

Station 76, July 3, 1873; off the Azores; lat.  $38^{\circ} 11' N.$ , long.  $27^{\circ} 9' W.$ ; depth, 900 fathoms; bottom, Pteropod ooze.

Station 78, July 10, 1873; off the Azores; lat.  $37^{\circ} 26' N.$ , long.  $25^{\circ} 13' W.$ ; depth, 1000 fathoms; bottom, volcanic mud.

Station 85, July 19, 1873; off Palma Island (Canaries); lat.  $28^{\circ} 42' N.$ , long.  $18^{\circ} 6' W.$ ; depth, 1125 fathoms; bottom, volcanic mud.

#### APPENDIX TO THE LIMACINIDÆ.

I. Gould has described,<sup>1</sup> under the name of "*Limacina* (?) *cucullata*," a Mollusc which he found to be different from the forms of *Limacina* previously described. For this he eventually proposed to erect the new genus *Agadina*.

The species and genus are, however, described and figured in a fashion so incomplete, and in addition characterised so insufficiently, that it is impossible to decide with any certainty as to their systematic position. One may, however, notice that according to Gould's figures the shell, which measures 6 mm. in diameter, exhibits a right-handed spiral which is not the case with any member of the Limacinidæ.

One must therefore entertain very grave doubts as to the position of this species. It seems to me most probable that it is a *Limacina antarctica* ill-drawn (*cf.* Gould's figure with fig. 4, Pl. II., after Hooker).

The specimen in question was obtained from the Antarctic Ocean ( $60^{\circ} 0' S.$ ,  $106^{\circ} 20' E.$ ). I have carefully sought among the Pteropods of the Challenger collection from that region, but have not been able to find anything corresponding to Gould's description.

A. and H. Adams have nevertheless retained<sup>2</sup> among the Limacinidæ the title *Agadina*; and in 1867 A. Adams described under this generic title two new species, but without any information as to the organisms.

In these, however, in contrast to the *Agadina* of Gould, the shell is perfectly left-handed, and the mouth does not in any way recall the bell-like form of *Limacina cucullata*. And furthermore the operculum of one of the forms is described (though without any notice of the direction of the coils) as multispiral. In this there is a resemblance to *Peraclis*, and there seems some reason therefore to regard the above types as true Limacinidæ.

I have found among the preparations of surface animals collected on the Challenger Expedition, which have been stained and mounted in balsam, one of the species described by A. Adams (*Agadina stimpsoni*), and another form of the same group, which is, however, quite distinct from either of the species above noted.

Having found several specimens of *Agadina stimpsoni* and of *Agadina*, n. sp., I have

<sup>1</sup> The Mollusca and Shells of the U.S. Exploring Expedition, p. 486, pl. li. fig. 601.

<sup>2</sup> *Proc. Zool. Soc. Lond.*, 1867, p. 309.