VI .- The Correlation of the Animikie and Huronian Rocks of Lake Superior.

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Having had more than twenty years experience, as a practical geologist, among the rocks of nearly every district on both sides of Lake Superior, I may be allowed to offer to the Royal Society the results of my studies of the relations which the different formations of these regions bear to one another. A want of agreement has lately arisen among geologists, as to the equivalency, or otherwise, of the Animikie and the Huronian series of this part of the Dominion, and I propose to confine my remarks chiefly to an elucidation of this problem. I think I am in possession of sufficient facts to set at rest any question as to their mutual relations. The term "Huronian" was first applied by Logan and Murray to a set of metamorphic and igneous rocks north of Lake Huron, and the name was soon extended to rocks, similar to the majority of these, on Lake Superior. Sir William Logan also called the Huronian, the "Lower Copper-Bearing Rocks," and the series of which the Animikie forms the lower part, the "Upper Copper-Bearing Rocks" of Lake Superior. What is considered to be the equivalent of the upper division of this latter series on the south shore of the lake was afterwards called the "Keweenian" formation by the United States Geologists, the name being derived from Keweenaw or Kewaiwana Point. Logan's names—Lower and Upper groups of the Upper Copper-Bearing Rocks of Lake Superior were found to be inconveniently long for constant use, and Dr. Bell proposed to call the whole series the "Nipigon" formation, it being extensively developed around Nipigon Lake and the Bay of the same name on Lake Superior. The lower and upper groups of the Nipigon (or Upper Copper-Bearing) formation appeared, from Dr. Bell's descriptions, to be unconformable to one another, and Dr. T. S. Hunt, at the suggestion of the writer, proposed the name "Animikie" for the lower portion—Animikie being the Outchipwai name for "thunder," the formation being well developed around Thunder Bay. The name "Nipigon" would then be restricted to the upper division. The sandstones of Sault Ste. Marie are generally conceded to be newer than any of the formations referred to, although their relations to some of them have not yet been very satisfactorily demonstrated. According to the Canadian geologists, we have therefore, on Lake Superior, the following sets of rocks, in descending order :-

- 1. The Sault Ste. Marie sandstones, resting apparently unconformably on the Keweenian.
 - 2. The Nipigon formation, equivalent, at least in part, to the Keweenian.
- 3. The Animikie formation, unconformable to both the Nipigon above and the Huronian below.

4. The Huronian system.

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