

City of Smithville, Missouri

# **Board of Aldermen - Work Session Agenda**

December 21, 2021

6:30 p.m. – \*\*\*Via Videoconference\*\*\*

NOTICE: \*Due to the Health Officer's orders for safety, public meetings and public comment during public meetings will require modification. The City of Smithville is committed to transparent public meetings and will continue this commitment during the COVID-19 crisis. Anyone who wishes to view the meeting may do so in real time as it will be streamed live on the city's FaceBook page through FaceBook Live.

For Public Comment, please email your request to the City Clerk at Idrummond@smithvillemo.org prior to the meeting to be invited via Zoom.

## 1. Call to Order

## 2. Discussion Stormwater Management Plan

## 3. Adjourn

Join Zoom Meeting https://us02web.zoom.us/j/89297575773

Meeting ID: 892 9757 5773 Passcode: 770595



# STORMATER MANAGEMENT PLAN 2021-2026

**December 21, 2021** 



# Timeline

March 2021 - There was an opportunitity for public comment on the MOR04C Permit Application

**April 2021** - Submitted the MOR04C Permit Application

**November 2021** - New permit was distributed from MO DNR, published Stormwater Management Plan for public comment

**December 2021** - Adopt Stormwater Management Plan pending Board approval

February 2022 - Submit 2021 Annual Report to MO DNR

# What is Stormwater?

Stormwater is the water that originates during precipitation events, and snowmelt. Stormwater that does not soak into the ground becomes surface runoff, which either flows directly into surface waterways or is channeled into storm sewers, ultimately entering surface waters.

Stormwater is of concern for two main issues:

- 1. Flood control and water supplies
- 2. Water pollution



# What is a Stormwater Management Plan?

National and State stormwater regulations require certain small communities to obtain a National Pollutant Discharge Elimination System (NPDES) permit.

Phase II regulations expanded the program to include communities as determined by population size, and land disturbance on one acre or greater. The City of Smithville is affected by Phase II Stormwater regulation, Smithville first applied for a permit in 2013.

The new permit for 2021- 2026 requires that communities with regulated Municipal Separate Storm Sewer Systems (MS4s) develop a stormwater management program.

# SEPARATED SYSTEM



# What is a Stormwater Management Plan?

The MS4 program has six elements termed "minimum control measures" (MCM) which when implemented, the control measures should result in a significant reduction in pollutants discharged into receiving waters.

The six MCMs are outlined below:

- 1. Public Education and Outreach
- 2. Public Participation / Involvement
- 3. Illicit Discharge Detection and Elimination
- 4. Construction Site Runoff Control
- 5. Post-Construction Runoff Control
- 6. Pollution Prevention / Good Housekeeping



# **MCM Overview**

# 1. Public Education and Outreach

- Implement a public education program to distribute educational materials to the community.
- Target audiences: residents, local government, and developers
- Currently in compliance
- 2. Public Participation
  - Implement a comprehensive public participation program that provides opportunities for public  $\bigcirc$ participation in the Stormwater Management Program.
  - Currently in compliance
- 3. Illicit Discharge Detection and Elimination
  - Wastewater other than those consisting entirely of stormwater are considered "illicit discharges" except for discharges permitted under other state operating permits of directly from fire fighting activities.
  - Must develop a program to develop and eliminate such discharges.
  - One year to be in compliance

# **MCM Overview**

- 4. Construction Site Runoff Control
  - The MS4 Operator shall develop, implement, and enforce a program to reduce pollutants in any stormwater runoff to their MS4 from construction activities that result in land disturbance of greater than or equal to one acre.
  - One year to be in compliance
- 5. Post Construction Runoff Control
  - The MS4 Operator shall continue or develop, implement, and enforce a program to address the quality of long-term stormwater runoff from new development and redevelopment projects that disturb equal to and greater than one acre, including projects less than one acre that are part of a larger common plan of development or sale that would disturb one acre or more and that discharge into the regulated MS4.
  - Two years to be in compliance
- 6. Pollution Prevention / Good House Keeping
  - Develop and implement an operation and maintenance program that includes a training component with the ultimate goal of preventing or reducing pollutant runoff from municipal operations.
  - One year to be in compliance

# **SWMP** Next Steps

Staff has developed an action plan to be in compliance with the MS4 Permit.

Key Implementation Steps:

- Continue to post educational materials in the quarterly newsletters, social media, and website
- Continue to use checklists for pre-construction, construction, and post-construction to determine if proper stormwater controls are in place
- Develop a Stormwater Ordinance that has enforcement procedures
- Training for employees





# Questions?





# Stormwater Management Plan (SWMP) Action Plan for MS4 Compliance

**Existing permittees:** Shall evaluate the current Stormwater Management Program including training, inspection procedures, and other municipal operation procedures to ensure compliance with these requirements.

