**Ocqueoc River Watershed Management Plan update October 2008**

By: Charlie Lyon, Chair-Habitat Restoration and Protection Committee,
County Drain Commissioner, ex-officio member of the Commission.
Re: The effective status of the commission and its role in achieving the
established Goals of the Watershed Management Plan

I have taken the liberty to apply my opinions and concerns regarding the status of the River Commission and what it has and has not accomplished. I have taken each Goal of the "Management Plan" and its suggested strategies and attempted to update as well as evaluate each one as "I" see them. I may be off target on some but at least it is a starting point to begin for next year.

---

**Ocqueoc River Watershed Management Plan Excerpts from Chapter V**

***Watershed Goals and Strategies***

**The purpose of the Watershed Project is to improve and protect the water quality of the Ocqueoc River and the lakes and streams that drain into it. Project goals were created through the collaborative efforts of the Watershed Partnership and are based on protecting designated uses. Specific objectives, or strategies, are organized under their respective goal and are used to address the source of the problem, typically by affecting the root cause.**

**Strategies were initially developed and prioritized through the use of a survey taken by members of the Partnership. *Strategies were further prioritized (ranked) by the group through a nominal group voting process April 29, 2003, and are listed below.* Additional strategies were incorporated during the update of the management plan based on discussions with the Ocqueoc River Watershed Commission.**

**The strategies of the watershed management plan can fall into one of two categories: those focused at mitigating or restoring problem sites, and, those aimed at protecting and enhancing a high-quality water resource. Even though it is much easier to quantify restorative practices, this should not**

**diminish the benefits that protective measures provide to a watershed such as the Ocqueoc where preservation of the resource is fundamental to maintaining high water quality and wildlife habitat.**

**Following the list of watershed strategies are tables showing the expected pollutants to be controlled, the potential system of Best Management Practices, estimated costs, and potential sources of funding.**

**PROJECT GOALS**

**Goal 1:** Protect the watershed's fishery population and navigation by reducing the amount of erosion, particularly caused by human activities, negatively impacting the river.

**Goal 2:** Safeguard fisheries, aquatic life, public water supply, and body contact recreation by reducing the amount of nutrient loading to surface water.

**Goal 3:** Protect the fishery and other aquatic life by restoring a more natural flow regime to the river system.

**Goal 4:** Conserve important wildlife habitat areas.

**Goal 5:** Enhance and protect the Ocqueoc River Watershed by promoting stewardship, education, and responsible use of the watershed.

**********

Goal 1: **Protect the watershed's fishery population and navigation by reducing the amount of erosion, particularly caused by human activities, negatively impacting the river.**

**To facilitate implementation of the strategies, the River Commission established a committee of resource professionals to develop an action plan, secure funding sources, and oversee the actual remediation work. The committee is known as: *The Ocqueoc River Habitat Restoration and Protection Committee* : aka ("*Habitat Committee*")**

**Strategy 1.1** Implement Best Management Practices (BMPs) at road/stream crossings identified as problem sites for erosion, runoff, sediment delivery, fish passage, and restricted flow. (1-10 years)

**Status: Site #39- Little Ocqueoc River/North Silver Creek Road-2006.** Two perched culverts creating downstream ponding and stream bank erosion has been replaced with one bottomless single culvert to restore a more natural flow. Additional BMP's include regarding the approaches to direct runoff to the ditches and 7 diversion outlets. Total project cost was $62,872 with funding provided by Section 319 and matching funds supplied by the Presque Isle Road Commission and the US Fish & Wildlife Service for structure replacement. The new bottomless culvert is a converted railroad tanker car.

**Site # 26- Peltz Rd –Little Ocqueoc- 2008.** A culvert extension was placed on one of the four culverts and stone rip-rap was placed between them and along the bank to prevent erosion from the gravel road into the Little Ocqueoc River. This river is one of the primary trout spawning and nursery streams in the Ocqueoc River Watershed. Wolverine Power Cooperative volunteers along with some River Commission members provided the manpower along side the Road Commission crew. Wolverine Power provided the $2750 for materials and reimbursement to the Road Commission.

