

## METEOROLOGY

# Prepared for Hurricanes

Early warning is given by photographs taken by orbiting weather satellites. Put on guard, people can take necessary precautionary measures.

► WITH Hurricane Anna signaling the true beginning of the hurricane season, U.S. scientists are better prepared to spot and track the tropical storms than ever before.

A weather satellite, Tiros III, whirling overhead looking for weather trouble spots, a sea-going robot automatically sending weather information back to shore, and a more sophisticated hurricane warning radar system blanketing U.S. East and Gulf Coasts have bolstered the weatherman's defense to a high degree of perfection.

Although scientists still can not control hurricanes, the improvements in weather detection have already dramatically reduced the death toll, Willard W. Shinnery, U.S. Weather Bureau meteorologist, told SCIENCE SERVICE. When Hurricane Donna swept across Florida last year, only 13 persons were killed, whereas a storm of similar intensity in 1935 raked the same area and left nearly 400 dead due to lack of warning.

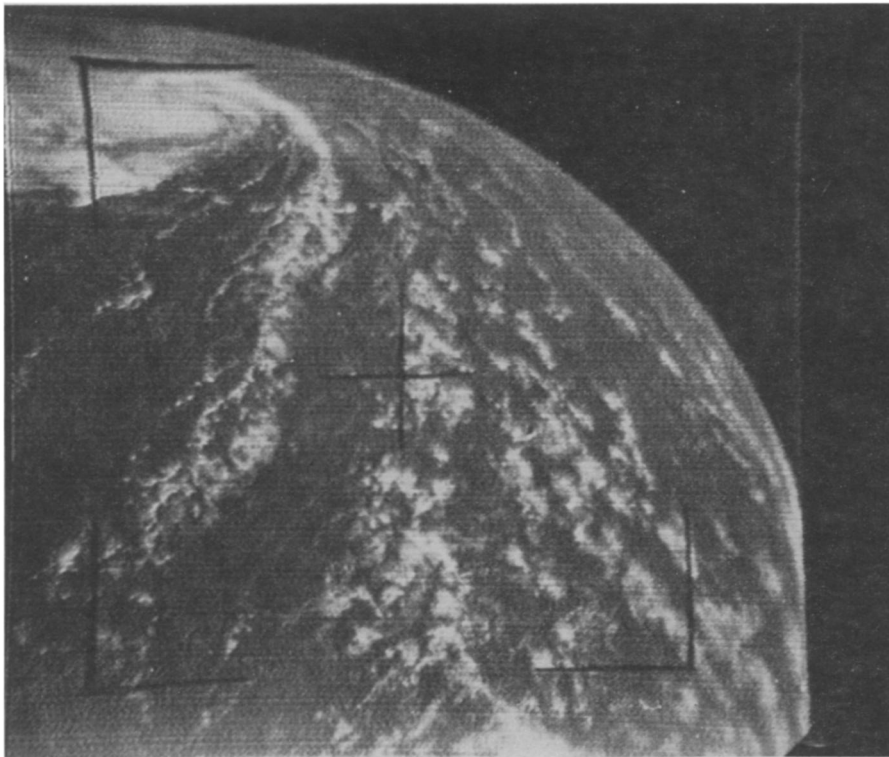
The weather satellite, sea robot and shore radar system hint at what to expect in the next few years. A network of bobbing weather stations (Nomad) will warn

weathermen when a possible storm is brewing in the Gulf of Mexico or Caribbean area. Trouble-shooting U.S. Navy and Air Force weather planes will fly to the area and verify the suspicion. Weather satellites and airplanes will then be used to track the hurricane until it approaches the coast where the especially designed radar tracking stations will take over.

Tiros III took pictures of Hurricane Anna on three different days, the U.S. Weather Bureau reported. But more satellites are needed to tighten the "seeing-eye" network before the weather satellites can be truly effective in tracking the storms.

Weather Bureau efforts against hurricanes are not solely confined to detecting and tracking storms. In August, weather planes will fly straight into the hurricane's center and seed the area with silver iodide crystals in an effort to cut down the energy driving the hurricane. By tracking and learning more about the hurricanes, scientists hope eventually to control the tropical storms.

• Science News Letter, 80:95 August 5, 1961



**ANNA FROM ORBIT**—Tropical storm Anna photographed from the Tiros weather satellite during its 117th orbit of the earth. The photograph was stored on magnetic tape until the 118th orbit when it was picked up by the Tiros station at Point Mugu, Calif. Hurricane Anna was about 200 miles north of Caracas, Venezuela, at the time of the photograph.

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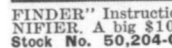
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