

observations in the despatch of Mr. Gregory, and portions of a letter he had received from Mr. Wilson, the gentleman selected as geologist of the expedition, which would at a future meeting, be brought before the Society. The success which had already attended the expedition was highly gratifying to him, for he was one of its earliest advocates when the Duke of Newcastle was in office; and it was that statesman who first gave attention to the representations of the Geographical Society on the subject. What had fallen from Captain Stokes explained very clearly that object of the expedition which was considered of the greatest importance, *i. e.* not merely to discover the extent of the great interior saline desert, or whether there might or might not be a practicable route from Northern to Southern Australia; but to determine first the true water-parting, and having ascertained the source of the Victoria, then without further delay to travel along that high-land, and proceed at once to the Gulf of Carpentaria before the resources of the expedition were exhausted. He should, therefore, exceedingly regret, in conjunction with Captain Stokes, if through the exhaustion of their resources the leading objects of the expedition were not attained, by opening out that great line of intercourse which he hoped to see established between Sydney on the south and the Gulf of Carpentaria on the north. He hoped, however, that Mr. Gregory would have ample provision to enable him to effect that object. They must, at all events, give that gentleman all credit for having overcome great difficulties, and for having already solved a curious geographical problem. If he should demonstrate the practicability of the other suggestion, he will have achieved a most important result.

2. *Notes of a Journey up the Sadong River, in North-West Borneo.*

By A. R. WALLACE, F.R.G.S.*

THE Sadong is the first considerable river east of Saráwak, from which it is distant about 25 miles, and forms a portion of the territory lately ceded in perpetuity by the Sultan of Borneo to Sir James Brooke.

About 20 miles up this river, a small stream, the Simunjon, enters from the east, a few miles up which, on an isolated mountain, coal of good quality has been discovered, and is now being worked. At this place I spent the whole of the dry season of 1855, engaged in making collections of birds and insects, and more particularly in hunting the great orang-utan or "mias," which is there particularly abundant. I succeeded in shooting 13 of these extraordinary animals, and in accumulating a mass of information about them, which will, I trust, tend to clear up many obscure and doubtful points in their natural history. I had intended to devote the latter part of the dry season to a somewhat extended journey into the interior, but an unfortunate wound in my foot rendered me incapable of leaving the house for three months of the very finest weather, and it was not till the rains had begun that I was enabled to walk. As the time which I had fixed for leaving Borneo, was

* See Proceedings, R. G. S., No. IV. p. 97.—ED.

now drawing near, I determined to return to Saráwak, by crossing the country between the head waters of the Sadong and Saráwak rivers; and as I am not aware of any account of this district or of its inhabitants having been published, or indeed of the whole of it having been previously visited by any European, I beg leave to submit my notes to the Royal Geographical Society.

The whole of the lower part of the Sadong valley is a forest plain, with scarcely a single spot of dry ground, except where a few isolated hills rise abruptly from it. It is a vast morass of a black vegetable mud, resting on a yellow clay. The surface is as nearly as possible on a level with the sea at high water. In such a country it may be supposed that the lower part of the river is monotonous enough. The banks are cultivated as paddy fields by the Dyaks and Malays; and their little thatch huts alone break the unpicturesque line of muddy banks, crowned with tall grasses and sedges, and backed by the tops of the forest trees behind the cultivated ground. It took me a day and a half from the mines to reach the Malay village of Gudong, where I stayed an hour to make some purchases of fruit and provisions, and called upon the Datu Bandar, or Malay governor of the place. His house was very spacious, but very dirty both outside and in. He was particular in his inquiries about the coal, the use of which the natives cannot realize. They are besides quite puzzled at the extensive and costly preparations made for working it. At the village of Jahi I found the stream so swift on account of a slight flood, that my heavy boat could make no way against it, and I was obliged to remain a day to obtain a smaller one, and fresh men to take me up to the first village of Hill Dyaks.

