

CLEAN WATER PLAN

208 Water Quality Management Plan for Portage County and Summit County Lake Erie Basin

Executive Summary

What does the 208 Plan mean?

The Northeast Ohio Four County Regional Planning and Development Organization (NEFCO) was designated by the Governor of Ohio under Section 208 of the federal Clean Water Act to perform areawide planning. Together with local public officials throughout the region, NEFCO has formulated a draft of the 208 Plan which addresses both municipal wastewater treatment issues and nonpoint source pollution management and control. This version of the 208 Plan incorporates changes from the public review process and has been approved by the NEFCO General Policy Board.

The first 208 plan for the NEFCO region was completed in 1979 and focused considerable attention on public investments in wastewater treatment facilities and point sources of water pollution, which produced a remarkable recovery in the quality of water throughout the region. The most recent concern of threats to water quality are from the rapidly developing areas of the region. The threat comes from a variety of potential sources, including non-point discharges from residential and commercial developments. Given these conditions, this draft 208 Plan focuses on:

- issues of planned sewer expansions in the suburban counties;
- better management of home sewage systems;
- more vigorous attention to the control of nonpoint source pollution; and
- protection of regionally important water resources.

What is the problem?

Recent court decisions resulting from the “Reynoldsburg vs. Ohio” and the “Scioto vs. Ohio” court cases, in conjunction with changes in the Antidegradation Rule application in Ohio, stipulate that the Director of Ohio EPA may not process an application for a National Pollutant Discharge Elimination System (NPDES) permit or a Permit-to-Install (PTI) that is in conflict with any Water Quality Management Plan developed under Section 208 of the Clean Water Act. This means that all local wastewater management agencies need to coordinate their facilities plans with the region’s 208 water quality plans.

Local Implications

Future sanitary sewer extensions must be consistent with the Plan.

Home sewage management regulations will mean regular inspections and mandatory septage pumping programs.

Stricter requirements and stronger enforcement of storm water management programs and other nonpoint source control recommendations could increase regulation of development.

Riparian zone protection programs may limit streamside uses.

Road salt minimization programs, will mean less road salt is used.

Local officials will be able to better protect regionally important water resources from pollution sources.

The advantage of the 208 Clean Water Plan Update is that it will establish the basis for evaluating all sewerage plans in a manner which will ensure that future development occurs as each community envisioned. Local governments will be able to help guide land use decisions in a manner that is protective of the environment and water quality.

In areas where sanitary sewers are to be excluded as an option, local communities must develop and implement more effective programs to make sure that individual on-site sewage treatment systems are properly installed, operated, and maintained. If this does not occur, and a water quality problem results, the Ohio EPA may be forced to require the extensions of sewers to rectify the problem.

Introduction

NEFCO's Clean Water Plan (CWP) is the first major update to the region's 208 areawide water quality management plan (WQMP) since 1981.

The Clean Water Plan planning area encompasses a two county area and includes the Cuyahoga River, and small headwater sections of the Chagrin River, Grand River, and Rocky River Basins tributary to Lake Erie. A NEFCO Clean Water Plan for the four-county area tributary to the Ohio River Basin will be produced in different phases and ultimately combined into one report.

NEFCO collaborated with NOACA in developing elements of this plan. The two agencies share planning responsibilities for several watersheds in northeast Ohio. Together they created a joint Task Force of local and state officials with water quality management planning responsibilities to assist in the development of the plan.

Authority for preparing this plan comes from Section 208 of the Clean Water Act which requires the preparation of areawide management plans for water quality by regional agencies designated for that purpose. NEFCO was designated in 1975 as the planning agency for the four counties of Portage, Stark, Summit and Wayne under Section 208, and produced the initial Section 208 plan in 1979. The Ohio EPA is responsible for overseeing updates to and implementation of Section 208 plans.

