

Sungei Blukang.—Small stream in extreme W. of Singapore, at entrance of Strait.

Sungei Blukang Kechil.—Ditto, † mile S. of above.

Sungei Boh.—Petty W. affluent of R. Pulei, S.W. Johore, 2 miles from the mouth.

Sungei Boko Boko.—A W. affluent of the Pahang R. in W.C. Pahang.

Sungei Boya.—See Sungei Buaya.

Sungei Bremen.—Small E. affluent of R. Chendariang, E.C. Perak.

Sungei Brentong.—A S.W. affluent of the Pahang R., which it joins in W. Pahang about 3 miles W. of the junction of R. Tomling.

Sungei Bri.—R. in W. Singapore between the Lim Chu Kang and Tengah districts.

Sungei Bruang.—Petty affluent of S. Batam Pajam, the S. source of the Langat R., 1 mile N. of Sungei Ujong frontier in S.E. Selangor.

Sungei Bruas.—R. in N. Dinding territory, about 4 miles S. of the boundary line.

Sungei Buaya.—Small affluent of the Endau R. in S.E. Pahang.

Sungei Buaya (Boya in S. A. S. map).—Petty W. affluent of Perak R., about 3 miles above Durian Sabatang, in S.W. Perak.

Sungei Bubar.—The fifth stream above S. Endau on the coast of Pahang.

Sungei Bukit.—Very small N. affluent of the Bernam R. in its extreme S. turn, S. Perak.

Sungei Bulan Kasar.—A petty affluent joining R. Ridan flowing into the R. Pulei, S.W. Johore.

Sungei Buloh.—Small R. on the coast of Selangor about 15 miles N. of the entrance of the Klang R.

Sungei Buloh.—Small R. in Johore entering Old Strait opposite E. Selitar, N. Singapore.

Sungei Buloh.—R. in N. point of Kranji district, Singapore.

Sungei Buloh Kechil.—Ditto, between $\frac{1}{4}$ and $\frac{1}{2}$ mile to W. of above.

Sungei Buluh.—A small V. in the Melakek district, N. Malacca.

Sungei Buluh Besar.—Small N. affluent of the Selangor R. in E.C. Selangor.

Sungei Buluh Kechil.—Ditto, 1 mile S. of above.

Sungei Burong.—Small stream flowing into the sea in N.W. Perak, close to Tanjong Piandang.

Sungei Burong.—Small R. on W. coast of Penang in Balik Pulau district.

Sungei Butal.—Small stream in N.W. Perak, flowing into the sea $5\frac{1}{2}$ miles, S. of Kriau R.

Sungei Chamar.—Petty affluent of Linggi R., 1 mile from its mouth.

Sungei Chamar.—A fork of the R. Sungei Pari, a branch of the Kinta R., C. Perak.

Sungei Changi.—R. flowing through district of same name, N.E. Singapore.

Sungei Chapit.—Petty W. affluent of R. Sungei Pari, a branch of the Kinta R., C. Perak.

Sungei Chat.—Small R. to W. of Johore Bharu, the capital of Johore.

Sungei Chego Udong.—Small S. affluent of Selangor R., entering it nearly opposite S. Kurlin in E. Selangor.

Sungei Chemalau.—A small affluent on S. side of Muar R., Gemenchi, Negri Sembilan.

Sungei Chendariang.—E. affluent of the Kinta R. in E.C. Perak, which it enters 9 to 10 miles N. of Bandar Baru I.

Sungei Cherating.—R. supposed to mark the boundary between Pahang and Tringganu, entrance 3 miles below that of R. Kemamang.

Sungei Chermin.—Small E. affluent of Perak R. nearly opposite Kwala Kangsa, C. Perak.

Sungei Chibillang.—Small R. in N.W. Kedah about 16 miles S. of Lungu R.

Sungei Chikoh.—Small W. affluent of Pahang R. 3 miles N. of Gnau, C. Pahang.

Sungei Chikus.—Small affluent of the Batang Padang R., S. Perak.

Sungei Chin,-Petty N. affluent of the Batang Padang R., E.C. Perak.

Sungei China.—Petty affluent of the Kinta R. about 5½ miles above Bandar Baru I., S.C. Perak.

Sungei China.—Small stream in the Mandi district, N. Singapore, flowing into the Straits opposite Johore Bharu.

Sungei Chinder.—R. in N. Pahang, just above South Cape or Tanjong Puling.

Sungei Choden.—E. small affluent of the Muar R., 3 miles below junction of R. Segamat, Johore.

Sungei Chul.—Petty stream 7 miles of Bidor Mts. in S. Perak flowing into R. Ekkawaya.

Sungei Dagong.—Petty affluent of the Padang Batang R., S. Perak.

Sungei Damar.—Petty E. affluent of Johore R., just below Kota Tinggi.

Sungei Danau Prujok.—A small affluent of the Muar R. about 5 miles N. of Segamat in S.W. Pahang.

Sungei Dangah,—Small stream flowing from W. into embouchure of R. Sakudei, Old Strait, Johore.

Sungei Dangalus.—Petty E. affluent of Kinta R., E.C. Perak.

Sungei Dapi.—Petty affluent of the Selangor R., N.E. Selangor.

Sungei Dedap.—A branch of the Perak River in Perak.

Sungei Delai.—A small affluent of the Muar R. in Enas territory, Negri Sembilan.

Sungei Denah.—Small E. affluent of the Selangor R., 3 miles above Kwala Kanching.

Sungei Dinding.—In the territory of that name (q. v.). It is very wide in proportion to its length, which is only 12 to 13 miles.

Sungei Dingin.—The S. branch of the Muda R., S.W. Kedah.

Sungei Dochong,—The first stream on the E. coast of Pahang above S. Endau.

Sungei Doulong.—A small affluent of the Pahang R. about 51 miles from its mouth and 2 miles W. of Pekan.

Sungei Dua.—A small stream in Johol, Negri Sembilan. Also a stream in N. part of Province Wellesley. The name is a very common one throughout the Peninsula.

Sungei Dua.—Several small villages in Province Wellesley have this name, derived from some petty stream close by. The most important is that about 3 miles from Ara Rendang, 7 miles 7 furlongs from Butterworth. It was formerly the site of a Police Station.

Sungei Dua.—A village between Rembau and Johol.

Sungei Dua.—Petty N. affluent of the Selangor R., E.C. Selangor.

Sungei Dua.—Petty N. affluent of the Bernam R. in extreme S. Perak, about 21 miles from the coast.

Sungei Dua.—Small R. in E. Penang, flowing through Batu Uban district.

Sungei Dua.—V. on the road from Chaban to Nyalas, E. Malacca.

Sungei Duablas.—Small W. affluent of the Pahang in W.C. Pahang.

Sungei Dupah.—Small N. affluent of the Perak R., 9 to 10 miles from its mouth.

Sungei Duri.—Small S. affluent of Pahang R., rising in a hill 10 miles S. of same name, C. Pahang.

Sungei Durian.—Petty W. affluent of Perak R., in S.W. Perak, about 1 to 2 miles N. of Durian Sabatang.

Sungei Ekkawaya.—Small R. rising in the Bidor Mts. and flowing into Bidor R., S. Perak.

Sungei Endau (sometimes spelt Indau).—The most southerly river of any size flowing through Pahang territory, its right bank being under the Government of Johore, which claims all south of N. lat. 2° 40′, the position of the Endau's mouth. According to the S. B. R. A. S. map the source of its western and longest branch is identical with that of the S. Sembrang flowing into S. Batu Pahat on the W. coast, the two streams making the larger portion of Johore an island. Its eastern branch rises at Chenddia Bemban, not far from the source of the S. Sedili Besar. Various small affluents flow into it, but the country has not as yet been sufficiently surveyed to allow of their being accurately mapped.

Prior to 1838 the mouth of the Endau was a great slave mart for captives taken by the Illanun pirates, a village called Kassing (not marked on modern maps), within 5 or 6 miles of the entrance, being their chief rendezvous. Here those kidnapped were sold to dealers from Pahang, Kelantan, Tringganu and Singapore, Chinese being the principal dealers. The S.W. monsoon was the musim perompak, or pirate season. Now that the slave trade has been suppressed by the breaking up of the piratical strongholds in Borneo, the inhabitants of the coast bordering the Endau, who were formerly noted for incivility and inhospitality, have turned their attention to more peaceful pursuits. They now collect gutta, rattans, ebony, &c., for the Singapore market.

Sungei Endau Mati.—A W. tributary of the R. Endau, joining the latter in lat. 2° 26′ N. and long 103° $42\frac{1}{2}$ ′ E.

Sungei Enggar.—Petty W. affluent of Perak R., 5 miles N. of Kota Lama, C. Perak.

Sungei Epo.—Petty affluent of the Batang Padang R. in S. Perak.

Sungei Gading.—Small W. affluent of Muar R., Muar, 3 miles N.E. of Panchor.

Sungei Gading.—A small affluent of the R. Sereting in Jumpol, Negri Sembilan.

Sungei Gagah.—Small R. in W. Penang, entering the sea at same entrance as Sungei Jalan Bharu, and flowing through the Sungei Rusa district.

Sungei Gagah.—A small V. in the Ayer Pah Abas district, Malacca.

Sungei Gajah Mati.—Small E. affluent of the Dinding R., S. Dinding.

Sungei Gantang.—Petty W. affluent of the Sungei Pari, a branch of the Kinta R., C. Perak.

Sungei Garam.—R. in S.W. Perak, a W. affluent of the Perak R.

Sungei Garuda.—Petty affluent of the Slim R., the N. branch of the Bernam, S.E. Perak.

Sungei Gatal.—Small R. in N. Dinding territory, 2 miles S. of Bruas R.

Sungei Gedong.—Small stream in N.W. Perak, 2 miles N. of Kurau R., flowing into the sea.

Sungei Gedong.—Petty R. in N.W. Singapore.

Sungei Gelang Patah, -E. branch of the Pulei R., S. Johore.

Sungei Gelugor.—Small R. in district of same name, E. Penang.

Sungei Genal.—Small R. in the Pahang Delta, E. Pahang.

Sungei Goar.—Petty W. affluent of Perak R., W.C. Perak, about 10 miles S.S.W. of Kwala Kangsa.

Sungei Goh .- A W. branch of the R. Pulei, S. Johore.

Sungei Goloh.—Petty E. affluent of the Kinta R., just below Kwala Kangsa, S.C. Perak.

Sungei Gombah.—A petty affluent of the Klang R., and one of its sources in S.E. Selangor, 2 or 3 miles from Kwala Lumpor.

Sungei Griang.—Small R. in N. Kedah, entering the sea about 7 miles N. of Kedah R.

Sungei Hantu.—Small stream flowing into the sea in N.W. Perak, 6 miles S. of Krian R.

Sungei Hantu.—Petty R. in N.W. Singapore, flowing into Old Strait, S. of S. Peraput, in Johore.

Sungei Harus Dras .- Affluent of the Sembrong R., N. Johore.

Sungei Hitam.—Small affluent W. of Linggi R., 4 miles above Permatang Pasir. Sungei Ujong. Also petty branch of the Chamar R., C. Perak.

Sungei Hut.—Small R. on coast of C. Perak, forming the N. boundary of the Dinding territory.

Sungei Ijok .- A S. branch of the Krian R. in N. Perak.

Sungei Itam.—Petty branch of the Chamar (fork of the R. Sri Pau), C. Perak. Spelt also Hitam (q, v).

Sungei Jakati.—The S. fork of the Rumpen R. in E. Pahang.

Sungei Jambai.—Petty N. affluent of the Batang Padang R., E.C. Perak.

Sungei Jambun.—Petty E. affluent of the Kinta R., E.C. Perak.

Sungei Jandarata.—Small S. affluent of the Perak R., about 12 miles from its mouth.

Sungei Jang.—Petty affluent of the Selangor R., N.E. Selangor.

Sungei Jarum Mas.—Small R. on coast of Perak, just above the Dinding frontier.

Sungei Jelebat.—Petty E. affluent of the Kinta R., S.C. Perak.

Sungei Jelebu.—An affluent and source of the Triang R., rising in the Jelebu hills.

Sungei Jelutong.—Petty N. affluent of the Langat R. nearly opposite Lankut Buntal, S.W. Selangor.

Sungei Jemaluang.—The eighth from the S. of the small streams on the E. coast of Johore.

Sungei Jerak.—Small affluent flowing N. to S. into the Linggi R., Sungei Ujong, about 2 miles above Permatang Pasir.

Sungei Jerbin.—Small R. in N. Kedah entering the sea 9 miles N. of Kedah River.

Sungei Jernis.—A small affluent S. of Muar R., in the corner formed by its turn from E. to S. in S.W. Pahang.

Sungei Jernong.—Petty affluent of the Chandriang R. in E.C. Perak.

Sungei Jijari.—Petty E. affluent of the Batang Padang R., S. Perak.

Sungei Johore.—The principal S. river of Johore. For 18 miles from its mouth it is of considerable width, but there becomes the centre of numerous affluents, the main stream eventually dividing some 16 miles N.W. into the Sayong and Lenggin. This stream is probably the largest of the Peninsula. At its mouth it is about 3 miles wide; at an island called Pulo Layang, a few miles above the ancient capital of Johore-Johore Lama, now almost deserted-it is yet about 2 miles broad; after the two islands, called Pulo Kayu Kechil and Pulo Kayu Besar are passed, it is from 200 to 300 yards wide, but after that it rapidly narrows, so that, a few miles further up, at the junction of the small river Kamang, it is no more than 30 yards. It then diminishes very little in breadth till Menkao, where it is 25 feet, and a few miles after only 10. It is to be remarked that this river, as well as several other rivers of the Peninsula, do not become shallow in proportion as they become narrow; there are 15 feet of water at Menkao, where the river is no more than 25 feet broad. Thus the Johore might be considered as navigable even for boats of considerable size until near its source, if it could be cleared of the trees by which it is obstructed. The jungle which covers both banks of the river abounds in rattans, chiefly in the upper part; there is also much dammar and garru-wood. The banks of the Johore River are almost deserted, a few Malay houses being the only habitations met with, and these ordinarily at a great distance from each other. The traveller proceeds sometimes half a day or an entire day without meeting any of them. There is nothing like a village except that of Johore. But, in the absence of human beings, a great number of wild beasts abound on both sides of the river.

Sungei Johore.—Small affluent of the Endau R. in S.E. Pahang.

Sungei Jong.—Petty E. affluent of the Chandriang R. in E.C. Perak.

Sungei Jubat.—A petty affluent of the R. Langat in S.E. Selangor.

Sungei Jugra.—An arm of the sea dividing Langat and Lumut Islands from the mainland in S.W. Selangor. The Langat R. flows into it, but the appellation is a misnomer, as it is not a river.

Sungei Jukan Mukiri.—Petty affluent of R. Tiram Batu, S.W. Johore.

Sungei Jukun Kechil.—Petty stream flowing into the mouth of Old Strait, S.W. Johore.

Sungei Jukun Besar,—Ditto, ½ mile S. of above.

Sungei Jumialu.—Small affluent from N. flowing into Muar R., just below Kampong Mondok.

Sungei Jumpol.—Runs in a S.E. direction through the State of that name, Negri Sembilan, and joins the Muar R. at its S.E. corner.

Sungei Junjong, in the centre of Province Wellesley, rises near [381]

Macham Buboh, and is called by that name as far as Sempang Ampat. It flows into the arm of the sea which constitutes Batu Kawan an island, debouching at Bukit Tamburo.

Sungei Jurak.—Petty E. affluent of R. Endau in N.E. Johore.

Sungei Jurong.—R. in S.W. Singapore dividing the Jurong and Pandar districts from Peng Kang.

Sungei Kabul.—Petty N. affluent of the R. Kampar, an E. branch of the Kinta R., S.C. Perak.

Sungei Kacha Kechil.—Petty W. affluent of the Kinta R., C. Perak.

Sungei Kahang.—The E. branch of the Endau R., N.E. Johore.

Sungei Kalang.—Small R. separating the Kalang and Rochor districts, N.E. Singapore-town.

Sungei Kalerbang.—Petty E. branch of R. Chamar, a fork of the Sungei Pari R., C. Perak.

Sungei Kali.—Petty S. affluent of upper portion of Selangor R. Tin found on S. bank.

Sungei Kalisa.—The third from the S. of the small streams on the E. coast of Johore.

Sungei Kambar.-Small affluent of the Endau R. in S.E. Pahang.

Sungei Kampar.—An E. branch of the Kinta R., S.C. Perak.

Sungei Kampong.—Petty N. affluent of the Batang Padang R., E.C. Perak.

Sungei Kanching.—Small E. affluent of the Selangor R. rising not far W. of the dividing chain between Selangor and Pahang.

Sungei Kangsa.—Small W. affluent of Perak R., 3 miles S. of Kota Lama, C. Perak. Kwala Kangsa, situated at the confluence, is an important station.

Sungei Kapar.—Petty R. and V. N. of mouth of Klang R., Selangor.

Sungei Kapayang.—Small affluent of the R. Chamar (branch of the Sungei Pari R., W. of Kinta R.), C. Perak.

Sungei Kapis. -N. affluent of the Muar R., just E. of Klubo in S.W. Pahang.

Sungei Karang.—Petty stream flowing from W. into R. Jurong, S.W. Singapore.

Sungei Karong.—Petty R. about 8 miles N. of Selangor R., on coast of Selangor.

Sungei Kaya Mati.—Small R. in the Pahang Delta, E. Pahang. The sixth stream above the R. Endau.

Sungei Kayang,—Petty stream flowing from N. into W. of Perak R., S.W. Perak.

Sungei Kayat.—A petty W. affluent of the Sungei Pari, a branch of the Kinta R., C. Perak.

Sungei Kedah.—R. in N. Kedah, in all probability of greater importance than it would appear from published maps and charts, though not supposed to be of any great size. The capital—Kota Star or Alor Star—is situated at its mouth on the N. bank.

Sungei Kelamtu.—Petty affluent of the R. Sembrang, at its abrupt turn N. in C. Johore.

Sungei Kelantan.—(S.) The principal R. of that State flowing N. The

capital, of same name, is situated at the foot of a delta several miles N. of the main entrance. The principal tributary of the Kelantan is the Lebih, which has its sources under other names in the N. hills of Pahang.

Sungei Kelantan.—(N.) Not marked on the latest maps, its embouchure only being indicated. This (forming a delta) is in about 6° 18′ N. and long. 102° 18′ E.

Sungei Keluang.—R. in S.E. Penang flowing between the Relau and Bayan Lepas district.

Sungei Kemaman.—See KEMAMAN.

Sungei Kemang.—Petty N. affluent of the Berman R., about 26 miles from the coast, S. Perak.

Sungei Kemang.—Small E. affluent of Johore R., 7 to 8 miles above Johore Lama.

Sungei Kembar.—Small N. affluent of R. Sembrong, N. Johore. Another immediately S. of the former is also so marked on the map.

