

Patuxent Wildlife Research Center South American Nutria Destroy Marshes

The overabundance of South American nutria, extensive marsh loss, and failure of traditional harvest methods to control nutria numbers in Maryland's eastern shore marshes are a grave concern to the US Fish and Wildlife Service and Maryland Department of Natural Resources.

USGS scientists at Patuxent Wildlife Research Center in partnership with the state of Maryland and the US Fish and Wildlife Service are working together to study the role of nutria in the extensive loss of marsh at Blackwater National Wildlife Refuge and surrounding state and private wetlands.

- Marsh loss was noticeable from photographs taken since the 1950's
- Loss of marsh has coincided with the increase of nutria population
- Nutria activity is directly contributing to marsh loss in Maryland



Large (8-18 lb) beaver-like rodent;
5 to 10 times as large as our native muskrat;
Accidentally introduced to Maryland in 1940's



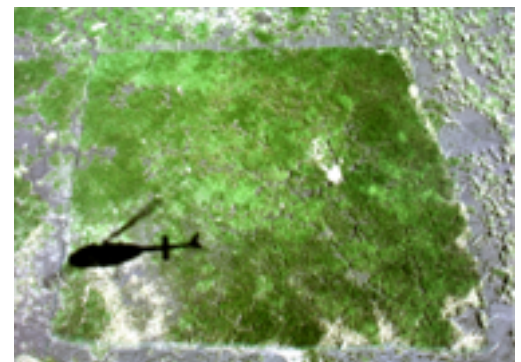
Marsh loss along the Blackwater River in Maryland has accelerated since the 1950s.

A recent study found that within the US Fish and Wildlife Service's Blackwater National Wildlife Refuge alone, over 6 square miles of marsh have been lost to open water, and 53 percent of remaining marsh has suffered significant damage and will likely be lost in the near future.

- Wetlands and tidal marshes of the Eastern Shore of Maryland provide significant cultural, economic, and ecological benefits to the State of Maryland, Atlantic Coast, and the Nation
- On a local scale, Blackwater National Wildlife Refuge generates about \$15 million annually in tourism revenue
- The continued existence of these precious marsh systems is currently threatened

Current studies indicate that Eastern Shore marshes have some capacity to recover in the absence of nutria. However, because of the vulnerability of the denuded marsh surface to erosion and tidal salt water intrusion, only partial recovery of marsh vegetation is possible without filling in eroded areas or raising the marsh surface to allow plants to grow.

Additional scientific information is needed to more fully understand the role nutria play in Eastern Shore marsh ecology, and to develop new methods to restore damaged wetlands and control nutria.



One of 20 large 100 ft. x 100 ft. enclosures showing good recovery of marsh plants when nutria were excluded from the marsh.