

100 species of land-plants. They are almost all acrogens, lycopods and ferns being largely predominant. Among the distinctive forms the following may be mentioned: *Psilophyton* (Fig. 350), *Arthrostigma*, *Leptophleum*, and *Prototaxites*. Forty-nine ferns include the genera *Palæopteris* (*Cyclopteris*), *Neuropteris*, *Sphenopteris*, and some tree-ferns

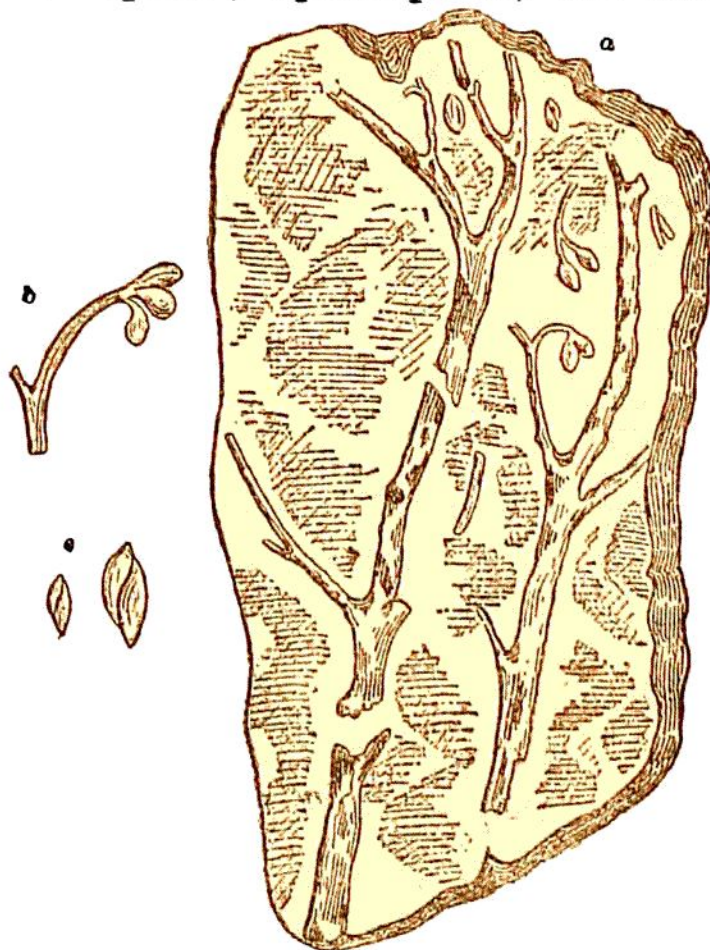


Fig. 350.—*Psilophyton robustum*, Dawson. Lower Old Red Sandstone, Perthshire.  
Drawn by Mr. R. Kidston.

*a*, specimen of the plant  $\frac{1}{2}$  nat. size; *b*, fructification; *c*, empty spore-cases.

(*Psaronius*, *Caulopteris*). *Lepidodendroid* and *sigillaroid* plants abound, as well as *calamites*. Higher forms of vegetation are represented by a few conifers (*Dadoxylon*, *Ormoxyton*,<sup>158</sup> etc.). From a locality on Lake Erie, Dawson describes a fragment of what he believes to be dicotyledo-

<sup>158</sup> Mem. Geol. Survey Canada, 1871; op. cit. 1873. Q. J. Geol. Soc. 1881, p. 299. "Acadian Geology," 2d edition. *Prototaxites*, included by Dawson among the *Coniferæ*, is relegated by Mr. Carruthers to the *Algæ* under the name of *Nematophycus*—a genus also found in the Upper Silurian rocks of N. Wales. Month. Microscopical Journ. 1872.