

Chapter 3: Build Partnerships

3.1 Stakeholders for the Watershed Restoration Plan

As the watershed restoration planning effort was initiated, the Milwaukee Metropolitan Sewerage District (MMSD) decided to use the newly formed Southeastern Wisconsin Watersheds Trust, Inc. (SWWT) as the stakeholder group for the effort. The SWWT is the ideal stakeholder group because it was formed to improve water quality throughout the greater Milwaukee watersheds (GMW), and the goal of this watershed restoration plan (WRP) is to develop the next steps to be initiated to improve water quality in the Menomonee River watershed.

The watershed restoration planning process is an ongoing collaborative effort. Work to date has included the following:

- ◆ Identification of key stakeholders
- ◆ Identification of issues of concern
- ◆ Establishment of preliminary goals
- ◆ Development of indicators
- ◆ Implementation of public outreach

Building partnerships is the cornerstone of the SWWT and its mission is one of collaboration to achieve healthy and sustainable water resources throughout the GMW. The SWWT is building an active membership of organizations committed to its mission, purposes, and goals. Participation is open to a large membership of diverse non-traditional stakeholders that actively participate in all activities of the SWWT and take personal and community responsibility to improve our water resources.

The SWWT collaborates with non-governmental organizations (NGOs) as part of this effort and has specifically identified five activities to help restore the watersheds in southeastern Wisconsin. For each activity, specific objectives, tasks, and measurable outcomes are defined. The activities and participating organizations are listed below.

- 1) Perform monitoring, modeling, and science work (Milwaukee Riverkeeper, Clean Wisconsin, River Alliance of Wisconsin)
- 2) Participate in the development and implementation of the WRP (Milwaukee Riverkeeper, Clean Wisconsin, River Alliance of Wisconsin, 1000 Friends of Wisconsin, River Revitalization Foundation, Sixteenth Street Community Health Center)
- 3) Initiate legal and policy implementation of the WRP (Midwest Environmental Advocates, Sixteenth Street Community Health Center and Clean Wisconsin)
- 4) Develop an outreach and communications strategy (1000 Friends of Wisconsin, Clean Wisconsin, Milwaukee Riverkeeper, Midwest Environmental Advocates)



- 5) Provide SWWT administration and committee support (create an integrated and long lasting structure that supports watershed restoration across municipal and organizational boundaries)

3.2 Southeastern Wisconsin Watersheds Trust, Inc.

The SWWT and its committee members are the stakeholders for this WRP and provide the structure for ongoing engagement and action. The SWWT is comprised of members who are committed to actively and publicly support the mission, goals, and objectives of the SWWT as established by its members and approved and amended by the Executive Steering Council (ESC).

Initially, a list of potential stakeholders in all the watersheds was compiled, including NGOs, municipalities, permit holders, universities, industries, and others as part of the restoration planning effort. Potential stakeholders were invited to participate on Watershed Action Teams (WATs). Appendix 3A lists the groups invited to participate.

