

my species to the genus *Anomalocera*, and make a new genus for the old species. Dr. Baird, however, thinks that the name ought not to be altered; it will be necessary therefore to give a new generic character.

Genus ANOMALOCERA.

Antenna antica maris geniculans, tumida. *Oculi superiores* quatuor. *Oculus inferior* unicus. *Pes posticus maris dexter*, prehensilis.

The four superior eyes fully distinguish it from every genus hitherto described. Probably in Goodsir's and Templeton's specimens they were not so distinct as in Dr. Sutherland's. The posterior angle of the cephalothorax on the right side is much longer than that on the left. The rostrum, on the contrary, is symmetrical.

Monops agrees with *Catopia*, Dana, in the eyes, but that genus in the 'Proceedings of the Am. Ac. of Arts and Sciences' is described as follows: "Oculis superioribus nullis, inferioribus grandibus, antenna maris antica dextra geniculante; aliis Calano affinibus;...." in Calanus, and therefore in *Catopia*, the posterior feet are "non-prehensile, often obsolete;" in *Monops*, on the contrary, they are prehensile.

EXPLANATION OF PLATE VII.

Fig. 1. <i>Labidocera Patagoniensis</i> .	Right antenna of the male.	
Fig. 2. — <i>magna</i> .	Ditto	ditto.
Fig. 3. — <i>Darwinii</i> .	Ditto	ditto.
Fig. 4. <i>Pontella Bairdii</i> .	Ditto	ditto.
Fig. 5. <i>Monops grandis</i> .	Ditto	ditto.
Fig. 6. <i>Anomalocera Patersonii</i> .	Ditto	ditto.

XVIII.—Notes on the Ornithology of Ceylon, collected during an eight years' residence in the Island. By EDGAR LEOPOLD LAYARD, C.C.S.

[Continued from p. 107.]

32. BATRACHOSTOMUS MONILIGER, Layard.

Only two specimens of the above new species have as yet been procured; one was caught at Avishavelly and sent to Sir J. E. Tennent, who, with his wonted kindness and liberality, transferred it to my collection. It lived three days with me, but refused all food; during the day it slept, squatting on the ground, with its head sunk between the shoulders; on being alarmed it sprang upwards with a sudden jerk, and after executing a rapid summersault in its confined cage, it would again alight and settle down like the *Caprimulgi*. I am informed this species is not uncommon in the locality from whence it was procured,

which is rocky and precipitous, and full of gullies and crevices. I also saw a drawing of one procured at Ratnapoora by Mr. Mitford of that place. He told me, he observed two of these birds, frequenting a tree in full flower, and capturing the beetles which flew about it; at last he shot one with an air gun, and the other left the place. The eyes of this species, like those of the Nocturnal Raptores, exhibit considerable luminosity, and partake of the same internal form.

33. CAPRIMULGUS ASIATICUS, Lath.,

and

34. CAPRIMULGUS MAHARATTENSIS, Sykes. *Ra-bassa*, Cing. *Pay-marrettey*, Mal.; lit. Cheating Devil.

The last of these birds is abundant in the vicinity of Colombo, and throughout the Southern province; mingled with *C. Asiaticus*, which predominates in the North almost to its total exclusion. In habits the two species are precisely similar. Hiding during the day under the umbrageous shelter of a thick bush, the nightjars avoid the "garish eye of day," and only venture forth when twilight or the softened effulgence of the moon's rays afford it that description of light for which its vision is so admirably adapted. At these times, till morning dawns, or the moon sets (they do not venture forth during the darkness), their "churring" cry may be heard in every direction; and the belated traveller hurrying homeward ere the last dying gleams of the setting sun fade in the west, is startled by what seemed a stone flying up with a few rapid querulous notes, and gliding along on noiseless pinions settling again within a few yards of him.

During the warm rainy evenings when the white-ant hills send forth their winged hosts to propagate fresh swarms of ravagers, the *Caprimulgi* are actively engaged (assisted by the crows and bats) in thinning their numbers; their undulating motions are at these times particularly elegant and graceful, and I have watched them with delight till I could no longer distinguish them amid the darkening landscape. They never appear to fly high; in this pursuit they seldom rise beyond 15 or 20 feet; the bats thin the next rank; and above the tree-tops, evidently to have the benefit of the little remaining light, the crows eagerly pursue those ants which escape from the carnage below.