I succeeded here in meeting with a Malay boy, named Bujon, who wanted to return to Saráwak, and agreed to accompany me, and who, as he knew the language of the Sadong Dyaks, having traded among them, was a very important acquisition. Leaving Jahi in a very small open boat, we proceeded more pleasantly, and in a few hours got beyond the cultivated country to where the virgin forests come down to the water's edge. At night we had some difficulty in finding dry ground to sleep on, the river's banks being generally flooded. Early in the morning we reached Empugnan, a small Malay village, situate at the foot of a mountain of the same name, which had been visible from the mouth of the Simunjon river, and is apparently isolated. In the dry season the tide reaches this place. From here the vegetation becomes much finer. Large trees stretch out their arms across the stream, and the high earthy banks are clothed with ferns and scitamineous plants.

Early in the afternoon we arrived at Tabokan, the first village of the Senankan Dyaks. On an open space near the river about twenty boys were playing at a game, something like what we call 'prisoner's base;' their ornaments of beads and brass wire, and their gay coloured kerchiefs and waist-cloths, showing to much advantage and forming a very pleasing sight. Being called by Bujon, they immediately left their game to carry my things up to the round head-house, which is attached to most Dyak houses, and serves as the lodging for strangers, the place for trade, the sleeping-room for the unmarried youths, and the general council-chamber. It is generally elevated on very lofty posts, has a large fireplace in the middle, and windows in the roof all round, and forms a very pleasant and comfortable abode. In the evening, after dusk, the house was crowded with young men and boys who came to look at me. They were mostly fine young fellows, and I could not help admiring the simplicity and elegance of their costume. Their only dress is the long "chawat" or waist-cloth, the ends of which hang down before and behind. It is generally of blue cotton, ending in broad bands of red, blue, and white. Those who can afford it, wear a handkerchief on the head, which is either red with a narrow border of gold lace, or red, blue, and white like the "chawat." The large, flat, moon-shaped brass earrings, the masses of white or black beads round the neck, brass rings on the arms and legs, and armlets formed of sections of a great, white conical shell, all serve to relieve and set off the pure reddish brown skin and jet black hair. Add to this the little pouch containing materials for betel-chewing, and a long slender knife, both invariably worn at the side, and you have the everyday dress of the young Dyak gentleman.

The "orang-kaya," or rich man, as the chief of the tribe is called, now came in with several of the older men; and the "*bitchára*," or council, commenced about getting me men to go on the next morning. As I could not understand a word of their language, which is very different from the Malay, I took no part in the proceedings, but was represented by my boy Bujon. A Chinese trader was in the house, and he too wanted men the next day; but, on his hinting the same to the orang-kaya, he was sternly told that a white man's business was now being discussed, and he must wait another day before his could be thought about.

The next morning we started in a boat, about 30 feet long and 2 feet 4 inches wide. At this point, the stream abruptly changes its character. Hitherto it had been deep and smooth, though swiftly flowing, and confined by steep banks covered with vegetation. Now it rushed and rippled over a pebbly, sandy, or rocky bed, here and

there forming miniature cascades and rapids, and throwing up on one side or the other, extensive banks of finely-coloured pebbles. No paddling could make way against it, but the Dyaks with bamboo poles, propelled us along with great dexterity and swiftness, never losing their balance, though standing up and exerting much force in such a narrow and unsteady vessel. It was a brilliant day, and the cheerful exertions of the men, the rushing of the sparkling waters, with the bright and varied foliage, which, from either bank, stretched over our heads, produced an exhilarating sensation, which I had not felt since leaving the grander waters of South America.

Early in the afternoon we reached the village of Borotoi; and, though it would have been easy to reach the next one before the evening, I was obliged to stay, as my men wanted to return, and others could not possibly go on with me without the preliminary talking. Besides, a white man was too great a rarity to be allowed to escape, and their wives would never have forgiven them, if, when they returned from the fields, they found that such a curiosity had not been kept for their examination.

Walking out to a small hill near, cultivated as paddy fields, I had a fine view of the country, which was becoming quite hilly, and toward the south, mountainous. I took bearings and sketches of all that were visible, which much astonished the Dyaks, who accompanied me, and produced much conversation when we returned, with a request to exhibit the compass.