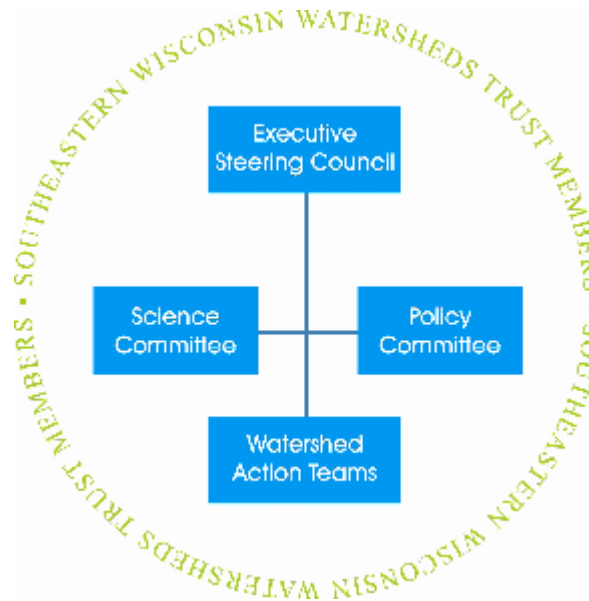


FIGURE 3-1: SOUTHEASTERN WISCONSIN WATERSHEDS TRUST, INC. MEMBERS

As shown in Figure 3-1, the SWWT consists of a general membership and four main committees: Executive Steering Council, Science Committee, Policy Committee, and the Watershed Action Teams. The functions and members of the committees are discussed in subsections 3.2.1 – 3.2.4 below. When the SWWT was first developed in February 2008, an organizing committee appointed the members of the SWWT Executive Steering Council. Soon thereafter, the Executive Steering Council appointed the Science Committee. The Science Committee established a Modeling Subcommittee to collaborate on water quality modeling issues and a Habitat Subcommittee to develop preliminary ideas on habitat-related watershed improvements. The SWWT formed two Watershed Action Teams - one for the Menomonee River watershed and one for the Kinnickinnic River watershed. Each Watershed Action Team has a set of co-chairs.



The SWWT members filling committee roles may include independent units of government, special purpose districts, agencies, organizations, companies, and members at large. Members may be asked to commit institutional resources to help fulfill the mission, goals, and objectives adopted by the SWWT. In return, members expect collaborative actions that work toward achieving healthy and sustainable water resources that benefit them and any constituents they might represent.

Upon initiating this WRP, the project team (consultants and MMSD staff) worked with the SWWT and met with the ESC, WATs and the Science Committee. Several general meetings were held with the ESC at the beginning of the project. From October 2008 to March 2010, nine meetings were held with the Science Committee, one meeting was held with the modeling subcommittee, four meetings were held jointly with the Menomonee River WAT and the Kinnickinnic River WAT, and five meetings were held separately with the Menomonee River WAT. Several meetings were also held with the SWWT committee chairs during this time.

As noted above, the members of the committees are listed in subsections 3.2.1 – 3.2.4 below. The lists provided reflect the participating committee members as they existed at the time the WRP was developed. It is anticipated that the SWWT website will maintain the most up-to-date membership lists, as membership is anticipated to change over time.

3.2.1 Executive Steering Council

The SWWT is managed by a subset of its participant members on the ESC. The 15 member ESC undertakes management and administrative functions of the SWWT. The council uses input from the WATs to review annual watershed priority lists of projects and programs supported by the SWWT. The ESC considers and recommends projects to undertake and fund at the watershed or subwatershed level and monitors and reports on project results.

Membership of the ESC is listed below.

Preston Cole, City of Milwaukee

Ken Yunker, Southeastern Wisconsin Regional Planning Commission (SEWRPC)

Nancy Frank, Acting Chair, University of Wisconsin – Milwaukee

Tom Grisa, City of Brookfield

Henry Hamilton III, National Association for the Advancement of Colored People (NAACP) - Milwaukee Branch

Andy Holschbach, Ozaukee County

David Lee, We Energies

Scott Mathie, Metropolitan Builders Association

Peter McAvoy, Sixteenth Street Community Health Center

Christine Nuernberg, City of Mequon

Neil Palmer, Village of Elm Grove

Kevin Shafer, MMSD



Reggie Newson, Wisconsin Department of Transportation (WisDOT)

Dan Stoffel, Washington County Board

Sharon Gayan, Wisconsin Department of Natural Resources (WDNR) (non-voting member)

Meeting dates: October 8, 2008; December 3, 2008; January 14, 2009; February 11, 2009; April 8, 2009; June 10, 2009; August 12, 2009; October 14, 2009; December 9, 2009; February 10, 2010.

3.2.2 Science Committee and Modeling, and Habitat Subcommittees

The Science Advisory Committee advises the SWWT ESC on important science and technical issues. The committee ensures that a wide range of interests are considered in scientific discussions and focuses on issues of a scientific and technical nature to achieve watershed objectives. The Science Committee identifies and makes recommendations on scientific and technical issues, including identifying areas where further study is necessary. It also provides scientific and technical input to project selection, project progress monitoring, and watershed/subwatershed project implementation.

The following are members of the Science Committee:

Cheryl Nenn, Milwaukee Riverkeeper

Chris Clayton, River Alliance of Wisconsin

Chris Magruder, MMSD

Claus Dunkelberg, Milwaukee 7 Water Council

Eric Loucks, AECOM

Ezra Meyer, Vice Chair, Clean Wisconsin

Ginny Plumeau, Cedarburg Science, LLC

Jennifer Runquist, League of Women Voters

Marsha Burzynski, WDNR

Mike Hahn, SEWPRC

Peter Hughes, United States Geological Survey (USGS)

Sandra McLellan, University of Wisconsin – Milwaukee, Great Lakes WATER Institute (GLWI)

Steve Melching, Marquette University

Tim Ehlinger, University of Wisconsin – Milwaukee

Tony Remsen, University of Wisconsin – Milwaukee, GLWI (retired)

Val Klump, Chair, University of Wisconsin – Milwaukee, Director GLWI



Meeting dates: October 28, 2008; January 20, 2009; March 4, 2009; April 9, 2009; May 14, 2009; July 30, 2009; September 28, 2009; November 18, 2009; and December 15, 2009

The Modeling Subcommittee members are listed below.