During my residence in Canada, I was surprised both by the prodigious number of "Fern Owls" which nightly made their appearance hunting in company, and also at the great altitude they attained in their airy gyrations. Here, as before stated, this is not the case, and it is a solitary bird, at most only seen in pairs.

The nest is merely a depression in the ground under a tuft of grass, or a bush, or beside a stone; the parent bird deposits two oblong eggs of a delicate buff colour, sparingly marked with irregular brown spots. Axis 14 lines, diam. 11 lines.

Dr. Kelaart procured another species at Nuwera Elia, which Mr. Blyth has described under the name of

35. CAPRIMULGUS KELAARTI, Blyth.

I have not seen it in its native haunts.

36. CYPSELUS BALASIENSIS, Gray. *Wahaleyna*, Cing.; lit. "Rain Fowl," the name for all swifts and swallows.

Extremely common throughout the island; building in the *Borassus flabelliformis*, to the dead fronds of which it attaches its nest by some viscid secretion. The nest is a small semicircular cup composed of the downy seeds of the *Asclepias gigantea* and the *Bombax pentandrum*, which they collect on the wing. The eggs are laid in the months of June or July, from two to four in number, and pure white. The species is partially migratory.

37. CYPSELUS MELBA, Linn.

Common about Nuwera Elia and the hilly zone; found also about Damboul and Ratnapoora.

38. CYPSELUS AFFINIS, Gray.

Migratory; breeding in April in large numbers about the rocks at Damboul. I also found them building under a bridge near Tangalle in the low country. The nests, built in clusters, are composed of mud and grasses, with a small round entrance precisely resembling those of the martin, *Hirundo urbica*; the eggs from two to four in number, and purely white.

39. MACROPTERYX CORONATA, Tickell.

Generally distributed, but affecting the jungles more than the open country. It generally selects an elevated and leafless branch, from which it sallies in quest of insects; when on the wing it utters a peculiar cry resembling the words "*chiffle, chaffle,*" "*klecko, klecko,*" often repeated. Sometimes I have heard them utter the same note when at rest, rapidly elevating and depressing the crest.

I never could find the nests of this species, though the natives assure me they build in old Euphorbia trees in the jungles. It appears about Colombo in March, and disappears in December. I shot a young bird in March; its plumage was green, each

feather edged with white, causing the bird to appear as if covered with scales.

40. COLLOCALIA BREVIROSTRIS, M'Clelland.

Having fully described my acquaintance with these birds in a letter to my friend Mr. Blyth, I cannot do better than copy what I then wrote, adding his remarks and the result of my subsequent inquiries. "I have at last visited the cave in which *Collocalia nidifica* builds, and will now, with the aid of my journal, give all the information I can, sending you birds skinned and in spirit, and a young nestling taken from the nest with my own hand. The cave is situated at a place called Havissay, about thirty-five miles from the sea, and twenty from the river, and about 500 feet up a fine wood-clad hill called Diagalagoolawa, or Hoonoomoolocota. Its dimensions are as follows:—length between 50 and 60 feet, about 25 broad, and 20 high. It is a mass of limestone rock, which has cracked off the hill side and slipped down on to some boulders below its original position, forming a hollow triangle. There are three entrances to the cave, one at each end, and one very small in the centre. The floor consists of large boulders, covered, to the depth of 2 or 3 inches, with the droppings of the birds, old and young, and the bits of grass they bring in to fabricate their nests. The only light which penetrates the cavern from the entrances above-mentioned is very dim; when my eyes, however, got accustomed to the light, I could see many hundreds of nests glued to the side of the fallen rock, but none to the other side, or hill itself. This I attribute to the fact of the face of the main rock being evidently subject to the influence of the weather, and perhaps even to the heavy dews off the trees; but for this the side in question would have been far more convenient for the birds to have built on, as it sloped gently outward, whereas the other was much overhung and caused the birds to build their nests of an awkward shape, besides taking up more substance. I was at the spot a few days before Christmas, and fancy that must be about the time to see the nests in perfection. This is corroborated by the fact of my finding young birds in all the nests taken by me, and by what the old Chinaman* said, that the 'take' came on in October. I find that they have three different qualities of nests, and send two for your inspection; the best is very clean, white as snow and thin, and is also very expensive. The most inferior are composed of dry grasses, hair, &c., but I could not detect anything like the bloody secretion as described ('though only under peculiar circumstances of exhaustion') by Mr. Barbe, even in a fresh nest. I was in the

