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**The tryphosine genera *Photosella* gen. nov. and *Tryphosella*
Bonnier, 1893 (Crustacea: Amphipoda: Lysianassoidea:
Lysianassidae: Tryphosinae) in Australian waters**

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Abstract

Within the lysianassid amphipod subfamily Tryphosinae the new genus *Photosella* is established with three included species: *P. charlotteae* (Lowry & Stoddart, 2009); *P. miersi* (Stebbing, 1888) and *P. mucronata* (Pirlot, 1936). The genus *Tryphosella* is rediagnosed and thirteen new Australian species are described: *T. betka* **sp. nov.**; *T. bicheno* **sp. nov.**; *T. chinchilla* **sp. nov.**; *T. cooeae* **sp. nov.**; *T. fortescue* **sp. nov.**; *T. freycinet* **sp. nov.**; *T. martrudan* **sp. nov.**; *T. rodondo* **sp. nov.**; *T. sorell* **sp. nov.**; *T. tathra* **sp. nov.**; *T. toowoomba* **sp. nov.**; *T. tuckanarra* **sp. nov.** and *T. wangeratta* **sp. nov.** *Tryphosella camela* and *T. orana* are redescribed. There are now 19 species of *Tryphosella* known from Australian waters. The 79 species currently attributed to *Tryphosella* are carefully assessed: 40 species are confirmed as definitely *Tryphosella*; 24 species are considered as possibly in *Tryphosella*, but cannot be confirmed or denied because of insufficient evidence; and 15 species are excluded from the genus.

Key words: Crustacea, Amphipoda, Lysianassidae, Tryphosinae, Australia, new species, taxonomy, *Photosella*, *Tryphosella*