Sungei Kembi.—Petty affluent of Selangor R., N.E. Selangor.

Sungei Kementas.—Affluent of the Endau R. in S.E. Pahang.

Sungei Kemuda.—Small R. flowing from W. into the Old Strait, S.W. Johore.

Sungei Kenabus.—A small W. affluent of the Triang R., W. Pahang.

Sungei Kenas.—Petty E. affluent of Perak R. just below a road connecting the Perak and Kinta Rivers, C. Perak.

Sungei Kendrong.—Small W. affluent of Perak R., about 8 miles N. of supposed boundary between Perak and Kedah.

Sungei Kerantun.—Small E. affluent of the Sereting R., about 7 miles N. of Lake Bera.

Sungei Kessang.—The boundary between Malacca and Muar. It takes its rise 2 or 3 miles W. of Mt. Ophir, is somewhat tortuous, deep, and very sluggish, often spreading out into lagoons of considerable extent. The scenery in some of these lakes is very beautiful. The river abounds with alligators.

Sungei Kindin,—Petty N. affluent of the Kinta R., near Kindin, C. Perak.

Sungei Kindum.—The source of the Bernam R., Selangor (q. v.).

Sungei Kingkim.—Small R. in Johore entering Strait between it and Pulo Ubin.

Sungei Kino.—Small E. affluent of Chandriang R., E.C. Perak.

Sungei Kinta.—Rises in the main range of Perak in the N.E., and running in a S. direction enters the Perak R. at Kwala Trus, being one of its principal tributaries. About 6 miles before joining the main stream, it bifurcates and forms an island, upon which is situated the village of Banda Bharu, or Baru. The village of Kinta lies on the E. bank of the river, about 14 miles S.W. by S. in direct distance from Kwala Kangsa.

Sungei Kita Bangsa.—Small R. in N. Selitar district, Singapore.

Sungei Kladi Merah.—Petty E. affluent of R. Madek, E. Johore.

Sungei Klang.—The principal R. of Selangor, the settlement of Klang, the seat of the Residency, lying about 12 miles from its mouth. Its sources lie in the range of hills between Selangor and Sungei Ujong.

Sungei Klian Mas.—Small S. affluent of the Batang Padang R., E.C. Perak.

Sungei Kling.—Small E. affluent of the Perak R., close to its mouth in S.W. Perak.

Sungei Korong.—Petty affluent of R. Pulei, S.W. Johore.

Sungei Koyaia.—Petty W. affluent of Bidor R., S. Perak.

Sungei Kramat.—Petty E. affluent of R. Pulei, S.W. Johore.

Sungei Kran.—Small E. affluent of Sereting R., about 8 miles N. of Lake Bera.

Sungei Kranji,-R. in district of same name, N.W. Singapore.

Sungei Kretum.—A fork and N. source of Sungei Rumpin in E. Pahang.

Sungei Kri.—An affluent of the R. Batu Pahat, just below its junction (as marked in the map) with the R. Sembrong.

Sungei Krian,—In N.W. Perak, with various affluents rising in the Perak range; supposed to communicate with the Kurau further S by the R. Semang.

Sungei Krong.—Petty affluent of the Chandriang R. in E.C. Perak.

Sungei Kuantan.—R. in N.E. Pahang, 6 miles E. of Cape of same name. Flows from W.S.W. to E.N.E.

Sungei Kubang Buaya.—Small R. in N.W. Kedah

Sungei Kuchang.—Petty E. affluent of Madek R., E. Johore.

Sungei Kulim. - A N. branch of the Krian R. S.W. Kedah.

Sungei Kulim,—Petty E. branch of the R. Chamar (the upper portion of Sungei Pari), C. Perak.

Sungei Kurau.—R. about 10 miles due S. of the Krian in N.W. Perak, rising in the Perak range.

Sungei Kurlin.-N. branch of Selangor R., N.E. Selangor.

Sungei Kursi.—Petty N. affluent of Bidor R. about 1 mile of Kwala Bekum, S. Perak.

Sungei Kurut.—Small E. affluent of the Kinta R. communicating with the Chandriang R., W.C. Perak.

Sungei Kwang.—A petty affluent of the Sungei Pari, a N. branch of the Kinta R., C. Perak.

Sungei Labis.—A small E. affluent of the Muar R., between Tikam and Lungga, W. Johore.

Sungei Labok Tanah.—A small R., being an E. affluent of the Muar R., about 2 miles N. of Segamat, S. Pahang. Spice plantations exist in this district.

Sungei Labong.-Small affluent of R. Endau, N. Johore.

Sungei Labu.—Petty affluent on E. side of Batang Padang R., S. Perak.

Sungei Labu.—Small R. in N W. Perak, flowing into the sea 5 miles below Krian R.

Sungei Labu.—Petty stream in Pasir Panjang district, S. Singapore.

Sungei Labun.—Small affluent of Linggi R., 2 miles below Rantau, Sungei Ujong.

Sungei Lahor.-Petty W. affluent of the Kinta R., C. Perak.

Sungei Lalang.—Small N. affluent of the Johore R., just above its turn S. to the sea.

Sungei Landi.—Small N. affluent of Muar R., about 9 miles from its mouth, Muar.

Sungei Lantang.—Small affluent of the Endau R. in S.E. Pahang.

Sungei Larut.—In the district of same name, W. Perak. Taipeng Kota, the seat of an Assistant Resident, lies near its source.

Sungei Layang.—Petty W. affluent of Johore R. opposite Johore Lama.

Sungei Lebam.—An E. affluent of Johore R., about 4 miles from its mouth.

Sungei Lebih.—The principal tributary of the Kelantan R., but probably known under other names at various portions of its course.

Sungei Lememet.—Petty E. affluent of the R. Madek in E. Johore.

Sungei Lenga.—A petty W. affluent of the Sembrang R., 3 miles below its junction with the Endau, N.E. Johore.

Sungei Lenggin.—A branch and the source of the Johore R., S. Johore.

Sungei Lenggor.—A petty E. affluent of the R. Sembrong, about 1½ miles below its junction with the Endau, N.E. Johore.

Sungei Liang Batu.—Small E. affluent of Muar R., 2 miles above Panchor, Johore.

Sungei Likir.—Small R. in S.W. Penang, 3 miles N. of entrance of Perak R.

Sungei Limau.—The S. source of the Lebih R. (q. v.).

Sungei Limau.-Petty W. affluent of the Kinta R., S.C. Perak.

Sungei Limau.—Small R. on coast of Perak, about 5 miles below Kwala Larut.

Sungei Limpit.—Petty N. affluent of the Batang Padang R., E.C. Perak.

Sungei Linggi.—The principal river of Sungei Ujong, through which it flows in a N. and S. direction.

Sungei Liong.—The upper branch of the Kinta R., which it joins not far S.E. of Gunong Monie.

Sungei Liong Hi,—Small R. in Johore flowing into Old Straits opposite Sembawang district, N. Singapore.

Sungei Lisih,—The twelfth from the S. of the small streams on the E. coast of Johore.

Sungei Loui.—Small N. affluent of the Pahang R., C. Pahang. At its head is a village called Kampong Loui Telor, where gold is found in large quantities.

Sungei Lui.-A W. affluent of the Sereting R. in W. Pahang.

Sungei Lukut.—The N. river of Sungei Ujong, entering the sea about 3 miles S. of the boundary line between that State and Selangor.

Sungei Lumut.—Small E. affluent of Dinding R., about 3 miles from its mouth.

Sungei Lundong.—Small W. affluent of Sereting R., about 9 miles N. of Lake Bera.

Sungei Lundu.—A V. in Sungei Siput district, N.W. of Malacca, and just inside the boundary line between Malacca and Rembau.

Sungei Lungga.—Small affluent of R. Muar just S. of V. of same name, W. Johore.

Sungei Lungu.-A R. in extreme N.W. Kedah.

Sungei Lupa.—Petty N. affluent of the Pahang R., E. Pahang.

Sungei Madek.—The E. fork of the Kahang R., an affluent of the Sembrang in E. Johore.

Sungei Mahang.—The source of the Dingin R., S.W. Kedah.

Sungei Malapar.—Small W. affluent of Muar R., 2 miles above Lungga, C. Muar.

Sungei Malau.—Petty E. affluent of Dingin R., the S. branch of the Muda, Kedah.

Sungei Malayu.—Small stream flowing from W. into the Old Strait, Johore, entering below the R. Sekudei.

Sungei Mandi,—Small stream rising in the Mandi district, N.W. Singapore, flowing into the Straits S. of Johore Bharu.

Sungei Mangkok.—A small village about 3 miles 2 furlongs from Butterworth, Province Wellesley, on the Bukit Tengah Road.

Sungei Mas.—Small R. in N. Penang, entrance $\frac{1}{2}$ mile S.W. of Tanjong Batu.

Sungei Masei and S. Masei Kechil.—Two small rivers in Johore flowing into Old Strait opposite R. Sempang, N. Singapore.

Sungei Mata Mata.—Small affluent on E. side of Linggi R., about 3½ miles above Linggi, Sungei Ujong.

Sungei Mati.—A small stream falling into the sea in N.W. Perak, just below Tanjong Piandang.

Sungei Mau.—The thirteenth from the S. of the small streams on the E. coast of Johore.

Sungei Medong.—Petty W. affluent of R. Madek, E. Johore.

Sungei Meletir.—Petty affluent of the R. Sembrong at its abrupt turn N. in C. Johore.

Sungei Melmah.—A small affluent of the R. Sereting in Jumpol, Negri Sembilan.

Sungei Membang Segaru.—Small R. in N.W. Kedah, opposite Pulo Teretek.

Sungei Menanti.—Small affluent of the Muar crossing the upper W. corner of Sri Menanti (Negri Sembilan) in a N.E. direction.

Sungei Mengkelah.—Small W. affluent of the R. Sembrong in the Jakun district, N. Johore.

Sungei Mentelong.—An affluent of the Endau R. forming part of the boundary between Johore and Pahang.

Sungei Merakit.—Small R. in N.W. Kedah, about 10 miles S. of R. Lungu.

Sungei Merbuk.—R. rising in Bukit Payong, Kedah. The town of old Kedah is situated at its mouth on the N. bank, 7 miles N. of the Muda R.

Sungei Merihong.—The fourth stream N. of R. Endau on the coast of Pahang.

Sungei Merising.—A creek and river in extreme N. of Johore opposite Pulo Babi. Formerly the northernmost boundary of Johore jurisdiction.

Sungei Merpah.—Small R. in N.W. Kedah nearly opposite S. point of Pulo Teretak.

Sungei Mingski.—Petty stream in N.W. Singapore just above S. Serimbun.

Sungei Montan.—A small W. affluent of Muar R., about 4 miles N. of Segamat in S.W. Pahang.

Sungei Moulana.—Petty W. affluent of R. Sedukei (q. v.), S. Johore.

Sungei Muar.—The river forming the boundary between Johore and Muar, and then between the latter and Pahang. It rises in Jumpol, and has numerous petty affluents.

Sungei Muda.—R. dividing Kedah from Province Wellesley. According to the maps it connects with the Prai R. in the N.E. corner of the Province. It rises in the Gunong Titi Wangsa range, S. Kedah. A southern branch known as Sungei Dingin, and at its source as Sungei Mahang, rises in Gunong Krian, S. Kedah.

Sungei Mumgan.—Small E. affluent of Muar R., just above Lungga, Johore.

Sungei Murei.-Petty R. in N.W. Singapore, Lim Chu Kang district.

Sungei Nangka.—Small affluent of the Endau R., in S.E. Pahang.

Sungei Neraka.—Petty stream flowing into Jurong R., S.W. Singapore.

Sungei Nibong.—R. and V. on E. coast of Penang, S. of Batu Uban district.

Sungei Nibong.—A small W. affluent of the Muar R., 14 miles E. of Mt. Ophir in Muar.

Sungei Nier.—A small affluent of the R. Sembrang, about 4 miles below its junction with the Endau.

Sungei Nina.—Small W. affluent of Triang R. in W. Pahang.

Sungei Nioi.—Petty stream flowing into a creek between an unnamed island and the coast of W.C. Perak, about 12 miles S. of Kwala Larut.

Sungei Nior.—Small R. flowing into W. side of Johore R., about 4 miles from the mouth.

Sungei Nior.-Small affluent of Endau R., near its mouth, N. Johore.

Sungei Nipah.—Small R. in S.E. Penang.

Sungei Nipah.—Small R. on W. coast of Penang, Pondok Upih district.

Sungei Nyang.—Small affluent of R. Endau, N. Johore.

Sungei Ooey.—A small affluent of the Klang R., which it enters some 3 miles below Kwala Lumpor.

Sungei Orading.—Small W. affluent of Sereting R., about 3 miles N. of Lake Bera.

Sungei Orai.—A petty E. tributary of the Sereting R., S.W. Pahang.

Sungei Orlong.—Petty affluent of Sapetang R. in N.W. Perak, 7 or 8 miles N.E. of Port Weld.

Sungei Pabei.—A branch of the Pedas R. in W. Rembau, Negri Sembilan, which flows into the Linggi about $3\frac{1}{2}$ miles above its mouth.

Sungei Pahang.—The principal river of Pahang, rising in Perak. Its banks are well inhabited. About 5 miles from the coast the river divides into the Pahang and the Pahang Tuah, forming a delta, with a coast line of 15 miles. Pekan, the capital of Pahang, is situated 4 miles from the mouth on the S. bank.

Sungei Pahang Tuah.—A stream forming the N. side of the Pahang delta, about 14 miles above the true entrance of the R. Pahang.

Sungei Paku.—Petty stream flowing into Bidor R., about 8 miles S.W. of Gunong Batu Pulei, S. Perak.

Sungei Pala.-Petty W. affluent of R. Pulei near its mouth, S.W. Johore.

Sungei Palas.—A small S. affluent of the R. Endau, N. Johore.

Sungei Palawan.—Petty E. affluent of the Batang Padang R., S. Perak.

Sungei Palin.—The sixth from the S. of the small streams on the E. coast of Johore.

Sungei Pandan and S. Pandan Kechil.—Rivers in S.W. Singapore in district of same name.

Sungei Pandas.—Petty stream flowing from W. into Old Strait, Johore.

Sungei Panggong.—Petty affluent of the Sembrong R., in C. Johore. The probable source of both that R. and the Batu Pahat R., which are shown as communicating at this point.

Sungei Panglor.—A small stream at the angle where the Muar R. turns from due N. to N.E. in S.W. Pahang.

Sungei Panjong.—Petty N. affluent of Bidor R., S. Perak.

Sungei Pankalan.—Small affluent of Linggi R. near Rantau, Sungei Ujong.

Sungei Papa.—Petty N. affluent of the Batang Padang R., E.C. Perak.

Sungei Papan.—Small W. affluent of the Kinta R., C. Perak, which it meets about 6 miles below Kinta V.

Sungei Papan.—Petty affluent of Lebam R., an E. branch of R. Johore.

Sungei Parit Tengah.—N. affluent and chief source of the Klang R., Selangor.

Sungei Pasir.—Petty E. affluent of the Bidor R., S. Perak.

Sungei Pasir.—Petty E. affluent of R. Endau in N.E. Johore.

Sungei Patang.—A N. affluent of the Muar R. in S. Pahang.

Sungei Patani.—The principal R. of Patani. Its entrance lies in the extreme N. of the State, a long tongue of land called Cape Patani forming its N. boundary. The town of Patani is on the E. bank, about 4 miles from the entrance. The R. rises in the hills between Kedah and Reman.

Sungei Patong.—One of the numerous affluents of the Kinta R. in C. Perak. A few miles from its source it becomes known as Sungei Pari.

Sungei Pau.—See Sungei Beko.

Sungei Pecha.—Petty E. affluent of the Bidor R., S. Perak.

Sungei Pedas.—A branch of the R. Linggi, its affluents flowing, under other names, across Rembau, Negri Sembilan, from S.W. to N.E.

Sungei Pekan.—Small S. affluent of the R. Pahang, 4 miles from its mouth. Pekan, the capital of Pahang, is situated at the junction.

Sungei Pelajan.—Small affluent of R. Endau, N. Johore.

Sungei Pelawan.—Petty E. affluent of R. Endau, N.E. Johore.

Sungei Pelipah.—Small E. affluent of Johore R. entering it at Panti.

Sungei Penaga —Petty W. affluent of the Pahang R. in E.C. Pahang.

Sungei Penaga.—Petty W. affluent of Johore R., 10 miles N. of Johore Lama.

Sungei Penat.—Petty E. affluent of Kinta R., S.C. Perak.

Sungei Penderam.—Petty W. affluent of Johore R., about 10 miles from its mouth.

Sungei Penglow.—Small N. affluent of the Kinta R., E.C. Perak, joining it at the same place as the R. Liong.

Sungei Penoh.—An E. affluent of the Kinta R., E.C. Perak.

Sungei Perak.—The principal R. in the State of that name, one of its sources being in Kedah, and the other in Patani. It runs in a generally N. and S. direction, and has several important affluents, of which the Plus, Kinta, Batang Padang and Bidor are the chief. About 15 miles from its mouth it turns W., reaching the sea after numerous windings. It is about 12 miles wide at the entrance.

Sungei Perampuan.—Small stream in Kranji district, N.W. Singapore.

Sungei Peraput.—Small R. flowing from W. into Old Strait, Johore.

Sungei Perei.—Small S. affluent of the Pahang R., 3 miles from its mouth.

Sungei Pergam.—Petty stream on W. coast of Singapore, Lim Chu Kang district.

Sungei Perimbi.—Small R. in Johore, entering Old Strait N.E. of Selitar, N. Singapore.

Sungei Permakei.—A small E. tributary of the Sereting R. in S.W. Pahang.

Sungei Permas.—Small R. in Johore, flowing into Old Strait opposite N. point of Singapore.

Sungei Pesisik.—Small affluent from the N. of Johore R., having its source W. of Gunong Panti.

Sungei Petei.—Petty W. affluent of Johore R., 9 miles above Johore Lama.

Sungei Petei.—Small W. affluent of the Sereting R., about 7 miles N. of Lake Bera.

Sungei Petei.-A small V. in district of same name, C. Malacca.

Sungei Petei.—A district in C. Malacca on the W. side of Malacca R.

Sungei Pikol.—Petty W. affluent of Perak R., about 10 miles S.S.W. of Kwala Kangsa.

Sungei Pelam.—Petty E. affluent of Dingin R., the S. branch of the Muda. A V. of same name at the Kwala, $2\frac{1}{2}$ miles E. of Province Wellesley frontier in Kedah.

Sungei Pimon.—One of the sources of the Kinta R., rising in Gunong Challei, C. Perak.

Sungei Pinang.—R. entering the sea just below the town, its upper portion

being known as Ayer Itam. Rises in the E. side of the central range.

