

was confirmed by placing specimens in glass dishes with a layer of harbour mud on the bottom; the copepods buried themselves almost immediately. This is all the more remarkable in that the indications are that *Calanopia* is a truly pelagic form, and the possibility that other plankton animals may at certain times do likewise should be borne in mind.

F. S. R.

**M. V. Lebour.** "Notes on the Plymouth species of *Spirontocaris* (Crustacea)." Proc. Zool. Soc. London. Pt. 1, 1936, pp. 89—104, 7 Plates. London, 1936.

Four years ago Miss Lebour described the development of *Spirontocaris cranchii*, the only species of the genus known to occur at Plymouth. Further observation showed that there are two forms of *Spirontocaris* larva in the plankton which differ in the number of exopods on the legs, and these larvae were reared through a succession of post-larval moults until it became clear that there are two perfectly distinct adult species of *Spirontocaris*, one of which is described as a new species, *S. occulta*. Study of the literature shows that this new species has been seen before, but has been confused with *S. cranchii*, which it very closely resembles in outward form. Curiously enough Miss Lebour finds that *S. cranchii* has no mandible palp, although the presence of the palp is the main character which separates *Spirontocaris* from the allied genus *Thor*. She notes a correspondence between the habitat and the degree to which the palp is developed in different species of *Spirontocaris*, and discusses its value as a systematic feature.

Her description of the adults and larvae of the two species, with a comparison of the larval forms of the genera *Spirontocaris* and *Hippolyte*, and discussion of the epipodites in relation to the accepted gill formula, is a valuable contribution to the systematics of the Hippolytidae. Miss Lebour's work on *Caridion* and *Spirontocaris* shows the great importance of the study of the larval phase in the systematics of the Decapoda, and it is unfortunate that her opportunities for further contributions of this kind are so limited by the absence from the British fauna of genera such as *Thor* and other Hippolytidae.

R. G.

**A. Vedel Tåning.** "On the Eggs and Young Stages of the Halibut." Medd. Komm. Danmarks Fisk.- og Havunders., Ser. Fisk., Bd. X. Nr. 4, pp. 1—23, 8 Fig. København, 1936.

Trotz der grossen Verbreitung des Heilbutts (*Hippoglossus hippoglossus* L.) und seiner wirtschaftlichen Bedeutung ist die Aufhellung seiner Lebensgewohnheiten bisher erheblichen Schwierigkeiten begegnet, und wie bei der Erforschung der fischereibiologischen Eigentümlichkeiten seines Verwandten, des pazifischen Heilbutts (*Hippoglossus stenolepis* P. Schmidt), so hat die Feststellung einiger wichtiger Tatsachen, den Laichvorgang betreffend, recht lange auf sich warten lassen.

Nach den früheren Bemühungen dänischer und norwegischer Forscher ist aber jetzt durch die Beobachtungen von Å. Vedel Tåning, die in der vorliegenden Arbeit veröffentlicht werden, ein entscheidender Schritt vorwärts gemacht worden, und besonders sind wir über die Beschaffenheit der planktonischen Eier des Heilbutts jetzt völlig im klaren.

Nachdem G. Røllfesen auf Grund einer im Aquarium zu Trondheim