Northeast Ohio's Water Quality Problems Today

Twenty years ago when it was first adopted, the 208 plan for the NEFCO region provided the regional planning framework for federal funding of publicly-owned wastewater treatment facilities. Construction of these was seen as absolutely critical to restoring water quality to northeast Ohio's urbanized areas. The public investments in wastewater treatment anticipated in the initial plan have produced a remarkable recovery in the quality of water and in the return of aquatic life to many of the region's streams, lakes and rivers and to Lake Erie itself. In spite of these improvements, significant water quality problems remain in the older urban areas of the region largely due to storm water, combined sewer overflows, sanitary sewer overflows, land use patterns, and habitat disruption.

However, the most recent concern to water quality today is occurring in the rapidly developing areas of the region on the periphery of the existing urban areas. This concern comes from a variety of potential sources, including nonpoint source discharges from residential and commercial developments, but most significantly from the combined effects of land disturbances to construct these new developments. This transformation is threatening regionally important water resources once thought relatively secure from water pollution threats (upland drinking water reservoirs, groundwater supplies, and high quality streams once far removed from urbanization). Thus, while the perceived water pollution problems of the 1970s have largely been addressed, there remains a whole new set of water pollution challenges at the turn of the 20th century to be confronted. Land uses will change from a predominantly rural character to urbanizing uses. This will affect water runoff from the land surface and how surface runoff seeps into the ground. This trend will have an impact on water quality.

Complex water management issues increase as local communities recognize the interrelationship of water resources and community growth. For example, multiple political jurisdictions downstream from Akron's Lake Rockwell (Cuyahoga River) reservoir remain engaged in litigation on water usage and its impact on the middle portion of the Cuyahoga River. The resolution of issues related to water management and use is critical to the continued planning and protection of water resources.

Focus of the Clean Water Plan

A primary focus of the Clean Water Plan, therefore, is to manage the threats to water quality presented by the rapidly developing areas of the region. The plan addresses issues of planned sewer expansions in Portage and Summit Counties; better management of home sewage systems; more vigorous attention to the control of nonpoint source pollution, and the identification of and protection of the region's important water resources. If action on the Clean Water Plan is not taken, regional water quality is expected to decline, reversing the gains of the last twenty years.

The Clean Water Plan is also concerned with the persistent water quality problems in the region's existing urbanized areas. In these areas, while water pollution problems associated with point source discharges from sewage treatment plants and industrial sources have been largely addressed, significant water quality problems remain.

Vision and Goals of Clean Water 2000

The 208 Plan represents a vision of the region's future to balance development and economic growth with a sustainable quality of the water environment. The policies and recommendations of the 208 Plan were formulated using the following goals as guidelines:

- 1) The plan should take a watershed approach that coordinates agencies addressing point and nonpoint pollution sources as the basis for management planning;
- 2) The plan should optimize the use of existing investment and reinvestment in infrastructure with infill development, prior to the use of public investments in new infrastructure;
- 3) The plan should be protective of what has been gained in environmental quality and outline measures needed to be undertaken to meet designated uses with particular attention to the enhanced protection of regionally important water resource areas;
- 4) The planning process should be a tool for educating local public decision makers on regional water quality management issues; and
- 5) The plan should be an educational tool to elicit support of the general public for plan implementation.

Areas addressed by the Clean Water Plan

The Clean Water Plan addresses water quality management planning improvements in seven areas:

- Area 1) Wastewater Management Facilities Planning;
- Area 2) Management of Home Sewage and Semi-Public Sewage Disposal;
- Area 3) Nonpoint Source Pollution and Storm Water Management;
- Area 4) Protection of Important Water Resources;
- Area 5) Restoration of Urban Streams;
- Area 6) Watershed Planning; and
- Area 7) Ongoing Areawide Water Quality Planning.

Steps to Plan Certification

The draft plan will be circulated for public review and comment from local jurisdictions and agencies, the general public and the Ohio EPA. A number of public meetings will be held for this purpose. The final draft plan will include revisions based on the public review process. With approval of this document by the NEFCO General Policy Board, the final plan will be submitted to the Ohio EPA for certification, and to the Governor and the USEPA for approval. Once approved, the plan will become effective.

Area 1: Wastewater Management Facilities Planning

The 208 Plan updates wastewater management facility planning areas (FPA) and identifies local jurisdictions to be designated as management agencies (DMA) for wastewater management facility planning within a FPA. Each FPA has identified wastewater management options or “prescriptions” which represent current judgments about where sewers will be extended and where areas will remain unsewered over the next 20 years.

