

Chelipeds rather longer than the carapace; a small lobule at the far end of the anterior border of the arm, inner angle of wrist stoutly spiniform, hand smooth except for a tiny tubercle in front of the apex of the wrist joint.

First 3 pairs of legs slender: merus of last pair less than twice as long as broad, its posterior border ending in an almost dentiform carina.

6th abdominal tergum of male broader than long, broadest in the middle, its sides therefore curved.

In spirit the carapace is white with some purplish-brown markings.

In the Indian Museum are 9 specimens, from off Ceylon 26½ fms., off the Malabar coast 26–31 fms., off Mergui 40 fms. and from the Andamans.

The largest specimen has a carapace 9.5 millim. long and 11 millim. broad.

### Sub-family III. LUPINÆ.

#### Alliance I. *Lupocyclus*.

#### LUPOCYCLUS, Adams and White.

*Lupocyclus*, Adams and White, Samarang Crust. pp. 46, 47: A. Milne Edwards, Ann. Sci. Nat., Zool., (4) XIV. 1860, p. 228, and Archiv. du Mus. X. 1861, p. 337: Miers, Challenger Brachyura, p. 185 (not subgenus *Parathranites*).

Carapace little broader than long, or even sub-circular, convex, the regions faintly indicated, with granular transverse ridges of definite position.

Front proper (not including the rather obscurely defined reduplicated inner supra-orbital angles) prominent and cut into 4 teeth.

Autero-lateral borders moderately oblique and moderately curved, about equal in length to the postero-lateral, cut into 5 or 6 teeth (including the outer orbital angle) with little denticles in some or all of the interdental spaces, bringing the total number to 9. (The denticles are sometimes so small as to escape notice).

Orbits large with a considerable dorsal inclination: the upper border with 2 fissures: the inner angle of the lower border though dentiform does not project anywhere near the level of the tips of the middle frontal teeth. The antennules fold transversely.

Basal antenna-joint about as long as broad, filling the orbital hiatus; not quite firmly fixed; flagellum long, standing in the orbital hiatus.

Epistome short, somewhat sunken. Buccal cavern somewhat broader than long: efferent branchial channels well defined.

Chelipeds very long, much longer than any of the legs, rather slender, the hand slenderer than the arm: the arm with spines, both inner and outer angles of wrist spiniform, the hand with spines and costæ, the fingers long and slender.

Legs slender: propodite and dactylus of last pair typically foliaceous and blade-like for swimming.

Abdomen of male five-jointed the 3rd-5th terga being fused: the first tergum almost concealed beneath the carapace.

*Key to the Indian species of Lupocyclus.*

- I. Frontal teeth blunt-pointed; chelipeds less than three times the length of the carapace, the arm being stout and prismatic: merus of last pair of legs broadened and compressed ... .. *L. rotundatus.*
- II. Frontal teeth acutely pointed: chelipeds more than three times the length of the carapace, the arm being slender and cylindrical: merus of last pair of legs slender ... .. *L. strigosus.*

7. *Lupocyclus rotundatus*, Adams and White.

*Lupocyclus rotundatus*, Adams and White, Samarang Crust. p. 47, pl. xii. fig. 4: A. Milne Edwards, Archiv. du Mus. X. 1861, p. 387: de Man, Notes Leyden Mus. V. 1883. p. 153: Miers, Zool. H. M. S. Alert, pp. 184, 234, and Challenger Brachyura, p. 186. See also de Man, Zool. Jahrb., Syst. etc., II. 1886-87, p. 718.

? *Goniosoma inæquale*, Walker, Journ. Linn. Soc., Zool., XX. 1886-90 (1887) p. 116, pl. viii. fig. 4.

? *Lupocyclus inæqualis*, Henderson, Trans. Linn. Soc. Zool. (2) V. 1893, p. 378.

