Woodland Dunes Nature Center and Preserve Final Report: RP-169-09

Project Goal:

The project was designed to support four major goals.

- 1) Enhance the three watershed stewardship groups existing within the project area by building their capacity to reach and engage local citizens and officials.
- 2) Provide citizens and officials with opportunities to individually participate in protecting and restoring rivers.
- 3) Raise citizens' and officials' awareness and understanding of threats to rivers in the project area, including contamination that results in listing as 303 (d) impaired waters.
- 4) Develop an audience profile and assess the effectiveness of education efforts.

The results of our efforts are described below:

Project Products and Deliverables:

Goal 1: Enhance the three watershed stewardship groups existing within the project area by building their capacity to reach and engage local citizens and officials.

This project continued the joint efforts of three watershed groups in the area, Lakeshore Natural Resource Partnership, Wisconsin Maritime Museum and Woodland Dunes Nature Center and Preserve, to raise awareness about local water resources. A membership and volunteer drive was completed via direct mail to 13,328 riparian landowners along the four rivers targeted for this project, the East and West Twin Rivers, Silver Creek and the Manitowoc River. The membership and volunteer drive continued at the five events held on the rivers during the grant period. We did not gain any members directly from the mailing but were able to recruit people for the "Restore and Explore" events held on the rivers.

Along with the direct mailing, newspaper articles, including a front page article on the East Twin River Paddle, publicized and highlighted the events on the rivers. The partners' newsletters and websites also publicized the events, and fliers were distributed around the cities of Manitowoc and Two Rivers.

Goal 2: Provide citizens and officials with opportunities to individually participate in protecting and restoring rivers.

Professionally designed brochures that interpret not only the importance and history of the rivers, but also how the rivers are threatened and can be protected and restored through individual action were mailed to 13,328 riparian landowners and local officials along the four rivers. These brochures were created and designed in large part by Debbie Beyer, UW-extension basin educator. UW-extension also funded the design and printing of the brochures.

The brochures have been delivered to local partners including UWEX offices, the conservation departments in Manitowoc, Kewaunee, Brown and Calumet counties, Ledgeview nature center, Brillion nature center, Collins Marsh visitor center and Point Beach State Park. The brochures will continue to be disseminated throughout the watersheds over the coming years. Display equipment including poster frames and wire racks will also be made available to some of the project partners for displaying the brochures.

Additionally, five events were held for people to learn about and help clean-up the rivers. 5/2/2009: "Silver Creek Nature Hike and Litter Pick-up" Professor Emeritus of Manitowoc Community College, Dr. Sontag led an exploration of Silver Creek Park's riparian community. Dr. Sontag spent

years studying Silver Creek Park. Participants learned about some of the little-known critters living in the park, like the star-nosed moles and the invertebrates and amphibians that start their life in the creek. During the event, little litter was found in the park. 15 people participated in the hike. 5/9/2009 "East Twin River Paddle and Litter Pick-up" A nine-miles stretch of the East Twin River was paddled from the Mishicot dam to Paddlers Park in Two Rivers. Lunch was served during a gathering after the paddle. One full garbage bag of litter and a basketball were collected from the river. In total 38 people participated in the paddle.

5/30/2009 "A River, Caves and a Forest – Exploration and Litter Pick-up" Woodland Dunes naturalists and local experts led a hike from Drumm Memorial Forest through Maribel Caves County Park. The unique natural features and the West Twin River were highlighted. A picnic-style lunch was provided for the participants. During lunch, aquatic invertebrates were caught in the river and a nitrate and phosphate test were conducted; both yielded high numbers. The unique geology of the Niagara escarpment and caves were explored during the hike, and groundwater contamination was discussed. One garbage bag was filled with litter and garlic mustard during the hike. Twenty-two people participated.

5/13/2009 "Collins Marsh Paddle and Litter Pick-up" Collins Marsh naturalist Terry Paulow led a land and water exploration of Collins Marsh, the largest wetland area remaining in the Manitowoc River watershed. The diverse animal life and influences of the marsh on the Manitowoc River was explored. In total, 30 people participated in the event.

6/27/2009 "Maritime Rendezous on the Manitowoc River" Natural and historical points within the urban portion of the Manitowoc River, from Mill street to the YMCA beach were explored; 20 people participated in this event.

Goal 3: Raise citizens' and officials' awareness and understanding of threats to rivers in the project area, including contamination that results in listing as 303 (d) impaired waters. In the East and West Twin Rivers and Manitowoc River brochures as well as at river events, the 303 (d) listing was highlighted. Please see enclosed brochures.

Goal 4: Develop an audience profile and assess the effectiveness of education efforts.

Through partnership with the UWEX Basin Education Initiative, a riparian questionnaire was created and administered to participants at the five river events listed above. This questionnaire provided valuable information about the impact of the events on participants, including their prior knowledge of local rivers and streams and positive behaviors before the event as well as what information they gained from attending the event and possible future positive behaviors in helping to protect and clean-up local water resources.

During events we were able to collect information from each participant giving us a profile of people interested and willing to attend water quality events. We now have a database of people we can invite to future events.

Summary

The distribution of brochures to riparian landowners by direct mailing enabled us to reach a key segment of people in the Manitowoc and Twin River watersheds, those who both directly affect and are affected by water quality and river health. The five river events focused participants' attention on the unique natural history of these rivers as well as ways that people can take direct action to keep our waterways clean. The combination of mailings and river events helped us reach our goals. The questionnaire gave us information we can use to further our goals.

We are looking forward to using the momentum created during the grant period to continue our progress in building community support to protect and restore our rivers.