Once adopted by NEFCO, certified and approved by the Ohio EPA, these options will be part of the region’s water quality management plan (WQMP), referred to by NEFCO as the Clean Water Plan (CWP). Decisions by the Ohio EPA concerning certain permits and State Revolving Loan Fund loans for wastewater treatment must be consistent with the Clean Water Plan. Designated management agencies for wastewater treatment facilities are listed in Chapter 3. This chapter also provides wastewater prescriptions for each of the facility planning areas contained in this update.

Significant Policies: One of the objectives of Section 208 of the Clean Water Act was to establish integrated and coordinated facility planning for wastewater management. In order to accomplish this objective in urban areas where competition for service areas was expected to be a concern, the Clean Water Act called for the designation of areawide planning agencies to assist in the resolution of such conflicts as they might arise. All future changes to boundary definitions and the creation of new facility planning areas must be approved by the NEFCO Board. Any applications to the Ohio EPA for a permit to discharge pollutants into the waters of the state or a permit to install must be consistent with the adopted CWP. Wastewater management options within facility planning areas must comply with requirements of the Clean Water Act and adopted with the advice of affected local jurisdictions. The Ohio EPA will not approve decisions concerning certain NPDES permits, permits to install (PTI) and State Revolving Fund (SRF) loans for wastewater treatment unless they are consistent with the CWP.

Detailed policies governing how changes to wastewater management plans will be made are included in Chapter 3.

Listed below are sample descriptions of categories shown on the county facilities planning areas maps. These are examples of what NEFCO refers to as wastewater prescriptions. The reader is cautioned to not apply any of these prescriptions to a specific community. Rather, the reader is referred to the community or county area’s prescription described in Chapter 3 of the CWP.

Areas currently sewered (yellow) - These areas are currently served with sanitary sewers that have been constructed and are currently in operation. However, there are undeveloped tracts of land and vacant lots subject to improvement. All new development and construction in the yellow areas of this facilities planning area will be required to connect to and/or provide sanitary sewer service to ensure that wastewater will be treated and discharged at an existing publicly-owned treatment works (POTW). Existing non-single-family private treatment systems which fail to operate properly will be required to connect to and/or provide sanitary sewer service to ensure that wastewater will be treated at an existing POTW. Failing home sewage treatment systems (HSTSs) serving single-family homes shall be abandoned in accordance with Ohio Administrative Code 3701-29-02.

Area Programmed for Sewers Within the Next 20 Years (orange) - These are areas projected to receive sewers but are not yet sewered. Projected wastewater flow from these areas have been accounted for within the system. Existing (developed) commercial, industrial, institutional and residential properties within the proposed sanitary sewer service area shall be required to connect to the sanitary sewer, as it becomes available, for the removal of sanitary wastewater from their existing properties.

All new residential developments and new commercial, industrial, institutional establishments within the proposed sanitary sewer services area shall be required to connect to the existing sanitary sewer system for removal of sanitary wastewater from each new building unit of facility, fully observing all regulations of governing agencies. The developer or owner may be required to extend new sanitary sewers from the proposed development or facility to the existing sanitary sewer system that is served by an existing POTW.

Failing systems of existing commercial, industrial and institutional establishments, in need of repair or replacement will be required to connect to the existing sanitary sewer that is served by an existing POTW, even if a sewer extension is required. No home sewage treatment systems (HSTS) or semi-public sewage disposal systems (SPSDS) are recommended within the proposed sanitary sewer service area for new commercial, industrial, institutional and residential developments. However, HSTS shall be considered appropriate for new single family houses constructed within subdivisions located within the proposed sanitary sewer service area and served by such systems if an existing POTW is not available to such properties. The decision shall be determined on a case-by-case basis and in accordance with local zoning, the local planning agency the Portage County or Summit County Health Departments, local health departments, as each area of government jurisdiction requires.

Exceptions may be (granted/requested) based on sewer availability, soil conditions, extent of failure, and cost of repair.

