



d'Albertis, sums up nearly all that is known as yet of the great island of New Guinea. Nevertheless, geographically, he has not very much to tell, and elaborate explorations in

the interior are reserved for future adventurers. He has succeeded, however, in showing that exploration is practicable to travelling parties of sufficient strength and fairly equipped; for though the natives are warlike and disposed to be treacherous, they seem to be broken up into small tribes or communities, and by no means so formidable as has been generally supposed. The proof is that the Italian traveller, partially at least, carried out his plans, though no doubt at great personal danger. Yet he had never more than a single European companion, and his handful of followers, who were seldom trustworthy, were either Chinamen, Malays, or South Sea Islanders. Signor d'Albertis merely touched the coasts and smaller islands on the southeast and the north-west of the country, though he made sojourns of considerable duration among the natives. Besides that, he made no less than three expeditions up the Fly river—an account of the Fly, by the way, having already been published by an English naval officer.

But Signor d'Albertis, although a man of varied tastes and general intelligence, was comparatively indifferent to geographical research. He is enthusiastic in his own special avocations, and had he not been an enthusiast he would never have consented to go through so much. He carried his life in his hand in the jungles and forests, living sometimes in open warfare with the natives,

who might be lying in ambush for him with their spears and poisoned arrows. For weeks at a time he was on the verge of starvation, and he was repeatedly brought to death's door by painful, wasting, and enfeebling diseases. Yet days and weeks of suffering were amply repaid to him by the prize of a rare humming-bird or the capture of some wonderful beetle, and he never hesitated to aggravate dangerous maladies by dabbling in arsenical preparations for the preservation of plumage and skins. Whatever might be the zeal with which he persevered in his self-appointed tasks, we should have fancied that he would have welcomed the day of departure that gave him temporary relief from incessant sufferings. On the contrary, it was with feelings of intense regret that he left his beloved swamps and jungles; while still shaking with fever or worn to a skeleton he was looking forward to revisiting the haunts of his predilection; and to some extent he makes us enter into the excitement which made him forget everything but the joys of a successful chase.

"This was a great day for me," he enters on one occasion in his journal. "What would not many naturalists give to be in my place this evening!" In the intervals of a severe attack of fever he had gone out shooting, guided by a Papuan. The first incident was the bagging a beautiful black bird in glistening plumage of velvet and satin. "What was my joy when I beheld a Lophorina atra in its garment of love!" Made happy for the day, he proposed returning; but his companion, who seems to have thoroughly entered into his feelings, conducted him to a lurkingplace behind the trunk of a fallen tree,

covered with mosses, ferns, and parasites. While watching some climbers on the stem of a giant araucaria, the note of a bird and a touch from his guide reminded him that he was in the country of the birds of paradise. That specimen, too, at a distance, appeared to be black, but when, after cautiously

tipped sprays that branch out from either side of the head. Signor d'Albertis admired, gazed, and pulled the trigger, fearful lest the prize should escape him; and then he goes into raptures over the charms of his tiny victim that remind us of the rhapsodies of hunters like Harris or Gordon Cum-



peering around and detecting no signs of an enemy, it dropped from the bough down upon a clearing, uttering shrill notes of defiance or self-complacency, it became evident that the colouring was a miracle of beauty. It derived its name of Sexpennis from the six long feather-

ming on first slaying the rarest antelopes of Southern Africa.

Signor d'Albertis gives a most interesting account of travelling adventure, which enables his readers to form an excellent idea of the country as well as of the manners of the people. Had he



BIRDS OF PARADISE.

been of a morbidly anxious temperament, he must have been fretted to death by his worries; but he tells us that he made a point of cultivating a modified fatalism. While neglecting no reasonable precautions, he made up his mind that what must be would be. Towards natives who were hostilely disposed, he adopted a somewhat aggressive bearing, and he backed up his natural courage by adroitly taking advantage of their superstitions. Repeatedly he seems to have saved his life by striking a seasonable terror with his gunpowder or chemicals. On the Fly river the explorers were repeatedly attacked, though the discharge of shots into the bush generally dispersed the natives without any great harm being done. Only once were any of the assailants killed, and then one of the signor's followers, who had been beset in the scrub, had fired the fatal shot in selfdefence. On another occasion there was an even more tragic episode. An onslaught of villagers had been repulsed, as usual, with some harmless firing, when Signor d'Albertis landed with his men to try to come to a better understanding. The plantations had been deserted, but they entered a house. There they found "an old woman, blind and shrunken almost to a skeleton, lying near a fireplace with her skull driven in and part of the brains scattered on the ground." The signor's native attendants were of opinion that the unfortunate old creature had been dispatched by her family, who were too much hurried to carry her away, and were fearful of her falling into the hands of the white