* Alluded to in a previous letter.

cave late (after 5 P.M.) in the evening of a day which threatened rain, but the old birds were still flying round the summit of the mountain, at a vast altitude, occasionally dashing down into the cave with food for their nestlings. By daylight next morning I was on foot, but the birds were before me, hawking on the plain below, and all about the hills: I have found the birds here in Colombo, in Kandy, and all along the road we went. I could learn nothing of the number of eggs laid, nor of their colour. I found one bird in each nest. The Chinese who live on the spot pretend not to understand anything asked them, and the apathetic Cingalese have never taken the trouble to see for themselves, so they could give me no information. The aspect of the country, broken and rugged, coupled with the numerous flocks of birds I saw flying round the various hills, lead me to think there must be many breeding places yet undiscovered. One, however, was pointed out, but we had not time to visit it. I could not hear of any other kind of *swift* breeding there, but have just received such information as leads me to suppose that *C. fuciphaga* builds near Jaffna on some rocks overhanging the sea. I may further add, that there were no bats in the cave with *C. nidifica*, nor did I see any bird of prey, save a fine *Hæmatornis*, which I shot. The Cingalese name for *C. nidifica* is *Wahalæna*." On this letter Mr. Blyth remarks:—

"The specimens sent by Mr. Layard are perfectly identical in species with those from Darjiling, &c., and measure $4\frac{1}{2}$ to $4\frac{3}{4}$ in. long, of which the outer tail-feathers measure 2 to $2\frac{1}{4}$ in.; expanse of wings $10\frac{1}{4}$ to $10\frac{1}{2}$ in., and closed wing $4\frac{5}{8}$ to $4\frac{1}{2}$ in. The gastric glands, as in *C. fuciphaga*, present no trace of the structure figured by Sir E. Home. The nests sent differ remarkably from those of *C. fuciphaga*, in being partly composed of grass stems worked in with layers of the mucus, and one of the two has some moss fixed to the outside. Hence they correspond with the descriptions of the nest of the *Linchi* or *Lintge* of Java, or *C. fuciphaga*, the nest of which is without any such intermixture, and no doubt the misrepresentations of the gatherers have led to the mistake. As regards the activity of the birds, early and late, the requirements of the young at the particular period might sufficiently account for it, only that Capt. Lewis also found the other species with young in the Nicobars, and the habit of retiring early may prove characteristic of *C. fuciphaga*.*"

To this I have little to add, save that I have traced the birds up to Anarajahpoora, and doubt not they breed among the rocks in that neighbourhood. I may remark that I only found *single*

* From a paper by Mr. Blyth printed for private circulation. Calcutta, 1849.

birds in each of the nests procured by me, and that I have lately received a *single* fresh egg from Diagalagoolawa taken in the month of February. It weighed 9ii, and was of a spotless white, slightly tapering at one end.

41. ACANTHYLIS CAUDACUTA, Lath.

This splendid swift is confined to Nuwera Elia. I have not seen it myself in its haunts, but received it from friends, who tell me it flies with immense rapidity, its wings causing a rushing noise as it darts through the air. The natives report that they build in hollow Rhododendron trees.

42. HIRUNDO GUTTURALIS, Scop.

Common throughout the island, arriving in Colombo about the end of September.

43. HIRUNDO HYPERYTHRA, Layard.

I first discovered this species in November 1849 at Ambepusse, on the road to Kandy. I have since seen them at Putlam, up the Central road as far as the hills extend, at Ambegamoia, and up the Caltura river from Perth sugar estate to Ratnapoora and Adam's Peak. They breed in caverns and under bridges, and build a nest of mud attached to the roofs. The general shape and size is that of a small basin, with a round entrance hole at the top. The lining is composed of fine hay and feathers, and the eggs are laid in March. The late Dr. Gardner informed me that a pair built their nest on a ring supporting a hanging lamp, nightly used in his sitting-room. They securely hatched their eggs, unscared by the cleaning or lighting of the lamp, and the young birds returned to the nest every night for about a month after being fully fledged.

44. HIRUNDO DOMICOLA, Jerdon.

Found by Dr. Kelaart at Nuwera Elia breeding in the European houses. It appears to be confined to that locality; the eggs, four in number, precisely resemble those of the European species except in size.