Carapace sub-circular in the young but becoming as much as five-sixths as long as broad in large individuals, convex, subtomentose, its surface broken by transverse granular ridges which are similar in number and position to those of *Neptunus (Lupocycloporus) whitei* A. M. Edw. but are more elevated and discontinuous and therefore look more like series of tubercles.

Front prominent beyond the dorsally-grooved, or reduplicated, inner supra-orbital angles, cut into four teeth of not very unequal size, of which the middle two are the most prominent and the most acute. Supra-orbital margin with two sutures or not very open fissures.

Antero-lateral borders cut into five rather coarse teeth (including the outer orbital angle), and in every one of the interdental spaces there is a denticle: these intervening denticles are so small in young individuals that some of them may escape notice, but in large individuals they are all very distinct. Posterior border straight, but forming a curve with the postero-lateral borders.

Antennal flagella more than half as long as the carapace.

Chelipeds rather more than  $2\frac{1}{2}$  times the length of the carapace in the male, and having the same form and proportions as those of *Neptunus* (*Lupocycloporus*) *whitsei*, the arm being much stouter than the hand and the surface of most of the segments being granular with a squamiform sculpture: 5 spines on the anterior border of the arm and 2 in the distal third of the posterior border: hand and wrist slender, costate—the costæ granular: a spine at the inner and the outer angles of the wrist: hand with 3 spines, one being in front of the apex of the wrist-joint, the other two being side by side some little distance behind the finger-joint. The fingers are stoutish, as long as the hand, and are gently incurved, but have the extreme tips sometimes slightly bent outwards: their opposed edges have jagged teeth like those of any *Neptunus*.

The first three pair of legs are slender. The fourth pair have all their joints broadened as in any *Neptunus*, though the merus and carpus are not quite so broad, relatively, as in that genus; there is a spine near the far end of the posterior border of the merus of this pair.

The 2nd and 3rd abdominal terga are sharply and decidedly carinate.

In the Indian Museum are 14 specimens representing both sexes and several ages, from the Andaman Sea up to 55 fms. and from off Ceylon  $26\frac{1}{2}$ –32 and 34 fms. The largest male has the carapace 15 millim. long and 19 millim. broad, but there are two egg-laden females only about half this size.

The four smallest specimens are identical with White's figure of *Lupocyclus rotundatus*, the two largest specimens agree with Walker's description and figure of *Goniosoma inaequale*, the six middle-sized specimens cannot be decisively separated from either: I therefore think that all belong to one species.

#### 8. *Lupocyclus strigosus*, n. sp.

(an *Lupocyclus philippinensis*, Semper, Nauck ?)

Except in the form of the chelipeds (which are even slenderer than those of *Iupa forceps*) and last pair of legs, this species is very much like *L. rotundatus*, from which it differs in the following characters:—

(1) the carapace is perhaps a little more nearly circular, and is distinctly more convex:

(2) the front is more prominent, is practically confluent with the inner supra-orbital angles, and is cut into four sharp teeth, of which the middle two are much smaller than the others:

(3) the antero-lateral borders are armed with five slender spiniform teeth *not* including the outer orbital angle, and the denticles of the interspaces are represented by granules or are quite inconspicuous:

(4) the chelipeds in the male are  $3\frac{1}{2}$  times the length of the carapace and are very slender, especially in the palm: there are 6 or 7 spines along the anterior border of the arm, which is a slender cylindrical joint, and two much smaller ones in the distal fourth of the posterior border: the fingers are considerably longer than the palm, are extremely slender, and their opposed edges are armed with close-set fine regular teeth having larger acicular teeth at fairly regular intervals—much as in the Leucosine genus *Arcania*:

(5) the last pair of legs, though otherwise similar to those of *L. rotundatus*, have the basal joints, up to and including the carpus, slender, sub-cylindrical, and, in fact, hardly stouter than the corresponding joint of the other legs.

In other respects this species agrees with *L. rotundatus*.

In the Indian Museum are five specimens—from the Andaman Sea 15 fms., from off the Madras coast, 33 fms., and from off the Koukan coast, 56–58 fms.