Areas That Will be Served by On-Site Non-discharging Systems (cream) - These are areas in which new development is expected to be “large-lot” low density, with non-discharging household and semi-public disposal systems as the primary method for the treatment of wastewater.

Areas That Will be Served by a POTW or by On-Site Non-discharging Systems (green) - These are rural areas with undeveloped tracts of land and vacant lots subject to improvement and many existing subdivisions developed in the past using HSTSs for wastewater treatment. All new subdivision development, whether residential or non-residential, and all other new non-residential, and new multi-family residential development, will be required to connect to and/or provide sanitary sewer service to ensure that wastewater will be treated at an existing POTW. Vacant lots within existing HSTS-served subdivisions and remote metes-and-bounds residentially-zoned parcels may be so improved with new HSTSs provided the local health department finds that soils are suitable to assure there will be no off-lot discharge of effluent. Existing non-single-family private treatment systems HSTS and SPSDS which fail to operate properly will be required to connect to and/or provide sanitary sewer service to ensure that wastewater will be treated at an existing POTW. Exceptions may be (granted/requested) based on sewer availability, soil conditions, extent of failure,

and cost of repair. Failing HSTSSs serving single-family homes shall be abandoned in accordance with OAC 3701-29-02.

Areas that will be served by a POTW or by on-site nondischarging systems in Joint Economic Development District (JEDD) Service Areas (dark green) - Existing (developed) commercial, industrial, institutional and residential properties within the sanitary service area shall be required to connect to the sanitary sewer, as it becomes available, for the removal of sanitary wastewater from the existing properties.

All new residential developments and new commercial, industrial, institutional establishments within the sanitary sewer service area shall be required to connect to the existing sanitary sewer system for the removal of sanitary wastewater from each new building unit or facility, fully observing all regulations of governing agencies. The developer or owner shall be required to extend new sanitary sewers from the proposed development of facility to the sanitary sewer system that is served by an existing publicly-owned wastewater treatment facility.

Failing systems of existing commercial, and institutional establishments, in need of repair or replacement, will be required to connect to the existing sanitary sewer that is served by an existing publicly-owned wastewater treatment facility, even if a sewer extension is required.

No home septic treatment systems (HSTSSs) are recommended within the sanitary sewer service area for new commercial, industrial, institutional and residential developments. However, HSTSSs shall be considered appropriate for new single family houses constructed within existing subdivisions located within the sanitary sewer service area and served by such systems if an existing publicly-owned sanitary sewer system is not available to such properties. HSTSSs shall also be considered appropriate for new single family houses built on metes-and-bounds parcels within the sanitary sewer service area that are not part of any existing subdivision and are not located adjacent to any publicly-owned sanitary sewer system. The decision shall be determined on a case-by-case basis and in accordance with local zoning, the local planning agency or the local health department, as each area of government jurisdiction requires.

Recommendations for Local Officials: Land use plans should conform to the wastewater management options described in the 208 Plan. Joint Economic Development District (JEDD) or Cooperative Economic Development Agreement (CEDA) procedures should be considered to address potential conflicts among local jurisdictions over the extension of wastewater services to currently unserved areas.

Area 2: Management of Home Sewage and Semi-Public Sewage Systems

The Clean Water Plan anticipates that some areas of the Lake Erie Basin portions of Portage and Summit Counties will remain unsewered and be serviced by individual home sewage treatment systems and semi-public sewage disposal systems over the next twenty years. If not properly maintained these systems can have a high rate of failure and can adversely impact water quality. The reasons for this are complex and tied to deficiencies in the home sewage management system.

The plan makes a series of recommendations for improving the management of home sewage treatment systems and semi-public sewage disposal systems by local health departments. This is the

result of work by a committee of seven county health departments, the Ohio EPA, the Ohio Department of Health, NEFCO and NOACA.

The recommendations have been organized in a “cradle to grave” fashion that begins with improvements to site evaluation procedures, includes improved procedures for system installation and site inspections, homeowner maintenance requirements and regular inspections by local health departments, regular pumping requirements and homeowner education and training.