The next morning we proceeded as before; but the river had become so shallow and rapid, and the boats were all so small, that though I had nothing with me but a change of clothes and a gun, with the scantiest possible *batterie de cuisine*, two were required with five men to take me on. The rock, which appeared occasionally on the river's banks, was an indurated clay-slate, sometimes highly crystalline, and thrown up nearly vertical. To the right and left of us were isolated mountains, which I knew to be limestone by their peculiar outlines, and by the whiteness of the numerous precipices they presented, no doubt an extension to the eastward of the limestone of the Saráwak river. The river bed was a mass of pebbles, mostly pure white quartz, with, however, abundance of jasper and veined quartz, which often presented a beautiful appearance. It was only 10 in the morning when we arrived at Budw; and though there were plenty of people about, I could not induce them to allow me to go on to the next village, only three hours farther.

I walked out to the paddy fields, which are here very extensive, covering a number of the little hills and valleys into which the whole country seems broken up, and obtained a beautiful view of

hills and mountains in every direction. In the evening the "orang-kaya" came in full dress (a spangled velvet jacket, but no trousers), and invited me over to his house, where he gave me a seat of honour, under a canopy of white calico and coloured handkerchiefs. The great verandah was crowded with people, and large plates of rice, with cooked and fresh eggs, were placed on the ground as presents for me.

The costume of the Dyaks on ordinary occasions, though scanty, is highly becoming, but when they attempt to make themselves extremely fine on state occasions, they only succeed in becoming ridiculous. *In civilized countries it is the same.*

The river was now so shallow, that boats could ascend only with much trouble: I therefore preferred walking to the next village, first presenting the orang-kaya with some tobacco and a pickle-bottle, which latter he greatly esteemed. I had expected to see the country in this walk, but the path lay almost entirely through thickets of bamboo, which here springs up wherever the forest has been cleared away. The Dyaks get two crops off the ground in succession—one of paddy and one of sugar-cane, maize, and vegetables. The ground then remains eight or ten years before it is again cultivated—and soon becomes covered with bamboos, or grasses and shrubs, which often arch over the path and shut out everything from the view. At half-past nine we reached the village of Senankan, where I was again obliged to remain the whole day, which I at length agreed to do on the promise of the orang-kaya that his men should take me through two other villages across to Senna, on the Upper Saráwak River. I therefore amused myself as I best could, by walking about to the high grounds near, to get views of the country round till the evening, when another public audience, with gifts of rice and eggs, and drinking of rice-beer, took place. These Dyaks cultivate much ground, and supply a good deal of rice to Saráwak. They are rich in gongs, brass trays, wire, silver coins, and all such articles in which a Dyak's wealth consists, and their women and children were all highly ornamented. Here, as among most uncivilized people, there seems no gradual transition in the women between youth and age. From the pleasing and often elegantly formed girl of twelve or fourteen, a very few years of married life and hard labour, transforms them into coarse middle-aged women.

In the morning, after waiting some time, and the men that were to accompany me not making their appearance, I sent for the orang-kaya, and found that both he and another head man had gone out for the day, and on inquiring the reason of this extraordinary proceeding, was informed that they could not persuade any of their

men to go with me, as I afterwards found, because the journey was long and fatiguing. As I was determined to get on that day, I told the few men that remained, that the chiefs had behaved very badly, and I should acquaint the Rajah with their conduct, and that I insisted on proceeding at once. Every man present made some excuse, but after much trouble and two hours' delay, we succeeded in getting off. For the first few miles, our path lay over a country of a very singular character, cleared for paddy fields. It consisted of abrupt hills and valleys, very steep, but of very slight elevation, all terminating in sharp ridges and hillocks, with not a patch of level ground. It was a mountain region in miniature. After crossing the Kayan River, a fine stream, which is in fact a larger branch of the Sadong than the one I ascended, we were on the lower slopes of the Sebóran Mountain, and the path lay along a sharp ridge which led up to the mountain, and afforded an excellent view of the country round. The features were exactly those of the Himalaya in miniature, as described by Dr. Hooker, and might be considered as a natural model of some part of those vast mountains, on a scale of about one-tenth, thousands of feet being here represented by hundreds. I now found the source of the beautiful pebbles which had so pleased me all up the river. The slaty rocks had ceased, and all these mountains appeared to be a conglomerate sandstone, in some places a mere mass of pebbles cemented together. I ought to have known before that such a small stream could not produce such vast quantities of well-rounded fragments of quartz and agate. They had been produced in past ages by the action of some large continental stream, before the great island of Borneo had risen from the ocean.

