

# Interrupted Rocksnail Reintroduced to the Coosa River

A snail once thought to be extinct was recently reintroduced to the Coosa River below Jordan Dam after an 80-year absence. More than 3,000 interrupted rocksnails (*Leptoxis foremani*) were released about two miles south of Jordan dam near Wetumpka by the Alabama Department of Conservation and Natural Resources.

Jeff Garner, a biologist with the Division of Wildlife and Freshwater Fisheries, had the honor of releasing the snails into the river. "It is very rewarding to be involved in something like this. Most of my career has consisted of monitoring the decline of freshwater snails and mussels, intermingled with pleas for help on their behalf. This is a giant step in the right direction," said Garner.

The interrupted rocksnail is a "candidate" species, meaning it is on the list for possible protection under the Endangered Species Act. The snail had not been listed previously because it was thought to be extinct. Because this snail lays eggs in February, it was important to release them a few months prior to that date so they could be ready to reproduce in the Coosa River next year. The snail is named for the ridges that "interrupt" its otherwise smooth shell. Mature snails are approximately 1/2-inch in length.

One interrupted rocksnail was found in Georgia's Oostanaula River by a U.S. Fish and Wildlife Service biologist in 1997.

The USFWS contracted with scientists at the Tennessee Aquarium Research Institute (TNARI) in 1999 to find the snails and begin cultivating them.

Once common in the main channel of the Coosa River, the interrupted rocksnail, 36 other snail species, and eight mussel species are known to have disappeared from the Coosa River. These and other river-loving species, including many fish, were affected by the dams built on the Coosa River. Dams stop water from flowing, which many aquatic species need. Dams allow silt (dirt washed into the lakes and streams) to cover the rocks, which snails and other species require for habitat. Though the reach downstream of Jordan Dam is not impounded, little water was released from the dam for many years. "These snails can't live in standing water," said Dr. Paul Johnson, a research scientist with the Tennessee Aquarium Research Institute (TNARI). "Their biology is adapted to flowing water."


Thirteen years ago, December 20, 1990, Alabama Power Company began releasing at least 2,000 cubic feet per second of water into the Coosa River below Jordan dam. "By turning the water back on, the channel has come back to life," Johnson added. "Alabama Power is to be commended for their commitment to maintaining flows downstream of Jordan Dam," said Garner. "Over the last 13 years, this has become one of the best examples

of free-flowing large-river habitat left in the southeastern U.S."

Snails are important to the ecosystem in part because they are at the bottom of the food chain. Snails eat algae and bacteria. Fish, ducks, turtles and other animals use the snails as food. Therefore, if the snails disappear, other species are affected. Snails are also what scientists refer to as "indicator species." This means that they can provide information about the health of a river, stream, lake, wetland or estuary. Snails are good biological indicators in part because they live in water, are sensitive to changes in water quality and can be easily collected.

"The reintroduction of interrupted rocksnails into the lower Coosa River is a project of the Alabama Division of Wildlife and Freshwater Fisheries. However, it would not be possible without production of juvenile snails by TNARI and restoration of the habitat by Alabama Power. Other cooperators include the U.S. Fish and Wildlife Service, U.S. Geological Survey and The Nature Conservancy," said Garner.

The restoration work will not end with the release of the snails. Scientists will do a follow-up in the spring, and hope to conduct yearly augmentations.

For more information about this project, contact Jeff Garner at 256-767-7673. 

Jeff Garner with the Alabama Division of Wildlife and Freshwater Fisheries releases interrupted rocksnails, *Leptoxis foremani*, to the Coosa River after being extirpated for 80 years. Paul Johnson, Tennessee Aquarium Research Institute Director, watches the release.



Approximately 25 minutes after the snails' release, three are already attached to a rock.

PHOTOS BY DOUG DARR AND PAUL JOHNSON