Local health department implementation of the recommendations is critical for maintaining water quality in unsewered areas of this region. Communities wanting to avoid the costs and developmental impacts of centralized sewers must actively support and encourage full implementation of these recommendations.

Recommendation for State Legislation

The Clean Water Plan also makes a recommendation that legislation be enacted in Ohio that would set standards for the management of home sewage treatment systems and semi-public sewage disposal systems including regular inspections by local health departments, and provide a mechanism for local accountability to state standards through a process of state certification of local agencies. It is clear from the deliberations of the committee, charged with addressing the issue of home sewage disposal management recommendations for this plan, that the absence of a state statutory authority in this area is a severe impediment to adequate regulation of this pollution source.

Another important recommendation is that local health departments prohibit in any new development the installation of any system which will produce an off-lot discharge. The recommendation goes further to say that off-lot discharging systems should only be allowed in repair or replacement cases where no other alternative is technically or economically available.

Federal Requirement for Control of Illicit Discharges

New federal regulations promulgated to control illicit discharges to municipal storm water systems will constrain the approval of off-lot discharging systems by requiring state enforcement of standards defined as “best available demonstrated control technology” as outlined in Ohio Administrative Code (OAC) 3745-1-05: Antidegradation Rule (Ohio EPA Correspondence of August 11, 2000). These standards will also apply to existing systems which may effectively eliminate the option to repair or replace many off-lot discharging systems with similar systems in the future.

The USEPA Storm Water Phase I Final Rule was promulgated on November 16, 1990 (55FR17990). The USEPA Storm Water Phase II Final Rule which was promulgated on December 8, 1999 (64FR68722), effective March 10, 2003, will significantly control off lot discharges. Further, regulations affecting the “medium” and “large” municipal separate storm sewer systems (MS4s) generally serving populations of 100,000 or greater, and construction activity disturbing five (5) acres of land or greater, and ten (10) categories of industrial activity under Phase I have been expanded. It now will cover urbanized areas that together have a residential population of at least 50,000 and an overall population density of at least 1,000 people per square mile and areas outside of an urbanized area of at least 10,000 and a population of at least 1,000 people per square mile. Construction activity is reduced to those areas of one (1) acre or more, and the regulations end the delay of the deadline for some industrial activities.

The Ohio EPA and ODH are currently negotiating with USEPA over the terms and conditions of permitting authority that complies with the new federal regulations. The Clean Water Plan includes the recommendation that local health departments continue to serve as the permitting authority for these systems.

What Local Agencies Need to Do

Under the 208 Plan, it is recommended that local health departments agree to: adopt the plan recommendations; pursue implementation of these recommendations over a five year period; pursue implementation of the plan recommendations as a priority in areas identified as tributary to regionally important water resources; and report their progress to the NEFCO Board. The LHDs agree to adopt and pursue uniform regulations through the Ohio General Assembly.

Recommendations for Management of Home Sewage Systems:

- 1) Site evaluation forms should be uniform; comprehensive site plans should be submitted with applications and fees should reflect the actual costs of the evaluation.
- 2) Sewage disposal systems that utilize soil for the treatment or disposal of wastewater should not be approved for use in soils that are not capable of providing adequate treatment and dissipation of sewage system effluent.
- 3) Any system that produces an off-lot discharge for any new development should not be permitted.
- 4) Regulations that permit the revocation of installer registration based on unsatisfactory work or deviation from regulations must be enforced.
- 5) Each county and municipality should adopt an Operational and Maintenance (O&M) Program which includes owner education, operational permitting process, regular system inspection, adequate staffing and fees, system records management, and mandatory pumping programs. These programs should be designed to comprehensively address existing and new systems. Systems should be inspected regularly to ensure maximum effectiveness in treating wastewater. The O&M Program should be staffed at a level that ensures that each system is inspected at least every five years. A mandatory septage pumping program should be implemented that educates, tests, registers, and regulates pumpers/haulers, maintains pumping records, and determines pumping schedules for each system.
- 6) A septage management and disposal plan to address septage disposal at POTWs should be developed with leadership by the County Executive, Board of County Commissioners, city administration, and local Boards of Health.

Detailed recommendations are included in Chapter 4.

