of the considerable attention paid to surface netting, and the fact that the Grimothea is known to be a common form, no specimens appear to have been taken by the Challenger, though two examples, presumably from New Zealand—labelled "Wellington Museum,"— are preserved in the collection. An examination of the material at my disposal in no way enables me to confirm Mr. Miers' theory, for a number of young specimens, undoubtedly belonging to Munida subrugosa, and taken on the bottom along with that species, have all the general characters of the adult, and are yet not more than one-third the size of ordinary specimens of Grimothea; nor have I been able to discover in these any great variation in the length of the external maxillipedes. It may, however, be possible that some of the newly hatched young pass to the surface and exist for a longer or shorter period in the Grimothea state; an examination of fresh specimens of the latter can alone decide the question.

In Munida subrugosa a certain amount of variation is noticeable as regards the number and size of the spines on the carapace, chelipedes, and abdominal segments, also as regards the length of the rostrum. In all the specimens which I have examined there is considerable uniformity in regard to the external maxillipedes; the ischium and merus are subequal in length, and their outer surface is as a rule grooved longitudinally, the lateral margins of the former joint terminate distally in spines, and the latter has usually a single spine on the inner margin and one at the distal end of the outer margin; the carpus is without a prominent lobe. In Grimothea gregaria the whole body is soft and adapted for a pelagic life, the abdomen is proportionately narrower, the eyes are of larger size, and the spines everywhere less strongly developed. The external maxillipedes are of great length (about two-thirds the length of the body), and the various joints are smooth and flattened; the merus is considerably longer than the ischium, and the carpus and propodus are each provided with a prominent lobe on the inner margin, while the dactylus is subovate in shape; the hairs which clothe the four terminal joints are of considerable length. It cannot, however, be denied that the external maxillipedes furnish the only important difference between the two forms, and there can be little doubt that these organs are specially adapted for the pelagic life of their owners.

Munida subrugosa (White), var. australiensis, nov. (Pl. XIII. fig. 3).

Characters.—The median rostral spine appears to be longer than usual, a character probably common to young specimens of the species. The spinules on the carapace are more numerous than in the typical form, and arranged as follows:—A row of four spinules stretches across the carapace, two being situated on the anterior margin of the cardiac area, and one on the anterior margin of each branchial region; a single spinule is placed on the inner aspect of the area formed by a splitting of the cervical groove, and a single spinule is placed on each hepatic region immediately external to the anterior gastric spine