Cheryl Nenn, Milwaukee Riverkeeper

Chris Magruder, MMSD

Claus Dunkelberg, Milwaukee 7 Water Council

Eric Loucks, AECOM

Ezra Meyer, Clean Wisconsin

Ginny Plumeau, Cedarburg Science, LLC

Jennifer Runquist, League of Women Voters

John Hoopes, University of Wisconsin - Madison

Ken Potter, University of Wisconsin - Madison

Marsha Burzynski, WDNR

Mike Hahn, SEWRPC

Peter Hughes, USGS

Peter Taglia, Clean Wisconsin

Sandra McLellan, University of Wisconsin – Milwaukee, GLWI

Steve Melching, Marquette University

Tim Ehlinger, University of Wisconsin – Milwaukee

Tony Remsen, University of Wisconsin – Milwaukee, GLWI (retired)

Val Klump, Chair, University of Wisconsin – Milwaukee, Director GLWI

Meeting date: February 18, 2008.

The Habitat Subcommittee members are listed below.

Chris Magruder, MMSD

Marsha Burzynski, WDNR

Tom Slawski, SEWRPC

Steve Melching, Marquette University

Tim Ehlinger, University of Wisconsin – Milwaukee

Val Klump, Chair, University of Wisconsin – Milwaukee, Director GLWI

The Habitat Subcommittee met on a weekly basis with various representatives from MMSD, WDNR, USGS, and staff from the universities to obtain data and information as well as discuss issues relevant to the biological communities and habitat within the Kinnickinnic and Menomonee River watersheds. In addition, this subcommittee regularly attended the



Kinnickinnic and Menomonee River Watershed Action Team meetings to share results and discuss ideas related to habitat issues within each watershed and potential mitigation strategies and remedial actions. This subcommittee met informally during the period May 2009 through December 2009.

3.2.3 Watershed Action Teams

The WATs advise the SWWT ESC on important watershed-specific issues pertaining to its activities and implement projects either as a body or by enabling its member organizations. In fulfilling its roles, the WATs perform the following tasks:

- 1) Ensure that a wide range of interests are considered in all watershed discussions.
- 2) Focus on issues that cut across existing lines of authority to achieve watershed objectives.
- 3) Work with SEWRPC to develop this WRP.
- 4) Identify issues and prepare a priority list of watershed-specific projects and programs to be supported by the SWWT, based on this WRP. Recommend this list to the ESC for their review and approval.
- 5) Identify and make recommendations on watershed-specific issues.
- 6) Undertake projects or advise on member projects that have been awarded by the ESC.
- 7) Record WAT meeting notes and report out to the ESC.

The following co-chairs were elected to lead the Menomonee WAT:

Cheryl Nenn, Milwaukee Riverkeeper

Gail Epping Overholt, University of Wisconsin Extension

The membership list is included in Appendix 3B.

Joint meeting dates with the Kinnickinnic River WAT: November 11, 2008; December 8, 2008; February 2, 2009; and May 5, 2009. Separate meeting dates: August 5, 2009; September 22, 2009; October 21, 2009; November 17, 2009; and March 17, 2010.

3.2.4 Policy Committee

The Policy Committee advises the SWWT ESC on important public policy and legal issues pertaining to its activities. The Policy Committee performs the following tasks:

- 1) Ensure that a wide range of interests are considered in all public policy and legal discussions
- 2) Focus on issues that cut across existing lines of authority to achieve watershed objectives
- 3) Identify and make recommendations on public policy and legal issues
- 4) Record Policy Committee meeting notes and report to the ESC

The Policy Committee members are listed below.