Area 3: Nonpoint Source Pollution and Storm Water Management

The threats to surface and groundwater resources are changing. Historically, point sources were viewed as the primary threat. However, point source problems are well on their way to being controlled, and now it is nonpoint pollution and storm water effects, which appear to provide the greater threat to our water resources. Nonpoint problems are both water quality and quantity based. There is an emerging realization that unchecked storm water runoff from impervious surfaces is a major threat to water resources. The solutions to these problems are watershed specific and therefore must be pursued using a watershed approach involving multiple government jurisdictions.

Recommendations for Nonpoint Source Control

Six nonpoint source management programs are recommended for implementation by local and county agencies. The plan provides model legislation for consideration. These programs are as follows:

- 1) **Storm water runoff management from development and redevelopment activities.** Municipalities and counties are encouraged to adopt and implement Storm Water Management Programs for all development and redevelopment activities that affect an area equal to one acre or more as part of a common development. These programs need to address the management of both storm water quality and quantity. The plan also recommends state legislation in this area.
- 2) **Construction site erosion and sediment control programs.** Municipalities and counties are encouraged to adopt and implement Soil Erosion and Sediment Control Management programs for all nonagricultural land disturbance activities, which affect an area equal to one acre or more as part of a common development.
- 3) **Riparian zone protection programs.** Developing communities are encouraged to adopt and implement Riparian Zone Protection Ordinances, while developed areas are encouraged to protect existing vegetation in riparian corridors and work to restore the integrity of the zone in disturbed areas. A riparian buffer ordinance minimizes or prevents the alteration of the riparian zone along stream segments to ensure that functions provided by the riparian area are protected. The riparian zone generally covered by a buffer ordinance includes the vegetative corridor adjacent to a perennial or intermittent stream usually up to the 100-year base flood level. The ordinance requires building setbacks in new subdivisions and major redevelopment areas that necessary to protect the riparian zone. These building setbacks range from 25 to 300 feet depending on the size of the stream. The plan also recommends state adoption of a model ordinance.
- 4) **Conservation design for storm water management.** Developing communities are encouraged to foster the use of Conservation Design Development which concentrates development on limited areas of a property while maintaining tracts of open space surrounding it. This minimizes infrastructure needs, preserves the natural character of the land, reduces soil erosion and lowers storm water management costs.
- 5) **Road salt minimization and storage programs.** Road salt management programs seek to use only the amount of salt needed to provide the desired level of safety and to apply that amount of salt at the time when it will deliver the most good. Under some conditions, substitutes for road salt should be considered. Counties and communities that are in close proximity to surface water or groundwater drinking supplies are particularly encouraged to implement and maintain Road

Salt Minimization and Storage Management Programs. ODOT is also encouraged to implement and maintain road salt minimization and storage management programs.

- 6) **Non-point source management plans for low interest loan programs.** Soil and Water Conservation Districts are encouraged to take the lead in developing non-point source pollution management plans which would allow local watershed organizations to participate in the Ohio EPA/ Water Pollution Control Loan Fund (WPCLF) Linked Deposit Program. This program requires completion of a watershed management plan that identifies needed non-point source controls and provides targeted implementation.

What local officials need to do:

Compare existing laws to model regulations and identify inconsistencies or shortcomings. Where substantial change is needed, decide whether it is better to upgrade the existing law to eliminate deficiencies or to adopt the model ordinance as a replacement for the existing codes. Train all personnel who implement the adopted regulation.

The plan also spells out a series of strategies addressing emerging nonpoint source program opportunities which are included in Chapter 5.

Area 4: Protection of Regionally Important Water Resources

A series of environmentally sensitive water resource categories have been identified as candidates for priority protection. Resources that meet these conditions include surface drinking water supplies, groundwater drinking supplies, and regional resource waters.

The Clean Water Plan proposes four changes in Ohio EPA policy to enhance the protection of regionally important water resources.