The same name is applied to a smaller R. rising on W. side of same range and reaching the W. coast just below Bt. Kechil in the Sungei Pinang district. Also name of a district in W. Penang.

Sungei Pingan.—Petty W. affluent of Bidor R., S. Perak.

Sungei Pinji.—Small E. affluent of the Kinta R., just below Kinta, C. Perak.

Sungei Plus.—An E. tributary of the Perak R., rising in Gunong Yong Yup, near the Pahang frontier.

Sungei Poaka.—Petty stream in S.W. Pulo Ubin.

Sungei Pondok.—Petty affluent of the R. Sembrong, C. Johore; the banks are inhabited by Jakuns.

Sungei Ponggol.—R. in N.E. Singapore, W. of district of same name. Its

chief importance is the means it affords of water communication to Trafalgar estate, in which it rises.

Sungei Pontean.—The second of the small streams about 16 miles above R. Endau on the coast of Pahang.

Sungei Propoh.—Petty stream in Tanjong Gul I., S.W. Singapore. L. of same name at mouth.

Sungei Puju.—Small R. just above Purlis R. in N.W. Kedah.

Sungei Pulei.—Small R. in S.W. Johore, its mouth being 5 miles W. of W. point of Singapore. Rises in Mt. of same name.

Sungei Pulo Ubin.—Petty stream in S.E. Pulo Ubin.

Sungei Pungei Balau.—The S. of the small streams on the E. coast of Johore.

Sungei Purlis.—A river just opposite Pulo Langkawi, situated in N. Kedah. V. of same name on S. bank.

Sungei Pus.-A petty R. in N.E. Singapore about a mile E. of R. Selitar.

Sungei Putus.—The E, fork of the Linggi R., joining it just below Rantau, Sungei Ujong.

Sungei Puyo.—A populous V. 3 miles 6 furlongs N. of Butterworth, Province Wellesley, on the cross road leading from Bagan Ayam to Ararendang.

Sungei Rabat.-Petty S. affluent of the Bidor R., S. Perak.

Sungei Rabbit (Rabat?).—Petty E. affluent of Kinta R., E.C. Perak.

Sungei Raja Itam,-Petty E. affluent of the Dinding R., C. Dinding.

Sungei Rambei Kechil.—Petty S. affluent of Selangor R., at its turn N. about 25 miles from the coast.

Sungei Rambei Besar.-2 miles W. of above.

Sungei Rambuan China Besar, and Kechil.—Two small streams, affluents of the Pedas in N.W. Malacca.

Sungei Rapal.—Small stream flowing into R. Sepang, extreme S. of Selangor.

Sungei Raya.—Petty affluent of Linggi R., 2 miles from its mouth.

Sungei Raya. - An E. tributary of the Kinta R., S.C. Perak.

Sungei Rayei.—Near the Linggi R., N. of Malacca. Mentioned in Malay annals, but not identified on modern maps.

Sungei Rebana.—Small N. affluent of the Perak R., about 10 miles from its mouth.

Sungei Relau,-S. affluent of the Lebih R. (q. v.).

Sungei Rembau.—Flows in a S.W. direction across the State of that name, Negri Sembilan, and after meeting the Pabei is called Sungei Pedas. It joins the Linggi about $3\frac{1}{2}$ miles above its mouth.

Sungei Rendam Seligi.—Petty W. affluent of the R. Madek, E. Johore.

Sungei Ridan.—Petty W. affluent of the Pulei R. in S.W. Johore.

Sungei Rimau.—Petty stream in N. Singapore.

Sungei Rindawal.—Small E. affluent of Pahang R., just N. of Lake Bera.

Sungei Rio.—A small affluent of the Muar River in Enas territory, Negri Sembilan.

Sungei Rochor.—River and canal bounding the S. of the district of that name in N.E. Singapore-town.

Sungei Roko.—Small R. in Johore flowing into Old Strait opposite Sempang R., N. Singapore.

Sungei Rui.—The W. source of the Perak R. in S.E. Kedah.

Sungei Rukum.-Petty E. affluent of the Kinta R., E.C. Perak.

Sungei Rumbei.—V. about $\frac{1}{2}$ mile N. of one of the numerous twists of the Kessang R., forming the E. boundary of Malacca territory, and a little over 5 miles E. of Merlimau. A police station exists S. of the V.

Sungei Rumgan.-Small R., 3 miles N. of R. Purlis in N.W. Kedah.

Sungei Rumpen.—R. in Pahang, its mouth being opposite Tioman Island, and 10 miles N. of Sungei Endau.

Sungei Rumpin.—The third of the rivers on the E. coast of Pahang above Sungei Endau.

Sungei Rusa.—V. and small R. in W. Penang. The latter flows into the R. Gagah.

Sungei Sadang.—Petty W. affluent of the Perak R., 4 miles S. of Blanja, C. Perak.

Sungei Sah.—Petty W. affluent of the Sungei Pari, a branch of the Kinta R., C. Perak.

Sungei Salah.-Small R. in N. Kedah, 4 miles N.W. of Gunong Jerei.

Sungei Salen Tiga.—Petty affluent of the Langat R., Selangor, just above Beran.

Sungei Salut.—Small E. affluent of Perak R., N. Perak, W. of Gunong Asaham.

Sungei Samagaga.—R. flowing into the strait between certain unnamed islands and Port Weld in W.C. Perak. Not marked in the Admiralty chart.

Sungei Sanglang.—Small R. in N. Kedah entering the sea 6 miles S. of R. Purlis.

Sungei Santi.—Small R. flowing from E. into embouchure of Johore R., N. of Johore hill and opposite Pulo Tekong.

Sungei Sapang.—Small N. affluent of the Bernam R., C. of extreme S. Perak.

Sungei Sapetang.—A small R. falling into the creek between two unnamed islands in W.C. Perak coast and just N. of Port Weld.

Sungei Sapetang Kechil.-A small S. affluent of above.

Sungei Saput.—Upper portion of an affluent of the Kinta R., about half-way between that stream and the Perak R.

Sungei Sarong Dinding.—Petty W. affluent of the Perak R. in S.W. Perak.

Sungei Sat.—Affluent of the R. Tomling, a N. branch of the Pahang R. in W.C. Pahang.

Sungei Sayong.—The S. source of the Johore R., joining the latter, where the N.W. branch is named the Lenggin.

Sungei Sebarang.—A small stream in W. side of Changi district, N.E. Singapore.

Sungei Sebating.—An affluent running E. into the R. Sereting and forming the N.E. border between Pahang and Jumpol, Negri Sembilan.

Sungei Sedang.—A small affluent of the Bidor R., in S. Perak. The valley through which it flows produces exceptionally fine padi.

Sungei Sedili Besar.—The most important of the small streams on the E. coast of Johore, and the fifth from its S. extremity. The entrance is nearly dry at low water, but has 5 fathoms inside as far as the V. of Simpang, about 6 miles up the river. The tide runs about 3 miles up. The banks are slimy and infested with croodiles. The inhabitants of Simpang are poor, and although a penghulu resides there, the place is unimportant. Timber, gutta and rattan are collected and exported to Singapore.

Sungei Sedili Kechil.—The fourth from the S. of the rivers on the E. coast of Johore, of which this and Sungei Sedili Besar are the only important streams.

Sungei Sediwi.—Small W. affluent of Muar R. in N. Muar.

Sungei Sedukei.—A small R. flowing into the Selat Tembrau, Johore Bhara being on the E. side of its mouth.

Sungei Segamat.—An E. affluent of the Muar R., forming part of the boundary line between Pahang and Johore.

Sungei Seget.—Small R. to E. of Johore Bharu.

Sungei Sei Pari.—A N. affluent of the Kinta R., with numerous small affinents from the hills S.E. of Kota Lama, C. Perak.

Sungei Selama.—Small affluent of Krian R., N.W. Perak. Important V. of same name on N. bank.

Sungei Selangor.—The principal R. of Selangor, rising in Ulu Selangor on the borders of Pahang, and entering the S. of Malacca in lat. 3° 22' N., long. 101° 15' E.

Sungei Selei.—Small N. affluent of the Sembrong R., N. Johore.

Sungei Selendok.-Petty W. affluent of R. Sembrong, N. Johore.

Sungei Selengkong.—Small W. affluent of Muar R., Muar, nearly opposite Pareir r.

Sungei Selitar.—The principal stream in N. Singapore, flowing through the district of same name. It divides N. and E. Selitar.

Sungei Seluang.—A N. affluent of the Johore R., about 23 miles from its mouth.

Sungei Semalei.—Small R., affluent of Endau R., N. Johore.

Sungei Semanda.—Petty R. in E. Selangor, supposed to flow into the Selangor R.

Sungei Sembah.—Petty N. affluent of Bernam R. in S.E. Perak.

Sungei Sembawang.—Small R. in extreme N. of Singapore, flowing into Old Strait nearly opposite Liong Hi, R. Johore.

Sungei Sembilan.—Petty stream flowing from the N. into the entrance of the Perak R.

Sungei Sembong.—Small R. in Johore flowing into Old Strait opposite N. point of Singapore.

Sungei Sembrong.—The W. branch of the Endau R., N. Johore. According to the maps and Admiralty charts, it flows into the river Batu Pahat, joining it where a S. branch becomes known as Sungei Beko or Pau. But geographically the two rivers appear to rise in a swamp, in lat. 2° 2′ N., long. 108° 25′ E.

Sungei Semerna.—Small E. affluent of the Batang Padang R., E.C. Perak.

Sungei Semongah.—Petty affluent of the R. Bernam, in N. Selangor.

Sungei Sempang Tujoh.—Petty affluent of the Bernam R., in N. Selangor, just above Kramat Hantu.

Sungei Sempang.—R. in N. Singapore flowing through district of same name.

Sungei Sempit.—Petty stream flowing from N. into embouchure of Dinding R.

Sungei Sendok.—Small N. affluent of Muar R., Muar, $1\frac{1}{2}$ miles N. of Panchor. Another stream of same name so marked, as the last N. affluent of same river 5 miles from its mouth.

Sungei Sendok.—V. on the Muar side of the Kessang R.

Sungei Sendret.—A small S. affluent of the Muar R., about 8 miles from Klubi, in S.W. Pahang.

Sungei Sengkur.—A small N. affluent of the Sembrong R., N. Johore.

Sungei Senoko.—Small stream in N. Singapore, flowing into Old Strait opposite S. Permas, in Johore.

Sungei Sepang.—Small R. in extreme S. Selangor.

Sungei Serah.—A small N. affluent of the Sapetang R., W.C. Perak, 6 miles N. of Port Weld.

Sungei Seranggong.—R. in N.E. Singapore rising in district of that name. S. Serangong Kechil rises in the Ponggol district, and flows into the Strait about $\frac{1}{2}$ mile N. of the R. proper.

Sungei Serdang.—Petty W. affluent of R. Madek, E. Johore.

Sungei Serding.—Branch of the Krian, N.W. Perak; the upper portion called the Kulom R.

Sungei Sereting.—The upper portion of the Pahang River running in a S.S.W. direction between Pahang and Jempol, Negri Sembilan. Near the S. boundary of the latter it makes an abrupt turn to the N.W., and is known locally as Sungei Ilir Sereting.

Sungei Serimbun.—Small R. in N.W. Singapore. A Government resthouse is close to the E. bank, and the V. of Serimbun Kangkah lies near its source about $\frac{3}{4}$ mile from the Strait.

Sungei Serongong.—Petty affluent of the Chandariang R., E.C. Perak.

Sungei Setul.—Small R. in N.W. Kedah, about 18 miles S. of R. Lungu.

Sungei Silian.—Small affluent of Linggie R., Sungei Ujong, entering it about 10½ miles from its mouth.

Sungei Simonei.—Small branch of the Langkat R., S.E. Selangor.

Sungei Simpeda.—Petty E. affluent of the Batang Padang R., S. Perak.

Sungei Singat.—Petty N. affluent of the Raya R., about 5 miles S.S.E. of Kinta.

Sungei Singet.—Petty W. affluent of the Johore R., 4 miles N.W. of Johore Lama.

Sungei Singha.—Petty S. affluent of the Bernam R., N. Selangor, 5 miles E. of the Chenghal Bintang.

Sungei Sinud.—Small S.E. affluent of the Chendariang R., E.C. Perak.

Sungei Sinui.—Small R. in Johore flowing into Old Strait opposite the Sempang district, N. Singapore.

Sungei Sipat.—Petty E. affluent of Dingin R., between Sedin and Pelam, Kedah.

Sungei Siput.—A district in N.W. border of Malacca S. of Sungei Linggi, a branch of which, S. Pedas, divides it from Sungei Ujong.

Sungei Skudai.—See S. SEKUDEI.

Sungei Skudang.—Small R. in Johore flowing into Old Strait opposite Selitar, N. Singapore.

Sungei Slim.—The N. branch of the Bernam R., S.E. Perak.

Sungei Smibong Putch.—Small R. in Johore flowing into Old Strait opposite Sempang district, N. Singapore.

Sungei Sobimbo.—The seventh from the S. of the small streams on the E. coast of Johore.

Sungei Sol Nyongsan.-Petty E. affluent of the Madek R. in E. Johore.

Sungei Solobok.—E. affluent of the Perak R., about 8 miles by river above Bota, W.C. Perak.

Sungei Sonti.-Small W. affluent of Muar R., in N. Muar.

Sungei Sorban.—Small affluent of Linggi R., entering at Linggi V., Sungei Ujong.

Sungei Soudayong.—Small stream, an E. affluent of Sungei Lukut, S.C. Sungei Ujong.

Sungei Srei.—Petty W. affluent of Johore R., about 7 miles above Johore Lama.

Sungei Sri.—A small affluent of the Muar R., in Enas territory, Negri Sembilan.

Sungei Srutong.-Petty W. affluent of Bidor R., S. Perak.

Sungei Subang Hiang.—S. petty affluent of the R. Langat, rising at the boundary between Selangor and Sungei Ujong.

Sungei Suka Menanti.—Small affluent of the Muar R. on E. side just above Tikam, Johore.

Sungei Sungkei.—E. affluent of the Bidor R., S. Perak, rising at foot of the Bidor Mts.

Sungei Surat Litan.—A small affluent of Linggi R., entering near Rantau, Sungei Ujong.

Sungei Suroh Rokam.-A N. affluent of the Muar R. in S. Pahang.

Sungei Sut.—A small affluent and one of the sources of the Langkat R. in Selangor.

Sungei Tabangau.-Small R. in N. Kedah, 14 miles S. of the Kedah R.

Sungei Tabau.—A small E. affluent of the Sereting R. in S.W. Pahang.

Sungei Tampayan.—A W. branch of the R. Pulei, S. Johore.

Sungei Tamulah.—A petty stream flowing into Kwala Trong, about 10 miles S. of Kwala Larut, W.C. Perak.

Sungei Tangatu Arang.—The tenth from the S. of the small streams on the E. Coast of Johore.

Sungei Tanjong Putus.—Petty E. affluent of Johore R., about 5 miles N. of Johore Lama.

Sungei Tapa.—Small S. affluent of the Batang Padang R., E.C. Perak.

Sungei Tarei .- An E. affluent of the Sereting R., W. Pahang.

Sungei Tebang Kasing.—Small E. affluent of Endau R., N. Johore.

Sungei Tebrau.—R. in Johore flowing into Old Strait 2 miles E. of Johore Bharu.

Sungei Tebrau.—Small stream flowing into the Selat Tembrau opposite the Sembawang district, N. Singapore.

Sungei Teja.—A small E. affluent of the Kinta R., Kampar district, C. Perak.

Sungei Telupin.—The E. of the two principal rivers of Patani, its entrance being 25 miles by coast S.E. of Cape Patani. Like the Patani R., it takes its rise in the hills between Kedah and Reman.

Sungei Tembia. -Petty W. affluent of Johore R., about 8 miles above Johore Lama.

Sungei Temblang.—Small R. in N.W. Kedah, opposite Pulo Teretak.

Sungei Tembruan.—Petty stream in Tanjong Gul district, S.W. Singapore.

Sungei Tempayan.—Small N. affluent of R. Muar, 2 miles from Panchor.

Sungei Tengah.—Small R. in N. Kedah entering the sea opposite Pulo Langkawi.

Sungei Tengah.—Small R. flowing into the embouchure of Jarum Mas R., W. Perak.

Sungei Tengah.—Small R. on E. coast Penang opposite Pulo Jerejak.

Sungei Tengah.—Petty stream flowing into the R. Jurong in S.W. Singapore.

Sungei Tengah.—Small R. forming the S. boundary of district of same name, extreme W. of Singapore.

Sungei Tersap.—Small E. affluent of the R. Endau, just before it turns W. in the same lat. as R. Mentelong. In N. Johore.

Sungei Thara.—Petty W. affluent of the Kinta R., S.C. Perak.

Sungei Tilian.—An E. affluent of the Triang R. in W. Pahang.

Sungei Tingar.—The second northernmost of the small streams on the E. Coast of Johore.

Sungei Tinggi.—Petty stream flowing into the creek between Pasir Itam I. and the coast of W.C. Perak.

Sungei Tiram.—Small R. on coast of S.W. Perak, about 5 miles S. of the Dindings frontier.

Sungei Tiram.—Small W. affluent of Johore R., nearly opposite, but N. of Johore Lama.

Sungei Tiram Batu—(Stone Oyster R.).—A W. branch of the R. Pulei, S. Johore.

Sungei Tiram Duku.—Petty E. affluent of R. Pulei, S.W. Johore.

Sungei Titian Trap.—Source of the Lukut R., close to S. Hummock, Sungei Ujong.

Sungei Toas.—Small stream in W. Singapore, Tanjong Gul district.

Sungei Tokus.—Petty affluent of the Chendariang R. in E.C. Perak.

Sungei Tomedo.—The eleventh from the S. of the small streams on the E. coast of Johore.

Sungei Tomling.—A N.E. affluent of the Pahang R. in W.C. Pahang.

Sungei Tong Kang.—Small stream in N.W. Perak, flowing into the sea 3 miles below the Krian R.

Sungei Trap.—Small E. affluent of the Muar R. in W. Johore, about 72 miles from the mouth.

Sungei Triang.—The river next S. of the Endau R. and the first in Pahang territory from the S.

Sungei Triang.—The S.W. branch of the Pahang R., rising in Jelebu.

Sungei Tris.—Petty stream on S.W. coast of Pulo Ubin.

Sungei Trong.—A small stream flowing into a salt-water creek of same name about 8 to 9 miles S. of Kwala Larut, W.C. Perak.

Sungei Trus Sunan.—A N. affluent of the Muar R. in S. Pahang.

Sungei Tuan.—Insignificant river on the Malacca coast just below Panchor.

Sungei Tuan.—Small R. flowing from W. into Old Strait, S.W. Johore.

Sungei Tui.—A small E. affluent of the Muar R., just above Trus Labis I. in the R.

Sungei Tujoh.—Small R. in N. Patani, entrance 9 miles W. of that of Patani R.