**Strategy 1.2** Develop a recreational access committee to regularly evaluate the condition of public access sites, ensure proper maintenance, ensure that sites are designed/and or maintained while preventing overuse, and implement BMPs at those sites contributing nonpoint source pollution.
**Level of Effort:** 2.25 acres of revegetation, 130 linear feet of terrace, 300 linear feet access management

**Water Quality Benefits:** Gully stabilization at site 03 and site 04: reduction of 13 tons/year sediment; 11 lbs/year phosphorous; 21lbs/year nitrogen. Annual clean-ups: increased public awareness and removal of debris from sites.
**Status:** The Ocqueoc River Commission has formed a committee and will designate certain access sites to local service/conservation groups and each site will be maintained at the Annual Watershed Celebration. Cleanup days have been established.

**Strategy 1.3** Conduct intensive educational program to demonstrate lake-friendly methods of erosion control and minimize nutrient input.

**Water Quality Benefits:** Reduction of 34 lbs/year phosphorous, reduced runoff and sediment input, increased wildlife habitat. **Status:** In 2005, 391 pieces of direct mail were sent to riparian landowners that included *Caring for the Ocqueoc* newsletter and *Landscaping for Water Quality* providing landowners with useful tips to protect water quality and wildlife habitat within the watershed.

**Strategy 1.4** Implement BMPs at streambank erosion sites along the river.

**Level of Effort:** 5.25 acres of revegetation, 1275 linear feet of bio-logs, 1275 linear feet of tree revetment, access management at 7 locations.

**Water Quality Benefits:** Reduction of 961 tons/year sediment; 819 lbs/year phosphorous; 1634 lbs/year nitrogen. Improvement of wildlife habitat, decreased water temperature, improved stream morphology.

**Status:** No work done until 2008 when a bank slump was remediated at Brege and Pomranke Rd. (Elick site) Volunteers from the Paul Young Chapter of Trout Unlimited from Detroit, the River Commission, and Hammond Bay Anglers along with three paid Huron Pines staff completed the one day project. Funding for the project, of $3800, was provided by the Paul Young Chapter of TU, U.S.F.W.S., The Ocqueoc River Commission (LaFarge Corp.grant), Wolverine Power Cooperative, and the property owner. Work consisted of installing a log terrace, using biologs to hold top soil, seeding and plantings of the bank slump, and placing trees at the toe from the slump location and 300 feet upstream to divert the current and slow undercutting of the bank and to enhance fish habitat. Coordination of the project was by the County Drain Commission and Conservation District through Huron Pines RC&D. **There are numerous opportunities for other similar projects.**

**Strategy 1.5** Increase county zoning setback for new development along the waterfront from the current standard of 30 feet minimum to a minimum of 100 feet.

**Water Quality Benefits:** Reduced impervious surface near water bodies, reduced polluted runoff, decreased construction infringement to water bodies, increased potential for native vegetative buffer, increase of septic system setback from water bodies.

**Status:** The updated Presque Isle County Comprehensive Plan was adopted November 4, 2004 that recommends the existing waterfront setback to be increased in new development. A revised county zoning ordinance was adopted in 2007 which increases the **setback to 50 feet for new construction** with some exemptions depending on existing lot size.

**Goal 2:** *Safeguard fisheries, aquatic life, public water supply, and body contact recreation by reducing the amount of nutrient loading to surface water.*

**Strategy 2.1** Adopt zoning regulation to require that aquatic buffers (i.e., shoreline greenbelts) are maintained along the waterfront for all new development.

**Water Quality Benefits:** Reduced impervious surface near water bodies, reduced polluted runoff, decreased construction infringement to water bodies, wildlife habitat improvement, increased privacy.

**Status:** The updated Presque Isle County Comprehensive Plan was adopted November 4, 2004 and encourages adopting a greenbelt ordinance to preserve native vegetation along water bodies, but does not specify width of the greenbelt. The 2007 revision of the County Zoning Ordinance provided for some buffers for new developments.

**Strategy 2.2** Conduct septic system outreach program to educate property owners regarding maintenance and management of their systems.
**2005 Status:** The updated Presque Isle County Comprehensive Plan was adopted November 4, 2004 and encourages cooperation with the Health Department to conduct septic system educational programs. An article was published in the Presque Isle Advance and septic information was distributed to riparian landowners in the *Caring for the Ocqueoc* newsletter.

