

"Thorax having nine segments; its length not quite so great as that of the head; axis broadest anteriorly, more strongly convex, and about one-third narrower than the lateral lobes are; segments extending straight across the lobe; lateral lobes depressed, their greatest convexity along the middle; pleuræ bluntly pointed at their outer ends, the points not being directed very strongly backward; their inner ends so joined to the axial segments that they have the appearance of lapping a little upon them just inside the dorsal furrow; grooved, the groove being deepest about mid-length, where the outer and inner portions of its front border meet at a distinct but very obtuse angle; grooves extending from the dorsal furrow nearly to the extremity of the pleuræ, where they disappear.

"Pygidium somewhat semicircular in outline, distinctly trilobate; segmentation indistinct, so much so in some of the specimens that the surface appears nearly as plain as that of an *Asaphus*, but the segmentation is usually more distinctly shown upon surfaces from which the crust has been removed; axis prominent, especially at its distal end, where it terminates abruptly at the inner edge of the broad marginal border; segments of axial lobe eight or ten; lateral lobes much depressed, a little wider than the axial lobe at the anterior end, and narrowing to an incurved point at the end of the axis; the whole exterior margin having a broad, flat border of nearly uniform width throughout; the under surface of this border marked by fine, somewhat irregular, longitudinal striæ, such as are usually seen upon corresponding parts of *Asaphus*.

"The largest specimen in the collection is about seven centimeters long.

"These specimens are the same that were used by Mr. Meek in his description of this species, and upon which he also based his genus *Asaphiscus*."

All the specimens are more or less flattened by compression; but from a few that show portions of the original convexity it is proven to have been about as in the genus *Bathyrus*. The strongly marked border of the pygidium also arises from the compression of the doublure up against the upper surface. In an uncompressed specimen the slope from the central axis to the margin is unbroken by any marked line.

Formation and localities.—Middle Cambrian. House Range, Antelope Springs, Utah. An identical form of pygidium also occurs at Pioche, Nevada, associated with *Olenoides typicalis*.

Genus DORYPYGE Dames.

Dorypyge Dames, 1883. China, Richthofen, vol. iv, p. 23.

It was not until the last pages of this report were put in type that I had the opportunity of reading Dr. Dames's description of the genus