Sungei Tukang.—Small R. in Johore, entering Old Strait opposite Tanjong Ponggol, N.E. Singapore.

Sungei Tukun.-Petty W. affluent of Kinta R., C. Perak.

Sungei Tumboh.—The upper portion of R. Balam Bidi, a N. affluent of the Kinta R., S.C. Perak,

Sungei Twaka.—Small affluent on E. side of Linggi R., about 5½ miles above Linggi, Sungei Ujong.

Sungei Ubah.—A petty R. on the coast 3 miles S. of the supposed boundary between Kedah and Siam in 7° N.

Sungei Udang.—Petty affluent of the Linggi R., 4 miles from its mouth.

Sungei Udang.—District and V. 12 miles from Malacca, N.W. of the town. Tapioca plantation close to V., about 1 mile from the coast.

Sungei Ujong.—Was the smallest of the protected Native States until the Negri Sembilan became so classed in 1887, and lies N.W. of Malacca and S. of Selangor. Including the districts of Lukut and Sungei Raya, it comprises an area of about 660 square miles, with a coast line of some 36 miles from the mouth of the Linggi River to that of the Sepang. The Linggi was formerly navigable for boats for 40 miles, but has now silted up. In 1873 the river was blocked owing to the quarrels between Sungei Ujong and the adjoining State of Rembau, and all traffic was stopped. Sir Andrew Clarke, then Governor of the Straits Settlements, proceeded to Sempang on the Linggi River in 1874 and suppressed the disturbances. A British Resident was then appointed, and the State has ever since been under British protection. The Residency was established at Seremban, about two miles from Rassa, the old capital of the State. It is not only the centre of the tin-mining district, but contains numerous Chinese shops in which nearly all foreign articles of food and drink (tinned meats, soups, &c., champagne, claret, beer, &c., &c.) can be bought at reasonable prices. The customs office and that of the State Treasurer are situated at Rassa.

The range of hills to the northwards attain an altitude of about 3,800 feet, and there being a good supply of water, with good soil, they are considered to afford good promise for the cultivation of Arabian coffee, cinchona, cacao, &c. Fair success has as yet attended enterprise in this direction. On the lower

grounds, Liberian coffee, cacao, pepper and tapioca are found to thrive. Mr. SEE Bow Trong's steam factory of the latter product is inferior to few in this part of the world.

To the south of the State lies the Beremban range of hills, rising, like those in the north, to a height of 3,000 to 4,000 feet. In this the Linggi R, has its source. On the south side is the Muar R., amd on the east the Triang, a tributary of the Pahang. Between the Beremban Hills and Gunong Angsa to the S, is a gap called Bukit Putus, leading to Sri Menanti and the other States of the Negri Sembilan.

The total population by the census of 1891 amounts to 23,000, of which 18,000 are Chinese and over 4,000 Malays. The foreign population is increasing rapidly, as more land is being opened up for tin-mining, which is the principal industry of the State. Rice, however, is largely cultivated by the Malays.

The new port of Sungei Ujong was opened on the 1st September, 1884, at Pengkalan Kompas on the Linggi River, at a distance of about seven miles from the mouth of the river. Streets have been marked out and houses of considerable size are rapidly being erected.

size are rapidly being erected.

Port Dickson (District and Port) lies S.W. of Seremban, and promises to become of some importance. The harbour has from eleven to fifteen fathoms of water and is well sheltered. A railway connecting it with Seremban was opened in July, 1891. The line has greatly facilitated trade.

There is a first-class road from Pengkalan Kompas to the Residency at Seremban, and thence on to Pantai, a distance altogether of about 31 miles, Pantai being 8 miles from the seat of Government and leading to the coffee estates on Bukit Berembun, which are in a flourishing state. To these, a distance of 13 miles, a cart-road has been constructed.

A cart-road from Seremban to Setul, 9 miles distant, and extending to Bernang, six miles further on the Selangor border, has been made, and has opened up an extensive and rich tin mining district, which is rapidly being taken up by the Chinese, who are the real wealth-producers of the country, as elsewhere in the Native States.

Communication with Malacca is kept up by subsidized steam launches, and a cart-road from the State to Lubok China in Malacca (five miles) was completed in 1885.

The Government consists of the Raja, assisted by the Resident and a Council of

State, including some of the principal Malays and Chinese.

The principal sources of revenue are the sale and leasing of lands, duties on opium, and duties on the export of tin. All imports, except opium, are duty free. The revenue for 1892 was \$354,184.35, and the expenditure \$361,143, thus exceeding the revenue by \$6,958.65.

Sungei Ulu Puting.—Small stream flowing into Lukut R., S.C. Sungei

Ujong.

Sungei Upip.—The acknowledged boundary at the coast line between Siam and Kedah, in $7^{\circ}3^{\frac{1}{6}}$ N.

Sungei Yaring.—Petty affluent of Patani R., in extreme N. of the State.

Sunua.—Small V. 1½ miles W. of Duyong R., and 3½ from the coast of
Malacca.

Superstitions (see also Charms).—The belief in supernatural influences is as common to the Malay as his fellow-men. Trees and animals are reverenced or feared for their supposed power to affect human fortune. This belief is strengthened by the acceptance of the doctrine of metempsychosis, and the tiger especially is regarded as the tenement of a human soul. A belief analogous to that in the German wehr-wolf is also Malayan. Demons of the woods and burial grounds of the storms and rocks all find place in this survival of a heathen mythology. Some

interesting details on this subject are given in the 20th Chapter of Major McNair's "Perak and the Malays."

Suran, Raja.—A king of the Coromandel country reputed to have invaded Johore and Singapore about 1200 A.D. [See Inscriptions.] See J. I. A., 89.

Swallow.—See Birds' NESTS.

Swords.—The Malays have various names for this weapon. The kléwang and chenangkas are broader near the tip than at the handle, somewhat after the Chinese pattern. The kumpel is a short equal-sided weapon, while the badek is a smaller variety of the same pattern. The wali, which more resembles a small kris, is still much worn, but the sword proper has almost disappeared, except in portions of the Peninsula as yet unaffected by foreign intercourse. The sundang is either straight or wavy like a kris, short, and single or double-edged. Borneo, Sulu, and Achun are the places whence they mostly come. The tumbuk lâda is rather a dagger than sword, and mostly comes from Sumatra. [See Arms.] Barros does not include the sword at all among the weapons used by the Malays in defending Malacca when attacked by the Portuguese in 1511. "The arms," says he, "which they used are daggers, of from two palms and a half to three palms long, straight and two-edged. Along with these they employ bows and arrows, javelins for throwing, and blow-pipes, from which they discharge very small darts, barbed and poisoned. These blow-pipes they have borrowed from the Javanese. They have two kinds of bucklers with which to shield themselves, a large one which protects the whole person, and a smaller."—Decade II, book 6, chapter 1.

Syenite.—This hard stone, of which the Egyptians have left so many sculptured remains, appears to be the bed-rock of the central portion of the Peninsula.

Tabas Tabang.—Tree and brushwood, a collective name used by wood-cutters for jungle.

Table Mt. (1,205 feet), on E. bank of Dinding R., about 7 miles from its mouth.

Tabong.—District in N. Malacca divided by the boundary line from that of Kru in Rembau.

Taiwan.—District in N. Penang, S.W. of Tanjong Tokong.

Taji or **Golok.**—The steel spur affixed to a fighting cock's heel. It is about $1\frac{1}{2}$ or 2 inches long, $\frac{1}{6}$ th of an inch broad, sharpened on both sides, keenly pointed and straight or curved. One is generally used, but at times two.

Talre.—V. and district of same name in N. Malacca on the border of Rembau, the village being at the foot of Bukit Ampar, 13 miles from the boundary line. It is 12 miles from Rumbiah.

Tambourine (Rebana).—See Drum.

Tambusu.—The name of the tribe inhabiting the islands of Tingi, &c., off the E. coast of Johore. They are few in number, dirty and ill-favoured.

Tampin.—The State between E. Rembau and Malacca, forming one of the Negri Sembilan (q. v.).

Tampin.-Mt. between Rembau and Malacca.

Tampin Tengah.—V. on the borders of Malacca and Rembau, a portion being in each territory.

Tampinis.—District in N.E. Singapore, W. of Changi. An estate of same name in W. portion.

Tampui Mambong.—V. just below the junction of the Kahang and Madek Rivers, E. Johore. Tamsak.—A name applied in the Malay annals to Singapore.—J. I. A., Vol. I, p. 89.

Tanah.—Most probably from the Sanskrit thana. This is the most frequent word to express land, earth, or ground; and also country, land, and region. Placed before the name of a people, it represents the country they inhabit, as Tanah-Jawa, the land of the Javanese, or that portion of Java occupied by the proper Javanese; Tanah-Sunda, the country of the Sundas, or that part of the same island inhabited by the Sunda nation; Tanah-Bugis, the land of the Bugis, or country of this nation, frequently extended to the whole island of Celebes, because the Bugis are its chief nation; and Tanah-Kling, the land of the Kalinga nation, or Talugus, often extended to the whole country of the Hindus, because the Talugus were the people of Hindustan best known to the inhabitants of the Malayan Archipelago. This is very much the manner in which the name of our own country is formed.*

Tanah Abang.-V. on E. side of Endau R. in N.E. Johore.

Tanah Merah.—A small V. in the Blimbing district, Malacca.

Tanah Merah.—A part of the coast of Malacca, about 2½ miles N. of Tanjong Kling.

Tanah Merah Besar, and Kechil.—The former just S. of the Changhei district, E. Singapore, and the latter just half-way between Singapore R. and point Beting Kusa, the S.E. point of the same district. Both places are so called from the colour of the exposed cliffs, which are of reddish laterite. A powder magazine and landing-pier are at Tanah Merah Kechil, all gunpowder imported into the Colony being stored there.

Tanah Seroh.—V. 3 to 4 miles above Johore Lama, on E. bank of Johore R. Tangga Batu.—District and V. about 2 miles N. of Tanjong Kling, in Malacca.

Tanggiling.—The local word in parts of the Peninsula for the Pangolin or Manis (q. v.).

Tanglin and Upper Tanglin.—District in S. Singapore, bounded on the E. by the continuation of Orchard Road and the Botanical Gardens, on the N. by Toah Payoh, on the W. by Jurong and Padan districts, and on the S. by Pasir Panjang. The district chiefly inhabited by foreign residents.

Tani.-V. on N. shore of Patani.

Tanjong.—In Malay, a headland, point, cape, or promontory—any land, whether high or low, projecting into the sea, or a river, or inland; but more commonly applied to the former. The word is of very frequent occurrence in the geography of Malayan countries, and examples are abundant, as Tanjong-Dato, Tanjong-Api, Tanjong-Selatan, literally "elder," "fire," and "south" points.

Tanjong.—A village in Rembau, Negri Sembilan (not marked in maps S. A. S.).

Tanjong Aigoh.—Point in the Pahang R., about 30 miles from the mouth, E. Pahang.

Tanjong Ayer Jambu.—Point at W. extreme of Teluk Blangah district, S.W. Singapore.

Tanjong Baru.—A point on N. side of Perak R., about 14 miles from its mouth.

Tanjong Batang.—A point on S. side of Muar R., about half-way between Segamat and Klubi in S.W. Pahang.

Tanjong Batu.—A point 10 miles S. of Pahang River, on the coast of that State.

Tanjong Batu.—The extreme N. point of Penang, Batu Feringgi district.

Tanjong Ben .- Point on W. of entrance of R. Pulei, S.W. Johore.

Tanjong Berala.—S.E. point of Tioman I. Also a point on E. coast of Johore, between points Morau and Tengurah.

Tanjong Bidan .- A small V. 1 mile S. of the Tampin (Rembau) district.

Tanjong Bidara.—A point on the Malacca coast, about 16 miles from the town in the Sungei Udang district.

Tanjong Bidara.—The N. point of Pulo Ayer Limau.

Tanjong Bri.—N. point of entrance of Bri R., W. Singapore, opposite Jaman Dulu in Singapore.

Tanjong Buei.—A point in Johore R. forming N. bank of entrance to Lebam R.

Tanjong Bulus.—The S. point of Asia (see ROMANIA) and forming the extreme S.W. point of the Territory of Johore, distant from Singapore 81 miles.

Tanjong Bunga.—Point about ½ mile W.S.W. of Tanjong Tikus, N.E. Penang.

Tanjong Changi.—The point E. of the V. and station of same name, forming, with Beting Kusa, in a direct line 1 mile S., the E. extremity of Singapore I.

Tanjong Dadalu.—Point on W. side of Perak R., 3 miles N.E. of Gunong Tunggal, W.C. Perak.

Tanjong Dahan.—The S. point of the Linggi district, Malacca, and about 2 miles S.E. of the Police station.

Tanjong Damar,-Point on W. side of Muka Head, N.W. Penang, about be mile S.W. of it.

Tanjong Datoh.—A S. bend of the Langat R., half-way between Bukit Jugra and Lankut Buntal, S. Selangor.

Tanjong Duri.-Point N. of entrance of R. Murbuk, N. Kedah.

Tanjong Duyong.—Point about 1 mile E. of Muka Head, N.W. Penang.

Tanjong Gabees.-Point in N.W. Kedah, about 8 miles N. of R. Purlis.

Tanjong Gading.—Point between the Kessang R. and Kwala Muar, about S miles from the Malacca frontier.

Tanjong Gadong.—A point on E. side of Johore R., 2 to 3 miles above Johore Lama.

Tanjong Gemok.—The point forming the N. side of the entrance to the Endau R., E. Pahang.

Tanjong Gemuruh,-Point on S. coast of Penang, and V. a little to W. of same.

Tanjong Gul.—Point S.W. of Singapore, and district of same name. V. 12 to 2 miles E. of above on S.W. coast. N. of P. Sembilan.

Tanjong Gutak Sanggul.—The extreme S.W. promontory of Penang.

Tanjong Hantu.—The extreme W. point of the Dinding (mainland) coast.

Tanjong Jaga.—Point at S. entrance of Yan R., N. Kedah, rising in Gunong Jerei.

Tanjong Jelutong.—The S. point of Pule Ubin.

Tanjong Kaloh.—Point at S. extremity of W. portion of Teluk Bahang district, N.W. Penang.

Tanjong Kampong Padaman.—Point and V. on E. bank of Perak R., C. Perak.

Tanjong Kapa.—Point on Perak coast, just below the Dindings boundary.

Tanjong Karang (Krong in the Admiralty charts).—Point W. end of island facing Port Weld, Larut, N.C. Perak. A lighthouse is erected here, showing a red light.

Tanjong Karang.—Point and Police station at extreme W. point of Singapore I., in the Teugah district.

Tanjong Katapang Besar.—Point in N.W. Penang, about 1 mile S.W. of Muka Head.

Tanjong Katong.—Point on S.E. coast of Singapore, on which is erected the pillar forming the E. harbour limit. A battery exists to the W. of the point at and near which several bungalows have been erected, which are let for short periods to persons wishing to enjoy sea-bathing and change of air.

Tanjong Katta.—The S. point of the Dindings (mainland) coast.

Tanjong Kerechut.—Point in N.W. Penang, about 10 miles below Muka Head, in the Teluk Bahang district.

Tanjong Kinawar.—A point S.E. of Johore about 5 miles N. of Point Romania.

Tanjong Kling.—S. Point in Tanjong Gul district, S.W. Singapore, between Pulo Sembilan and Pulo Damar.

Tanjong Kling.—The point 6 miles W. of the town of Malacca, and one of its prettiest suburbs. A Government bungalow and an excellent bathing-house have been erected here. The village is on the N. of the high road just before it turns upwards to the Tangga Batu district.

Tanjong Kramat.—A point and V. in the Sungei Bharu Tengah district, N.W. of Malacca.

Tanjong Kuantan.—Point in N.E. Pahang, 34 miles N. of Pahang R. and the most easterly portion of the State.

Tanjong Kupang.—Point between Old Strait and mouth of R. Pulei, S.W. Johore.

Tanjong Labu.—Small V. on the E. bank of the Duyong R., Malacca.

Tanjong Lepas.—Point in the Batu Feringgi district, N. Penang. A little over 2 miles S.W. of T. Batu.

Tanjong Liat Tanah.—V. at entrance of Kwala Trong, 10 to 11 miles S. of Kwala Larut, W.C. Perak.

Tanjong Limau.—A point at extreme S.E. of Pahang, formerly regarded as making the boundary between that State and Johore.

Tanjong Lumboh.—Point on E. bank of Perak R., about 6 miles below Bota, W.C. Perak.

Tanjong Luyong.—Point and V. just below the mouth of the Jugra R., S.W. Selangor.

Tanjong Lyan.—Small V. in the Durian Tunggal district, S.C. Malacca.

Tanjong Malmi.—Point on N. side of Bernam R., S.E. Perak.

Tanjong Manura.—A point on E. bank of R. Perak, about 8 miles below Kwala Kangsa.

Tanjong Masari.—A W. point of the Pulai Betong district, S.W. Penang.

Tanjong Menkuang.—The S.E. point of Bedoh district, S.E. Singapore.

Tanjong Merawang.—Point on W. Singapore coast forming E. boundary
of entrance to Old Strait.

Tanjong Morau.—Point in N. Johore, 21 miles N. of Point Berala.

Tanjong Nipis.—A N. bend in the Kurau R., N.W. Perak, about 8 miles from the mouth.

Tanjong Pachut.—Point on E. bank of Perak R., C. Perak.

Tanjong Pagar.—District of S.W. Singapore-town, where the principal docks are situated. Connected with the town proper by steam tramway.

Tanjong Pangkalen.—Point on the E. bank of Perak R., 8 miles above Durian Sabatang, S. Perak.

Tanjong Patani.—Cape in extreme N. of Patani and N. boundary of R. mouth.

Tanjong Pau.-Point in N.W. Kedah, about 18 miles S. of R. Lungu.

Tanjong Pengra.—The first point W. of Point Romania, S.E. extreme of Johore.

Tanjong Peniabong.—A point in Pahang opposite Pulo Kaban, and almost at the S.E. extremity of that State.

Tanjong Peniabong.—The extreme N. cape of Johore, 5 miles E. of entrance of Endau R.

Tanjong Penyuso or Point Romania.—The extreme S.E. point of the Malay Peninsula, often but erroneously called the S. point of Asia, that distinction belonging to Tanjong Bulus, a little W. of Singapore. It terminates in a bold rocky promontory of plutonic origin.

Tanjong Piandang.—The W. point of the Perak coast, lat. 5° 2' N., long.

100° 23′ E.

Tanjong Pinjura.—Point between the entrances of the Jurong and Pandan Rivers, S.W. Singapore.

Tanjong Ponggol.—Point berween the Ponggol and Seranggong R. in N.E. Singapore. It is the site of a Police station, and is just opposite the R. Tukang in Johore.

Tanjong Puchat Muka (Muka Head). -The N.W. point of Penang, upon which a lighthouse is erected.

