CHAPTER II.

GEOLOGY.

I shall now proceed to give a brief outline of the geological features of each section. They may be conveniently designated.

1. The South-Eastern Palæozoic Basin.
2. The Central-and-Western Palæozoic Basin.
3. The Archæan Nucleus.

They are geographically coterminous with the physico-geographic areas, though within the limits of each there are included portions of the others. Thus the northern peninsula of Nova Scotia (Cape Breton Island) and some other axial ridges in the eastern Palæozoic basin belong to the Archæan nucleus. The island of Anticosti, the basins of Lakes St. John, Mistassini, Nipissing, Temiscamang and James' Bay, and probably others not yet observed, are geologically outliers of the Central-and-Western Basin. While in the South-Eastern Basin we have Carboniferous and Triassic formations which, not having been subjected to the action of those forces already referred to as having given rise to the general physical aspect of the region, are comparatively undisturbed, and where these occur, a level or gently undulating surface replaces the hills, ridges and mountains formed of the disturbed lower palæozoic and more ancient strata.

Except some doubtfully Triassic areas in Nova Scotia and Prince Edward Island there are—apart from Post-Tertiary deposits—no formations newer than the coal measures, in any part of the Eastern Section of the Dominion. Below the Carboniferous, all the larger divisions (systems) from Laurentian to Devonian are represented in the South-Eastern Basin, including many of the formations and groups into which these have been elsewhere locally divided.

On the geologically colored map of the Dominion, in explanation of which this sketch has been prepared, the scale—forty miles to one inch—is not large enough for these subdivisions to be indicated, though when possible to do so the supposed lower, middle or upper portions of the system have been shewn respectively by vertical, diagonal and horizontal lines.

1. The South-Eastern Palæozoic Basin.

In the geological map of Canada, 1866, the principal features of the South Eastern Palæozoic Basin are: 1st. The so-called Quebec group, occupying an area nowhere exceeding thirty miles in width, but extending from the Vermont boundary to Cape Rosier in Gaspe.