## I. MCM 1. Public Education and Outreach on Stormwater Impacts

- a. The MS4 Operator shall implement a public education program to distribute educational materials to the community and/or conduct equivalent outreach activities about the impacts of storm water discharges on water bodies and the steps that the public can take to reduce pollutants in stormwater runoff.
- b. Smithville will need to be in compliance with this section in one year of the permit issuance.

We are currently in compliance in this section. Staff will strive to improve our communication methods on the website to add more information to educate the public about stormwater discharges.

## II. MCM 2. Public Participation

- a. The permittee shall develop and implement a comprehensive public participation program that provides opportunities for public participation in the development and oversight of the permittee's Stormwater Program.
- b. This program must provide opportunities for public participation of the permittee's permit renewal and shall, at a minimum, comply with any state and local public notice requirements. Additionally, the program must provide opportunities for public participation in activities related to developing and implementing the Stormwater Management Program.
- c. Smithville will need to be in compliance with this section in 1 year of the permit issuance.

We are currently in compliance in this section. We will advertise for public participation when the stormwater management plan is brought to the Board of Aldermen. Staff will track the level of participation of these public participation events.

## III. MCM 3. Illicit Discharge Detection and Elimination (IDDE)

- a. The MS4 Operator shall implement and enforce a program to detect and eliminate illicit discharges (as defined in 10 CSR 20-6.200 at 40 CFR 122.26(b)(2)) into the regulated MS4.
  - i. Illicit discharge detection and elimination. Discharges to MS4s of wastewater other than those consisting entirely of storm water are considered "illicit discharges" except for discharges permitted under other state operating permits or directly from firefighting activities.



A program to detect and eliminate such discharges must be developed.

b. Smithville will need to be in compliance with this section in 1 year of the permit issuance.

In order to be in compliance, the following must be implemented:

- 1. The MS4 Operator must record the sources of information used for the map and track:
  - a. A number of naming system of all outfalls
  - b. Dates that the outfall locations were verified / last field survey
  - c. For newly added outfalls, the date it was added to the storm sewer system
- 2. The MS4 shall effectively prohibit non-stormwater discharges into the permittee's storm sewer system and implement appropriate enforcement procedures and actions.
  - a. The City of Smithville does not currently have an ordinance prohibiting non-stormwater discharges, the enforcement procedures will need to be developed.
  - b. Develop checklist for Inspectors
- 3. Develop the following strategies:
  - a. Dry weather field screening strategy
    - i. Outfall field assessments will need to be done for 60% of all outfalls. The screening shall be conducted during dry weather conditions (a minimum of 72 hours after the last precipitation event) to check for the presence of a discharge.
      - 1. Identify any specific priority areas
    - ii. Develop checklist for Inspectors
    - iii. Diagnostic monitoring procedures to detect and investigate unknown non-stormwater flows as part of the dry weather screening program.
  - b. Maintain procedures for training the source of an illicit discharge.
    - i. Must include:
      - 1. Description of dry weather field screening strategy to detect and address non-stormwater discharges, including discharges from illegal dumping and spills, to the permittee's system.
      - 2. Description of how the discharge is evaluated and the possible parameters tested.
      - 3. If contracted to another entity, the contact information.



- 4. Attach a copy of, or explain (or list) what parameters are sampled for and how the decision is made on what to sample for.
- 5. Attach a copy of, or explain procedures for tracing the source of an illicit discharge, and mechanisms to locate and follow stormwater infrastructure. A variety of investigative tools may be used as appropriate for each situation, such as, but not limited to;
  - Visually following the flow;
  - Storm sewer system sampling;
  - Full storm sewer map;
  - Closed circuit television;
  - Smoke or dye tracing; and
  - Tunnel entry.
- c. Develop procedures for removing the source of the discharge.
  - i. Include names and contacts for environmental cleaning companies
- d. Develop a prioritization for stormwater areas
  - i. Evaluate annually
- e. Develop a procedure for conducting investigations in response to field screening discoveries, spills, or in response to complaints from the public, municipal staff, or adjacent MS4s.
  - i. Develop timeline for responses.
- f. Develop procedures for appropriate enforcement to ensure the permittee's illicit discharge ordinance is being implemented.
- g. Develop a spreadsheet to track the dry weather field screenings, spills, incidents, and investigations.
- h. Develop an education campaign for City employees, businesses, and general public of the hazards associated with illegal discharges and improper disposal of waste.
- i. Develop and implement a training program for all municipal field staff who may come into contact or observe an illicit discharge or illicit connection to the storm sewer system.
  - i. Develop an evaluation sheet of the trainings

## IV. MCM 4. Construction Site Stormwater Runoff Control

a. The MS4 Operator shall develop, implement, and enforce a program to reduce pollutants in any stormwater runoff to their MS4 from construction activities that result in land disturbance of greater than or equal to one acre. Reduction of stormwater discharges from construction activity disturbing less than one acre shall be included in the program if that



construction activity is part of a larger common plan of development or sale that would disturb one acre or more.

b. Smithville will need to be in compliance with this section in 1 year of the permit issuance.