Peter McAvoy, Chair - South Sixteen Community Health Center

Dan Collins, Elutions



James Fratrack, WDNR
Shawn Graff, Ozaukee Washington Land Trust
Susan Greenfield, Root-Pike Watershed Initiative Network
Henry Hamilton III, NAACP - Milwaukee Branch
Jill Hapner, Washington County Land Conservation
Andy Holschbach, Ozaukee County
Steve Keith, Milwaukee County
Bruce Keyes, Foley & Lardner LLP
Scott Mathie, Metropolitan Builders Association
Ezra Meyer, Clean Wisconsin
Mike Murphy, City of Milwaukee Alderman
Neil Palmer, Village of Elm Grove
Melissa Scanlan, Midwest Environmental Advocates
Kevin Shafer, MMSD
Ken Yunker, SEWRPC

3.3 Southeastern Wisconsin Watersheds Trust, Inc. Linked Goals (concurrent with Regional Water Quality Management Plan Update Pollutant Reduction Goals)

In order to establish goals for this WRP, the ESC suggested combining the goals established by the SWWT and the goals from SEWRPC's Regional Water Quality Management Plan Update (RWQMUP). A document entitled *Linked Goals and Objectives for the Southeastern Wisconsin Watersheds Trust, Inc. and SEWRPC's Regional Water Quality Management Plan Update* was developed in April 2009. In order to continuously focus and strive to accomplish its mission, the SWWT developed and approved the following four goals:

- 1) Make measurable progress toward improving the water resources in the region
- 2) Identify/support land use practices and designs that enhance/improve water resources and promote and restore ecological benefits
- 3) Forge and strengthen relationships to leverage funding and recommend policies to assist in the implementation of projects to produce lasting water resource benefits and cost savings throughout the GMW and nearshore Lake Michigan
- 4) Implement cost-effective projects that result in measurable improvements in water quality and water resources

The focus of the SWWT is on implementing these goals; however, the SWWT recognizes that its efforts must build on the goals, objectives, and recommendations of SEWRPC's RWQMPU.¹ The RWQMPU provides a relevant and transparent foundation for moving forward.

Below is a detailed listing of the RWQMPU's measurable water quality improvement goals for the Menomonee River watershed and its objective categories paired to an extensive list of recommendations and/or implementation strategies. Programs and projects supported by the SWWT will be evaluated relative to their potential to make progress toward these measurable goals.

Measurable Water Quality Improvement Goals

In general, the degree of improvement in water quality resulting from implementation of the plan's recommendations will be evaluated through comparison of existing vs. future measured water quality conditions. These measurable goals can serve as indicators of progress being made toward improving water quality conditions. The goals range from changes to land use, pollutant load reductions and improvements to habitat and aesthetics.

Note on using aesthetics with habitat as a goal. While a consensus was reached during the development of the WRP by the Menomonee WAT to include aesthetic improvement with habitat as a goal, it is recognized that aesthetic improvement does not always translate to ecologically-based (habitat) improvement. The use of aesthetics as a goal does present a challenge in some cases because criteria for aesthetic improvement vary among people and over time. For example, a concrete-lined channel with managed turf in the riparian area adjacent to accessible parking may be perceived as aesthetically-ideal to some, but as sterile to others. Alternatively, a naturalized stream that courses through a wide, wooded riparian corridor has improved ecological function, but may present challenges in terms of litter control, maintenance and law enforcement. This WRP acknowledges that aesthetic improvement does not always relate directly to water quality or habitat improvement, but in many cases they are all linked. In addition, aesthetic improvement is strongly related to quality of life issues and environmental justice issues. For the purpose of this WRP, aesthetic improvement impacts amenity value, personal relationships to the resource, and community connections necessary to provide the financial resources necessary to address habitat and water quality concerns.

The preceding goals that are to be achieved by 2020 can be reviewed in the Plan Summary of the RWQMPU, which details the goals for the entire RWQMPU.²

Specific to the Menomonee River watershed, the RWQMPU goals are the following:

- 1) Land Use Changes
 - a. Converting 2.3 square miles of marginal cropland to prairie or wetland conditions

¹ SEWRPC implements Section 208 of the federal Clean Water Act toward the goal of achieving water use objectives for surface waters within the region through a sound and workable plan for the abatement of water pollution.