45. HIRUNDO DAURICA, Linn.

I found one of these birds in the village of Pt. Pedro in December: it had probably been driven over from the opposite coast by stress of weather: it was hawking about the street. I fired at, and wounded it, but it flew away. Next day it was again in the same place, and I succeeded in killing it, and I found the shot of the previous day had broken a leg.

46. HARPACTES FASCIATUS, Lath.

This is one of the most beautiful of our indigenous birds. They inhabit the high tree-jungle called by the natives "*Mookoolaney*," and are extremely shy. I found them about the Perth estate and Ratnapoora, frequenting the highest tree-tops. On dissection, their stomachs proved full of the remains of various insects and small seeds.

Preserved skins give but a faint idea of the beauty of these birds; the contrast afforded by the brilliant crimson breast, and the deep blue cere of the eye, bill and legs, when fresh, must be seen to be appreciated.

47. CORACIAS INDICA, Linn. *Cawolowa*, Cing. *Kotta Killy*, Mal.; lit. Palmyra Parrot (from breeding in hollow palmyra trees).

Common, and widely distributed; very partial to the small clumps of trees scattered over the cultivated parts of the Jaffna peninsula; they are also very fond of sitting on the top of the Well-Whips in the fields. It breeds in hollow trees, laying four or five greenish eggs profusely speckled with dark brown spots. Axis 15 lines; diam. 11 lines.

48. EURYSTOMUS ORIENTALIS, Linn.

Very rare in Ceylon; but three specimens fell under my notice; one I killed in the Pasdoom Corle. It resembled the preceding in its flight, but clung to trees in the manner of the *Picidae*. I shot it in the act of tearing away the decayed wood round a hole in a dead tree. The other birds I killed at Gillymally in a similar situation. Their stomachs were full of wood-boring coleoptera, swallowed whole, and merely a little crushed, and I saw them beat their food against the trees as a thrush would beat a snail.

49. HALCYON CAPENSIS, Linn.

Is rare in the immediate neighbourhood of Colombo, but found occasionally about Caltura, and up the river to Ratnapoora. It is very abundant near Trincomalee and Batticaloa, and the Anarajahpoora Wanny, frequenting tanks, and feeding on fish, frogs, crabs, and small mollusca. When flying they utter a loud harsh note, not unlike the cracking of castanets. I have never obtained their nests, but the natives say they build in hollow trees.

50. HALCYON ATRICAPILLUS, Lath.

This lovely kingfisher has but once fallen under my notice as

an inhabitant of Ceylon. The specimen in question was shot in the Jaffna district, in the island of Valenny. I know nothing personally of its habits.

51. HALCYON SMYRNENSIS, Linn. *Calavy coorooi*, Mal.; lit.
Large-mouthed Bird.

Very common and widely distributed, feeding indiscriminately on fresh or saltwater fish, crabs, beetles, and butterflies. I have seen them capture these last in the manner of flycatchers (*Muscicapidae*), darting from a sprig and seizing them in the air, their mandibles closing with a snap, audible at the distance of some yards. One, which was unluckily introduced into an aviary, destroyed most of the lesser captives ere he was detected as the culprit; he was at last caught in the act of seizing a small bird in his powerful bill; he beat it for a moment against his perch, and then swallowed it whole. The nest of this species is found in decaying trees; the parent bird deposits two white eggs, axis 15 lines, diam. 13 lines, beautifully smooth and shining. I have procured eggs in the north of the island in *December*, in the south in *April*.

52. CEYX TRIDACTYLA, Linn.

This lovely little bird is certainly one of our uncommon species, and yet, at the same time, widely distributed. I have seen it at Galle, Trincomalee, Anarajahpoora, Matelle, Putlam, and Ratnapoora. It delights equally in the headlong waters of the mountain torrent, and the calm unruffled bosom of the jungle tank; and glancing like a gemmed arrowpast the traveller journeying along the narrow native road, its minute form evades his quickest shot. I have only procured one specimen.

53. ALCEDO BENGALENSIS, Gmel. *Mal-pillihudua**, Cing.; lit.
Flower Kingfisher.

Found throughout the island, feeding alike on small fresh or saltwater fish, crustaceans, &c. It is captured in great abundance during some seasons of the year, by Moormen who resort to this country for that purpose, and transmit the skins to China, where they are used for embellishing fans and other fancy work. They are entrapped by a net placed under the water covered with horse-hair nooses, and baited with a small fish.