About mid-day we reached the village of Menyerry, beautifully situated on a spur of the mountain, about 600 feet above the valley, and affording a delightful view of the mountain region of this part of Borneo. I here first got a view of the Penrhissen Mountain, at the head of the Saráwak River, and one of the highest, if not the highest in this district, rising probably to near 6000 feet above the sea-level. The Rowen Mountain to the south, seemed nearly equally lofty. It is situated near Sikyam, on a tributary of the Pontianak River; and in the same direction, but much more distant, appeared the lofty mountain Nutowan.

Descending from Menyerry we again crossed the Kayan, which bends round the foot of the spur; and ascended to the pass which separates the valleys of the Sadong and Saráwak Rivers, and forms the boundary of the Saráwak district. The height of this point must be about 2000 feet. The descent from here was very fine. A

deep rocky stream rushed on each side of us, down to one of which we gradually descended over numerous bamboo bridges, over the gulleys, or along the faces of precipices. Some of these were several hundred feet long, and fifty or sixty feet high, a single smooth bamboo 3 inches in diameter forming the only pathway, and a very shaky handrail of the same material, rendering the passage almost as perilous as that of the aërial bridge by which the followers of the Prophet are said to enter paradise.

Late in the afternoon we reached Sodos, situated on a space between two streams, but so surrounded by fruit-trees that little could be seen of the country. We stayed here for the night, and found the house very spacious, clean, and comfortable, and the people very civil and obliging.

In the morning early, we continued our descent to Senna, along a fine valley, with mountains rising 2000 or 3000 feet on every side. The stream rapidly increased in size till, when we reached Senna, it had become as large as the Sadong, above Tabokan, with the same abundance of sand and pebbles. Here too, the upheaved slaty rock again appeared, with the same dip and direction as in the Sadong. At Senna, I remained for the day, as the river was now navigable for boats to Saráwak. An unexpected difficulty however presented itself. The Senna Dyaks had no boats, they did not know how to make them, and never used them. It seemed strange to see people living by the side of such a fine stream without making use of it; but I found that they were true mountaineers, who had only come down the valley about twenty years ago, and had not yet got into new habits.

The people of Menyerry and Sodos are all of the same tribe. They make excellent paths and bridges, and cultivate a great extent of mountain land. Their district has therefore a more pleasing and civilized appearance, than in those places where the people move about only in boats, and confine their cultivation to the banks of the streams.

With some difficulty, I hired a boat from a Malay trader, to take me down to the next village, and found three Dyaks who had been several times with Malays to Saráwak, and thought they could manage a boat very well. They were, however, very awkward, constantly running aground, knocking up against rocks, losing their balance, and almost upsetting themselves and the boat, offering a striking contrast to the consummate skill in boatwork of most other Dyaks. At length we came to a really dangerous rapid where boats were often lost, and the men, conscious of their incapacity, were afraid to go on. Some Malays, with a boat-load of rice, here over-

took us, and, after passing down with great skill, kindly sent back one of their men to assist me. This he did very well, for my Dyaks, in the critical part of the passage, lost their balance, and had they been alone, would certainly have upset the boat. The river was exceedingly picturesque, the ground on each side being cleared at intervals for paddy-fields, affording a view of the country. Numerous little farm-houses were built high up in trees overhanging the river. They were reached from the bank by a bamboo bridge, and had a most curious appearance. At intervals, too, were hanging bridges crossing the stream, and suspended from trees on either side. One of them is well figured in Mr. Low's work on 'Saráwak.'

