

# *FOSSIL LIGHTNING*

by STAFF WRITER

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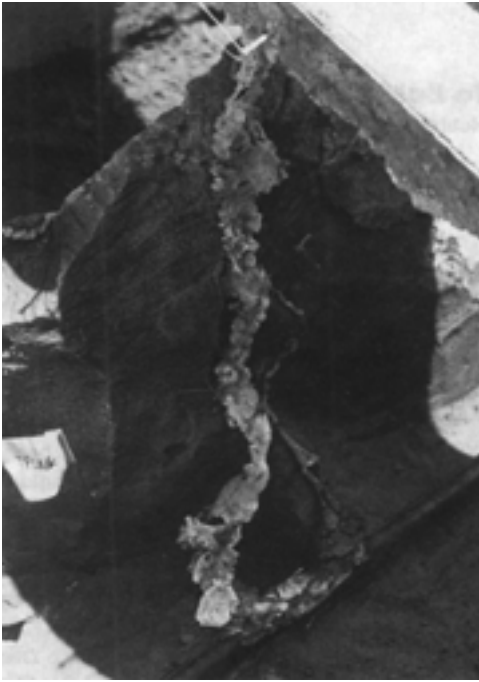
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Few things are evanescent as lightning. Yet Martin Uman can boast of a collection of “frozen” lightning bolts. Uman, an electrical engineer at the University of Florida, collects fulgurites. These long, glassy tubes form when lightning strikes the ground and melts sand in the soil, creating a hollow outline of the bolt’s underground path. But Uman is more than a hobbyist. He studies the effect of lightning on buried cables—like the one shown here under a zigzagging fulgurite. The underground bolts can surge through the soil,



pierce a cable's insulation, melt some of the wires, and disrupt electrical service. Uman and his colleagues don't wait for lightning to strike at random: they get it to strike when they want it by firing a rocket trailing metal wires into storm clouds. That allows a group of paleontologists from the university—experts in unearthing frag-

ile artifacts—to know exactly where to dig for fulgurites. So far, Uman and his collaborators have excavated five fulgurites formed by artificially induced lightning and one naturally formed fulgurite. “Our longest one,” says Uman, “traveled over ten feet in all and down three feet.”

*THE EVENT*

*PETRIFIED LIGHTNING FROM CENTRAL FLORIDA*

A PROJECT BY ALLAN MCCOLLUM

CONTEMPORARY ART MUSEUM  
UNIVERSITY OF SOUTH FLORIDA

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