²SEWRPC, *A Regional Water Quality Management Plan Update for the Greater Milwaukee Watersheds*, Plan Summary, http://www.sewrpc.org/publications/planningprogramreport/pr-050_summary_water_quality_plan_greater_mke_watersheds.pdf (revised January 2009)



- b. Establishing or expanding riparian buffers along approximately 69 miles of stream bank
- 2) Habitat/Aesthetics Improvements
- a. Renovating and rehabilitating concrete channels where concrete lining removal can be accomplished without creating flood or erosion hazards
 - b. Preparing abandonment and associated riverine restoration plans for dams, specifically addressing sedimentation issues
 - c. Limiting culverts, bridges, drop structures, and channelized stream segments and designing such necessary features to allow the passage of aquatic organisms
 - d. Developing restoration and remediation programs for riverine and impoundment sites with contaminated sediments
 - e. Extending the Milwaukee Estuary Area of Concern to include reaches of the Little Menomonee River and additional reaches of the Menomonee River
 - f. Improving the habitat of stream systems by accomplishing the following:
 - ◆ Enhancing streambank stability
 - ◆ Limiting instream sediment deposition
 - ◆ Implementing techniques to moderate the effects of channelization
 - ◆ Restoring instream and riparian habitat

3) Pollutant Load Reduction Goals

Based upon the comparison of the Year 2020 (the estimated future condition as defined in Chapter 4) and the Baseline Year 2000 (the existing condition as defined in Chapter 4), the following pollutant load reductions are estimated for the Menomonee River watershed:

- | | |
|-------------------------------------|-------------------------------------|
| a) Total Phosphorus | 32% (17,231 pound reduction) |
| b) Total Suspended Solids (TSS): | 24% (4.2 million pound reduction) |
| c) Fecal Coliform Bacteria: | 42% (6,900 trillion cell reduction) |
| d) Total Nitrogen: | 26% (104,000 pound reduction) |
| e) Biochemical Oxygen Demand (BOD): | 17% (224,000 pound reduction) |
| f) Copper: | 15% (281 pound reduction) |

The breakdown of the load reductions for each of the major components of the RWQMPSU is presented in Section 6.2 of Chapter 6 of this WRP. The modeled Baseline 2000 and Year 2020 water quality assessments are presented in Section 6.4 of chapter 6. Section 6.4 presents assessments of flashiness, fecal coliform, TSS, total phosphorus, and dissolved oxygen (DO). The assessments are based on the percentage of time in compliance with either water quality standards or targets.

It is important to note that achieving these goals will not meet water quality standards at every location in the watershed, 365 days per year. As explained in Chapter 11 of the RWQMPSU



(Planning Report No. 50), achieving the goals for BOD, phosphorus and TSS would generally result in a high level of compliance (defined as compliance 85% of the time or greater) with the water quality standards or planning standards developed under the RWQMPPU. Achieving the fecal coliform load reduction goal would generally result in a high level of compliance with the standards during the summer months, but a low degree of compliance is expected when looking at data for the full year. Based on the model results, in order to meet all of the fecal coliform standards 100% of the time in all areas of the watershed, over 90% of the total load would need to be reduced.

Note, for the RWQMPPU, the variance standards were used for DO and fecal coliform where applicable. For the WRP analysis, the SWWT committees decided to look at compliance assuming the variance standards did not apply. Therefore, the results shown in Chapter 6 of the WRP do not show as much of an increase as the results of the RWQMPPU for fecal coliform and DO. However, reaching the goals listed above is one of the first steps in improving water quality and habitat in the watershed. It is anticipated that additional work will follow as the adaptive watershed management approach is implemented.

To get a sense of what achieving the water quality standards means, the RWQMPPU links the water quality objectives to the water use objectives. In general, the Menomonee River is classified as a warm water fishery. Therefore, meeting the water quality standards should allow the river to sustain fish such as walleye and bass. However, there are other factors, such as habitat, that need to be considered when predicting the type of aquatic life that could potentially be sustained.

3.3.1 Watershed Action Team Visioning Session

The Menomonee River WAT participated in a visioning session in December 2008. The purpose of this session was not to determine specific goals or objectives, but to determine the parameters on which the WRP should focus. Project team staff asked the following three questions to help discover values-based water resource expectations of the members:

- ◆ How do you want the Menomonee River to look?
- ◆ What activities do (or would) you like to do in the Menomonee River?
- ◆ On behalf of aquatic and plant life, what do you think the Menomonee River needs?

While some respondents directly answered the questions and others responded more generally, it was staff's opinion that answers were generally in line with recommendations of the RWQMPPU. The compiled list of responses that was developed from the WAT visioning session and considered by the Science Committee is shown below.