Tanjong Ridan.—Point 4 miles up the R. Pulei, where a little R. of that name joins it.

Tanjong Rimau.—A small V. in the Pulau Sebang district, N. Malacca, 1³ miles S. of the Tampin district (Rembau). Also a district of the same name in the same position.

Tanjong Risang.—Point in extreme N. Johore, about 5 miles S. of Point Peniabong.

Tanjong Ru.—A spit of land forming the S. limit of the entrance to the Kalang and Rochore Rivers, Singapore.

Tanjong Salang,-N. point of Tioman I.

Tanjong Sang Long.—A bend on N. side of Selangor R., about 8 miles from the mouth.

Tanjong Sarong.—Extreme W. point of Blakang Mati I., forming S. boundary of New Harbour, Singapore.

Tanjong Sekakap.—Point on E. coast of N. Johore, 7¹/₂ miles S.W. of Babi I.

Tanjong Sekudei.—Point at W. entrance of Sekudei R., opposite Johore Bharu, S. Johore.

Tanjong Sembilan.—Point to S. of entrance of R. Lungu, N.W. Kedah.

Tanjong Senai.—V. in Linggi district of Malacca, about 1 mile S. of the Police station at the entrance of R. Linggi.

Tanjong Silantei.—Point in N. Johore, 41 miles S. of Point Risang.

Tanjong Sipang (Syrang in the Admiralty chart).—Point forming a peninsula on N. bank of Perak R., and about 16 miles from its mouth, in S.W. Perak.

Tanjong Sippong.—The N.E. point of the promontory of which the S.E. end is named Point Romania.

Tanjong Sungei Poaka.—Point forming W. entrance of small R. of same name, S.W. Polo Ubin.

Tanjong Tajam.—The W. point of Pulo Ubin.

Tanjong Teluk Bahang.—Point at E. side of Teluk Bahang, N.W. Penang, about 2½ miles S.W. of Tanjong Batu.

Tanjong Teregeh.—S.E. point of Pulo Brani.

Tanjong Tikus.—Point in N.E. Penang, about § mile S. by E. of Pulo Tikus.

Tanjong Tokong.—District and point in N.E. Penang, $4\frac{1}{3}$ miles N.W. of town.

Tanjong Tukun.—Point in N.W. Penang, about $1\frac{1}{2}$ miles S.E. of Muka Head.

Tapa.—Important V. on S. bank of Batang Padang R., E.C. Perak.

Tapioca Plant.—Ubi Kayu, cassava (Jathropha manihot). Originally from Brazil. About six varieties are grown in the Straits, from the roots or tubers of which are manufactured tapioca in various forms—as flake, flour, bullet, pearl, and seed. The fibrous part, or refuse after manufacture of the tapioca, is used as pig's food. Casserepe, the basis of the famous West Indian pepperpot, can be made from the expressed juice of the pulped roots. This juice contains two poisons—hydrocyanic acid and a poison which has lately been discovered and provisionally named "Manihotoxin." Both poisons being very volatile, they are expelled by a slight degree of heat. The juice also contains a non-poisonous substance, which has been named "Sepsycolytin," or "fermentation's hinderer," on account of its remarkable antiseptic properties, to which is probably due the preservation of the ingredients of West Indian pepperpot. The tubers are sometimes eaten as a vegetable, either boiled or roasted.

Mr. Cantley, referring to the Government Nursery (Report 1886), says:—
"Of tapioca there are many varieties; so far I have been able to secure the following:—Red and white Brazilian, Singapore, and Mauritius. These are all in cultivation here, and the time they take to mature is about as follows:—Brazilian, nine months; Singapore, fifteen months; and Mauritius, eighteen months."

Tapioca, Bullet, Pearl and Seed.—The same process is gone through as in making flake, only that before being placed in the hot iron pans, the damp pulverized starch is rolled about in cloth cradles until converted into pellets, when

it is stirred about on the hot round pans for a short time and then dried the same as flake. It is sifted into sizes, and gains the name of bullet, pearl, or seed, according to size.

Tapioca, Flake.—Is the starch of any variety of the tapioca plant manufactured into irregular rocky masses. To manufacture it, the roots are washed, grated, and the starch washed out of the pulp, the water and starch in a milky state being run into cisterns to settle. After the starch has settled to the bottom, the water and lighter impurities are run off, the starch is dug up and agitated with clear water and allowed to settle again in other cisterns. This process is gone through one or more times, according to circumstances, the top and lower surface of the starch being each time carefully scraped clean with chisels. The starch is then pulverized and sifted in its damp state and stirred about in round iron pans heated to a temperature sufficient to burst the starch capsules; the amylaceous matter thus released cements the whole into small, irregular, rocky masses, which are dried until crisp on flat iron or copper plates at a comparatively low heat. After sifting into sizes, it is then packed in bags. The manufacture of tapioca is now almost entirely done by machinery on all large estates.

Tapioca Flour.—The same process is followed as for making flake tapioca, except that the pulverized damp starch, instead of being stirred in the round iron pans at a high temperature, is either dried in the sun or placed on flat iron or copper plates and dried slowly.

Tapir (Tapirus Malayensis).—In Malay, těnok, or Kuda Ayer ("waterhorse"). This animal was discovered in the Peninsula at the beginning of the present century, and differs from the American species, which is of uniform brown colour, in having a ground colour of sooty-black, with greyish-white back and flanks. The young animal is beautifully variegated, being striped and spotted with yellow fawn above and white below, the marks disappearing as it reaches adult age. It has no mane, and the proboscis is longer than with the American animal. The hide is used, but the flesh is dry and tasteless. In spite of its native name, it does not attempt to swim, though very fond of wading in streams. It is said to be readily tamed, and even to become unpleasantly familiar with those it knows, acting like a pet kitten or puppy, which, in an animal of its size, is somewhat embarrassing. The proboscis of the Malayan is longer than that of the American variety.

Tasek .- V. on W. bank of Kessang R., extreme S.E. of Malacca.

Tasek.—Hill and V. 15 miles from Butterworth, and formerly the site of a sugar plantation owned by Mr. NAIRNE of Penang, but now abandoned in favour of cocoa-nut and other cultivation. The house is pleasantly situated, and the water in the neighbourhood soft.

Tasek Bera.—A lake in W. Pahang, supposed to be about 8 miles long by 3 in greatest breadth. Oval in shape, and lying in a N.W. to. S.E. direction at the junction of the Bera R. with the Sereting R.

Tattooing.—The practice of making indelible stained figures in the skin, by way of ornament or distinction, is called, in Malay, chachah, a word which also signifies to chop, or mince. It obtains only among the rudest tribes, but is unknown to all the more civilized races, nor is it ascertained to have existed among the latter in any period of their history.

Tea (Assam hybrid).—Is imported from China and India for foreign consumption, but is not indigenous. Plantations have been started in Johore, which are meeting with fair success. Mr. Cantley says the plant "grows with a freedom which would seem to insure profitable cultivation; the question is more one of cheap manipulation than of plant growth. I have lately inspected tea cultivation on some estates in Ceylon, and I see no good reason why its cultivation should not be taken up freely in the Straits on selected soils and made remunerative."

Teak.—See Woods.

Teanei.-V. on N. bank of Pahang R., E. Pahang.

Teban.—A N.E. district of Singapore, between Ponggol and Tampinis. An estate of the same name occupies about one-third of the district.

Tebang Said.—V. on E. bank of Kahang R. in E. Johore, half way between its junction with the Sembrong and Makek Rivers.

Tebing Tinggi.—Small V. on the main branch road from Malacca-town to Ayer Panas, about 7 miles from the former.

Tebing Tinggi.—A V. in the Bringin district, C. Malacca.

Tebing Tinggi.—V. and bridge on the high road between Bukit Minyak and Sempang Ampat, 11 miles from Butterworth, Province Wellesley.

Tebong.—A small V. on the W. affluent of the R. Kessang, about 31 miles from Chin Chin, E. Malacca.

Tedong.—A small V. on the S. coast of Malacca, about 21 miles E.S.E. of Merlimau.

Tejong.—See Nutchi.

Tekah.—Small V. 1½ miles S. of the Johore frontier in N.E. Malacca.

Tekam.—Important V. on E. side of Muar R. in Johore, lat. 2° 27' N., long. 102° 53' E.

Telaga Tujoh.—V. in extreme N.W. of Kedah on the coast just below the Siamese boundary.

Telinga or Kalinga.—In Malay Käling, the name of the nation of Southern India with which the Indian islanders have at all known times held most intercourse, and through whom, it is believed, they received, in ancient times, the Hindu religion, and some of the civilization which belongs to those who profess it. (See Kling.)

Teluk Anson.—A flourishing settlement in Lower Perak, about 23 miles from the mouth of the Perak R., and likely to become of much greater importance, owing to its situation just below the confluence of the Perak and Kinta Rivers, this being the key of the riverine traffic. A railway has been partly constructed from Kinta, which will yet further aid the development of Teluk Anson, which has grown up entirely under the management of the late Superintendent of Lower Perak, Mr. Noel Denison. Teluk Anson lies on the side of a tongue of land about $\frac{1}{2}$ mile across, and has replaced Durian Sabatang, which was the native village on the N. side, but is now almost abandoned.

Teluk Ayer.—Bay forming a portion of the sea face of Singapore. A large reclamation has recently been filled in here, which in time bids fair to become an important business centre.

Teluk Ayer Rambut.—The beach N. of Point Romania, Johore.

Teluk Ayer Tawar or Tawer.—V. and district in N. division of Province Wellesley, the former 5 miles 7 furlongs from Butterworth. The village is a populous one, the inhabitants being chiefly fishermen and boatmen, with Chinese and Kling petty shopkeepers. A short but wide river admits boats of good tonnage at high tide, and the fishing industry is very flourishing. A Police station stands near the N. end of the village. Ayer Tawar is the natural capital of the N. district, but the inland V. of Penaga has been found more suitable as the head station, on account of its more central position as regards the N. boundary of the Province.

Teluk Bahang.—District in N.W. Penang.

Teluk Bahang.—Bay in N.W. Penang, T. Tukun and T. Teluk Bahang being the two extreme points; about 2 miles from Muka Head S.E.

Teluk Bakong.—A bend in the Perak R., 6 to 7 miles below Bota, in S.W. Perak.

Teluk Barang.-Curve and V. on E. bank of R. Endau, N.E. Johore.

Teluk Batu. - Bay at S. point of Dindings territory.

Teluk Bendira. - Bay on N.E. side of Blakang Mati I., S. of Singapore.

Teluk Bharu.—Bay forming S.E. coast of Changi district, extreme E. Singapore.

Teluk Blangah.—The S. district of Singapore proper, only partly within the town limits. The P. and O. Wharf and New Harbour Docks are within this district, as laid down in the most recent maps.

Teluk Blangah.—Bay and V. in Sungei Bharu Tengah district, N.W. of Malacca.

Teluk Brani.-N.E. point of Pulo Brani.

Teluk Durian.—A bend in the Langat R., 3 miles W. of Bukit Merbiling, S. Selangor.

Teluk Duyong.—Bay to S.E. of Muka Head, N.W. Penang.

Teluk Epi.—The bay immediately S. of the entrance of the Kurau R., N.W. Perak.

Teluk Ghintan,-Bay to E. of Tanjong Batu, N. Penang.

Teluk Gong.—V. on the W. bank of the Kessang R., about 5 miles from the coast, E. Malacca.

Teluk Joara.-Bay on E.C. side of Tioman I.

Teluk Kapur.—Bend of the Endau R., about 11 miles from its mouth, the river here turning N. after running 2 miles W. In N. Johore.

Teluk Katapang Besar.—Bay just below point of same name in N.W.

Teluk Kempai.—Bay on W. coast of N. Penang, Teluk Bahang district.

Teluk Kertang.—V. on S. bank of Larut R., about 3 miles from the entrance, Perak. The anchorage at the mouth of the river goes by this name.

Teluk Kirlang.—Bay in N.W. Penang, just below Tanjong Duyong.

Teluk Kumbar.—Bay and district in S. coast of Penang.

Teluk Kupoh.—Bay on W. side of S.E. point of Penang.

Teluk Larak.-V. on W. bank of R. Endau, N. Johore.

Teluk Luas .- See TELUK WAS.

Teluk Mas.—V. on the left of the Umbei R., between 6 and 7 miles E. of Malacca-town.

Teluk Mata Ikan.—Bay and V. on E. coast of Singapore in Bedoh district.

Teluk Mokut,-Bay on S. coast of Tioman Island (q. v.).

Teluk Nangka.—Bay on N. coast of Penang, 11 miles E. of Tanjong Batu.

Teluk Nibong Patah.-Bend of the Endau R. in N. Johore.

Teluk Pah Bedin.—Bay on E. side of Teluk Purajah, S. coast of Penang.

Teluk Paku, -Bay forming E. coast of Changi district, E. Singapore.

Teluk Papan.—A bay about 12 miles from Malacca-town in the Sungei Udang district.

Teluk Perlepah.—V. at junction of Sembrang and Kabang Rivers with Endau R., N. Johore.

Teluk Prang.—A reach of the Perak R., C. Perak, with V. of same name on W. bank about 12 miles S. of Kwala Kangsa.

Teluk Purajah.—Point to E. of Teluk Kumbar on S. coast Penang.

Teluk Remis.—A village 3 miles 7 furlongs N. of Butterworth, Province Wellesley. Formerly the site of a Police station and the magistracy for the N. portion of the Province. About 1850 the station was abandoned for police purposes and converted to the use of Indian convicts employed in repairing the roads. On the cessation of the convict system, the building was allowed to fall into disrepair and is now a ruin. According to Malay story, two large and fierce hamadryad snakes took possession of it, and nobody dared approach it after nightfall. A syce assured the compiler that he had seen one of these snakes, which was induced to show itself by an Indian snake-charmer, but as none of the party had guns, it was allowed to escape. As the hamadryad abounds in the Province, there is no improbability in the story.

Teluk Ridang.—Point on W. side of R. Endau, S.E. Pahang.

Teluk Salang.—Bay at N.W. corner of Tioman I.

Teluk Sekari.—V. in S. Pahang, about 2 miles E. of Muar R. and 4 miles N. of Segamat.

Teluk Sera.—Bay on coast of N. Dindings territory, the shore, running E. and W., turning abruptly S. just above Pulo Tallong.

Teluk Telaga.—Bay on coast of Pasir Panjang district, S.W. Singapore. The Pasir Panjang Police station about ½ mile. E.

Teluk Tempoyak.—Bay on E. side of S.E. promontory, Penang.

Teluk Tikus.—Bay on N.W. coast of Penang, 1½ miles from Pulo Tikus.

Teluk Tingah.—Bay on W. side of Tioman I.

Teluk Tingho.—V. on W. bank of Perak R., just S. of Kedah boundary line.

Teluk Trepang.—A N. curve in the Langat R., just below Langkut Buntal, S. Selangor.

Teluk Tuan.—Reach and V. on W. side of R. Endau, N.E. Johore.

Teluk Was or Teluk Luas.—Bay to S. of entrance of R. Upip. the boundary between Siam and Kedah.

Telupin.—District at mouth of R. of same name in N.E. Patani.

Temenggong, or Tumunggong.—Lit., guardian of the palace; next in rank to rajah.

Temong.—V. a few miles above Kwala Kangsa on the Perak R., formerly the seat of the native Government. It is now known as Kota Lama.

Temperature.—The mean temperature of Singapore is 81°, seldom varying one degree. It appears to be slightly increasing, but the clearing of land, &c. renders this at present inappreciable. Penang has a slightly higher average, while that of Malacca appears to be the same within a trifling decimal. The Peninsula will naturally, owing to the vast forest tracts existing, give higher figures. But 85° may be taken as the highest average heat throughout the States dealt with in this work.

Tengah.—The W. district of Singapore. Gambier and pepper plantations exist here in large numbers.

Tengah.—V. in E. part of Tampin, Rembau, Negri Sembilan.

Tenure of Land.—CRAWFURD's remarks upon this subject are of interest. He says:—With the exception of the populous islands of Java. Bali, Lomboc, and a few parts of the Philippines, the land is so super-

small in relation to it, that the greater part of it has, in reality, no saleable value at all. With the exceptions thus enumerated, no real or theoretic rent exists, and the only value of the land is derived from the labour invested in clearing it of forest, in making it amenable to irrigation, in digging wells, and in the fruit-trees planted on it. All lands which have received a value from labour so invested, are a private heritable property, or an heirloom—in the language of the Malays and Javanese, pusaka. If any public tax be imposed on such lands, it is taken in kind, and does not exceed a tithe. Even the rude laws of the Malays proclaim this private property in cultivated or reclaimed land, as the few following extracts from those of Johore will satisfactorily show :- 'Land is of two descriptions, appropriated and unappropriated. The last has no owner, and therefore cannot be a subject of litigation. He who reclaims forest land, or builds upon it, shall not be molested in his possession.' 'The proofs of land being appropriated are the presence of wells, of fruit-trees, or marks of tillage, and if any one intermeddles with such lands, he shall be amenable to prosecution.' 'If any one trespasses on such appropriated lands, he shall be fined ten mas, more or less, at the discretion of the magistrate, according to the extent of the land.' 'If a man builds a house, and makes a garden upon the appropriated land of another, not knowing that it had an owner, and the owner returns, he shall be entitled to one-third part of the produce.' 'If a man cultivates the irrigated land (sawah) of another, not knowing it had an owner, he shall pay such owner, as in the last case, one-third of the produce of the land.' 'If a man takes possession of the land of another, after it has been prepared for upland culture (umah), he shall pay a fine of ten mas, and if a man seizes upon such land forcibly, he shall be fined one tael and one paa.' 'If neighbours unite for the purpose of clearing, cultivating, and fencing a portion of forest land, and one out of the number neglects the portion of the fence assigned to him, and cattle or wild hogs enter and destroy the crop, such person so neglecting shall be compelled to make good the crop which has been destroyed.' 'If a man steals the materials of a fence, and the owner of it meets him, it shall be lawful for him to seize and bind the thief, to take from him such articles as krises, hangers, or spears, and to carry him, if a free man, to the magistrate, or if a slave, to his master.' 'If a man goes to hunt with toils, or nets, or decoys, or to fish in rivers or lakes, it shall not be lawful for the thief in authority over the land to hinder him, for the game he is in quest of are wild animals.' 'If, however, a person robs a beehive on another's land, without the knowledge of the owner, it shall be lawful for the owner to seize and take such hive from him, and the offender shall be further fined to the extent of half a tael. It is true that bees are wild animals, but the hives had yielded the owner of the land a regular and certain

In the British possessions, however, so important a source of revenue as landrent could not be overlooked. Owing to defective registration, want of proper
land-marks, and other causes, matters had reached so unsatisfactory a state that a
late Governor, Sir F. A. Weld, determined to introduce the Torrens system, and to
this end Mr. W. E. Maxwell (now C.M.G.) was despatched to Australia to study
that system on the spot. Upon his return, Ordinances were passed, and the
requisite staff appointed to carry out the new arrangements. The revenue from this
source has undoubtedly increased, but the want of a sufficient staff to effectively
demarcate the land has materially retarded matters. Upon the whole, there has
been less grumbling amongst the natives than might have been expected, they
being fully conscious of the value of a secure title. The matter, however, is still
one of experiment.