In the type specimen the carapace is 8 millim. long and 9 millim. broad.

#### CARUPA, Dana.

*Carupa*, Dana, Silliman's Amer. Journ. Sci. and Arts (2) XII. 1850, p. 129; Proc. Ac. Nat. Sci. Philad. 1852, p. 86; and U. S. Expl. Exp. Crust. pt. I. p. 279: A. Milne Edwards, Ann. Sci. Nat., Zool., (4) XIV. 1860, p. 228, and Archiv. du Mus. X. 1861, p. 386.

Carapace transverse, broad, moderately convex, with smooth unbroken surface.

The front proper projects slightly beyond the rather ill-defined inner supra-orbital angles, and is either broadly bilobed or cut into four shallow lobes: its breadth is about a fourth the greatest breadth of the carapace.

Antero-lateral borders moderately oblique and arched, about the same length as the postero-lateral, cut into 7 rather irregular lobes (including the outer orbital angles).

The orbit, which has little or no dorsal inclination, has two notches in its upper border; the lower border crenulate. The antennules fold almost transversely.

Basal antenna-joint as long as broad, rather slender; the flagellum, which is of moderate length, stands in the orbital hiatus.



Epistome sufficiently long. Buccal cavern squarish, broader than long, the efferent branchial channels very well defined.

Chelipeds longer and vastly more massive than the legs: arm with spines, one or both angles of wrist spiniform; palm inflated, massive, nearly smooth: fingers stout, hardly as long as palm, strongly toothed.

Legs slender: in the fourth pair the merus is elongate and the carpus slender, but the propodite and dactylus are typical swimming paddles.

First abdominal tergum narrow, almost hidden by the carapace: in the male the 2nd-5th terga are fused—though the suture between the 2nd and 3rd may be visible—so that the abdomen consists of 4 pieces only.

### 9. *Carupa laeviuscula*, Heller.

*Carupa laeviuscula*, Heller, Verh. zool. bot. Ges. Wien, XII. 1862, p. 520, and Novara Crust., p. 27, pl. iii, fig. 2: de Man, Notes Leyden Mus. V. 1883, p. 152, and Archiv. f. Naturges. LIII. 1887, i. p. 336: Ortmann, Zool. Jahrb., Syst. VII. 1893-94, p. 68 and in Semon's Forschung. Crust. (Jena. Denk. VIII) p. 44: Zehntner, Rev. Suisse Zool. II. 1894, p. 161.

Carapace about  $\frac{2}{3}$  as long as broad, perfectly smooth to the naked eye, frosted with minute granules under the lens.

Front cut into 4 shallow lobes, of which the middle two are the narrowest. Supra-orbital margin with two notches, infra-orbital margin cut into four lobes of which the middle two are the narrowest.

Antero-lateral borders cut into 7 teeth (including the outer orbital angle), of which the 5th is the smallest and the 6th the largest and most acute. The postero-lateral angles of the carapace are well defined.

Antennal flagella more than half the length of the carapace.

Chelipeds about  $2\frac{1}{2}$  times the length of the carapace, in the male: arm short with 3 claw-like spines on the anterior border, the posterior border being smooth: inner angle of wrist strongly spiniform, the outer angle rounded, but armed with a spinule below: hand smooth, its upper border well defined.

In young specimens, as in the young of *Scylla serrata*, there may be two faint costae or two lines of small granules along the upper surface of the hand, and also there may be some costiform lines of small granules on the upper surface of the wrist.

The legs are slender and smooth: the last pair have only the last two joints dilated for swimming.

In the Indian Museum are two specimens (one badly damaged) from the Andamans and one from the Madras coast—besides one from Sumoa and one from Mauritius.

Alliance II. *Lupoida*.

## SCYLLA, De Haan.

*Scylla*, De Haan, Faun. Japon. Crust. p. 11: A. Milne Edwards, Ann. Sci. Nat., Zool., (4) XIV. 1860, pp. 228, 249, and Archiv. du Mus. X. 1861, p. 347: Miers, Challenger Brachyura, p. 184.