Reaching the village of the Sebungo Dyaks, I remained there that day, and the next proceeded to Saráwak, passing through a most beautiful country, where limestone mountains, with their fantastic forms, white precipices, and rich vegetation, shoot up on every side. In one of them is a cave which I visited, and which, except that it passes completely through the spur of a lofty mountain, offers nothing remarkable. The banks of the Saráwak river are everywhere covered with fruit-trees, the most numerous being the durian, a magnificent forest-tree, bearing a terrifically spiny fruit, the size of a melon, and which deserves to be ranked as the king of fruits. No tropical fruit, I have yet seen, can bear any comparison with it. They were ripe, and we enjoyed them to perfection.

I shall now proceed to a few general observations on the geography and geology of the country I passed through, and on the characteristics of its inhabitants.

Geography, &c.—Taking the latest map of Borneo as professing to represent the geography of the country, according to the best authorities, I will point out a few alterations which seem to me to be required. First then, the territory of Saráwak must be considerably extended; the boundary line passing rather south-east from Penrhissen Mountain, which exactly agrees in position with Mount Sebahu of the maps, and which will increase its area at least one-third. The mountain group at the head of the Saráwak and Sadong Rivers, is completely separated from the Cape Datu Mountain, which terminates in the Poey Mountain in lat. $1^{\circ} 35' N.$ South of this an extensive plain occurs, over which a fine view as far as the coast of Sambas, is obtained from the Serambo Mountain, near Saráwak. In the position occupied by Mount Raja on the map, *no hills exist.* Farther east, all the hills must be placed more to the south, and it seems probable from all the information I can obtain, that they soon cease altogether; a gently inclined divide, only, existing between the tributaries of the Batanglupar and those of the Kapuas

or Pontianak River. The Linga River, the first branch of the Batanglupar from the south, flows through a flat and swampy country almost from its source, near the Klingkang Mountain; and the passage from the higher part of the Batanglupar to the great lakes of the Upper Kapuas, is described as being over a scarcely elevated, certainly not a mountainous country. I am inclined, therefore, to believe that the little mountain district, from which flow the Saráwak and Sadong Rivers on the north, and the Sikyam and Landak on the south side, forms the central nucleus of the north-western end of Borneo. These rivers, in their upper part, are true mountain streams, flowing swiftly over gravelly beds, or rushing over rocky ledges, and forming so many little rapids and falls, that we cannot put their descent at less than 25 to 30 feet a-mile, probably much more. Now, on the Sadong, more than 30 miles of the river has this character, while 20 more is a deep and swift-flowing stream. This would give an elevation of a thousand feet for the base of this mountain region, showing that it differs essentially in character from those mountains nearer the coast, which, though of equal elevation, rise abruptly from a flat and marshy country which is scarcely elevated above the level of the high tides.

Geology.—The geology of the country is exceedingly difficult to elucidate, owing to its great complication, to the difficulty of obtaining sections, and the excessive rarity of organic remains. In no case have I been able to ascertain, by direct observation, the order of superposition of any of the formations. The most extensive formation in the country is a ferruginous sandstone conglomerate. This composes most of the mountains near the coast, and also the whole of the central mountain region. Between these and often in contact with them, occur limestone and porphyritic or trappean rocks, and a hard slaty rock, which is sometimes highly crystalline. The sandstone rocks are generally inclined at an angle of from 7 to 20 degrees with the horizon, while the slaty rocks are always nearly vertical. No distinct stratification is observable in the limestone, which forms abrupt and fantastically formed isolated mountains, often presenting mural precipices of much grandeur, and it is in these that the *hirundo esculenta* forms the gelatinous nests, which are so great an article of luxury with the Chinese. On my sketch-map* the dip and direction of the strata are noted, wherever I observed them.

It is in the sandstone and the clayey beds which alternate with it, that the coal occurs, and there seems little reason to doubt that it is of

* In the Map-room of the Society.—ED.

