



Plate III. Map of the Glaciated Areas in North America and Europe, from Professor Wright's book, "Man and the Glacial Period."

The large cross X which Mr. Cotsworth has inserted to the east of the present position of the North Pole shows where the pole was 5,000 years ago, as indicated by the slope of the Great Pyramid in Egypt.

"C," to the right of the map, marks the probable latitude of England when the English coal beds were formed in Equatorial swamps.

"P," on the top of the map, marks the probable position of the North Pole when England was in latitude "C," where Central Africa now grows the thick mass of tropical marsh-grown trees, sudd and other dense vegetable matter now choking the equatorial swampy waters of the Nile and that vast territory south of Kordofan—the potential coal beds of the remote future.

The "dot and dash" line - . - . - indicates the supposed course of the Pole from Behring's Straits. The arrows show the present direction of the Gulf Stream. The "hit and miss" line - - - , curving across the Atlantic from the American glacial boundary deposit to its corresponding boundary deposit in Europe, marks the limit of the glacial ice-cap when the North Pole turned south of Greenland.

Note the parallel character of the lines marking the boundary of the glacial deposit in America and Europe with the line indicating the supposed course of the North Pole when it moved across from Behring Straits. Apparently at one time the centre of Hudson's Bay was the site of the North Pole. The changing climate of Canada, therefore, tends to make Hudson's Bay more free from ice every year.

other reliable investigators explored the opposite latitudes of Greenland they found that (excepting its southern point and the northeast tip) that continental area, approximately 500,000 square miles, is practically buried under the lop-sided Polar ice-cap averaging *about 9,000 feet thick*.

4. That enormous mass of glacial ice, if spread over North America, would cover the whole of the United States, Mexico, Canada and Alaska with a layer about 500 feet thick. As now accumulated in Greenland it exerts an eroding pressure of more than 200 tons per square foot towards the Atlantic, as by the vertical pressure of its interior it is pressed outward and flows towards Greenland's coasts at the rate of about 40 feet per day throughout every

year, as a mass of pitch placed on a table would by gravitation similarly flow outwards on all sides.

The out-creeping ice is thus forced down the coast fiords, where it breaks off in those huge icebergs which, by floating southwards, are increasingly developing dangers to the trans-Atlantic steamships, as forcibly brought to our notice by the Titanic disaster.

5. The immensity of the Greenland ice-cap is beyond comprehension, as Greenland has about 3,600 miles of iceberging coastline. Through Dr. Rink's observations, made during more than thirty years, we are enabled to gather a mental glimpse of Greenland feeding the Atlantic with ice down the typical fiord of "Jacobshavn,"