In order to be in compliance, the following must be implemented:

- 1. Develop enforcement procedures for the 400.415(B)(12) ordinance.
- 2. Develop a review procedure of pre-construction plans
  - a. Evaluate threats to water quality
  - b. Checklist to ensure consistency
  - c. Develop requirements for construction site operators to select, install, implement, and maintain appropriate stormwater control measures.
  - d. Consider ways to maximize disturbed areas
    - i. Reflection parts of forms
  - e. Requirements for construction site operators to control construction-site waste that may cause adverse impacts to water quality (trash, concrete wash-out, etc.)
- 3. Identify priority sites for inspection based on nature of the construction activity, topography, disturbed area, and the characteristics of soils and sensitivity of, or proximity to, receiving water.
- 4. Develop two sanctions of an escalating enforcement policy that clearly describes the action to be taken for violations of construction site runoff control program.
- 5. Develop an inspection checklist for construction site operators.
  - a. Checklist for every 14 days when construction is active
  - b. Checklist for storm events (within 72 hours)
  - c. Create a standard operating procedure for how these forms will be submitted to the Public Works Department.
- 6. Develop an inventory of active public and private land disturbance sites, as defined in the Section 4.4 of the MS4 Permit.
  - a. Inventory will contain:
    - i. Relevant contact information for each project
    - ii. Size of the project / area of disturbance
    - iii. Level of priority
    - iv. Tracker of inspections, communication, and any correspondence
- 7. Require training for construction site runoff control training for inspectors and plan reviewers at least once during the new permit cycle.
  - a. Track training completion
- 8. Develop a standard operating procedure for inspections and enforcements to ensure consistency.



## V. MCM 5. Post-Construction Stormwater Management in New Development and Redevelopment

- a. The MS4 Operator shall continue or develop, implement, and enforce a program to address the quality of long-term stormwater runoff from new development and redevelopment projects that disturb equal to and greater than one acre, including projects less than one acre that are part of a larger common plan of development or sale that would disturb one acre or more and that discharge into the regulated MS4. The MS4's program shall ensure that controls are in place that have been designed and implemented to prevent or minimize water quality impacts
- b. The City of Smithville will need to be in compliance with this permit within the first 2 years of permit issuance.

In order to be in compliance, the following must be implemented:

- 1. Develop an ordinance or other regulatory mechanism to address postconstruction runoff from new development and redevelopment projects.
  - a. Develop a strategy to minimize water quality impacts
    - i. Adopt or maintain local stormwater discharge design standards that consider parameters with the intent to minimize the impact of stormwater runoff on water quality.
    - ii. Structural and non-structural
  - b. Develop a checklist for Plan Review to ensure adequate planning for stormwater program compliances
    - i. Structural / non-structure controls
  - c. Develop enforcement mechanism to ensure long-term operation and maintenance (O&M) of the selected BMPs.
    - i. Develop an escalating enforcement policy to address noncompliance
    - ii. Sanctions must be within 30 days of discovering a violation
- 2. Develop an excel spreadsheet to track inventory of water quality postconstruction BMPs
- 3. Provide training for MS4 inspectors once every permit cycle to explain the function of both structural and non-structural post-construction water quality BMPs.

# VI. MCM 6. Pollution Prevention/ Good Housekeeping for Municipal Operations

a. The permittee shall develop and implement an operation and maintenance program that includes a training component and has the ultimate goal of preventing or reducing pollutant runoff from municipal operations.



b. Smithville will need to be in compliance with this section in 1 year of the permit issuance.

In order to be in compliance, the following must be implemented:

- 1. Develop an employee training program for MS4 operations staff.
  - a. Training shall be used to prevent and reduce stormwater pollution
  - b. Maintain schedule and tracking system
- 2. The MS4 Operator shall develop or maintain controls for reducing or eliminating the discharge of floatables and pollutants from municipal facilities listed in Section 4.6.D and 4.6.E of MS4 Permit
- 3. Develop procedure schedule for proper disposal of waste removed from the MS4 structures and areas of jurisdiction
- 4. Develop procedures for washing of municipal vehicles and equipment