Carapace transverse, broad, moderately convex, with an almost unbroken surface.

Front proper well delimited from the inner supra-orbital angles, cut into four teeth: its breadth (not including the supra-orbital angles) is between a fourth and a fifth the greatest breadth of the carapace.

Antero-lateral borders oblique, arched, longer than the postero-lateral, cut into 9 teeth of nearly equal size.

Orbit without any dorsal inclination: two nearly closed fissures in its upper wall: the inner angle of the lower border dentiform and prominent. The antennules fold nearly transversely.

Basal antenna-joint short and broad, its antero-external angle produced to form a lobule lying in the orbit: the flagellum, which is of good length, stands in the orbital hiatus.

Epistome sufficiently long fore and aft, not sunken. Buccal cavern squarish, broader than long: the efferent branchial channels cavernous, but not defined by ridges.

Chelipeds massive, longer than any of the legs: arm wrist and hand with definitely placed spines: hand deep and full, not prismatic, not costate.

Legs stout, moderately compressed: in the fourth pair the merus and carpus are shortened and broadened, and the propodite and dactylus are typically foliaceous for swimming.

Abdomen of male rather broadly triangular, consisting of 5 segments, the 3rd-5th terga being fused. The first tergum is much concealed beneath the carapace.

10. *Scylla serrata* (Forsk.) De Haan.

*Cancer serratus*, Forskal, Descr. Anim. p. 90.

*Cancer olivaceus*, Herbst, Krabben, II. V. 167, pl. xxxviii. fig. 3.

*Portunus tranquebaricus*, Fabricius, Ent. Syst. Suppl. p. 386; Bosc, Hist. Nat. Crust. I. p. 219; Latreille, Hist. Nat. Crust. VI. p. 18 and Encycl. Meth. X. p. 191.

*Portunus serratus*, Rüppell, 24 Krabben roth. Meer. p. 10, pl. ii.

*Lupea tranquebarica*, Milne Edwards, Hist. Nat. Crust. I. 448.

*Lupea lobifrons*, Milne Edwards, Hist. Nat. Crust. I. 453 (*Adæ* A. M. Edw.).

*Scylla serrata* De Haan, Faun. Japon. Crust. p. 44: Krauss, Südafr. Crust. p. 25: A. Milne Edwards, Ann. Sci. Nat. Zool. (4) XIV. 1860, p. 252, and Archiv. du Mus. X. 1861, p. 349, and Nouv. Archiv. du Mus. IX. 1873, p. 162, and in Maillard's

l'île Réunion, Annexe F p. 2: Hess Archiv. f. Naturges. XXXI. 1865, i. pp. 139, 172: Heller, Novara Crust. p. 27: Miers, Crust. New Zealand, p. 27: Hilgendorf, MB. AK. Berl. 1878, p. 799: E. Nauck, Zeits. Wiss. Zool. XXXIV. 1880, p. 59, pl. i. figs. 22, 24 (gastric teeth): Haswell, Cat. Austral. Crust. p. 79: Miers, Ann. Mag. Nat. Hist. (5) V. 1880, p. 238; and Zool. H. M. S. Alert, pp. 518, 588; and Challenger Brachyura, p. 185: Filhol, Crust. N. Zel., Miss. ile Campbell, p. 382: de Man, Archiv. Naturges. LIII. 1887, i. p. 332; and in Weber's Zool. Ergebn. Niederl. Ost. Ind. II. 1892, p. 285: Cano, Boll. Soc. Nat. Napol. III. 1899, p. 215: Ortmann, Zool. Jahrb. Syst. VII. 1898, p. 78, and in Semon's Forschung. (Jena-Denk. VIII.) Crust. p. 45: Henderson, Trans. Linn. Soc. Zool., (2) V. 1898, p. 372.

*Scylla tranquebarica*, Dana, U. S. Expl. Exp. Crust. pt. I. p. 270: Stimpson, Proc. Ac. Nat. Sci. Philad. 1858, p. 38.