Manmade channels:

- ◆ Concrete channels
 - Underwood Creek, Honey Creek (downstream of 84th Street and upstream at McCarty Park) and Menomonee River should have no concrete and should be



naturalized (See the Underwood Creek Baseline Water Quality Report for the locations of drop structures and concrete-lined channels)³

- Concrete lining along the Menomonee River channel in the vicinity of Miller Park is an impediment for fish passage
- ◆ Streams should be daylighted (remove streams from enclosed conduit); however, consider safety and unintended consequences (e.g., flooding)
- ◆ Reintroduce meanders

In-stream conditions:

- ◆ Eliminate barriers to fish passage (add fish ladders)
- ◆ Free of trash
- ◆ Increase pools and riffles
- ◆ Decrease flashiness and thermal discharges
- ◆ No fish advisories
- ◆ Reduce unnatural solids in streambed and improve clarity of water
- ◆ Less salt
- ◆ Seawalls/fish condos – look at the lower portion of the Menomonee River to create habitat
- ◆ Plant wild rice in the Burnham Canal (Milwaukee Riverkeeper is undertaking a pilot project)
- ◆ Restore original meanders upstream of 115th Street
- ◆ No fecal coliforms
- ◆ Increase levels of DO
- ◆ Decrease nutrient loads
- ◆ Remove invasive species
- ◆ Clean up Superfund sites such as Little Menomonee River

Riparian areas:

- ◆ Keep vegetation wild, but maintained
- ◆ Balance natural vegetation with recreational use needs
- ◆ Provide increased riparian areas (i.e., buffers), 75' minimum
- ◆ Remove all homes and businesses from the floodplain
- ◆ Construct and restore wetlands

³ MMSD, Underwood Creek Baseline Water Quality Report (2003-2005), <http://v3.mmsd.com/AssetsClient/Documents/08-266%20UC%20web.pdf> (October 2008)



- ◆ Reduce or eliminate nutrient inputs from manure spreading in rural areas
- ◆ Improve public access to river (indirect improvement through increased recreational use, awareness of, and connection to the river)
- ◆ Improve diversity of aquatic life

In-stream and riparian areas:

- ◆ For projects, start at the headwaters and work progressively downstream
- ◆ More aquatic life diversity, plants and animals that would use the waters in a safe manner

Desired uses:

- ◆ Swim
- ◆ 25th Street and downstream on the Menomonee River: riverwalk with some public access
- ◆ Access points for fishing at Petit Point, 12th Street and Bruce Street
- ◆ Kayaking/canoeing, but evaluate woody debris within streams

Overarching and vision:

- ◆ Consider cost-benefits
- ◆ Citizen involvement and education
 - Lawn care education, regulations
 - Positive association/identity with water; ways to generate adoration for water resource assets
 - Work with the river asset – create an identity for the river with the communities
- ◆ Green infrastructure focus
- ◆ Sustainable solutions
- ◆ More flow monitoring to match to needs

3.3.2 Watershed Restoration Plan Focus Areas

The Science Committee used the input from the WAT visioning session to determine parameters that should be focused on in the WRP that would help address the input received from the WATs. They also determined what should be recommended for future analysis. The following parameters were recommended to be focused on in the WRP:

- 1) Bacteria/Public health - concentrate on determining unknown or unidentified sources, failing sanitary sewer infrastructure and illicit connections, and achieving reductions and compliance with water quality standards in warm weather months.
- 2) Habitat/aesthetics - concrete channels and enclosed channels are poor for aquatic life and for downstream hydrology; however, flooding considerations must be taken into account. See Section 3.3 above for a discussion of the importance of considering aesthetics and the indirect impact of aesthetics on the river's water quality and habitat. The restoration of watersheds should include buffers and consider the following parameters:



- ◆ Chloride (harmful to aquatic life)
 - ◆ TSS
 - ◆ Sediment
 - ◆ DO/BOD
 - ◆ Water temperature
 - ◆ Trash - defined as pet litter, waterfowl impacts, and refuse - with the understanding that there is some overlap with other pollutants
 - ◆ Flow/flood impacts
- 3) Nutrients (Phosphorus) - While there do not appear to be many problems with algal growth within the watershed, phosphorus has been identified as an issue along the nearshore area of Lake Michigan.

The management strategies also consider nitrogen, copper, legacy pollutants such as polychlorinated biphenyls (PCBs), and emerging contaminants such as pharmaceuticals and personal care products (PPCPs). However, these pollutants are not a primary focus for the WRP and should be addressed in future studies.