54. CERYLE RUDIS, Linn.

Commonly distributed, feeding on fresh or saltwater fish, according to its locality. Whilst other kingfishers pounce upon their

* *Pillihudua* is the native name for all Kingfishers.

prey from the overhanging bough of a tree, or solitary stake protruding from the water, *C. rudis* hovering in the air with head inclined marks its victim. Plunging down with unerring aim, it is lost for a moment in the spray caused by its heavy fall, and reappears with the prey struggling in its bill.

55. MEROPS PHILIPPINUS, Linn. *Kattalan cooroovi*, Mal. ; lit. Aloe Bird (from a fanciful resemblance in the tail of the bird to the aloe plant). *Pappugai de champ*, Port. ; lit. Ground Parrot.

This bee-eater is very common throughout the island during the period of its visitation : it is the harbinger of the snipe, and appears about the middle of September.

They frequent open fields, perching on fences, or on the tops of low bushes, always choosing a dry projecting twig, from which they dart at any insect that may pass by, returning with an elegant sailing flight : before the prey is devoured, they beat it against the perch till sufficiently broken to be swallowed entire. In the evenings they frequently pursue insects after the manner of swallows, uttering the while a pleasing chiruping note and soaring to a great height in the air.

56. MEROPS VIRIDIS, Linn.

This species is confined to the open plains of the maritime districts. I have seen it at Trincomalee and Hambantotte, and traced it from Chilau to Mulletivoe. I am not aware that it is found near Colombo, nor in the interior, where the preceding and following species replace it.

It delights in the neighbourhood of water, over which it hunts for insects. I have even seen it take them from off the surface, which it has struck with its breast in the endeavour. It is a much bolder bird than either of the other two, often allowing a European to approach within a few feet before seeking its safety in flight.

It is singular to observe the distinction in this respect between the native, in his usual state of semi-nudity, and the white man ; the former can usually approach closely to any wild animal or bird, but the sight of the latter puts them to speedy flight : I attribute this more to the colour of the face than to the European dress ; for I always found that by allowing my beard and whiskers to grow, I could approach them more closely than when shaved.

M. viridis roosts in large flocks, always returning to the same tree for successive months ; they usually retire before 5 o'clock in the evening, whereas *M. Philippinus* flies till dark.

57. MEROPS QUINTICOLOR, Vieill.

Whilst the two former species frequent low open plains, and are rarely, if ever, seen in elevated districts, the present species, on the contrary, affects the hilly forest region. Here it pursues its insect prey among the lofty tree-tops, seldom descending to the ground, except in the breeding season, when it frequents steep banks for the purpose of providing a suitable habitation for its young: this is generally effected by scooping a hole in the soil, to the depth of about 18 inches, terminating in a domed chamber, in which the young are hatched on the bare ground. The eggs, two in number, resemble those of the kingfisher in shape and colour: they are hatched in April.

58. UPUPA SENEGALENSIS, Swain. *Chaval cooroovi*, Mal.; lit. Cock Bird (from their crest).

The hoopoe is common in the Jaffna peninsula during the season of its stay, and I have every reason to believe that it not unfrequently breeds with us, as I shot young birds not fully fledged, in August. I saw the bird at Hambantotte and Trincomalee, and procured one solitary specimen in Colombo.

They feed much upon the ordure of cattle, in search of small coleoptera: at such times the crest is carried flat on the head; but when seated on a tree-top uttering its monotonous "*hoop, hoop, hoōp,*" the crest is rapidly elevated and depressed, the bird swinging itself backwards and forwards at every repetition of its note.

I have been assured by a gentleman long resident in the Northern Province, that *U. Epops*, Linn., had occurred to him; sed non vidi.

