broader, linguiform, and provided along the inner margin with a double row of delicate curving bristles. The distal portion of the basal part is marked off as a distinct segment, furnished interiorly with a fascicle of bristles, whereas exteriorly, between the palp and the exognath, it runs out as an obtusely rounded prominence. The palp is comparatively more strongly developed than in *Lophogaster*, consisting, as in that genus, of two distinctly defined joints, the first of which is short and broad, the last oblong-ovate, and densely fringed with bristles arranged along the inner edge in several rows. The exognath forms a rather large ovate or elliptic lamella, attached exteriorly to the distal segment of the basal part, and fringed with a dense row of very strong and elongate ciliated bristles, all of which exhibit a distinct articulation near the base. This lamella, too, as stated above, fits comparatively closely into the lateral emargination of the carapace at the side of the buccal area (see Pl. IV. fig. 4), forming, as it were, a kind of piston, by the oscillatory movements of which the postero-anterior current of water produced beneath the free portion of the carapace may be regulated.

The maxillipeds (see Pl. IV. fig. 4; Pl. VIII. fig. 8) are rather short and thickset in form, always closely applied to the other oral parts, which are partially covered by them inferiorly. The basal part forms a rather strong transverse trunk, indistinctly divided into two segments, and giving origin, at its anterior extremity, to the incurved terminal part or palp, whereas, exteriorly, there is appended to the base a freely movable membranous plate (*ep*) projecting within the branchial cavity, representing the epipodite. This epipodite, as in *Lophogaster*, is of very considerable size, almost equalling in length the whole maxilliped, and exhibits a narrow lanceolate form, the apex being somewhat recurved. Its function, too, is more properly to produce by its rhythmical movements to and fro, the current of water flowing beneath the free portion of the carapace, and bathing the gill-branches attached outside the bases of the legs. The exopodite is present only in four of the species, viz., *Gnathophausia ingens*, *Gnathophausia gigas*, *Gnathophausia calcarata*, and *Gnathophausia gracilis*, as a very small narrow linguiform plate, fringed with ciliated bristles (see Pl. IV. fig. 4). In the remaining species it is, on the other hand, wholly wanting, and in its place may be observed a small depression invested with a thickened glabrous cuticle (Pl. VIII. fig. 8, *x*), into which the above-mentioned mamillar prominence of the second pair of maxillæ would appear to fit (see Pl. VIII. fig. 17). The terminal part, or palp, scarcely exceeds in length the basal, and is densely beset with bristles on both margins. It consists of five distinctly defined joints, the third of which (carpus) is rather large and laminarly expanded. The terminal joint (dactylus) is lanceolate, and at the inner edge finely dentate. Of distinctly developed masticatory lobes no trace can be found.

The first pair of legs (Pl. VIII. fig. 9) differ but very slightly in appearance from the remaining ones, and cannot therefore be strictly regarded as true gnathopoda. The basal section, contrary to what is the case in the maxillipeds, is exceedingly short, whereas the