The use of real-time data was stressed as an important implementation tool. The USGS and MMSD have installed monitoring facilities at select locations along the Menomonee River. These facilities provide water quality, temperature, and flow data to resource managers on a real-time basis. The availability of real-time data facilitates an improved understanding of stream parameters under varied conditions. The USGS posts real-time monitoring data for Wisconsin at the following website:

<http://waterdata.usgs.gov/wi/nwis/current/?type=quality>

3.3.3 Habitat Considerations

Preliminary water pollution goals from the RWQMPPU did not directly address habitat improvement. However, the RWQMPPU did recommend restoration of prairies and wetlands and the establishment or expansion of riparian buffers.

3.4 Education and Outreach

A strong information and education component enhances public understanding of both watershed planning and the project and encourages early and continued participation. Efforts include work by SEWRPC, MMSD, SWWT, and others.

3.4.1 Internet

Online resources throughout the region include web pages launched and maintained by SEWRPC, MMSD, SWWT, USGS, and others.

The SEWRPC maintains a web page for the RWQMPPU (<http://sewrpc.org/waterqualityplan/>) that documents the plan update process consistent with the U.S. Environmental Protection Agency's (USEPA's) watershed planning process. Topics documented include an overview



section, planning background, the current effort, public involvement, study meetings, advisory committees, final plan summary, plan chapters, environmental corridors, yard care, related fact sheets, links, and contact information. The final RWQMPU report and the companion technical report are available on the web site.^{4,5} The website includes opportunities to contact staff.

The MMSD website for the 2020 Facilities Plan planning process was used intensively by committees, citizens, and stakeholders and afforded the opportunity to comment on documents as they were drafted. The MMSD continues to maintain the project website at <http://www.mmsd.com/wqi/>. The site includes background on the project, a record of committee activities, information about watersheds, presentations, publications, links, and contact information.

In the spring of 2009, the MMSD launched an online tool called *H₂O Info* that tracks water quality indicators on a real-time basis. On this interactive site, users can click on a monitoring location on a map and view data that are virtually real time and chart data over time. The MMSD collects data with remote sensors and transmits it in cooperation with the USGS and then posts the data to the *H₂O Info* website. Water quality variables tracked include conductivity, DO, turbidity, water temperature, flow (discharge), and stage. Precipitation data are also available from several precipitation monitoring stations.

The SWWT website (<http://www.swwtwater.org/>) documents the formation of the group, posts meeting information, and provides technical information. It includes a calendar of events, publications, project listings, and lists committee members and activities. The MMSD hosts an E-forum, accessible through the SWWT website, which is a tool designed to enable stakeholders to participate in online discussions. The E-forum (<http://www.swwtwater.org/swwtforum/>) may be used by all committee members to share information, discuss concepts, and comment on draft documents, such as the WRP, as they are developed.

3.4.2 Watershed Booklets

As a precursor to the WAT meetings, the MMSD produced a booklet about each watershed that included information about the status of the water quality within the watershed, the geography of the watershed, and information about what local governments, the MMSD, and others are doing to improve water quality. These booklets also outlined additional actions that individuals and groups could do to further advance improvements to water quality.

3.4.3 Annual Conference

The annual Clean Rivers Clean Lakes conference is attended by hundreds of people dedicated to improving the region's water quality. Originally convened by the MMSD, SEWRPC and others as part of the Water Quality Initiative, 2009 marks its 6th year. The event draws people involved in many aspects of water resource management and protection including scientists, regulators, planners, elected officials, engineers, developers, environmentalists, and community activists.

⁴ SEWRPC, *A Regional Water Quality Management Plan Update for the Greater Milwaukee Watersheds*, Planning Report No. 50 (December 5, 2007)

⁵ SEWRPC, *Water Quality Conditions and Sources of Pollution in the Greater Milwaukee Watersheds*, Technical Report No. 39 (November 2007)



3.4.4 Other Southeastern Wisconsin Watersheds Trust, Inc. Education and Outreach Initiatives

The SWWT education and outreach materials and tools can be used by municipalities and counties throughout the watersheds. This ultimately may include an information and education curriculum for elected officials as well as a communication plan. Print or electronic publications may include an annual magazine, periodic newsletters, and special topic newsletters focusing on critical habitat and WAT efforts and results. Ultimately, SWWT envisions development of an annual water-quality report card for all the watersheds, based on agreed-upon parameters and measured data.