the tertiary formation, as the most abundant fossils are impressions of exogenous foliage, exactly similar in character to that of the trees which now cover the surface. I have also seen what appear to be leguminous fruits, and the shells found in the Labuan coal-field, were all of an extremely recent type. Now as the sandstone of the interior almost exactly corresponds with that of the coal formation, we may conclude that it also is tertiary, the principal difference being, that some beds of it contain a greater quantity of quartz and limestone pebbles. The presence of volcanic rocks with contorted limestone, sufficiently explains the vertically-upheaved stratified rocks, which appear to underlay the sandstone. The limestone is highly crystalline, and is probably an ancient formation, as it contains slender-stemmed encrinites; and the slaty rocks which occur in all the river beds between the coal mountains and those of the interior, are probably of equal or greater antiquity. A considerable tract of country between the limestone hills, is covered with an alluvium of gravel and clays, the surface of which is very undulating, and in this the gold-washing is principally carried on. It seems to rest upon the limestone, which often pierces through it in strange water-worn peaks, which resemble ruined buildings, or ancient monuments. It is in cavities of the limestone also, that the antimony ore is found; and near the junction of the trap-rock with the limestone, a fine hot spring has recently been discovered.

We may therefore, in general terms, describe the Saráwak district as consisting of ancient limestone and slaty rocks and of modern sandstone with coal. In the interval between these deposits, violent volcanic action has taken place, which has resulted in the trappean mountains; and this action has been renewed since the most recent rocks have been formed. With the very scanty information we yet possess on the subject, more detail than this would be out of place.

Ethnology.—The manners and customs of the Aborigines of Borneo have been so often described, that I shall only now make a few observations on what has been less generally noticed—their physical, mental, and moral characteristics. The Dyak is closely allied ethnographically to the Malay, more remotely to the Chinese and to the Indians of South America, who are all united by so many similarities, that we must consider them as branches of one great division of mankind, the Mongolian race. All are characterised by a reddish brown skin of various shades, by jet-black straight hair, by the scanty or totally absent beard, by the rather small and broad nose, and high cheek-bones. In one character only is there any disagreement among them;—in the Chinese and Tartar races the eyes are oblique, while in the Americans and Malays this

peculiarity either does not exist, or is very slightly developed. The average stature of the Dyaks, seems intermediate between the Malays and Chinese, being rather greater than the former and less than the latter, though the local differences are in all very great. Their whole forms are well proportioned, their hands and feet small, and they are seldom so stout as either the Chinese or Malays, while the coronal region of the head, is better developed than in the latter races.

It is highly curious that countries so distant as Borneo and the valley of the Amazon, between which we can by no possibility imagine any direct communication to have ever taken place, should yet contain indigenes so similar to each other; for between some tribes of Dyaks and of Amazon Indians, I can call to mind no one physical distinction. We can only explain the circumstance by supposing both to have had a common origin, and shall thus have additional reason for supporting the views of Dr. Latham and others, who consider the Americans as Mongols who have emigrated direct from Eastern Asia. We may also suppose that similarity of climate and other physical conditions, have tended to produce the remarkable resemblance I have alluded to, both tribes inhabiting districts under the Equator, where the surface is everywhere covered with virgin forests, and where excessive heat and moisture constantly prevail.

In mental capacity it is probable that the Dyaks would be fully equal to the Malays or Chinese, while in moral character they are undoubtedly superior to either. They may be said to bear the same relation to the Malays, that the Tartars do to the Chinese. They are simple and honest, and become the prey of the Malay traders and chiefs, who cheat and oppress them whenever they have the opportunity. The Dyak languages are very various, and differ very considerably from each other. In some, nearly half the words are pure or modified Malay, while in others, there is scarcely a word exactly the same in the two languages. In some of the names of places, there is a strange similarity to the Celtic; thus, *Penrhissen*, *Lundu*, *Siniacen*, *Senna*, are most of them true Welsh names, and as the Celtic languages have an Eastern origin, and there is a considerable Sanscrit element in the Malay, and as besides there is reason to believe that Hindoos were once settled in Borneo, it seems possible that these are not mere accidental coincidences, but indications of a common origin of the former inhabitants or languages of Britain and Borneo—countries which we can now only place in juxtaposition, as representing nearly the extreme points on the scale of civilization.

