PLATE IV.

- Fig. 1. *Colsa costastriga*, p. 96; 1a, the head and rostrum seen in front; 1b, the same seen sideways.
- Fig. 2. *Bidis notivena*, p. 88; 2a, the head and rostrum seen in front; 2b, the same seen sideways.
- Fig. 3. *Conna guttifera*, p. 90; 3a, the head and rostrum seen in front; 3b, the same seen sideways.
- Fig. 4. *Elica latipennis*, p. 86; 4a, the head and rostrum seen in front; 4b, the same seen sideways.
- Fig. 5. *Daradax fusipennis*, p. 86; 5a, the head and rostrum seen in front; 5b, the same seen sideways; 5c, the extremity of the abdomen seen sideways.
- Fig. 6. *Euria lurida*, p. 88; 6a, the head and rostrum seen in front; 6b, the same seen sideways; 6c, the extremity of the abdomen seen sideways.

On the Occurrence of *Sepia biserialis* in Cornwall.

By JONATHAN COUCH, Esq., F.L.S. &c.

[Read March 4th, 1856.]

It appears from the "History of British Mollusca," by Professor E. Forbes and Mr. Hanley (vol. iv. p. 241, and Pl. P.P.P.), that the *Sepia biserialis* is regarded as of very rare occurrence in Britain; one specimen only of its shell or plate having been found in England and three in Ireland. The English specimen was obtained on the shore of the county of Northumberland. It may therefore be regarded as of some importance in the completion of our local fauna, to make the Linnean Society acquainted with the fact, that in the course of two days in the month of February of the present year I have myself found no less than ten specimens of the dorsal plate or shell of this animal, scattered among perhaps a hundred of those of the Common Bone or Burn Cuttle, *Sepia officinalis*.

My attention was attracted to these specimens by the beautiful pale pink colour of the dorsal aspect of the shell; and a very slight examination of the most perfect specimen I could find, compared with those of the common species, was sufficient to point out the decided distinction there is between them; but as the shell of this species is but little known, and those which have fallen into my hands are slightly different from what is described in the work above referred to, I beg leave to lay before the Society a more particular description than might otherwise be necessary.

The length of this shell, as described by Professor Forbes, was

$2\frac{1}{2}$ inches, and the breadth (I suppose without the membranous wing) was $\frac{1}{8}$ ths of an inch; but in the most perfect of my specimens, which however is defective at its blunt end, the length is 4 inches, and the breadth, including the membranous border, $1\frac{1}{8}$ inch. The form is much more slender than in the common species, and, as it approaches the mucro or spur, may be described as lancet-shaped. The spur projects much more considerably than in the *Sepia officinalis*, although in the latter I find a difference in different specimens. In the *S. biserialis* it advances $\frac{1}{8}$ th of an inch beyond the membranous border in a straightforward direction, whereas in the *S. officinalis* it is depressed and bent inward. The membranous border at this part is also turned inward, so as to enclose a cavity, and conceal the narrower portion of the shell. The structure of this spur in the *S. biserialis* is also different; for while that of the common species is for the most part hooked, round and simple, in the *S. biserialis* it is slightly lobed or keeled. I have not been able to assure myself of its shape at the point, as in my most perfect specimen it was a little injured.

In addition to these well-marked distinctions, the rarer species is smooth on its dorsal aspect at that part where the more common is covered with a decided graining. The transverse striae are also much more numerous, and of a finer structure. Their direction also at the sides is not so bent towards the slender extremity.

It is still a subject of interesting inquiry whether the animal to which this shell or plate belongs is truly a native of our own waters, since it does not appear that any observer has ascertained its existence. It is to be observed, however, that although the whole of these specimens were injured, and most of them much broken, they were scarcely more so than were those of the common species, which is, beyond question, common on our coasts. The two species were lying together on the beach, as they had been left by the tide; and although there were at no great distance from them many specimens of the stalks of the American maize, clothed with perfect leaves—and although without heads of grain, still bearing clumps of the male flowers,—yet we cannot conclude from the presence of these foreign plants that the shells can have come to us from a considerable distance, since those of the *Sepia officinalis* certainly have not done so, and the leaves and stalks of the plants bear no marks of long immersion or of a distant voyage. It is probable that they were thrown overboard from

some ship, as is often the case with foreign productions which we find cast up on our shores.

Polperro, 1856.

Notice of the "Borer," a Caterpillar very injurious to the Sugar-Cane. By J. O. WESTWOOD, Esq., F.L.S. &c.

[Read June 3rd, 1856.]

[Abstract.]

MR. WESTWOOD gave an account of the natural history of the "Borer," or caterpillar of a moth which is at the present time doing immense damage to the sugar-canes in the island of Mauritius. A committee had been formed in the island, composed of the chief planters and scientific individuals, for the purpose of investigating the subject, and from the able report which they had drawn up, it appears that the insects were in all probability imported with a cargo of new cane plants from the island of Ceylon several years ago, and that since that time the damage has been rapidly extending, and now threatens the entire destruction of the plantations. The female insect deposits her eggs in the axils of the young leaves, and the larvæ as soon as hatched bore into the stem, forming long galleries filled with the excrement of the insect, and which have the effect of bringing the stem into such a state of disease, that no crystallization will take place, and the plant becomes quite useless even for making rum. The entire transformations of the insect are effected in about six weeks, so that there are at least six successive generations in the course of a year. It appears that the chrysalis state is passed in a slight cocoon spun amongst the dead leaves of the plant; and the committee, after reviewing various proposals suggested for the destruction of the insect, had come to the conclusion that a well-organized system of burning the infested canes, as well as all loose rubbish and leaves in the plantation, was the only practicable means of getting rid of the enemy. Dr. Ulcoq, an extensive sugar-cane planter in the island, who was present at the meeting, confirmed the details contained in the report, and begged for any suggestions which could be offered by scientific men in this country for the purpose of remedying the evil. He had already been in communication with M. Guérin-Méneville and other naturalists in Paris.

Several of the members present took part in the discussion