? *Achelous crassimanus*, Macleay Ill. Annulosa. S. Afr. p. 61, (sec. A. M. E.).

Carapace about  $\frac{1}{2}$ , or a little less, as long as broad, practically smooth, except for a faint granular ridge running obliquely inwards across either branchial region from the last spine of the antero-lateral border.

Front cut into four lobes or bluntish teeth of about equal size and prominence. Antero-lateral borders cut into 9 sharply acuminate teeth of about equal size: posterior border forming a curve with the postero-lateral borders, the points of junction sometimes slightly thickened.

Menus of external maxillipeds oblique but not having the antero-external angle distinctly produced in a lateral direction.

Chelipeds not quite twice the length of the carapace in the adult male, but shorter than this in the female and young male. Arm with 3 spines on the anterior border, and 2 on the posterior border—one terminal, the other submedian: a strong spine at inner angle of wrist, the outer angle being rounded and armed with one, or sometimes two, small spines or teeth: hand with 3 spines or tubercles, one being in front of the apex of the wrist-joint, the other two being side by side behind the finger-joint—(the outer of these two is sometimes obsolescent).

Legs unarmed.

Abdomen of male broadly triangular.

An extremely common crab in all the estuaries and backwaters of India, from Karáchi to Mergui. It grows to a large size.

In young specimens the frontal lobes are broad and indistinct, the upper surface of the palm is traversed by two faint but distinct longitudinal costæ, and there may be a transverse granular line across the gastric region.

This is the common edible crab of India.

NEPTUNUS, De Haan, A. Milne Edwards, Miers.

*Neptunus*, De Haan, A. Milne Edwards, Ann. Sci. Nat., Zool., (4) XIV. 1860, p. 226 and Archiv. du Mus. X. 1861, p. 314 (ubi syn.)

*Neptunus*, *Achelous*, *Amphitrite*, *Pontus*, De Haan, Faun. Japon. Crust. pp. 7, 8, 9.

*Posidon*, Herklots, Add. Faun. Carcin. Afric. Ooc. p. 3.

*Lupa*, *Arenaeus*, *Amphitrite*, Dana, U. S. Expl. Exp. Crust. pt. I. pp. 270, 275, 289.

*Euctenota*, Gerstaecker, Archiv. f. Naturges. XXII. 1856, i. p. 181.

*Neptunus*, *Achelous*, A. Milne Edwards *op. cit.*

*Callinectes*, Stimpson, Ann. Lyo. Nat. Hist. New York, VII. 1860, p. 220.

*Xiphonectes*, A. Milne Edwards, Nouv. Archiv. du Mus. IX. 1873, p. 157.

*Heilenus*, A. Milne Edwards, Miss. Sci. Mex., Crust. pp. 210, 221.

*Neptunus*, *Xiphonectes*, Miers, Challenger Brachyura, pp. 171, 183.

*Portunus*, M. J. Rathbun, see Proc. Biol. Soc. Washington, June, 1897, pp. 155, 160.

Carapace usually transverse, broad, and depressed or little convex, often with the surface areolated.

Front proper well delimited from the inner supra-orbital angles and cut into from 3 to 6—usually *four*—teeth: its breadth (not including the supra-orbital angles) is from a sixth to a fifth the greatest breadth of the carapace (lateral epibranchial spines not included), and it is often somewhat receding.

Antero-lateral borders oblique, arched, longer than the postero-lateral, cut into 9 regular teeth (including the outer orbital angle) of which the 9th may be enlarged or not.

The orbit usually has 2 fissures or sutures in the upper border, which border is less prominent than the lower border, so that the orbit very often has a dorsal inclination: the lower border has a fissure or suture near the outer angle, and the inner angle is dentiform and usually very prominent. The antennules fold transversely.

The basal antenna-joint is peculiarly short and has its antero-external angle produced to form a lobule or spine extending into the orbit: the flagellum, which is of fair length, stands in the orbital hiatus.

