DON'T LET CACTO BLAST US! : A COOPERATIVE EFFORT TO DETECT AND TEST CONTAINMENT OF THE CACTUS MOTH, *CACTOBLASTIS CACTORUM* (BERG) ON THE US GULF COAST

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The Cactus moth, *Cactoblastis cactorum* (Berg), showed its success in 1920s Australia as a biological control agent introduced to control invasive exotic prickly pear cacti, *Opuntia* spp. Subsequent introductions to other areas led to the Caribbean in the 1950s and a detection in the Florida Keys in 1989. The potential impacts of its U.S. spread includes effects on grazing, nursery and landscape industries and significant negative ecological impacts on hosts in deserts of the Southwestern U.S. Potential impacts in Mexico in addition to ecological include agricultural affects because of the importance of the fruit and cladodes for human consumption and forage.

The cactus moth spread along both Florida coasts in the 1990s and by 2004 on to Bull Island, SC on the Atlantic Coast and Dauphin Island, AL on the Gulf Coast. The cactus moth appears to be favoring barrier islands on the Gulf Coast and is currently not moving inland in the panhandle area of Florida. Dispersal rates along the coasts are approximately 160 kilometers/year, with an estimated arrival in Texas in the year 2004 barring artificial spread.

In cooperation with Mississippi State University's Georesources Institute, funded by the U.S. Geological Survey, a national detection network is being assembled to gather monitoring information from managed lands complementing state Cooperative Agriculture Pest Surveys. ARS and APHIS have been cooperating since 2000 on developing techniques for detection using an attractant, trap testing, mating studies, mass rearing on an artificial diet, and irradiated moth studies for application of the sterile insect technique (SIT). In the Spring of 2005, they will begin a large-scale SIT validation study on barrier islands in Florida and Alabama to ascertain whether a barrier can be established there to prevent the cactus moth's further westward movement.