A Science Service Feature

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? WHY THE WEATHER ? Mailed August 27, 1932

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Authority on Meteorology.

FULGURITES

On the shelves of many museums may be seen specimens of fulgurites, or lightning-tubes, produced by the fusing of loose sand along the path of a lightning discharge. They are of various sizes, from a fraction of an inch to several inches in diameter, and sometimes twenty-five feet or more in length. The inner surface of these tube-like formations is of smooth glass, while the outer consists of rough, incompletely fused particles of sand and often bears longitudinal ridges and furrows. The tubes are frequently twisted in spirals and are sometimes branched.

At one time fulgurites were believed to be formed by excretions from the roots of plants. Their true origin was first recognized by Dr. Hentzen, of Paderborn, Germany, in 1805. Darwin, in his "Naturalist's Voyage Around the World," tells of finding these tubes in large numbers along the Rio de la Plata, in South America, where shifting sandhills had left them projecting above the ground.

In some cases the lightning that formed the tubes has been seen to strike and the fulgurites have been dug up while still hot to the touch. A few years ago Prof. R.W. Wood, of Johns Hopkins University, saw lightning strike on his lawn. On examining the spot he found a hole, into which he poured melted solder. After this had hardened he dug it up and thus secured the "cast" of a fulgurite.

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