Epistome short or even linear, sometimes prolonged in the middle line to form a spine lying below the inter-antennular septum. Buccal cavern squarish, broader than long, the efferent branchial channels almost always very well defined.

Chelipeds longer, usually much longer, than any of the legs, and massive: arm with spines, both inner and outer angles of wrist spini-form, palm prismatic costate and usually with spines, fingers usually nearly as long as the palm and strongly toothed.

Legs compressed: in the last pair the merus and carpus are short and broad, and the propodite and dactylus are typically foliaceous and paddle-like for swimming.

The abdomen of the male is five-jointed, the 3rd-5th terga being fused: the 1st tergum in both sexes is almost entirely concealed beneath the carapace.

The Indian species of the genus *Neptunus* fall into five groups, or subgenera, which are characterized as follows:—

- I. Carapace very broad, little convex, and having the junction of the posterior with the postero-lateral angles rounded. Front not projecting beyond, or even receding behind, the internal supra-orbital angles: the last spine of the antero-lateral borders enormously larger than any of the others. Orbits of moderate size and having only a slight dorsal inclination. Antero-external angle of basal antenna-joint produced to a spiniform process lying in the orbit. Epistome produced in the middle line to form a very prominent spine: the antero-external angle of the merus of the external maxillipeds rounded, not produced laterally. Hand at least as massive as the arm..... NEPTUNUS.
- II. Carapace moderately broad, little convex, and having the postero-lateral junctions rounded. Front hardly projecting beyond the internal supra-orbital angles, but not receding: the last spine of the antero-lateral borders a good deal the largest. Orbits large, with a very strong dorsal inclination. Antero-external angle of basal antenna-joint forming a blunt lobe-like process. Epistome slightly produced in a spiniform manner: the antero-external angle of the merus of the external maxillipeds strongly produced in a lateral direction. Hand at least as massive as arm ..... AMPHITRITE.
- III. Carapace suborbicular or not very broad, flat, the postero-lateral junctions rounded. Front slightly projecting beyond the internal supra-orbital angles: the last spine of the antero-lateral border either hardly larger or actually smaller than any of the others. Orbits of moderate size and with a moderate dorsal inclination. Antero-external angle of basal antenna-joint forming a lobe-like process. Epistome hardly produced in the middle line: antero-external angle of merus of external maxillipeds strongly produced in a lateral direction. Hand hardly less massive than the arm ..... ACHELUS.
- IV. Carapace moderately broad, flat or little convex, and having the postero-lateral junctions angular or actually spiniform. Front decidedly prominent beyond the inner supra-orbital angles: the last spine of the antero-lateral borders very much the largest. No free prolongation of the epistome in the middle line. Hand about as massive as arm. [Except in *N. spinipes*, the angle of the basal antenna-joint is a lobe-like process. Except in *N. tuberculosus* and *brockii*, the orbits are large with a very strong dorsal inclination. Except in *N. hastatoides*, the antero-external angle of the

merus of the external maxillipeds is not produced in a lateral direction] ..... HELLENUS.

- V. Carapace moderately broad, distinctly convex, rounded postero-laterally. Front projecting beyond the inner supra-orbital angles: the last spine of the antero-lateral borders slightly the largest. Orbits large, with strong dorsal inclination. Basal antenna-joint longitudinally grooved on ventral surface. No free prolongation of the epistome in the middle line: no lateral expansion of the antero-external angle of the merus of the external maxillipeds. Hand much slenderer than the arm ..... LUPOCYCLOPORUS.