Terachi.—One of the Negri Sembilan, lying between Ulu Muar and Gunong Pasir, and the most westerly of the group. It possesses no villages of any importance. The source of the Muar R. forms the boundary line between it and Ulu Muar.

Terap Bark.—The fibre of this bark is used by the Jakuns to form loin cloths.

Terentang.—Small V. on the W. affluent of the R. Kessang, $1\frac{1}{2}$ miles from Relau Police station and just above Chin Chin.

Teum Yong.—V. on N. bank of Pahang R., opposite Cheno, C. Pahang.

Thaipeng or Taiping.—The principal mining station of Larut, C. Perak, at the head of the Larut R., and the seat of the Assistant Residency. It is a busy place, and has largely developed of late years, and is regarded as the real capital of the State, although the Sultan and Resident both reside at or near Kwala Kangsa. It has well-constructed public buildings, such as prison, hospital, barracks, markets, Police stations, court-house, treasury, post office, &c. It possesses a library and an excellent museum. The town is supplied by waterworks.

Thaiping.—See TAIPANG.

Thatch.— See ATTAP.

Theatricals.—Plays are sometimes, but rarely, given, derived from the Javanese. (See Clown and Pupper Show.) In such cases four characters usually appear, a hero and his friend the clown, with the heroine and a muse or servant.

Thermal Springs exist in two or three localities only, Malacca, Naning and Klang being the only districts regarding which we have reliable information. The springs are found in level swampy ground only, as in other countries, and are believed to possess curative qualities. That in Klangis thus described by Mr. B. Douglas:—

"Near the junction of the Klang and Tata, we came on the track to Pahang. About four miles below the kampong at Sungei Tata we reached a hot spring flowing out of the basin in a small granite rock, about two or three feet above the bed of a small branch or back-water of the Klang on its left bank. The water is impregnated with sulphur, and hot enough to cook an egg or rice in; we found it too hot to test by hand. On approaching, steam is seen rising a considerable height among the trees. A short distance below are two other springs, the lowest being the coolest and oozing out of the mud. Here wild cattle—Seladang—and other large game came down to wallow in the hot ground, and, so the natives say, to drink the mineral water. The natives themselves bathe in the water, and use it as an internal medicine for rheumatism, with, they say, good effect. I had no detached thermometer to test the temperature of the springs, but I should say the hottest one was about 180 degrees. There was some ebullition as of boiling."

At Ayer Panas in Malacca a similar spring exists. It is in the centre of a padi field, about $6\frac{1}{3}$ feet square, with a clear stream of water running within 2 feet of its edge. Temperature 122° F. A spring at Sebang shows a temperature of

over 110° according to one writer, 130° according to another.

"The hot swamp lies between the road and the base of the hill which forms the western side of the flat. The ground is uncultivated and swampy, but the thicket which rises out of it extends nearly back to the hill, and is said by the Malays to have a bottom of hot mud and water throughout. The water must rise from more than one place, and the quantity discharged is considerable, as, where it flows out beneath a bridge across the road, it formed a running stream three feet broad and three inches deep. Every day there is probably discharged about ten thousand cubic feet."

Tial.—V. on the Duyong R., Malacca, about 4 miles S.W. of Ayer Panas.

Tides.—The tides, both at the Settlements and at the more important places on the coast of the Peninsula, have been, even at this late date, but imperfectly recorded. Tide tables for Singapore by E. ROBERTS were published for the first time in 1884, but are avowedly incomplete. At Singapore, curious double tides take place,

i.e., there are two high and two low waters, the second tides in each case being inferior in rise and fall to the others. At times the inferior tides disappear altogether. Reliable tide tables for all the Settlements are still desiderata.

Tiger (Felis Tigris).—This dangerous animal is frequent in the Peninsula, and is occasionally found in Singapore, Malacca and Province Wellesley. The tiger of the Malayan countries is the same as that of India. In Malay the name for it is harimau, and by elision of the initial syllable—a frequent practice of the language—rimau. The royal tiger is the type which, in the native languages, furnishes the generic name of all the larger feline animals, the others being designated by adding an epithet. Thus, the Malays call a kind of tiger-cat harimau-akar, which may be rendered "the scandent or climbing tiger." The tiger itself, to distinguish it from the rest of the family, is designated harimau-tunggal, which signifies "the unique tiger," or the "tiger itself." It should be noted that the Malays, when in the forest, never refer to the animal by its real name, they having a superstitious belief that the animal understands speech. They call it tuhan utan (lord of the woods), or by some similar synonym. The souls of the dead are supposed to enter the bodies of tigers, and their destruction therefore is seldom attempted independently, though the natives will gladly assist foreign sportsmen.

Tigers are usually caught by pitfalls or timber-traps in which a heavy balk of timber falls on the animal if he touches a releasing trigger. The pitfalls have more than once proved fatal to men. A French priest at Batu Kawan in Province Wellesley was impaled on the sharp bamboo planted in the bottom of a tiger-pit into which he accidentally fell, and died before he could even be released. Singular cases are on record of tigers being shot by accident, i.e., under the impression that they were dogs or wild pigs. A case happened at Bukit Timah, Singapore, about

eight years ago.

A man-eating tiger is called riman-kumbang, one which eats animals only

rimau-kerka. (See also Black Tiger.)

As many people will be interested by further particulars, we subjoin an account furnished on the subject of tiger-hunting to the J. I. A., Vol. XI, by Mr. J. D. VAUGHAN. The lapse of time has rendered one or two corrections necessary:—
"Fire-arms are in common use, and some Malays are exceedingly bold and expert in killing tigers. It is said that a tiger becomes extremely fierce and bloodthirsty when once he has tasted human blood, and will seek his prey in the most crowded kampongs, and will watch a house night after night in the hope of catching a man-

A remarkable instance fell under the writer's observation.

"Several men had been killed at a village in Province Wellesley by the same tiger, and for several nights he had been heard prowling about the houses, regardless of cattle and dogs that fell in his way. He was evidently bent on catching one of the inhabitants. Finding at length that the villagers kept close, he actually sprang at the door of a house at night, burst it open, seized a man from his bed and walked off with him. At daylight he was traced by his footprints into the jungle and the body of the man was found partly devoured. A famous shot, one ETING, a Samsam (or cross between a Malay and Siamese), was in the neighbourhood, and he proposed that the remains of the poor fellow should be kept in the house, as the tiger would be sure to return for a second meal. This was done, and over the door of the house a strong platform was erected, on which ETING took his station with his guns. Sure enough, the tiger a little after nightfall returned to the house, and was shot through the head.

"Tigers are frequently caught in traps: the most common is the pit-trap, which is used in all parts of India. A deep pit is dug and the bottom staked with sharp-pointed staves. The mouth of the pit is concealed by branches and leaves, and the bait (a dog generally) is tied to a bar over the centre. The tiger in prowling about discovers the bait, naturally springs at it, and alights on the

stakes. He is often pierced through by them; if not, he is easily despatched with

long spears.

"Another trap employed in catching tigers resembles the figure-of-four trap used by schoolboys. The trap is made with poles cut from the jungle; the part or lid that falls is laden with logs till rendered so heavy that the largest brute is unable to raise it. The lid is held up by an upright post so placed that the slightest push will remove it. To this upright post the bait is fixed, which the tiger seizes, and in endeavouring to drag it away, he pulls the post aside and brings the lid down. To prevent the lid crushing the animal, a cross-bar is placed on the post a sufficient height off the ground to protect the brute, but not leaving room enough to permit him to rise; his captors then introduce their hands into the trap and tie his legs together, and to prevent him biting a piece of wood is lashed across his mouth. The lid is removed, and the animal is so powerless that he may be easily removed in a basket or slung to a pole. In this fashion he is carried to town and disposed of.

"A fixed reward of \$50 is now paid by Government for the tigers destroyed, but in any case the fortunate sportsmen are enabled to dispose of them for a handsome Chinese are the usual purchasers; to them the claws, teeth, flesh, and bones are invaluable. The two former are strung on threads and worn about the person, or treasured in their houses as charms, the bones are calcined and ground to a fine powder and used as medicine in various diseases, and the flesh is eaten to render them brave and hardy. The skin generally falls to the lot of a European. It occasionally happens that the master of a merchantman purchases a tiger for the English market, and then the hunters reap a golden harvest. A tiger is usually

sold for five-and eventy or thirty dollars."

It must be added that this account was written when tigers were more common both in Singapore and elsewhere than they are now, but, this allowed for, the above remarks apply at the present date.

Tikoro.—Small I. 10 miles from nearest point of the Kelantan coast, opposite the mouth of R. Kelantan.

Tikum Batu.—On the most southerly bend of the R. Muda in the extreme N. of Province Wellesley, 19 miles 4 furlongs from Butterworth. This is a great resort for cattle-dealers, a station on the other side of the river in Kedah territory being the chief mart for cattle and buffaloes brought from Ligore and Patani, some 4,000 head changing hands annually. They are swum across the river and taken south by the Ikan Mati Leher and P. Bertam Road. A duty of \$1 per beast is levied in Kedah on each beast before it is allowed to cross, this being farmed to Chinese resident in Penang.

Tilian Banga.—V. on E. side of the Triang R., W. Pahang.

Timba.—Water-lifters made of the upei, or sheath of the betel-nut palm just below the fruit.

Timber.—See Woods.

Tin.—In Malay timah. The word, however, is used as a generic term for both tin and lead, the epithet "white," or "flowery"—putch and sari—being given to tin itself, and that of "black"—itam—to lead, a metal with which, being entirely a foreign product, the Malayan nations are but little acquainted. Stream tin is timah biji. A tin mine is lumbong timah, the tin bearing strata is karang. To excavate it is angkat karang, and to smelt is masak or puput.

What may be called the Malayan tin district, or tin field, is, beyond all comparison, the most extensive and the richest in the world, for it stretches from Tavoy, in the 14° of north latitude, to Billiton, in the 3° of south latitude, that is, over seventeen degrees of latitude, and ten of longitude. Tin has been found or worked in a great many localities within these wide bounds—in various parts of

the continental territories of the Malayan States, and in several of the islands at the eastern end of the Straits of Malacca. The ore would seem only to become the more abundant as it approaches its termination at Banca and Billiton. The localities richest in tin are ascertained to be those near the junction of the sandstone with the granite, and all the countries rich in tin are also observed to be so in iron. All the ore heretofore worked, it should be noticed, has been found in the alluvium, or detritus of ancient mountains-what is called in mining language "stream-work"—obtained, in fact, by washing the soil in the same manner as, for the most part, gold in Australia and California; for no ore has ever been obtained by mining the rock containing veins of it, although it has been traced to them. It must also be remembered that the greater part of the tin district is covered with an immense forest, and has not been explored, so that tin may reasonably be expected to be found in many situations which have hitherto remained unexamined. The supply of tin from the Malayan countries promises to last for at least as many ages as that of the coal of England. It is produced, in fact, in quantity proportionate to the labour and capital invested in working it, and without restriction from any other cause. With partial exceptions, the Chinese are at present the effectual miners and smelters, and the increase which has taken place in the quantity produced is remarkable. The tin mines of Malacca were not worked at all until as late as 1793, and not effectually by Chinese until 1840, but in 1848 there were 50 open, yielding some 250 tons. The production in the neighbouring Malay States had also greatly increased, so that the whole quantity exported from Malacca amounted in that year to above 960 tons. Mr. Logan estimated the whole quantity produced in the Malay Peninsula at about 2,350 tons, exclusive of the produce of the Siamese territory. Since that period, tin mining an almost ceased in Malacca; Sungei Ujong, Selangor, and Perak being now the principal mining centres. Perak produces some 12,000 tons, and Selangor between 5,000 and The metal has also been discovered in the N. and S. of 6,000 annually. Johore.

Barbosa mentions tin among the commodities taken by the Malay traders to the Moluccas and other eastern islands from Malacca; but in a detailed list of the articles taken by the junks to China, and amounting to ten in number, tin is not found. Barbos names the metal as one of those found in the market of Malacca, but calls it, erroneously, a product of Sumatra. The tin referred to by these writers, was, no doubt, the produce of rude Malayan industry, for in their time the Chinese had not yet settled in any part of the Archipelago. It would, consequently, have been small in quantity, and, at least by 20 per cent., less valuable than that smelted by the skilful Chinese. Malay tin must have reached Hindustan at an early period, for it is otherwise difficult to understand from whence the Hindus, who have none of their own, could have obtained their supply of a metal which is largely used by them in the formation of alloys. Dr. Vincent is of opinion that this tin was British, but it is far more likely to have been Malayan, part of it, probably, brought overland from the Coromandel coast. The most usual Sanskrit name for tin—vanga and ranga—seem to be Indian, and to have no relation to the Malayan word timah.*

Tinjau Laut.-V. and hill in E. Johore, 3 miles S. of R. Sedili Besar.

Tipah.—One of the nine districts of Patani (q. v.).

Titi.—A bridge. Occurs in names of places.

Titi Trus.—Bridge over a small affluent of Sungei Ayer Itam and V. of same name, W. Penang.

Titi Wangsa.—A range of hills in Kedah.

Titian Akar.—The site of a tin mine opened in 1793, about 11 miles from Malacca, and lying between Durian Tunggal and Ayer Panas; now abandoned.

Toa Payoh and Upper Toa Payoh.—Two districts in S.C. Singapore. A Police station exists at the former, about 3 miles from town.

Toads (Katak puru) of various species abound, but the same remarks

apply to them as to the Frog family (q. v.).

Tobacco (Nicotiana tobacum) is grown in small quantities throughout the Peninsula, but not as an article of export. That for foreign consumption is imported. The Malay expression for smoking is minum roko', lit., to drink the nipah palm leaf, the coverings of Malay eigarettes being of that material. The experiment has recently been tried in Province Wellesley by Mr. Koh Boo Ann of growing tobacco on a large scale, but it has resulted in considerable loss, much to the disappointment of many who hoped to see a new industry available. Pipes and cigars are unknown to the Malays of the Peninsula, except where their use has been acquired on board foreign ships or in other countries. Mr. N. Cantley says of this plant:—"The soil of the Straits is generally not sufficiently rich for the successful cultivation of tobacco, except perhaps as a first crop after the removal of virgin forest, or in specially prepared compost. The plant requires heavy manuring to keep it growing satisfactorily on ordinary ground, as it exhausts the soil so quickly and thoroughly. Where soil is not congenial to start with, its cultivation can hardly prove remunerative. Seed of the best kinds have, however, been distributed amongst the planting community."

Todah.—The sword-fish. A curious legend in the Sijara Malayu relates that in old times a large number attacked the inhabitants of Singapore and cut the legs of those who opposed them. A boy advised the Rajah to substitute plaintain stems for people's legact and the advice being taken the fish, on embedding their swords in the trunks, were easily captured and destroyed. The boy, however, was deemed to show a dangerous ability, and was killed, lest he should become a conspirator

against the Government.

Toddy (*Tuak*) or palm-juice is much consumed. It is fermented in the same way as in other palm-producing countries.

Tokang.—Small islets with few or no trees, such as T. Burong and T. Bara

between Pulo Siribuat and P. Tioman off the coast of Pahang.

Tokay.—A species of lizard, so called from its cry resembling this word. The natives firmly believe its bite to be poisonous, which, it need hardly be said, is an error, no poisonous lizards existing in Asia.

Toman.—A village in Johol, Negri Sembilan.

Tombak Bandrang.—A spear the shaft of which is ornamented at its upper part with hair dyed red or black. It is carried before a chief on state occasions.

Tombs (Kubor), in the case of conspicuous men, hajis, &c., are often of some pretence, and resemble our own. As a rule, however, a simple head-piece of wood marks the last resting-place.

Tones.—A writer in N. and Q. with No. 17 (1886) of the J. S. B. R. A. S. states that he has detected three tones in both dialects spoken by the *Sakeis* in Perak. Philologists will be interested in following up the hint.

Tong Perapah.—A V. in a bend of the Bernam R., about 22 miles from its mouth, N. Selangor.

Tonquin Bean (Diplerix odorata).—Introduced a few years ago and found in many gardens in the Settlements. It has a very charming scent.

Tooth-Brush.—The fibrous stick used as a brush is called pesagi.

Topaz (Manikam kuning).—Imported only,

Tops (Gasing).—Top-spinning, main gasing. This is a favourite game [413]

amongst the Malays, the toy being almost identical with our boys' peg-tops, but with a shorter iron peg. It is spun in precisely the same way, the object, as with us, being to split the top of the opponent.

Tortoise.—Various species of tortoise are found in the Peninsula, but none of large size, or of any commercial value. One species is described by McNair as having a soft shell, a large snout, and being very quick in its movements, scuttling away rapidly at any alarm.

Tortoise-Shell.—The shell of the turtle (Chelone imbricata) which furnishes this incorrectly-named article, is an article of export, the chief supply

coming from the Dindings.

Torture.—The Malays have never emulated the Chinese in the refinements of torture recorded against the latter. They are not, however, blameless in such matters—compressing and crushing the fingers, the bastinado, holding the head over smoking cocoa-nut husk and chili, hanging by the wrists so that the feet cannot touch the ground, and rubbing chili in the mouth, are (or were) schoolboy punishments. Burying the accused to the middle and leaving him or her to perish by starvation is also a Malay torture; but there is no record of judicial torture being employed to the same extent as in more civilized countries.

Toucan.—The word often erroneously applied to hornbills (q. v.).

Town,—Crawfurd states that there is no word in Malay for town or city, except such as are Sanskrit, namely, negri or nagara, pura and praja, with kuta, which signifies, literally, "a fortress," adding:—The application of the word praja to a town is rather singular, for in Sanskrit it signifies "subject" or "inhabitants." It is not, therefore, an unreasonable conclusion to come to that lowns were unknown before the arrival of the Hindus, even to the most civilized nations of the Archipelago. The Persian word bander is now, however, used by educated Malays, the country people still retaining the word kampong (q. v.).

