Corsica Project

The Corsica River: Maryland's First Targeted Watershed

On September 27, 2005 the Corsica River made headlines as the first watershed on the Chesapeake Bay to be the focus of an intense, inter-agency restoration effort over the next five years. The Corsica is a major tributary of the Chester. The state of Maryland estimates that it will spend $19, 422, 653 to implement a comprehensive strategy of infrastructure improvements, habitat restoration and incentives for farmers and homeowners – all focused on reducing nutrients and sediments, and improving water quality. The ultimate goal is removing the Corsica from the state's 303(d) List of Impaired Waters, a designation it shares with the greater Chester.

Governor Robert Ehrlich made the announcement under brilliant blue skies at Ship Point on Conquest Preserve, to a crowd of over 150 federal, state and local partners. His comments came during a devastating fish kill on the river, and took place directly across from Tilghman Cove, the site of a recent and blatant example of shoreline clearing in direct violation of the Critical Area Law.

Residents know there will be no shortage of challenges for this landmark endeavor. The Corsica has been plagued by a familiar suite of problems: discharges from Centreville's wastewater treatment plant into Gravel Run; nutrient runoff from farms and developed lands; aging septic systems; wetland loss and stream degradation; fish blockages and unnecessary hardening of the natural shoreline. In warm weather, algae blooms known as "red tides" have choked the Corsica of oxygen, robbing it of vital underwater grasses and hastening the decline of its fisheries. Maryland Department of Natural Resources (DNR) estimates that the September fish kill, attributed to algae blooms, claimed 30,000 to 50,000 fish in the Corsica, and that 15 species were affected.

For CRA President Ed Nielsen, whose parents bought a farm on the Corsica 60 years ago, the state's effort is coming in the nick of time. "As kids in the 1950s, we could pluck enough soft shells for dinner in a matter of minutes. Up until the 1970s, there were healthy underwater grasses all along the Corsica's shores. Today, by concentrating proven restoration measures in one watershed, we have a shot at restoring an entire river system, and we can export that knowledge to other rivers on the Bay. It's an incredible opportunity."

At a follow-up meeting in October, Maryland Department of Natural Resources (DNR) outlined ten restoration goals for the Corsica that will involve numerous state agencies:

- Upgrade and maintain Centreville's Wastewater Treatment Plant to Enhanced Nutrient Management (ENR), which will reduce nutrient concentrations from 8

mg/l to 4 mg/l. The plant already has a new de-nitrifying system online with its spray-irrigation field.

- Establish and maintain 4000 acres of cover crops and 2000 acres of small grain enhancements.

- Treat 300 acres of urban lands with storm water management.

- Establish 100 additional acres of buffer with the Conservation Reserve Enhancement Program (CREP).

- Implement 50 acres of Horse Pasture Management best management practices (BMP's)

- Retrofit 30 septic systems with denitrification technology.

- Establish 200 acres of reforested buffers on non-agricultural land.

- Restore 50 acres of wetlands and 2 miles of stream channel.

- Restore 10 acres of submerged aquatic vegetation (underwater grasses) and 20 acres of oyster beds. (The river bottom has been mapped by the National Oceanic and Atmospheric Administration (NOAA) to determine the best sites for oyster reefs. Two historic sites have already been seeded near the mouth of the river.)

- Monitor the effectiveness of all best management practices and water quality parameters in the tidal Corsica River.

The Corsica initiative is a pilot of the Chesapeake Bay Recovery Partnership, a new public-private arrangement between the Oyster Recovery Project and Maryland DNR. The group was created to fund and implement large-scale Bay restoration efforts. So far, about $5,700,000 has been committed to the Corsica, and officials see potential for $7,750,000. To close the budget gap, a long list of funding sources has been identified, including a percentage of the profits from a new product – Maryland Natural Spring Water, bottled at Brick House Springs in Ellicott City.

"Given its magnitude, one of the big things to come out of this project will be finding the pathways to access the resources to get the job done," said John McCoy, who is coordinating the Corsica effort as Director of DNR's Ecosystem Management Center. "To improve water quality, you have to address 60 to 70 percent of the land use in the watershed, and that's a very different school of thought. What it says is that everybody contributes to the problem, and that everybody has to be a part of the solution."

How did the Corsica become the focus of such an ambitious effort? In many ways the answer goes back at least ten years. Since the early 90s the Chesapeake Bay Program has

emphasized nutrient reduction in "the tribs" – the rivers that shape our landscapes and have the ultimate influence on the health of the Bay. In Maryland, Tributary Strategy Teams were appointed in each of the state's ten major river systems, with the recognition that given their locations, each would require a very different approach to nutrient reduction. The Upper Eastern Shore (UES) Tributary Strategy Team included members of the farming community, local government, and business and environmental groups, including CRA. Their task was to ground-truth the state's long list of nitrogen and phosphorous sources in the watershed, and recommends the best and most cost-effective ways to reduce them.

In 2000, the state began offering towns and counties a real inducement to go a step further. They could apply to DNR for financial and technical help in developing a comprehensive Watershed Restoration Action Strategy (WRAS) that would detail conditions in their watersheds, and the concrete steps needed to restore water quality. Under the leadership of Mike Whitehill, a member of the Centreville Town Council who was also chair of the UES Trib Team, a WRAS was developed for the Corsica in conjunction with DNR and other agencies.

The state cites three reasons for choosing the Corsica over other watersheds to be the pilot for a comprehensive restoration: the completion of a WRAS; the size of the watershed; and the impressive extent of local involvement. "I think the Corsica WRAS has been generally recognized, especially by the State offices, as a well founded, coherent, and feasible strategy with excellent local support," said Frank Digialleonardo, current Chair of the UES Trib Team and President of the Corsica River Conservancy, a group of residents who are actively involved in habitat restoration projects on the Corsica. "Even before the Governor's announcement, we made considerable progress on several of the WRAS sub-strategies."

Local efforts have included weekly water quality monitoring by residents on the Corsica, an ambitious shoreline restoration project near Centreville wharf involving 18 homeowners, underwater grass planting and monitoring, and a tree grow-out project for a planting at Conquest Preserve. Implementing the WRAS will require even more local involvement, so the Conservancy will focus on engaging more local residents to learn about funding opportunities made available by the project – incentives that could help a farmer plant cover crops, or encourage a homeowner to upgrade a septic system. CRA members will also remain involved as participants in the implementers team that will see the project through to completion.

In many ways, however, the biggest question facing the Corsica is just how serious Centreville and Queen Anne's County officials are about improving water quality. The Corsica can survive only so much degradation, particularly as development heats up throughout a 24,000 acre watershed that includes vulnerable feeder streams. Planned development at the Centreville wharf will be an important test, as will the town's new Comprehensive Plan. As Frank Digialleonardo points out: "The watershed management strategy that we're trying to apply here is also an ethic – a way of thinking and acting that puts good stewardship front and center. Our local and county governments should think

of it as a valuable management tool – one that can help them make critical decisions as we confront growth in our watershed."

To learn more about the Corsica River Conservancy and opportunities to get involved, email corsicariverconservancy@verizon.net and check their website:
www.corsicariverconservancy.org

For an in-depth look at the Corsica River, see the
Corsica Watershed Restoration Action Strategy (WRAS)
www.dnr.state.md.us/watersheds/surf/proj/wras.html