

in the second of the two propositions above enumerated. At the same time we find the spot where the pore will appear indicated by a pointed projection of the sac between the muscles, and it is a fact very worthy of notice that the more we approach this preformed outward duct, the less ripe are the ova (Pl. XV. fig. 14). The same fact is noticed in many other Nemertea; *Pelagonemertes* even shows traces of it (Pl. VIII. fig. 8, *ov.*) In *Carinella* I found it persisting even after the definite pore is established, and the most plausible explanation appears to me to be this, that the deeper inwards the developing generative products are situated, the more they are surrounded by the gelatinous tissue, and the better their conditions of nutrition must be; whereas those which are observed close to the duct, piercing the muscles, will only gradually increase in size, when in their turn similar favourable conditions are offered to them.

The fact of the occurrence of definite preformed ducts without pores was observed by me in *Amphiporus moseleyi*, *Amphiporus marioni*, *Drepanophorus lankesteri*, and *Drepanophorus serraticollis*, and of several of these I also had ripe specimens, in which the fact could be determined that it is, indeed, in the places where these pointed projections are found that the pores afterwards appear (Pl. IX. figs. 5, 6).

In this place I may mention that according to embryological observations (XIV) the generative sacs are primitively in connection, at least in the species investigated, with the epiblast by means of a strand of tissue which is not indicative of the ultimate duct. These strands, however, are situated on the other side of the nerve-stem, and thus are in no way identical with the projections which were here described and discussed as preceding the definite generative pores.

The duct which pierces the muscles to afford a passage to the generative products is generally shortened as maturity advances, through the distension of the body by the ripening of ova or spermatozoa, and the consequent decrease in thickness of the muscular body-wall. Still, in *Cerebratulus macroren* this duct presented an uncommon feature, which must here be mentioned, and which is figured on Pl. XV. fig. 19. After having pierced the circular muscular layer β , it distends in the layer γ to a second sac-like expansion, which in its turn communicates with the exterior by a small opening. This was not a local disturbance, but was met with in very numerous generative ducts, both on the right and left sides of the animal.

In *Eupolia* and Schizonemertea the ripening sacs, developing in pairs between each successive pair of intestinal cæca, are often wedge-shaped, with the sharp edge turned outwards, and the broad end between the two intestinal cæca, where these emerge from the principal longitudinal cavity of the intestine (see woodcut fig. 6, p. 120). And, in addition to this, another fact is very marked in *Eupolia giardii*, viz., that dorsally and ventrally the generative cæca become lobulated or arborescent, sending out short lobes of indented and irregular shape.

It would, however, lead us too far, and hardly offer any additional interest, to discuss