Trade, Commerce.—In Malay the most usual word for these is an abstract noun, derived from the word which signifies "a stranger," dagang. In Malay barniyaga or menyaga is a synonym of frequent use, and this is Sanskrit. The simple native expression, jual-bli, "selling and buying," is of frequent use also. To sell, to buy, to be in debt, are all expressed by native words. Interest of money is expressed by the figurative phrase, "flower of gold," which also signifies "tribute." Mercantile profit is usually expressed by the Sanskrit word laba, but sometimes by the native figurative word bunga, flower or produce, and, occasionally, by the word untong, which signifies "luck." The only word for capital or stock is modal, which is from the Telinga. The most usual expression for money is mas-perak, that is, gold and silver, or pichis, which is the name of the small tin or zinc coins borrowed from the Chinese. Another, and now the commonest word, is wang, which also signifies "a palace." For a merchant, the most usual native word is the same which signifies a stranger. Another native name, juragan, means, literally, the master or commander of a vessel; two others are Sanskrit—bopari and santri—the last being literally scholar or priest; and the fifth—sudagar, very commonly used—is Persian.*

Trafalgar Estate.—Partly in the E. Selitar and partly in the Ponggol districts, N.E. Singapore.

Tree Ferns.—Fine specimens of these are to be met with in the Peninsula, but they invariably dwarf when potted or removed to the garden. The finest are from 12 to 14 feet high, being much below the enormous height of 30 feet recorded by Wallace as that of those met with by him in the Aru Islands.

Trees. - See Woods.

Tribute.—In the shape of a golden flower (bunga mas) was sent triennially

by subject states, but has been discontinued since British influence became paramount in the Peninsula.

Tringganu.—Position between 4° 35' and 5° 40' N. lat. Bounded on the N. and E. by the China Sea, on the S. by Pahang, and on the W. by Kelantan.

HISTORY.—Less is known of this than of any other Malay State. It has always been deemed tributary to Siam, but has never done more to acknowledge its dependent positions than to send the periodical bunga mas, or golden flower. No historical details are available.

GEOLOGY.—Nothing certain is known. The country is one continuous jungle. FAUNA.—Presumed to be identical with that of the rest of the Peninsula.

AGRICULTURE, PRODUCE, and TRADE.—A few Chinese carry on all that can be mentioned under these heads. A little jungle produce is gathered, and there are a few tin mines worked by Chinese, but the information regarding them is

practically nil.

POPULATION.—The inhabitants consist almost entirely of Malays and some wild tribes, with a very few Chinese. The total population of the State was computed at 37,500 in 1856. Of this number, the town of Tringganu, situated in the northern part of the State, near the mouth of a not very large river, latitude 5° 25' north, longitude 103° east, was then estimated to contain from 15,000 to 20,000 inhabitants, or more than half of the population of the State. A most destructive fire took place in August, 1883, which is said to have destroyed nearly 2,000 habitations. The town has been much deserted since, and the population of the whole country has, it is believed, declined considerably, and does not exceed 20,000 at the present time, many having been attracted away to Kelantan.

GOVERNAMA Rajah nominally tributary to Siam but really independent.

REVENUE.—No details obtainable.

TOPOGRAPHY.—Tringganu has an area of under 4,000 square miles, and has, for some time past, included old Kemaman, which lies along the coast of the Gulf of Siam to the south of Tringganu. Its coast line extends along the Gulf of Siam for 80 miles. The River Besut is its boundary with Kelantan, and the River Cherating with Pahang. To the interior, the high ranges forming the east boundary of Pahang form a natural frontier, but the boundary is believed to be otherwise quite undefined. Of its area nothing certain is known; nearly the whole country is one continuous jungle, with less development, either of its minerals or its commerce, than perhaps any other of the Malay States.

COMMUNICATION WITH OTHER PORTS.—By sailing boats only.

Tringganu.—V. on S. bank of R. of same name, extreme N.E. of Tringganu State.

Tringganu Head.—Point 5 miles S. of entrance of Tringganu R., Kemaman.

Tripang.—The name of a species of holothurium, found in most of the shallow seas of Malaya. The word tripang is Malay. It is the bicho-de-mar, or sea-worm of the Portuguese, and our own "sea-cucumber," for in appearance and shape, although not in colour, for it is a dirty brown, it greatly resembles a cucumber. The esculent holothuria is by no means confined to the seas of the Archipelago; it is found in the upper part of the Gulf of Siam, and is so abundant on the northern coast of Australia, that the people of Celebes, receiving advances from the resident Chinese, have been long in the habit of making annual voyages thither in quest of it. Gutted, dried in the sun, and smoked, it is considered cured, and fit for its only market, that of China, to which many hundred tons are yearly sent for the consumption of the epicures of that country.

The fishery of the *tripang* is to China what that of the sardine, tunny and anchovy is to Europe. It is, for the most part, caught by hand, for it has little power of locomotion, but in deep water it sometimes dives. This is the account

given by Mr. Windsor Earl of the fishery on the shores and banks of the Aroe Islands, where this animal appears to be very abundant:—"But the great sources of wealth are the pearl and tripang banks, which lie on the eastern side of the group. These extend the entire length of the island, and are often several miles in width, being intersected by deep channels, some of which will admit vessels of burthen. The tripang, or sea-slug, is of several varieties. The greater portion is caught in shallow water, where it can be picked up off the bank without diving."—Journal of the Indian Archipelago, Vol. IV, p. 480. The tripang, although an article of considerable importance in the trade of the Indian Islands, is never found in the printed price-currents of an European emporium, because never dealt in by Europeans, which arises from nice or rather capricious distinctions in their quality, which no European is competent to appreciate. I can discover no mention of the tripang in the early Portuguese writers; which seems to be another proof that the Chinese, who carry on the trade and advance the funds, had not yet settled in the Archipelago when the Portuguese first appeared in it.

Trompah.—A document containing the Malay Royal Genealogy.

Trong.—The generic name of Cucorbitaceous plants, but chiefly applied to the brinjal or egg-plant.

Trong Merah (Agati grandiflora).—A plant introduced into the Singapore Botanic Gardens from India.

Trousers (Silvar) .- See Dress.

Trubuk (Fish-roe).—Strictly speaking, the name of a fish, the cured roes of which are a large article of native trade, but usually apply to the roe itself. Sumatra is the principal breeding-place, but the roes are exposed for sale at all the principal ports of the Peninsula.

Trumpet (Nefiri).—The native term in Persian, and points to the origin of the instrument. It is also applied to a fife or lute. The trumpet is rarely seen in the Peninsula, the well-known conch or trumpet-shell taking its place. It is more common amongst the Chinese, the hua chioh, or "painted horn," or the la pa (horn), being frequently seen in street processions.

Tuak.—Toddy, made from the fermented juice of the cocoa-nut palm. Often used as a substitute for yeast.

Tuba.—The name of a creeping plant (dalbergia), the root of which, when the sap is extracted by maceration in water, is used to stupefy fish for the purpose of capture. It does not appear to in any way vitiate their consumption as food. A few buckets-full thrown into a river will bring to the surface every fish within a wide radius—sometimes 100 yards—and "tuba-fishings" by Europeans never fail to attract all the Malays within hail of the proceedings, to whom the less promising specimens for the cook's art are always given.

Tumbuk Lada.—A short dagger, the best specimens of which come from Sumatra. It is rather a matter of curiosity than of actual use in the Settlements and States under British influence, where the use of the Kris and its numerous varieties is steadily discouraged by the authorities.

Turkey (Ayam yuropa or A. blanda).—The native names at once show that this bird is exotic. Chinese breeders rear them to meet the wants of European residents, but they do not produce specimens comparing with the best obtainable in home markets. It has long been naturalized in Java and the Philippines, but is regarded by Mahommedans as unclean owing to the tuft on the breast resembling the bristles of a hog.

Turmeric (Kunijit).—This important ingredient of curry is as common in Malaya as in other Oriental countries, the word Kunijit being apparently pure Malay.

Turnip.—Exotic only; grown only from foreign seed.

Turquoise.—Imported only.

Turtle (labi labi, katong, or penyu, the latter being the commoner name; river turtle, tuntong).—Turtles are largely consumed in Singapore, where they are nearly always on sale at cheap rates, the amount of flesh necessary for a tureenfull of soup costing only on an average ten cents. They are less often seen in Penang, but, generally speaking, are well known on the W. coast of the Peninsula. They are, as a rule, imported from the outlying islands.

Typhoons (Arabic Tufan) are fortunately unknown in Malaya, although their effects sometimes extend to the shores of the N.E. States. They have never been experienced in any district of the Peninsula inhabited by Europeans.

Ubi.—The generic name for tubers of all sorts, potatoes, yams, &c. Potatoes are often called *ubi benggala*, or *ubi holanda*, as large quantities are imported from Bengal or the Dutch East Indies. *U. bada*, the rhinoceros yam, *U. Bouton*, the Bouton yam, *Ubi Jawa*, the *batata*, or sweet potato, *U. upas*, the poison yam. There are several other varieties, but they are not often met with by foreigners.

Ujong.—A tip or point, of constant occurrence in the names of places—e.g., Sungei Ujong, Ujong Tanah, &c.

Ulu.—The interior or up-stream portion of a country; the handle of a weapon. This is a common geographical term, e.g., Ulu Jelentu in N.E. Kinta.

Umbrella (Payong).—The native word is probably derived from the Javanese payon, a roof or covering. Although regarded as a Malay word, the umbrella or parasol is a solution of European or Chinese manufacture, the latter being in constant use. Umbrellas as sunshades are in British Malaya commonly carried by Europeans and well-to-do Malays and Chinese. In other Malay countries they are, as with the Chinese, a symbol of official dignity, being carried by attendants over the heads of Rajahs and other Government officers. These latter are rather ornamental than useful as a protection against rain.

Ung Ka, or Wah-Wah.—See Monkey.

Upas-Tree (*Pokoh ipoh*).—The ipoh-tree is supposed to be identical with the upas of Java, exuding a white, milky juice which is a deadly blood poison, the aborigines using it as one of the ingredients to poison the heads of their sumpitan arrows. The upas-tree in Javanese is *anchar*, the word designating the juice only.

While the juice is undoubtedly a virulent poison, it is said to lose its effects if exposed to the air very speedily, and it is worthy of note that the aborigines invariably mix with it a ptomaine or animal-corpse poison, obtained by dipping the

point of the arrow in putrid flesh.

A shrub called chetek (strychnos tiento) is reputed in Java to possess the same properties. Death from the introduction of the juice of either plant into the cir-

culatory system generally ensues within an hour. (See IPOH.)

Upih.—A vegetable substance growing at the bottom of the leaf of the betel-nut-tree. It makes primitive but useful buckets, much used by natives dwelling on the banks of rivers.

Utan. - Forest or wood. (See JUNGLE.)

Varnish.—The Malays use sampang, the juice of a jungle tree, for this purpose. The word "varnish" is generally understood by native carpenters and joiners.

Vegetables (Sayor).—Most European vegetables have been grown with more or less success—artichokes, tomatoes, kohl rabi, vegetable marrows, celery, and some few others, flourishing well. Of native vegetables yams, brinjals, cucumbers, onions and garlic, kachang, or various kinds of bean, and bamboo shoots (much

esteemed), are plentiful. Watercress thrives without difficulty. Of out-of-theway plants the leaf-shoots of a fern resembling bracken, and the palm cabbage, one of which only is produced by each tree, may be mentioned.

Venereal Disease.—Introduced by Europeans, Chinese, and Japanese. Much modified by the excellent system of Government supervision introduced many years ago, but now again unchecked, owing to the outery raised against "a Government recognition of immorality" by the so-called "Purity Party" in England.

Most historians award to the Portuguese the unenviable distinction of having introduced this disease to the Malayan peoples. Chinese and Japanese immi-

grants have aided its spread within recent years.

Village (Pekan; lit., a place for buying and selling; and Kampong, which is, strictly speaking, an enclosure).—The native villages are in nearly all cases insignificant in size, while no word exists correctly designating a town or city.

insignificant in size, while no word exists correctly designating a town or city.

Besides the terms above given, dusun and duka are occasionally used. Each village has its headman, who is assisted by a writer and priest. Under British rule, the penghulu (lit., chief) or headman is the officer responsible to the Government for the good order of his district.

Volcano (Gunong api).—The Peninsula lies outside the volcanic belt, extending from Japan to the Philippines, no volcano existing within its limits. The great eruption of Krakatoa in 1883 was, however, heard in the Peninsula, although 580 miles distant, and the dust fell in Singapore.

Wah Wah.-See MONKEY.

Wait-a-bit.—A name conventionally applied to a species of the armed with powerful curved thorns which is found in the jungle.

Walking-stick (Tongkat).—This applies only, in native parlance, to a stick cut from the jungle, but has naturally been adopted to designate the polished and mounted sticks used by Europeans. Excellent specimens suitable for finishing in Western style can be easily obtained at a nominal price from native junglemen.

Wampi, a Chinese fruit, is imported from S. China and generally procurable

in the fruit markets at the proper season.

Wasp (krawei with nests on the ground, tabuan those building in trees).—Several species of wasp exist, but they seldom attack man unless provoked. The commonest sort and the most vicious are of small size, but all the tree species build enormous combs, which are plainly visible on the lofty trees at a considerable distance. It does not appear that naturalists have as yet classified this large family of tropical insects.

Water Caltrop, or Buffalo Horn Nut.—See BUAH TANDOK.

Water Melon (Mandelikei).—Melons of all sorts thrive well in the Peninsula, and an indigenous species is largely sold in the streets.

Wax (Lilin) is plentiful, but seldom collected by the Malays, as there is no demand for it in native circles, although for some centuries exported from the Islands of the Archipelago. The honey is poor in flavour compared with that produced in Europe, and is not found in the native markets. Bees are not kept as domesticated insects, the combs being invariably gathered in the jungle. The man who discovers one is held to have a right to its ownership.

Wayang (actor, player, or drama).—The name applied to theatricals, a corruption of baiang (lit. a shadow). As noted under Plays, the Malays seldom indulge in stage plays, and the word is generally understood to apply to Chinese theatricals.

Weathercock (Angin Angin or tanda angin).—The Malays are fond of fixing these in trees. They are fitted with windmill arms, which cause a humming

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noise as they whirl round, and are frequently put up to frighten away birds and monkeys from plantations or fruit orchards. A common term for them is balangbalang.

Weaving (tânun, to weave, jëntra or lurik, a loom).—The Peninsular Malays, being mostly junglemen or fishermen, are much behind their fellow-inhabitants of the Archipelago in the matter of weaving, nearly everything in the shape of woven material being imported. The art is, however, pursued in some districts, though British Malaya does not furnish woven goods except for local and very limited requirements.

Weights (batu timbaugan) and Measures.—The latter having no generic title. The weights in use are either Chinese or English, measures of capacity alone being of Malay origin. The Chinese table of weights sanctioned by law are:—

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1 Tahil = 1½ oz. avoirdupois.

16 Tahils ... 1 Kati = 1½ lbs. ,,

100 Katis ... 1 Pikul = 133½ lbs. ,,

40 Pikuls ... 1 Koyan = 5,333½ lbs. ,,
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All other weights except goldsmiths' (which follow the Indian tables) are the same as with us. The measures, dry and liquid, are as follow:—

MEASURES OF CAPACITY.

Dry Measure.

Gills	3.														
2	•••	T	Tau	or Q	uarte	r Chi	ıpak.								
4	•••	2		1	Pint	or E	Ialf (Chuj	oak.						
8	•••	4	•••	2	•••	1	Quar	t or	Chu	pak.					
32	•••	16	•••	8	•••	4	•••	1	Gall	on o	r Gar	itoi	ıg.		
64	•••	32		16					•••		Peck		•		
256	•••	12 8	٠	64	•••	32	•••	8	•••	4	•••	1	Bush	el.	
2,048	•••	1,024	•••	512	•••	256	•••	64	•••	32	•••	8	•••	1	Quarter.

Liquid Measure.

, GIII	s.														
2	•••	1	Pau			Chupa									
4	•••		•••			or Hal									
8	•••	4	•••	2	•••	1	Quai	rt or (\mathtt{Chup}	ak.					
32	•••	16	•••	8	•••	4	•••	1	Gall	on (or Ga	ınta	ing.		
2,016	•••	1,003	•••	504	•••	252	•••	63	•••	1	Hogs	she	ad.		
		2,006													
8,064	•••	4,032	•••	2,016	•••	1,008	•••	252	•••	4	•••	2	•••	1	Tun.

All other measures of capacity are British.

Whale (*Ikan paus*), naturally, but mistakenly, called a fish by the Malays. It is known only by repute to the natives of the Peninsula.

Wood Oil.—See Oils.

Woods (Kayu).—The following list, largely based upon the catalogues of exhibits sent by the late Mr. N. Cantley, curator of the Botanical Gardens, Singapore, and by Dr. Rowell, C.M.G., to the Colonial Exhibition, comprise, it is believed, all names known to foreigners. Readers will be struck with the fact that no less than fifteen varieties will not float in water. While a large number are unidentified, some fifty-eight are noted as of more or less use to the builder. Scarcely any country in the world can compete with Malaya in this respect.

 $_{\star}^{\star}$ In ordinary conversation the word Kayu (wood), is prefixed to each name.

