

VILLAGE OF ROCHESTER, ILLINOIS

GENERAL INFORMATION ON STORMWATER MANAGEMENT WITHIN THE VILLAGE OF ROCHESTER

Stormwater that falls on the Village of Rochester generally drains to either the South Fork Sangamon River or Black Branch Creek. Runoff is the excess of precipitation, snowmelt or irrigation that is not evaporated, is not intercepted by vegetation or infiltrated into the ground. Stormwater runoff is also one component of this region's water resources that can eventually be used for drinking water, whether through wells (groundwater) or lakes (surface water). Managing stormwater is important because the quantity and quality of it impacts the average Rochester resident's standard of living. The United States Government has also mandated that state and local governments manage its stormwater within the respective corporate boundaries.

Background

The Federal Clean Water Act of 1972 and subsequent amendments of 1977, focused primarily on the control of pollution sources originating from municipal and industrial wastewater discharges. These acts established the National Pollutant Discharge Elimination System (NPDES), which required permits from such "point source" discharges. USEPA administers this program through the states. In the State of Illinois, the IEPA is charged with administering the NPDES program.

As pollution control measures were implemented under these requirements, it became increasingly evident that stormwater runoff and other diffuse, or "non-point," sources of runoff were significant causes of water quality impairment. For example, in urban areas around the country, it has been shown that streams and rivers impacted by urban non-point sources generally do not meet the "fishable/swimmable" goals of the Clean Water Act, while rural areas typically are in much better condition.

As a consequence, in the reauthorization of the Clean Water Act in 1987, Congress required implementation of a comprehensive approach for addressing stormwater discharges under the NPDES permitting program. In response, the USEPA developed a Phase I stormwater permitting program that became effective in 1992 and the subsequent Phase II was implemented in 2003. The Phase I stormwater permitting program identified several categories of activities that were subject to requirements, including: municipal separate storm sewer systems serving populations of 100,000 or more; construction activities disturbing five or more acres; and numerous industrial activities.

Phase II Requirements

Phase II regulations apply to municipalities and counties that own or operate a separate storm sewer system (also known as an MS4) located within an “urbanized area.” An urbanized area is one where the combined population of an area (e.g., county and adjoining or neighboring municipalities) is greater than 50,000 as determined by the most recent decennial census. Rochester has been included in the Springfield urbanized area due to its proximity to Springfield and the Village has a separate storm sewer system. Therefore, Rochester must comply with the Phase II NPDES requirements.

The Phase II regulations identify six “minimum control measures” for municipalities and counties as follows:

1. Public education and outreach.
2. Public involvement and participation.
3. Identification and elimination of illicit discharges to storm sewers.
4. Control of construction site runoff.
5. Control of stormwater runoff from new development and redevelopment.
6. Reduction/prevention of pollutant runoff from local government operations.

The Village of Rochester has addressed or is in the process of addressing the six minimum control measures as follows:

1. Included this information on their website and provided educational materials to the public in the Public Works Committee meeting.
2. Involved Rochester High School biology class in the monitoring the health of the pond in Rochester Park and encouraging the Public Works Staff to be more proactive with stormwater issues.
3. The Village Board approved ordinance 04-03 that prohibits illicit discharges into the separate storm sewer system. The Rochester Public Works Department is responsible for identifying, documenting and reporting illicit or illegal connections to the separate storm sewer system. Examples include sewage connections or connections to piping other than storm sewer.
- 4&5. The Village Board approved ordinance 04-07 that regulates erosion and sediment control for developments of 1 acre or more. This includes new and redeveloped sites. The Rochester Village Engineer reviews stormwater pollution prevention plans prepared by developers and recommends approval by the Village Board of Trustees.
6. The Rochester Public Works Department continues to improve their operations and maintenance procedures that minimize their impact on stormwater and is working on a routine to sweep streets and clean storm inlets.

Homeowners in Rochester are responsible for the runoff from their property, whether it is one-third acre or ten acres. While the volume of runoff is not usually controlled from individual property owners, the quality can be controlled. Individual property owners can ensure improved stormwater quality leaving their property by following some basic guidelines:

- Make sure that all areas either have vegetation or ground cover to retain a strong soil structure. Fertilize sparingly and carefully. Minimize impervious areas, if possible.
- Avoid sweeping yard debris into the streets or drainage swales adjacent to property and keep drainage inlets clear.
- Dispose of yard waste and construction debris in an approved manner.
- Clean roof gutters of debris and consider installing a rain barrel to capture runoff from the roof. This water can be used to water plants, gardens, etc.
- Avoid storing chemicals outside and dispose of household cleaners, chemicals and oil at approved IEPA collection sites.
- Clean up after pets and practice good car care.
- If a creek, stream or river runs adjacent to property, maintain a buffer area between the bank and yard using native plants.
- Consider constructing a rain garden to filter out stormwater pollutants leaving property.

Stormwater management is important to the health and well being of Rochester and is the responsibility of both the Village and its residents.

Please contact the Rochester Public Works Department with questions about stormwater runoff and drainage issues at 498-7062.

Credits and links:

United States Environmental Protection Agency: <http://cfpub2.epa.gov/npdes/>

Illinois Environmental Protection Agency:

<http://www.epa.state.il.us/water/permits/storm-water/index.html>

Northeastern Illinois Planning Commission: <http://www.nipc.org/>

Rain Barrels: <http://www.rainsaverusa.com/programs.htm>

Rain Gardens: <http://clean-water.uwex.edu/pubs/home.htm#rain>