**Strategy 2.3** Provide technical staff to assist property owners with re-establishing 5 acres of vegetation along the waterfront and assist with appropriate turf management techniques.
**Lead organization(s) for ensuring this project is implemented:**
*Presque Isle Conservation District and MSU Extension*
**Water Quality Benefits:** Reduction of 1.1 lbs/year phosphorous, reduce polluted runoff and sediment to water bodies, improve habitat.

**Status: 2005:**Hosted a riparian workshop featuring a hands-on native greenbelt demonstration at the Ocqueoc Outdoor Center. Provided riparian property owners with greenbelt and native planting literature.

**Strategy 2.4** Implement ordinance to require inspection of septic systems every several years or at the time of property improvements and sale. Promote requirements of upgrades for substandard systems.
**Water Quality Benefits:** Reductions based on new system installed, refer to Table 15
**Status:** No action so far

**Strategy 2.5** Install exclusion fencing to prevent unrestricted livestock access to streams. **Lead organization(s) for ensuring this project is implemented:** *Natural Resources Conservation Service*
**Level of Effort:** 1,800 linear feet of fencing, 2 acres of revegetation, 1 alternate water source. **Water Quality Benefits:** Reduction of 155 tons/year sediment; 176 lbs/year phosphorous; 347 lbs/year nitrogen.
**Status:** No action until 2008 when the "Habitat Committee" began to address this issue. NRCS is researching any past activity regarding the Silver Creek site on North Curtis Rd and will report at the April 09 meeting.

**Goal 3:** *Protect the fishery and other aquatic life by restoring a more natural flow regime to the river system.*

**Strategy 3.1** Identify and inventory existing human-made impoundments within the watershed.

**Lead organization(s) for ensuring this project is implemented:**
*State of Michigan -- Department of Natural Resources and Dept. of Environmental Quality, River commission, Presque Isle County Drain Commissioner*

**Status:** Presque Isle County Drain Commissioner researched the four man-made impoundments on the mainstream and presented the findings in **2006**.
**2008** The "Habitat Committee" will consider this soon. The Lake Emma Dam is in the beginning stages of planning for repair or replacement of the spillway.

**Strategy 3.2** In areas where commercial or residential development and its associated transportation system is directly discharging stormwater runoff to surface water; work with the site owner/developer to implement a retrofit of the drainage system so that it is treated or redirected away from surface water.

**Lead organization(s) for ensuring this project is implemented:**

*Huron Pines RC&D* . **Water Quality Benefits:** Reduce runoff, sediment, nutrients, oils & grease, salts, etc. Decrease temperature of surface water, and decrease fluctuating flows associated with stormwater runoff. **Status:** No action

**Strategy 3.3** Promote the use of Low Impact Development (LID) and/or Better Site Design techniques to ensure future development does not increase runoff to the river.

**Lead organization(s) for ensuring this project is implemented:**

*Huron Pines RC&D*

**Water Quality Benefits:** Reduce polluted runoff and sediment to water bodies, mimic natural infiltration to groundwater.

**Status:** Two land use-planning roundtable discussions were held in 2005 where LID concepts were presented to the Ocqueoc River Commission and local officials.

*The water runoff from the residential street is directed into bio-retention areas along the road. Low Impact Development techniques, show here in a Seattle neighborhood, can help eliminate stormwater runoff while increasing privacy, calming traffic, beautifying the landscape and increasing property values.*

**Goal 4:** *Conserve important wildlife habitat areas.*

**Strategy 4.1** Conduct regular presentations and disseminate materials to community organizations and property owners to link the concept of land use stewardship and high water quality.

**Lead organization(s) for ensuring this project is implemented:**

*Huron Pines RC&D, Presque Isle Conservation District*

**Water Quality Benefits:** Protection of high quality resources through sound planning and stewardship.

**2005 Status:** Information was disseminated to 391 riparian landowners, information kiosks were displayed at the Rogers City and Onaway District Libraries.

**Strategy 4.2** Place voluntary conservation easements on 600 acres of significant ecological properties (see Strategy 4.3) that also have an interested landowner.

**Lead organization(s) for ensuring this project is implemented:**

*Head Waters Land Conservancy*

**Water Quality Benefits:** Reduction of 40.2 tons/year sediment, 162 lbs/year phosphorous, 3,000 lbs/year nitrogen. Protection of wildlife habitat and unique watershed features.