Antui	(unidentified).	
Ara	vitex pubescens.	
Babi Kurus	eurycoma longifolia.	
Bachang	mangifera fætida.	
Bakau	rhisophora conjugata	Mangrove: the bark is used for tanning.
Balau	dipterocarpus sp	Used for beams, sleepers, &c.
Bangka	ploiarium oblongifolium.	• • • • • • • • • • • • • • • • • • • •
Bangkong	(unidentified).	
Banior itam	do.	
Båru	caryota rumphiana.	
Běrangan	castanea spectabilis.	
Bintangor	calophyllum inophyllum	A durable wood, used for masts, spars,
	care programme and programme and	beams, and other purposes.
,, bâtu	" lanigerum.	The state of the s
" bunga	,, cymosum.	
Champadak	artocarpus polyphema	The smaller species of jackfruit-tree.
", utan	,, captassia	The jungle species of the same. Both
,,	,,	trees produce a timber used in build-
		ing.
Chempau	(unidentified).	0*
Δ1.1	caryophyllus sylvestris,	
TOATI TOATI	memecylon subtrinervium.	
T) A A	(unidentified).	
T)Y-1	do.	
TA-dam Jane		Fruit edible. Wood used in house and
Durian daun	shorea sp	boat-building.
" utan	durio malaccus	
973 iu •		Used for plants, posts, &c.
— - • • •	(unidentified).	es de la companya de
Empûnek	do.	
Garroo	leguminosa sp. (agila)	This is the decayed wood of more than
		one variety of tree, that known as
		eagle-wood furnishing the principal supply. It burns with a strong per-
		supply. It burns with a strong per-
		fume, and is much used for scenting
		joss sticks, &c.
Gelam	melaleuca leucadendron.	
Gĕlam tikus	melaleuca minor.	
Gĕran	shorea sp	Used for building purposes. It is a very
		heavy wood, sinking in water like iron-
_		wood, which Europeans often call it.
Gëronggng		Used for posts, &c., and in building.
Hårang	diospyros ebenum	Used for furniture somewhat mottled
		in colour.
	,, discolor	Do.
Hûba	(unidentified).	
Jambu ayer	eugenia sp	Used in building, but not durable if
		exposed to sun and weather.
_ ,, utan	jambosa linearis	A jungle variety of the preceding.
Jangkang	(unidentified).	· · · · · · · · · · · · · · · · · · ·
Jelutong	dyera costulata	The tree yields a resin, and the wood is
-	=	used by clogmakers and undertakers.
		It is not regarded as durable.
Jentek Jentek	(unidentified).	•
Kahwa	rubiaceæ sp.'	
Kamup	(unidentified).	
Kandis	litsæa sp	A very heavy wood, sinking in water.
•••	• • • • • • • • • • • • • • • • • • • •	It is used for posts, but is not very
		durable.
Kâta ûtan	(unidentified).	
Kĕdondong ûtan	do.	
Kělat	eugenia zeylanica	A heavy wood, used for building; like
		Kandis, it sinks in water.
Kelatak tangga	(unidentified).	
Kembang semankok	trenesia sp	Wood used for planking; the tree pro-
		duces an edible fruit.
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Kĕmĕnyan	•••	•••	styrax benzira .	••	••	Only occasionally used. The tree yields the gum benzoin of commerce.
Kĕmpas	•••	•••	kæmpassia malacc	ensis	•••	A forest tree of fine appearance, but of little use, even its charcoal being regarded as inferior.
Këralei		•••	terminalia sp	••	••	Used in house-building; hard, strong, and durable.
Kerantei	•••		artocarpus sp			Used for tool-handles.
Kĕtâpang	•••	•••	callicarpa longifoli	ia.		
Kledang	•••	•••	diospyros melanoxy			
Kranji	•••	•••	leguminosæ sp	••	•••	Heavy wood, sinks in water; used for
•			•			rudders and masts, and in building.
" buror	1g		dipterocarpeæ.			•
,, papa	•	•••	do.			
Kûlim		•••	(unidentified).			
Kundangan		•••	do.			•
Kurkapullei		•••	inga dulcis.			
Kusak	•••	•••	dipterocarpus sp			A tough wood, used for paddles and
	•••	•••	· ·		•••	oars. The Chinese use it to make the carrying poles which do duty for
V-mon a			dintanagamen semb			our "yokes."
Kweng Landas	•••	•••	dipterocarpus eurh	yncriu	w.	
	•••	•••	(unidentified).			
Leban	•••	•••	vitex negundo.			
Lělei	•••	•••	barringtonia speci	054.		
Lempoyan	•••	•••	(unidentified).	•-		
Lĕngkuas	•••	•••	alpinia malaccens	15.		
Lundek	•••	•••	cissus thyrsiflora.	•_		Cluber in makeus mand in heildi
Malim patal	a		myristica laurifoli		•••	Sinks in water; used in building.
Mampat		~·`	crotoxylon polyant	na	•••	Do.
Mangalang	•••	•••	jambosa tetrædra.			Mha wall known manga tuas masi
Mangga	•••	•••	mangifera indica	•••	•••	The well-known mango-tree wood; not regarded as of much use.
Manggis uta	n	•••	embryopteris glutin	nifer	•••	The jungle mangosteen; wood not often used.
Mangol	•••	•••	(unidentified).			
Mata keli	•••	•••	do.			77-3 1-1-1-131 1-4
Mědang bělá		•••		•••	•••	Used in building, but not durable.
,, bua		•••	(unidentified).			
,, klad		•••	tetranthera subova			
" kur		•••	paratropia littoral	18.		TT3 for alombo mode to
	ang	•••	tetranthera sp.	•••	•••	Used for planks, posts, &c.
	a.was	•••	polyadenia lucida			** * * * * * * * * * * * * * * * * * * *
" sere		•••	tetranthera bancar	ra	•••	Used in building; a very durable wood.
	dok	•••	(unidentified).			773 to 1-2131 311.
	r	•••	tetranthera sp.	•••	•••	Used in building; very durable.
Melantei	•••	•••		•••	•••	Used chiefly for planking; very durable.
Mĕndârahar	ı	•••	(unidentified).			
Mengas	•••	•••	do.			
Mĕngkudu	•••		do.	•••	•••	Used chiefly for posts, &c.
Mentangor 1	bĕnut	•••	calophyllum sp.	•••	•••	Used for house and boat-building; the tree produces an edible fruit.
Mĕrâpat	•••	•••	(unidentified).			
Mĕrawan	•••	••• '	bopea sp	. 	•••	Used in building; but the chief value of the tree is that it produces "damar
						mata kuching," the most valuable of the damar gums.
Mĕrbâtu	•••	•••	(unidentified).			-
Měribau Merjagong	•••	•••	afzelia palembania (unidentified).	ca	•••	A hard wood, which tries tools considerably; bookcases and other articles of furniture designed to last a long time are made of it. The price is expensive.
Měranti	•••	•••	bopea meranti			A fine tree which violds planks three
was comfi	•••	•••	wpour meat units			A fine tree, which yields planks three feet in width. It is much used in boat and house building.
				1 4637		

Nangka					
	•••	•••	artocarpus integrifolia	•••	The large jackfruit-tree, the chempedak producing a smaller variety. The wood is occasionally used in building.
Nibong	•••	•••	areca nibong		A jungle palm, the wood of which is much used for spears, fences, battens for holding down attap roofs, &c.
Nipis kulit	•••	•••	fagræa sp	<i>:</i> ••	The tree yields a resin. The wood sinks in water, and is used for posts and in building.
Nyatoh Natah	•••	•••	dichopsis sp	•••	Used chiefly for planks; very durable.
Nyirih	•••	•••	xylocarpus granatum.		Trand for mlambing
Pagar anak		•••	(unidentified)	•••	Used for planking.
Pantat ulat	•••	•••	eugenia sp	•••	Not in use for building, but yields good charcoal.
Påsak lingg	a	•••	(unidentified).		
Pauh Pauh			` do.	•••	Used chiefly for posts.
Pĕlāwan		•••	tristania obvata.		• •
Pĕnâga			calophyllum inophyllum	n.	
Pendarah bi		•••	dipterocarpus	•••	Used for posts; sinks in water, but is not considered durable.
Përah Përapu	•••	•••	(unidentified). do.		
Percha	•••	•••	21.1		One of the gutta-percha-yielding trees.
	•••	•••		•••	The wood is not deemed of value.
Petaling	•••	•••	strombosia javanica	•••	A close-grained wood used in building.
Pisang-pisa	ng	•••	(unidentified).		
Pâlei	•••	•••	alstonia scholaris, var.	:: *	The tree yields a resin; the wood is used for planking, but is not very durable.
Putih	•••	•••	melaleuca cajeputi	•••	The tree yields the well-known Kayuputih or but no use is made of the wood.
Rambutan (âtan	•••	nophelium lappacoum	•••	The wild rambutan, which bears an edible fruit. The wood is very durable, sinks in water, and is used for building purposes.
" 1	pachat	•••	nephelium sp.		
Rejang	•••	•••	shorea sp	•••	A very brittle wood of trifling value.
Rĕsak		•••	quercus neurophylla.		
Rĕngas	•••	•••	gluta velatina	•••	Used principally for furniture, as it takes a good polish.
Rumënia	•••	•••		l mecro	A very durable wood used for the
Ru	•••		phylla casuarina sumatrana	•••	gunnovig of hought gings in water
T-142				•••	supports of houses; sinks in water. Very brittle, and rejected even by char-
					Very brittle, and rejected even by char- coal-burners.
Sabilik			dipterocarpus		Very brittle, and rejected even by char-
	•••	•••	dipterocarpus adenanthera pavonina.		Very brittle, and rejected even by char- coal-burners. Hard and durable; used in building.
Sabilik Saga ûtan Sakĕpal	•••	•••	dipterocarpus adenanthera pavonina. bopea parviflora	•••	Very brittle, and rejected even by char- coal-burners.
Sabilik Saga ûtan Sakepal Samaram	•••		dipterocarpus adenanthera pavonina.	•••	Very brittle, and rejected even by char- coal-burners. Hard and durable; used in building.
Sabilik Såga ûtan Sakëpal Samaram Såma pûlut	•••	•••	dipterocarpus adenanthera pavonina. bopea parviflora (unidentified). do.		Very brittle, and rejected even by char- coal-burners. Hard and durable; used in building. Used in building; sinks in water.
Sabilik Såga ûtan Sakëpal Samåram Såma pûlut Sapah pëtei		•••	dipterocarpus adenanthera pavonina. bopea parviflora (unidentified). do. litsæa sp		Very brittle, and rejected even by char- coal-burners. Hard and durable; used in building. Used in building; sinks in water. Used in building; sinks in water.
Sabilik Såga ûtan Sakëpal Samaram Såma pûlut		•••	dipterocarpus adenanthera pavonina. bopea parviflora (unidentified). do. litsæa sp diospyros sp		Very brittle, and rejected even by char- coal-burners. Hard and durable; used in building. Used in building; sinks in water.
Sabilik Saga ûtan Sakepal Samaram Sama pûlut Sapah petei Sejangkang Semak			dipterocarpus adenanthera pavonina. bopea parviflora (unidentified). do. litsæa sp diospyros sp sysygium variifolium.		Very brittle, and rejected even by char- coal-burners. Hard and durable; used in building. Used in building; sinks in water. Used in building; sinks in water.
Sabilik Såga ûtan Saköpal Samåram Såma pûlut Sapah pötei Sejangkang Sämak Semongkong			dipterocarpus adenanthera pavonina. bopea parviflora (unidentified). do. litsæa sp diospyros sp sysygium variifolium. (unidentified).		Very brittle, and rejected even by char- coal-burners. Hard and durable; used in building. Used in building; sinks in water. Used in building; sinks in water. Used in building.
Sabilik Saga ûtan Sakepal Samaram Sama pûlut Sapah petei Sejangkang Semak	 		dipterocarpus adenanthera pavonina. bopea parviflora (unidentified). do. litsæa sp diospyros sp sysygium variifolium. (unidentified). macaranga sp		Very brittle, and rejected even by char- coal-burners. Hard and durable; used in building. Used in building; sinks in water. Used in building; sinks in water.
Sabilik Såga ütan Sakëpal Samåram Såma pülut Sapah pëtei Sejangkang Sëmak Sëmongkong Semdok-send Sëntada	ok		dipterocarpus adenanthera pavonina. bopea parviflora (unidentified). do. litsæa sp diospyros sp sysygium variifolium. (unidentified). macaranga sp. (unidentified).		Very brittle, and rejected even by char- coal-burners. Hard and durable; used in building. Used in building; sinks in water. Used in building; sinks in water. Used in building.
Sabilik Såga ûtan Saköpal Samäram Såma pûlut Sapah pëtei Sejangkang Sëmak Sëmongkong Sendok-send Sëntada Sëntada	ok		dipterocarpus adenanthera pavonina. bopea parviflora (unidentified). do. litsæa sp diospyros sp sysygium variifolium. (unidentified). macaranga sp (unidentified). sandoricum indicum.		Very brittle, and rejected even by char- coal-burners. Hard and durable; used in building. Used in building; sinks in water. Used in building; sinks in water. Used in building. Used for planks, posts, &c.
Sabilik Såga ûtan Såköpal Samåram Såma pûlut Sapah pötei Sejangkang Semak Semongkong Sendok-send Sentada Sentul Sepan	 ok		dipterocarpus adenanthera pavonina. bopea parviflora (unidentified). do. litsæa sp diospyros sp sysygium variifolium. (unidentified). macaranga sp (unidentified) sandoricum indicum. bopea sp		Very brittle, and rejected even by char- coal-burners. Hard and durable; used in building. Used in building; sinks in water. Used in building; sinks in water. Used in building.
Sabilik Såga ûtan Saköpal Samäram Såma pûlut Sapah pëtei Sejangkang Sëmak Sëmongkong Sendok-send Sëntada Sëntada	 		dipterocarpus adenanthera pavonina. bopea parviflora (unidentified). do. litsæa sp diospyros sp sysygium variifolium. (unidentified). macaranga sp (unidentified). sandoricum indicum. bopea sp vatica grandiflora.		Very brittle, and rejected even by char- coal-burners. Hard and durable; used in building. Used in building; sinks in water. Used in building; sinks in water. Used in building. Used for planks, posts, &c.
Sabilik Såga útan Saköpal Samåram Såma púlut Sapah pötei Sejangkang Sömak Sömongkong Sendok-send Söntada Söntul Söpan Söpan Söpan Sial mönähu	ok		dipterocarpus adenanthera pavonina. bopea parviflora (unidentified). do. litsæa sp diospyros sp sysygium variifolium. (unidentified). macaranga sp (unidentified). sandoricum indicum. bopea sp vatica grandiflora. (unidentified).		Very brittle, and rejected even by char- coal-burners. Hard and durable; used in building. Used in building; sinks in water. Used in building; sinks in water. Used for planks, posts, &c. Used in building; sinks in water.
Sabilik Såga ûtan Saköpal Samäram Såma pûlut Sapah pětei Sejangkang Semak Semongkong Sendok-send Sentul Sepan Sepan Seråya Sial měnáhu Supute	ok		dipterocarpus adenanthera pavonina. bopea parviflora (unidentified). do. litsæa sp diospyros sp sysygium variifolium. (unidentified). macaranga sp (unidentified). sandoricum indicum. bopea sp vatica grandiflora. (unidentified). sindora siamensis		Very brittle, and rejected even by char- coal-burners. Hard and durable; used in building. Used in building; sinks in water. Used in building; sinks in water. Used in building. Used for planks, posts, &c.
Sabilik Såga ûtan Saköpal Samåram Såma pûlut Sapah pötei Sejangkang Semak Semongkong Sendok-send Sentada Sentul Sepan Sepan Seråya Sial měnáhu Supute Taho	 ok 		dipterocarpus adenanthera pavonina. bopea parviflora (unidentified). do. litsæa sp diospyros sp sysygium variifolium. (unidentified). macaranga sp (unidentified). sandoricum indicum. bopea sp vatica grandiflora. (unidentified). sindora siamensis (unidentified).		Very brittle, and rejected even by char- coal-burners. Hard and durable; used in building. Used in building; sinks in water. Used in building; sinks in water. Used for planks, posts, &c. Used in building; sinks in water. Used chiefly for planks.
Sabilik Såga ûtan Saköpal Samäram Såma pûlut Sapah pětei Sejangkang Semak Semongkong Sendok-send Sentul Sepan Sepan Seråya Sial měnáhu Supute	ok		dipterocarpus adenanthera pavonina. bopea parviflora (unidentified). do. litsæa sp diospyros sp sysygium variifolium. (unidentified). macaranga sp (unidentified). sandoricum indicum. bopea sp vatica grandiflora. (unidentified). sindora siamensis		Very brittle, and rejected even by char- coal-burners. Hard and durable; used in building. Used in building; sinks in water. Used in building; sinks in water. Used for planks, posts, &c. Used in building; sinks in water.

Tampui		tetranthera sp	•••	Sinks in water; used in building.
" batang	•••	do.		
,, bunga	•••	pierardia.		
Tembusu	•••	fagræa peregrina	•••	A very durable wood, which sinks in water; used in building.
Tempinik		artocarpus sp		Sinks in water; used in building.
Tempûnek	•••	hedycarpus malayanus.		
Tempûrong	•••	(unidentified).		
Temu		vernonia javánica.		
Tëngar	•••	paratropia rigida.		
Teraling jantan		vitex sp		Very durable; used mostly for planking.
Teranti		melodinus lævigatus.		
Tërëntang		fagræa sp		Used for posts, &c.
Terutam		Ægiceras majus.		•
Tiup-Tiup	•••	(unidentified).		
Tunjuk belaka	•••	do.		

Writing (Tulis).—A writing, surat (Ar.) The Malays, like the Arabs, use a sharpened reed to produce the written character, though most educated natives are able to use the European pen.

Xenopeltis.—The name of a species of harmless snake found throughout the Peninsula. It is of brown colour.

Yam (Ubi).—A dioscorea common throughout Malaya and the South Sea Islands, as also tropical Africa and America, taking the place occupied by the potato in temperate regions. The tuber varies in length from 3 to 10 inches or more.

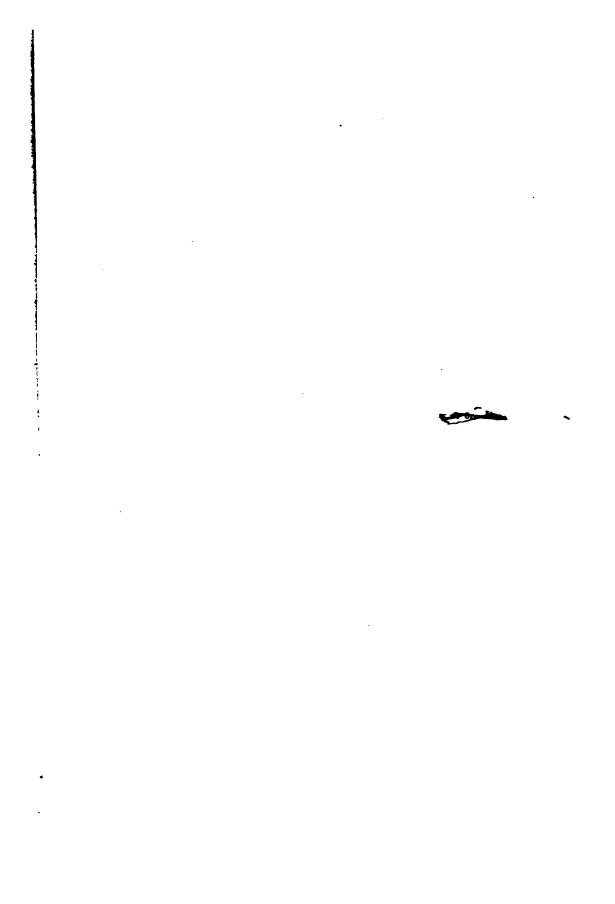
Yeast 'mown to and used by the Malays, but its usual substitute is tuak or cocoa-nut palm toddy, which serves the same purpose.

Zebra.—Although known to the Malays by description only, the animal is named kuda blang. The term is generally applied to piebald horses.

Zinc (Timah sari) is imported, and is used exclusively by Europeans, or as fittings to houses built more or less in European style.

Zodiac, signs of the (bintang duablas).—The little astronomical knowledge possessed by the Malays comes from Arabic or Hindoo sources.

Zoology.—The zoology of the Malay Peninsula is fairly well known, the list of mammals being, it is believed, complete. In Ornithology, the lists published by the late W. Davison in "Stray Feathers," by Lieutenant Kelham in the *Ibis* and Journal S. B. R. A. S., and by other workers in the same field, leave but little remaining to be done. Mr. A. B. Wallace discovered and catalogued an enormous number of insects, but the lists are not supposed to be exhaustive. Dr. T. J. Rowell has devoted much attention to ichthyology, while the Raffles Museum contains a nearly complete collection of local Ophidia. The Peninsula has been reasonably described as "a zoologist's paradise."



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