VISIT TO MISS JOHNSTON'S GEOLOGICAL COLLECTION AT HAZLEWOOD, WIMBLEDON HILL.

SATURDAY, FEBRUARY 12TH, 1910.

(*Report by* MISS JOHNSTON.)

DURING the afternoon of February 12th a party of members and their friends visited Hazlewood, Wimbledon Hill, by the invitation of Mrs. and Miss Johnston, to see the Geological Collection which Miss Johnston had recently brought from Egypt.

Considerable interest was evinced over the sun-split flint pebbles, found only in one place, in the desert between Ghizeh and Abu Roash, west of Cairo, and over the implements and artificially chipped fragments of red chert, found on the ridge between Der el Bahri and the Tombs of the Kings and on the plateau near the mouth of Wadi Hof, south of Cairo. Both lots were lying on limestone of Eocene Age containing flint or chert. Messrs. Hazzledine Warren, Leach, and Martin took part in a discussion on the subject.

Dr. Teall made some remarks on the specimens, at the collecting of which he had been present. He started with the examples of igneous rocks from the First and Second Cataracts (the well-known hornblende granite and diorites). The exposed surfaces of these rocks have often a lustrous appearance, due, in some cases, to a deposit from the water, and in others to friction from suspended material. It only occurs on them between the points reached at high and low Nile. The primeval floor of igneous rocks and crystalline schists, in this part of the country, is thought by Dr. Hume to have been brought up by folds; the cataracts, which are all formed by these rocks, being the crests of the waves from which the Nubian sandstone has been removed by denudation. Wherever the sandstone is seen capping the igneous rock, the latter, in the places visited, was always decomposed to a depth of 3 or 4 feet. The basement bed of the sandstone contained pebbles of pink quartz and pieces of decomposed rock, and dykes in the granite were seen to be cut off at the junction, thus showing that the sandstone was deposited on the granite. Attention was directed to the specimens illustrating the lithological characters and fossil contents of the Cretaceous and Tertiary rocks of the Nile Valley.

The nummulites in the Lower Mokattams (Middle Eocene) were specially mentioned as illustrating the theory of "alternation of generation." One specimen contained the two different generations. The whorl of chambers, in the one case, starts from a small cell, and in the other, from a much larger cell. Attention was also directed to a specimen from a hill south of the Ghizeh

Pyramids, in which Pliocene oysters—*Ostrea cucullata*—could be seen sticking to a surface of Eocene limestone and thus showing the approximate limit of the Pliocene sea which extended up the Nile Valley. Pectens and *Clypeaster aegyptiacus* of this age from a sandy deposit on the slopes of the valley about two miles further south were also referred to. A specimen of quartzite from the so-called fossil geyser in the Mokattam Hills behind the Tombs of Khalifs was referred to, and it was pointed out that the material is entirely unlike the deposit of modern geysers. The quartzite, as shown in a photograph, forms a low hill, in shape that of a truncated cone, and apparently cuts through the horizontal Eocene beds (Upper Mokattam) without disturbing or altering them. The various weathered forms were next passed in review, and attention was called to the resemblance between some of these and the “sastrugi” of the wind-swept ice of the Antarctic regions. This portion of the collection included fine specimens of dreikanter and eroded Nubian sandstone.

Reference was also made to the great quantities of selenite found amongst the Eocene limestones and shales, especially in the Wadi Hof district and in the Mokattam Hills, and to two rose-shaped pseudomorphs of calcite after selenite.

After the inspection of the collection the members were entertained to tea by Mrs. Johnston.

A hearty vote of thanks was proposed by the President to Mrs. and Miss Johnston and to Dr. Teall. This was acknowledged by Dr. Teall, after which the meeting terminated.

VISIT TO THE IMPERIAL INSTITUTE, SOUTH KENSINGTON.

(THE ROCKS AND MINERALS OF PENINSULAR INDIA.)

SATURDAY, 19TH FEBRUARY, 1910.

Director : JOHN W. EVANS, D.Sc., LL.B., F.G.S.

(*Report by* THE DIRECTOR.)

DR. EVANS met the members of the Association, some twenty-five in number, at the eastern entrance, which leads directly into the Indian Court, where specimens of the vegetable products of the country, including lac, indigo, tea, spices, quinine and opium, and models of agricultural operations, were pointed out on the way to the Indian Pavilion. Here the structure and geology of the Peninsula were described with the aid of a large geological map, while proof copies of a tabular arrangement of the strata were distributed. These are here reprinted, with some modifications. They are founded on the publications