**2005 Status:** HeadWaters Land Conservancy conducted a land protection workshop, disseminated information to riparian property owners with 20+ acres, and met with landowners interested in land protection.

**Strategy 4.3** Identify key ecological corridors and habitat areas.

**Lead organization(s) for ensuring this project is implemented:**

*HeadWaters Land Conservancy, Huron Pines RC&D*

**Water Quality Benefits:** Prioritize sensitive habitats for the protection of water quality.

**2005 Status:** No action

**Strategy 4.4** Conduct a Natural Features Inventory to catalog unique wildlife, ecosystems, and other natural features within the watershed.

**Lead organization(s) for ensuring this project is implemented:**

*Ocqueoc River Commission, Huron Pines RC&D*

**Milestones needed to execute this strategy:**

4.4.1 Establish an ad-hoc committee to coordinate the program

**Water Quality Benefits:** A catalogue of natural features will help guide future land use planning and direct development to more suitable areas.

**Status:** No action

**Goal 5:** *Enhance and protect the Ocqueoc River Watershed by promoting stewardship, education, and responsible use of the watershed.*

**Strategy 5.1** Establish and maintain a permanent Ocqueoc River Commission to address concerns related to the river system.

**Status:** The Ocqueoc River Commission has formalized their bylaws and established an executive committee. They need to develop an annual strategic plan and budget. They have been involved with numerous educational and clean-up programs since 2004.

**Strategy 5.2** Develop a water quality monitoring program to establish a baseline, track water quality changes over the years, and serve as an education tool for residents, school groups and local officials.
**Status**: Hammond Bay Area Anglers Association donated $5000 to the River Commission to establish a water monitoring program in **2007**. The County Drain Commissioner and the Conservation District are administering the program. Wolverine Power Cooperative and some watershed townships have contributed funds to help sustain the program. Other sources of funding are being sought.

**Strategy 5.3** Host an Annual Ocqueoc River Day or Watershed Appreciation Week to focus on those actions the community can take to help care for the river system.

**2005 Status:** Hosted the Ocqueoc Watershed Celebration with educational speakers, a stream clean-up, and resource materials were provided. The 2006-08 Watershed Celebration was 2 days and included local school groups. Michigan Sea Grant has become involved and has helped Onaway Community Schools to develop a watershed curriculum for 5$^{th}$ grade students. The students do research and develop projects about the Ocqueoc and make presentations at the Watershed Celebration Day in May of each year.

**Strategy 5.4** Establish a Speakers Forum to meet with various target audiences and distribute any necessary literature.
**Status:** Hosted three speaker's forum in 2005 and nothing sense.

**Strategy 5.5** Create a resource library of recommended practices for riparian homeowners (lawn care practices), local officials (regulations to protect water quality and habitat), teachers (learning tools for students), and other stakeholders.
**Status:** No action taken so far.

**Strategy 5.6** Promote responsible guidelines to reduce future conflicts from activities such as fishing, canoeing etc.
**Status:** No action taken so far

**Strategy 5.7** Work with regulatory officials to enforce trespassing rules along the banks of the river in order to reduce severe streambank erosion resulting from recreational foot traffic.
**Status:** Some effort has been made through the Hammond Bay Area Anglers Association working with property owners and the DNR Enforcement Division to resolve this issue.

---

**Status Summary Rating of Goal Strategies**

*A = Active: presently being addressed in planning and/or action*
*SA = Some action: action in the past but minor and need for improvement*
*NI = Need for improvement in attention, lacking in adequate response*
*NA = No action has been taken since management plan has been approved.*
*C = Completed*

1.1- A
1.2- A (but in moderation)
1.3- SA, NI
1.4- A (in moderation)
1.5- C

2.1- C
2.2- SA,NI
2.3 - SA,NI
2.4- NA

2.5- A

3.1- A

3.2- NA

3.3- SA,NI

4.1- SA,NI

4.2- SA,NI

4.3- NA

4.4- NA

5.1- A,NI

5.2- A

5.3- A,NI

5.4- SA,NI

5.5- NA

5.6- NA

5.7- SA,NI(?)

CLyon/October 2008