

may possibly be of interest to the readers of SCIENCE.

In 1870, through the medium of the public press, a Mr. John Hampden wagered £500 that the convexity of the surface of any inland water could not be proved. Mr. Wallace accepted the challenge. The old Bedford Canal was chosen for the experiment and a six-mile stretch between two bridges selected as the site. On the higher of the two bridges a white sheet, six feet long and three feet wide, was fastened. Along the center of the sheet parallel to the water was a six-inch black band, the lower edge of which was at the same height above the water as the parapet of the second bridge. At the half-way point a pole with two red discs, four feet apart, was erected in such a way that the center of the upper disc was at the same height as the center of the black band. A six-inch telescope, resting on the parapet of the second bridge, was used for sighting. The result, as seen through the telescope, is shown in the accompanying figure. A second experiment was performed with a spirit-level.

EXPERIMENTS ON EARTH CURVATURE

AFTER reading my article on earth curvature¹ Mr. H. F. Dunham, of New York, called my attention to similar experiments reported

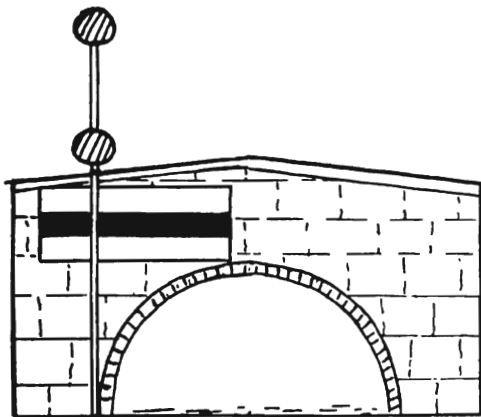


FIG. 1

by Mr. Alfred Russel Wallace.² A brief sketch of Wallace's experiment and its results

¹ "A Simple Method of Proving that the Earth is Round," *Nat. Geog. Mag.*, XVIII., 771.

² "My Life," Alfred Russel Wallace, Vol. II., 381-393.

The sequel of the experiment is almost as interesting as the experiment. The referee for Mr. Hampden, a devotee of the flat earth school, insisted, on looking through the telescope, that the three points were in a straight line. Hampden, who refused to look through the instrument, accepted the statement, although Wallace's referee declared that the curvature was shown. An umpire, chosen to settle the difficulty, awarded the money to Wallace. Then followed a remarkable series of libels, persecutions and recriminations. As late as 1885 Hampden published, among other things, the statement that "no one but a degraded swindler has dared to make a fraudulent attempt to support the globular theory." Wallace sums up his experience in this matter thus: ". . . two law suits, the four prosecutions for libel, the payments and costs of the settlements amounting to considerably more than the £500 pounds I received from Hampden, besides which I bore all the costs of the week's experiments, and between fifteen and twenty years of continued persecution."

The whole story as presented by Wallace is

a most astounding series of libels, against which he seemed to have been utterly powerless.

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