Having compared the Dyaks with some of the indigenes of South America as to their physical characters, it may be as well to extend

the comparison to their mental qualities as exhibited by their sports, their weapons, and their general habits. In these too there is a very considerable general resemblance, though much difference in the details. The Dyaks are more lively, more talkative, and less diffident than the Americans, and therefore pleasanter companions. They have more amusements and are more social, while at the same time they have less variety of weapons, and are less skilful in their methods of obtaining game and fish. Both these circumstances will lead us to place them one degree higher in the scale of civilization. Among the Indian boys of the Amazons, I never observed any other amusements, than imitations of the more serious occupations of the men. The bow and spear, the blowpipe or the canoe, were employed in their sports and games, which were thus the school in which they became qualified for the duties of manhood. This is a characteristic of the truly savage state. The Dyak youths, on the other hand, have their social games, their trials of strength and of skill. They amuse themselves with pegtops like our English schoolboys, and I was surprised to find them fully initiated in all the mysteries of the in-doors game of "scratch-cradle," of which they had modifications unknown to us. They possess besides numerous puzzles and tricks of great ingenuity, with which they amuse themselves on dull evenings or during wet weather. These apparently trifling matters are yet of some importance, in arriving at a true estimation of their social state. They show that these people have passed beyond that first stage of savage life, in which the struggle for existence absorbs their whole faculties, in which every thought and every idea is connected with war or hunting or the provision for their immediate necessities. It shows too an advanced capability of civilization, an aptitude to enjoy other than mere sensual pleasures, which, properly taken advantage of, may be of great use in an attempt to raise their social and mental condition.

The moral character of the Dyaks is undoubtedly high. They are truthful and honest to a remarkable degree. It is often impossible from this cause to get an opinion from them, for they say, "If I were to tell you what I don't know, I might tell a lie;" and if they relate any thing voluntarily, you may be sure that they are speaking the truth. The fruit-trees about their houses have each their owner, and it has often happened that on asking a Dyak to gather me some fruit from a tree, he has replied, "I can't do that, for the owner of the tree is not here;" never seeming to contemplate the possibility of acting otherwise. Neither will they take the smallest thing belonging to a European, without asking permission. They will pick up scraps of torn newspapers or crooked pins, and ask as a

great favour whether they may have them. In other moral qualities they are also above most uncivilized, and perhaps also above most civilized, nations. They are temperate in food and drink, and the gross sensuality of the Chinese and Malays is unknown among them. They have but one fault—a fault common to all nations in a half-savage state, except perhaps the African races—an apathy and dilatoriness, which, however annoying to the Europeans who come into contact with them, cannot be considered a very grave offence, or be held to outbalance the many excellent qualities they possess.

Few subjects are of greater interest, or of more vital importance to the welfare of a people, than the state of the population, its increase or decrease, and the causes by which it is affected. In my visits to the Hill Dyaks, I was much struck by the apparent absence of those causes, which are generally supposed to check the increase of population, coupled with the evidence of a population almost stationary or very slightly increasing. The conditions generally supposed most favourable for the increase of population, are an abundance of food, the absence of polygamy, and early marriages. Here these conditions all exist. The people produce far more food than they consume, and exchange the surplus for ornaments, gongs, and small cannon, which constitute their wealth. On the whole, they appear remarkably free from disease; marriages take place early, though not too early, and old bachelors and old maids are alike unknown. The number of births is, however, below the usual ratio, and a sufficient cause may be found in the fatiguing occupations to which the women are subjected.

3. *Proposed Exploration of Borneo.* By Lieut. C. A. C. DE CRESPIGNY,
R.N., F.R.G.S.

LIEUT. DE CRESPIGNY, R.N., submitted his proposition for the more thorough exploration of Borneo. He reasoned that Borneo ought to be better known, on account of its riches, its fertility, and above all, its position, situated as it is, in the direct route between China and Australia, between which two countries, it is not difficult to foresee, that there will be as great a trade as now exists between Europe and Australia. In addition to this, Lieut. De Crespigny was anxious to discover the ruins of a large stone city said to exist in Koti, in the east of Borneo, and the truth of a rumour of a tribe of fair people, living in the mountainous region of Kinibalu, with light hair and blue eyes. In reply to a question Lieut. De Crespigny said he had been employed in the survey of the north-west coast in 1848, and had taken that opportunity to learn the Malay language, and to gain information of the manners of the people.