

1862. BATE, C. SPENCE.

Catalogue of the specimens of Amphipodous Crustacea in the Collection of the British Museum. London. 1862. iv and 399 pages. Plates I.—LVIII. with Plate Ia. Plate XXI. has its lower half devoted to Plate XIVa.

This ambitious work, beyond the promise of its title, aims at bringing together, in systematic arrangement, all the Amphipoda then known to science. The preface explains that the arrangement of the species follows the classification proposed in the British Association Report for 1855, and adopted in the "British Sessile-eyed Crustacea" then in course of publication, but that observation during the progress of the Catalogue had "suggested a more natural arrangement by the absorption of the Orchestidæ as a subfamily into the Gammaridæ, establishing the Phoxides as a distinct family, and placing them between Corophiidæ and Hyperidæ."

The new species described and figured are, in Fam. 1. ORCHESTIDÆ:—*Talorchestia*? *Africana*, with the remark that "it may be the female of the *Orchestia* that Krauss supposed to be *O. Bottæ*;" "*Orchestia Aucklandiæ*," Hab. Auckland, as to which Mr. G. M. Thomson writes to me from New Zealand, expressing the opinion that Auckland Islands must be intended. *Orchestia Fuegensis*; "*Orchestia Novæ-Zelandiæ*," which along with *Orchestia tenuis*, Dana, G. M. Thomson unites under the common name *Orchestia sylvicola*, Dana; "*Orchestia Telluris*," of which G. M. Thomson remarks that it "is by no means a terrestrial species. It lives in burrows in the sand just above tide-marks;" *Orchestia megalophthalma* (*Orchestia megalophthalmus*, Leach MS., and White's Cat. Crust. B. M.); *Orchestia trigonochirus* (Leach MS. B. M.); "*Allorchestes Piedmontensis*"; "*Allorchestes Knickerbockeri*," a species which W. Faxon thinks may be synonymous with *Amphithoë aztecus*, Saussure, 1858, and the later *Hyaella dentata*, S. I. Smith, as Professor Smith had himself suggested, in which case the name would be *Hyaella azteca*; *Allorchestes carinatus*; "*Allorchestes Sayi*"; *Allorchestes microphthalmus* (*Gammarus microphthalmus*, MS. Brit. Mus.); "*Allorchestes Inca*," said to be perhaps a sex-form of *Allorchestes hirtipalma*, Dana; (for reference of species of *Allorchestes* to the genera *Hyaella* and *Hyaella*, see Note on Rathke, 1837).

In Fam. 2. GAMMARIDÆ. Subfam. 1. STEGOCEPHALIDES:—*Montagua longimana*, perhaps only a variety of *Stenothoë monoculoides*; "*Montagua Guerinii*," which Spence Bate says bears a strong resemblance to *Stenothoë validus*, Dana.

In Subfam. 2. LYSIANASSIDES:—*Anonyx longicornis*, subsequently transferred by its author to the genus *Lepidepecreum*; *Anonyx obesus*, subsequently made the type of the genus *Acidostoma*, Lilljeborg; *Anonyx ampulloides*, Stimpson, MS.; *Anonyx punctatus*, Stimpson, MS.; *Anonyx annulatus*, Stimpson, MS.; *Anonyx longipes*, which with Bate's "*Anonyx ampulla*, Krøyer," Boeck renames *Tryphosa longipes*, as respectively female and male of one species; *Phlias rissoanus*.

In Subfam. 3. AMPELISCADES:—*Ampelisca ingens* (*Pseudophthalmus ingens*, Stimpson, MS.): "*Ampelisca Japonica*," (*Ampelisca Japonica*, Stimpson, MS.).

In Subfam. 4. PHOXIDES:—

*Grayia*, new genus, is thus defined:—"Cephalon produced, hood-shaped. Eyes two. Superior antennæ not appendiculate. Gnathopoda subchelate. Pereiopoda subequal, and terminating in a sharp-pointed curved dactylos. Posterior pleopoda biramous. Telson squamiform, entire?" "This genus differs from *Cedicerus* of Krøyer in having two eyes, and in the fifth pair of pereiopoda not being longer than the preceding."

To this genus two species are assigned, *Grayia imbricata*, n. s., which, in the opinion of A. M. Norman and myself, is the young of *Amathilla sabini*, and *Grayia pugettensis*, Dana, as to