*Key to the Indian species of the genus Neptunus.*

1. Hand either more, or but little less, massive than arm:—
  - A. Last spine of antero-lateral border much the largest:—
    1. Posterior angles of carapace rounded (NEPTUNUS):—
      - i. Antero-external angle of merus of external maxillipeds rounded:—
        - a. No spine on the posterior border of the arm ..... *N. sanguinolentus*,
        - b. A spine at far end of posterior border of arm ..... *N. pelagicus*.
      - ii. Antero-external angle of merus of external maxillipeds strongly produced in a lateral direction (AMPHITRITE):—
        - a. No spot on dactylus of last pair of legs ..... *N. gladiator*,
        - b. A spot on dactylus of last pair of legs: crests of hands and abdomen with a pearly sheen ..... *N. argentatus*.
        - c. Spine at inner angle of wrist two-thirds as long as palm ..... *N. petreus*.
    2. Posterior angles of carapace square or spiniform (HELLENUS):—
      - i. Posterior angles square: front cut into 3 teeth ..... *N. tenuipes*.
      - ii. Posterior angle spiniform: front cut into 4 teeth:—
        - a. Two distinct spines on posterior border of arm:—
          - α. After half of distal border of merus of last pair of legs finely serrulate ..... *N. hastatoides*,
          - β. After half of distal border of merus of last pair of legs smooth ..... *N. andersoni*.

- $\phi$ . A spine near far end of posterior border of merus of last pair of legs ..... *N. spinipes*.  
 b. A single true spine on posterior border of arm:—  
    $\pi$ . Middle teeth of front very much smaller and less prominent than the outer: three spines on hand ..... *N. longispinosus*.  
    $\beta$ . Middle teeth of front nearly as large as, and more prominent than, the outer: two spines on hand ..... *N. tuberculosus*.  
    $\phi$ . Teeth of front obsolescent: no spines on hand ..... *N. brockii*.  
 B. Last spine of antero-lateral border either hardly larger or even smaller than any of the others (ACHELOUS):—  
   1. Carapace granular, last spine of antero-lateral border slightly the largest ..... *N. granulatus*.  
   2. Carapace polished, last spine of antero-lateral border slightly smaller than the others ..... *N. orbicularis*.  
 II. Hand slender, much less massive than arm (LUPOCYCLOPORUS):  
   1. Front cut into four teeth of nearly equal size, of which the middle two are the most prominent ..... *N. whitei*.  
   2. Front cut into four lobes, of which the middle two are much the smaller and are hardly more prominent than the others ..... *N. gracilimanus*.

Dr. J. R. Henderson includes *Neptunus sieboldi*, A. Milne Edwards (Archiv. du Mus. X. 1861, pp. 323, 339, pl. xxxv. fig. 5), which according to de Man is identical with *N. convexus* De Haan, in the Indian Fauna. It appears to belong to the subgenus *Neptunus*, and is distinguished by the uniformity of size and shape of the frontal teeth, by the small size of the last spine of the antero-lateral border, and by the absence of any spine on the posterior border of the arm.

### 11. *Neptunus sanguinolentus*, (Herbst).

*Cancer pelagicus*, (part), Fabricius, Mant. Ins. I. p. 818, and Ent. Syst. II. 447.  
*Cancer sanguinolentus*, Herbst, Krabben, I. ii. 161, pl. viii. figs. 56, 57.  
*Portunus sanguinolentus*, Fabricius, Ent. Syst. Suppl. p. 367: Bosc, Hist. Nat. Crust. I. p. 220: Latreille, Encyc. Meth. X. p. 190.  
*Lupa sanguinolenta*, Desmarest, Dict. Sci. Nat. XXVIII. p. 224, and Consid. Gen. Crust. p. 99: Milne Edwards, Hist. Nat. Crust. I. 461 and in Cuvier Règne An. pl. x. fig. 1: Lucas Hist. Nat. Anim. Art. Crust. p. 101: Dana, U. S. Expl. Exp. Crust. pt. I. p. 271: Stimpson, Proc. Ac. Nat. Sci. Philad. 1858, p. 38: Tozzetti, "Magenta" Crust. p. 68.

*Neptunus sanguinolentus*, De Haan, Faun. Japon. Crust. p. 83: A. Milne Edwards, Archiv. du Mus. X. 1858-1861, pp. 319, 339, and in Maillard's l'île Réunion,