It seems strange that the natives, knowing that the steam launch must return sooner or later, did not make arrangements to stop her, and so take their enemies at a disadvantage. With the frequent rapids and shallows there could have been little difficulty in making the channel impracticable. But

probably so much strategical forethought was beyond them, and, moreover, they appear in the meantime to have a wholesome dread of firearms. Should traders to the coast precede European colonists, the progress of civilisation is likely to be slow and dangerous. As Signor d'Albertis ejaculates, when remarking on the readiness of the savages in handling his guns, "May the day be far distant when the first gun shall be given to these people. With the fascination which bloodshed has for them, it is easy to foresee what they would be capable of if provided with firearms."

Some of the tribes are indifferently honest, though as a rule they rob and pilfer when they have the opportunity. At one place the traveller had his hut broken into and all his stores stolen, with the exception of the heavy boxes of ammunition, and it says much for his firmness and the influence he had established that he succeeded in recovering almost all the articles. The third and last of his voyages up the Fly river taxed his nerve and resources to the utmost. One of his Chinamen was missing in the forests, the others stole his boat and deserted, while the two or three Polynesian hands who remained with him were supposed to have come to an understanding with the deserters. Finally, when these others had mutinied and followed the rest, it was rather a relief than otherwise. It is true that he had but two companions—one of them an Englishman—and that he was 150 miles from the nearest settlement, in a country thickly populated with savages. But there was no longer the fear of being murdered unexpectedly or of having his arms seized and turned against him.

After incessant watchfulness against the savages and shipwreck among the shoals, he succeeded in working the launch safely into the open sea, so far bringing his wanderings in New Guinea to a close. It appears to be an inviting country to colonise, were the locality of the settlement judiciously chosen. But it is by no means very safe or easy to explore, putting danger from the natives out of the question. In the virgin forests and undrained swamps the climate is often insalubrious or even deadly, while there is more than the usual share of tropical nuisances in the shape of venomous reptiles and insects, most unwelcome to anybody except fanatical entomologists. And, above all, there is the difficulty of the food supply for a party moving into the interior. The natives live chiefly on game, fish, and fruits, but although Albertis and his people were provided with guns, they were often reduced to extreme distress when they passed out of the districts frequented by the pigs and cassowaries; while an unfortunate sheep on board the steam launch actually died of inanition, though the signor had landed daily to go botanising in search of nourishment for it.

OYSTERS AND OYSTER BEDS.

r is curious how little interest has been hitherto taken in the scientific cultivation of oysters; I trust, however, that our readers are not in the position of the old-fashioned farmer who, when attending a lecture on agricultural

chemistry, remarked, "pleno ore," "What I knows, I knows—and what I don't know, I don't want to be told."

There are almost as many kinds of oysters as there are kinds of dogs: no two oysters are exactly alike, but those which come from the same locality bear a general resemblance one with the other, so that any one accustomed to handle and criticise oysters can tell pretty well where the lot was reared. Taking the English coast round, there are not after all so very many localities suitable for oyster farming. The reason of this is that oysters abhor sand, and where sand is oysters cannot possibly exist; the reason is the grains of sand get into the hinge of the oyster, and, like a stone in the hinge of a door, prevents him opening and shutting his shells. The sand then smothers the oyster; he gapes his shells and dies. For this reason we never have, and

never shall have, any oysters in the great estuary of the Solway-Morecombe Bay (the headquarters for cockles), the estuary of the Flintshire Dee, the vast expanse of Cardigan Bay, and the greater part of the estuary of the Severn. Several times has the idea been started to use for oyster purposes the great plain of the Maplin Sands at the mouth of the Thames, but oysters cannot possibly ever thrive here-it is all sand. When we come round to the south of England from the Land's End to the North Foreland then we begin to find oysters in the various estuaries and landlocked bays. I instance only Falmouth, Plymouth, Poole Harbour, the Solent, Portsmouth (especially Hayling, Havant, etc.), also in the Isle of Wight, such as the Medina River, Brading, etc. On the north-east coast there are but few oysters, Boston Deeps and Holy Island being excepted.

Oysters may be generally classified into natives and deep-sea, and between these there are several varieties, the shells of most of which I have in my museum. The deep-sea oysters are as different in form and fashion from the natives as a Clydesdale cart-horse is from a thoroughbred race-horse. Like horses, oysters have their points. The