The Ohio EPA is requested to:

- 1) Adopt changes to its Permit to Install (PTI) application procedure for new or increased discharges to areas identified as regionally important areas in the 208 Plan that would require assessment and mitigation of potential off-site impacts of discharge.
- 2) Broaden the Total Maximum Daily Load (TMDL) process so that local officials could augment state-initiated set asides for the unique regional waters within their jurisdictions by petition to the Ohio EPA with set asides implemented through Ohio EPA's antidegradation and PTI review process.
- 3) Amend its policies regarding the Water Pollution Control Loan Fund (WPCLF) to give priority to the protection of regionally important water resources identified in the 208 Plan through enhancements to its financial incentives program.
- 4) Prioritize the enforcement of the National Pollutant Discharge Elimination System permits for construction site activities in communities that are tributary to Surface Drinking Water Supplies, Groundwater Drinking Supplies, and Unique Regional Waters identified in the 208 Plan.

Detailed recommendations are included in Chapter 6.

Area 5: Urban Stream Restoration Plans

The Clean Water Plan proposes a strategy for urban stream restoration as a way to start or restart processes of stream restoration for streams whose land use is predominately urban and which, generally, are not attaining current standards. These urban stream restoration plans would be individually tailored to a specific stream or stream segment with the help of substantial public participation. This is expected to result in outcomes which reflect community goals. Traditionally, resources devoted to stream protection have been focused on pollution abatement. While pollution abatement remains a necessary activity, other measures to protect or restore streams can often more effectively restore water quality.

There is a strong need for initiatives to consider the establishment of reasonable standards for restoring urban streams. Currently, aquatic life water quality standards are based upon “reference streams” from undeveloped areas. Urban ecosystems, in particular, are at risk from a wide range of stressors beyond point sources of pollutants. Modified land use patterns in urban areas typically impact nonpoint pollutant loads to surface and ground waters, alter the hydrology of a stream, and destroy the biotic and abiotic functions of stream corridors. While a wide range of significant stream stressors are well documented, we continue to invest our resources in narrow solutions that have little chance of effecting desired change. Pollutants are just one of many factors which affect an ecosystem.

There is a pressing need to focus on two areas where urban streams typically fall far short of meeting existing standards -- the biological criteria for aquatic life uses and the bacteria criteria for “contact recreational” use. A process that sets attainable goals in these areas could greatly further watershed restoration by prompting action as well as focusing attention and resources toward underlying stream problems.

Future efforts for a regionally endorsed urban stream restoration plan should:

- 1) Be based on a scientific approach and a thorough analyses of costs and benefits. Local impacts need to be considered. The urban stream restoration plan will need to prepare a scientifically and economically defensible mechanism.
- 2) The Urban Stream Restoration Plan will need a detailed analyses of specific streams (or segments of streams) that would be affected.
- 3) The Urban Stream Restoration Plan should also demonstrate how existing rules and designations preclude downstream attainment and how further investment of resources in specific streams will not be cost effective.
- 4) An Urban Stream Restoration Plan should initiate a statewide initiative to examine how stream standards could be more appropriately determined. Other stream segments that probably may

warrant Restoration Plans and designation may include; rural agriculture; rural and urban flood control, rural recreation, and water supply.

Model of proposed urban watershed planning process

A regulatory program that encourages community-developed urban use designations i.e., stream goals could be the catalyst for community work to define and address problems at the heart of urban stream impairments. If flexibility is allowed in setting goals, communities are likely to respond with ideas that are efficient in increasing the value of the resource. If resources for pollution abatement could be re-targeted, many communities would likely be interested in addressing the root causes of urban stream problems with measures such as habitat protection, stream restoration and storm water management.

The development of an Urban Stream Restoration Plan (USRP) would follow a planning process that initially focuses on the root causes for the condition of the urban stream segment in question. This would be followed by a community goal-setting process. Alternative sets of actions to restore the stream segment to chosen goal levels would be created and evaluated to lead to a recommended set of actions. The product would include an implementation plan outlining responsibilities for achieving both short and long term stream goals.

The proposed USRP, including the proposed supporting water quality standards, would be submitted to the designated WQMP planning agency for consideration and adoption as part of the area's Water Quality Management Plan. The review process would look at the issue of protection of downstream uses and assure that appropriate best management practices have been included to protect stream health. Additionally, the CWP would consider measures of technical and institutional support for the USRP. The amended CWP would be forwarded to Ohio EPA for incorporation into the state's Water Quality Plan. Incorporation of the amended CWP into the state's Water Quality Plan would likely be accompanied by a schedule for Ohio EPA rulemaking.