59. NECTARINIA ZEYLONICA, Linn. *Teyn cooroovi*, Mal.; lit. Honey Bird.

My house in Colombo was, as is usual in the East, surrounded by a verandah, up which crept, in tropical profusion, several species of *Passiflora*; to the flowers of these came the various *Nectariniæ* for their morning and evening meals, rarely appearing in the heat of the day; they hovered about the starry flowers, thrusting in their curved bills, in search of the minute insects on which they fed; occasionally they would fly into the verandah and seize a small spider from its web, or from the crevices of the walls. Then they would betake themselves to the trellis supporting the passion-flowers, or to the branches of a pomegranate close by, where they pruned themselves and uttered a pleasing song. If two happened to come to the same flower, and from their numbers this often occurred, a battle always ensued, which

ended in the vanquished bird retreating from the spot with shrill piping cries, while the conqueror would take up his position upon a flower or stem, and swinging his little body to and fro, till his coat of burnished steel gleamed and glistened in the sun, pour out his note of triumph. All this time the wings were expanded and closed alternately, every jerk of the body in *N. Asiatica* and *N. Lotenia* disclosing the brilliant yellow plumelets on either side of the breast.

N. Zeylonica is abundant in the southern and midland districts, but is rare in the north, where it is replaced by

60. NECTARINIA MINIMA, Sykes.

I never could ascertain to my satisfaction the nest of these species, but believe them to be similar to those of the following.

61. NECTARINIA LOTENIA, Linn.

This species is exceedingly plentiful in the southern and midland districts; it is not so common in the north as

62. NECTARINIA ASIATICA.

The nests of these latter two are elegant domed structures, generally suspended from the extremity of a twig of some low bush artfully covered with cobweb, in which I have often seen the spider still weaving her toils, having extended the web to the surrounding branches, thus rendering the deception still more effective; and it would seem that the birds were aware of it and left their helper undisturbed.

The entrance to the nest, which, if built in a bush, is always turned inwards, is screened from the sun and rain by a portico projecting often above an inch beyond the walls. The eggs usually are from two to four, of a whitish ground colour, so closely speckled with minute dusky spots as to appear gray. They weigh from Di. gr. 1. to Di. gr. 6. while the parent bird is only Zii. heavier. The young males are clad in the livery of the female, but at the first moult assume their proper garb, the brilliant metallic hues first appearing in a long line down the breast.

63. DICEUM TICKELLI, Blyth.

This, the smallest of our feathered tribes, is plentiful among parasitic plants wherever found, but it especially delights to feed on the white viscid berries of a misletoe? which flourishes on the Sooria (*Hibiscus*) trees, and I believe it is by their means that the plant is propagated, the seeds passing undigested

through the intestine. I never saw the nest of this species, nor do the natives seem cognisant of it.

64. *PHYLLORNIS MALABARICA*, Lath.

A rare species, and confined to the upland districts. Dr. Kelaart procured it at Nuwera Elia, and Muttoo brought in a single specimen whilst I lay ill at Gillymally.

65. *PHYLLORNIS JERDONI*, Blyth.

Extremely common in the south of Ceylon, but rare towards the north. It feeds in small flocks on seeds and insects, and builds an open cup-shaped nest. The eggs, four in number, are white, thickly mottled at the obtuse end with purplish spots.

66. *PHYLLORNIS AURIFRONS*, Temm. ?

Included by Dr. Kelaart in his catalogue; sed non vidi.

67. *DENDROPHILA FRONTALIS*, Horsf.

This elegant little creeper is abundant about jack-trees, among the branches of which it incessantly creeps in search of minute insects, examining the under as well as the upper sides, and the bold little climber courses upright or headlong with equal facility.

These birds always hunt in small parties, and the rapidity of their motions is such as to baffle the eye.

[To be continued.]

XIX.—On the Head of the Genus Conus, Linn.

By J. E. GRAY, Ph.D., F.R.S., V.P.Z.S. &c.

ADANSON (Voy. Seneg. t. 6), LESSON (Voy. Freycinet, t. 67. f. 7), QUOY and GAIMARD (Voy. Astrolabe, t. 52 & 83), PHILIPPI (Moll. Sicil. t. 12. f. 19), EHRENBURG (Sym. Phys. t. 2), EYDOUX and SOULEYET (Voy. Bonite, t. 45), and CHIAJE (Moll. Sicil. iii. t. 45), have described and figured the animal of the Cones as having an elongated muzzle or rostrum like the phytophagous univalve mollusks; and Lovèn, probably misled by these descriptions, expressly describes them as having "*rostrum productum non recondendum.*"

Never having had an opportunity of examining the mouth of these animals before the publication of the arrangement of the families which I proposed in the 'Annals and Magazine of Natural History' for Feb. 1853 (xi. 130), I placed the family *Conide* in the suborder *Rostrifera*.