

quartzite with shales above it carrying *Lingulella Ella*, *Olenellus Gilberti*, and *Bathyriscus producta*, and at Antelope Spring, in the House Range, Western Utah, Mr. G. K. Gilbert measured the following section (Geog. and Geol. Expl. and Surv. West 100th Merid., vol. iii, p. 167), from the top downward:

	Feet.
1. Gray, massive limestone .....	200
2. Blue-gray, calcareous shale .....	200
Fossils (as corrected by C. D. W.): <i>Acrothele subsidua</i> , <i>Agnostus inter-</i> <i>strictus</i> , <i>Olenoides Nevadensis</i> , <i>Ptychoparia Kingi</i> , <i>P. Housensis</i> , and <i>Asaphiscus Wheeleri</i> .	
3. Gray limestone, light and dark, chiefly massive .....	900
4. Vitreous sandstone, umber-brown on weathered face; base not seen .....	1,000
Total .....	2,300

§ 79. No. 4 of this section may be correlated with No. 1 of the Eureka and Highland sections or No. 12 of the Wasatch section; and the fossil-bearing shale No. 2 is the stratigraphic, lithologic, and paleontologic equivalent of No. 13 of the Highland Range section; and although there is but one species in common, *Acrothele subsidua*, the general facies of the fauna is comparable to that of the fauna of division 13 of the Highland Range section.

#### CORRELATION OF SECTIONS.

§ 80. The foregoing sections show that the Middle Cambrian fauna has a distinct stratigraphic position in the Cambrian System and that it is widely distributed over the North American continent. When studying the faunas we found that of the Vermont section to be similar to that of the Bic Harbor and L'Anse au Loup first determined by Mr. Billings; and that the Bic Harbor and the Troy fauna were united by twelve species common to each locality, first determined by Mr. S. W. Ford and Mr. Billings. With the Nevada area there is a greater difference; but the presence of a pre-Potsdam fauna, characterized by the genera *Olenellus*, *Olenoides*, and *Protypus*—all of which are found in the typical Georgia section—serves to unite them.

§ 81. Throughout the Mississippi Valley, including the areas of Upper Cambrian in Llano County, Texas, and in Wisconsin, nothing is known of the Georgia fauna; but to the northwest, on the eastern slope of the Rocky Mountains, Dr. George M. Dawson discovered a species of *Olenellus* like *O. Gilberti*, also *Protypus senectus*, thus showing the extension of the fauna north from Southern to Central Nevada, and northeast to Kicking Horse Lake in British Columbia.

§ 82. In the accompanying table an attempt is made to correlate the principal sections herein mentioned. The Georgia or *Olenellus* fauna of the Middle Cambrian and the Potsdam or *Dicellosephalus* fauna of the Upper Cambrian are taken as the two horizons to locate the local sections on the line of the great section, as their relations are known in