Ohio EPA would undertake a rulemaking process to consider the proposed water quality standard component of the proposed USRP. The state would also consider Total Maximum Daily Load plan and initiate any associated NPDES permit actions needed to achieve consistency with the plan. It is hoped that the state would also adopt policies that would help to direct available resources to priorities set forth in the USRP.

The named implementing authorities in the USRP would be responsible for carrying out measures called for in the plan in a coordinated fashion. It is anticipated that a coordinating organization may be designated to provide overall direction to the implementation effort.

At appropriate intervals, specified in the plan, there would be a re-evaluation of the overall goals of the USRP. This is envisioned as a community process similar to the initial process used to establish goals for the USRP. This process might involve formal revisions of the goals of the USRP and, as appropriate, might involve consideration of formal revisions of the area CWP and the state's Water Quality Plan. At a minimum, evaluation of future goals should benchmark with the attainment of the fishable/swimmable goals established by the Clean Water Act.

Opportunities for Land Use Changes

The process of adoption of a proposed USRP as a part of the area's CWP may also offer an opportunity to require consideration of changes in land use practices. Specifically, as a matter of policy, the designated planning agency may consider requiring that certain best management practices related to land use be considered in the development of any USRP which it considers for adoption.

Finally, one of the most powerful tools in affecting land use is having the capital resources necessary to obtain easements or actual ownership of critical natural features that support the integrity of water resources. Ohio is fortunate to have a powerful new program that makes available the capital strength of the state's SRF fund for protection and restoration efforts. The Water Resource Restoration Sponsor program, put into place in 2000, is designed to assist protection and restoration projects that directly benefit water quality. It accomplishes this objective by offering reduced interest rates on traditional SRF loans when a loan recipient agrees to use the financial benefit of the reduced loan rates for the specified restoration/protection efforts. This program can produce substantial capital resources for these efforts. For example the benefit of a zero percent interest rate on a \$10 million dollar loan could be used to fund a restoration or protection effort costing in the range of \$5 million.

Detailed strategies and recommendations are included in Chapter 7.

Area 6: Watershed Planning

During the 1990s organized watershed and subwatershed planning groups have emerged in four of the five major river basins in the Northeast Ohio 208 Lake Erie Basin planning area. Local, county and state water quality management agencies are encouraged to participate in and support the major watershed planning groups currently existing in the area. In Summit and Portage Counties, three watershed groups exist for the Cuyahoga River: the Cuyahoga River Remedial Action Plan Coordinating Committee; the Middle Cuyahoga River Stakeholders; and the Upper Cuyahoga River Task Force. In Portage and Summit Counties, subwatershed groups have or are being organized for Yellow Creek, the Little Cuyahoga River, and Tinkers Creek. These groups constitute a significant and valuable regional planning resource for promoting coordinated approaches to watershed issues. Their strength lies in developing public awareness and responsible actions for water quality.

Watersheds and subwatersheds are becoming recognized as a new form of community or 'neighborhood' around which citizens and public agencies can organize to address environmental problems.

This CWP recognizes the importance of Northeast Ohio's watershed groups, and recommends actions to sustain and enhance their varying roles.

Detailed policies and recommendations are included in Chapter 8.

Area 7: Ongoing Regional Water Quality Management Planning

The NEFCO General Policy Board will continue the ongoing 208 Plan administration responsibilities and organizational structures of the agencies involved in the planning process. This involves updating the regional plan for wastewater treatment facilities, promoting local implementation of recommendations for home sewage management, and nonpoint source controls, promoting state rules to protect regionally important resources and encouraging urban stream restoration, maintain water quality information and facilitate coordination of data, and serve as a regional forum for addressing water quality management issues. Staff and financial support will be needed to sustain ongoing planning activities. With the adoption of this plan update, the NEFCO Board reaffirms its intention to sustain this effort.

Detailed policies and recommendations are included in Chapter 10.