

Introduction

The City of San Diego began implementing their Storm Water Pollution Prevention Program with the goal to **protect and improve the water quality of rivers, bays and the ocean** and comply with Clean Water Act. In response to the Clean Water Act, the Regional Water Quality Control Board, San Diego Region (RWQCB) issued a municipal storm water National Pollutant Discharge Elimination System (NPDES) Permit (Municipal Permit), NPDES No. CA0108758, to San Diego County, San Diego Unified Port District, and 18 cities, including the City of San Diego. The Municipal Permit contains a requirement for the City to develop and implement a jurisdictional Urban Runoff Management Program. This Urban Runoff Management Plan is a total account of how the City plans to protect and improve the water quality of rivers, bays and the ocean, and to comply with the Municipal Permit.

The City's Program must meet the requirements of the Municipal Permit, summarized below in Table 1. The Permit requirements are fully enforceable via the San Diego Municipal Code §43.03 and can be changed only through action of the San Diego Regional Water Quality Control Board.

Table 1. Permit Requirements – Urban Runoff Management Program.

Permit Section	Requirement (Summary)	Compliance Date
F.	Take appropriate actions to reduce discharges of pollutants and runoff flow during each of the three major phases of development, i.e. the planning, construction, and existing development (or use) phases and that addresses the following: <ul style="list-style-type: none"> ▪ Land-Use Planning for New Development & Redevelopment ▪ Construction ▪ Existing Development (Municipal, Industrial, Commercial, Residential) ▪ Illicit Discharge Detection & Elimination ▪ Public Participation ▪ Assessment of URMP Effectiveness ▪ Fiscal Analysis 	365 Days after adoption of Order (2/21/02)
H.	Submit to the Principal Permittee an individual Jurisdictional URMP document which describes all activities it has undertaken or is undertaking during the five-year life of this Order to implement the requirements of each permit component of the Jurisdictional URMP section F. of this Order.	Prior to 365 days after adoption of Order (Principal Permittee to specify date of submittal)
I.	Submit Jurisdictional URMP Annual Report	Prior to January 31, 2003, (Principal Permittee specifies date of submittal)

Implementation activities for each program area are discussed in the following components of this Urban Runoff Management Program document or Urban Runoff Management Plan, adopted by the San Diego City Council on January 28, 2002. Each City department is responsible for performing those tasks that are applicable and necessary to be in compliance with the City's Municipal Permit. This includes implementing the applicable procedures and policies to address the activities covered in the Municipal Permit, providing the appropriate staff training, keeping records of compliance activities, performing self-assessments, and preparing status reports for the annual report.

Background

The 1972 Clean Water Act established the National Pollutant Discharge Elimination System (NPDES) permit program to regulate the discharge of pollutants from point sources to waters of the United States (US). Since then, considerable strides have been made in reducing conventional forms of pollution, such as from sewage treatment plants and industrial facilities, through the implementation of the NPDES program and other federal, state, and local programs. The adverse effects of some of the persistent toxic pollutants were addressed through manufacturing and use restrictions and through cleanup of contaminated sites. On the other hand, pollution from land runoff (including atmospheric deposition, urban, suburban, and agricultural) was largely unabated until the 1987 Clean Water Act amendments, which established a framework for regulating urban storm water runoff and other non-point source pollutants. These sources, including urban storm water runoff, now contribute a larger portion of many kinds of pollutants than the more thoroughly regulated sewage treatment plans and industrial facilities.

Non-point source pollution, the diffuse pollution not traceable to a specific source, causes public health risk and safety concerns. Urban runoff potentially contains a host of pollutants like trash and debris, bacteria and viruses, oil and grease, sediments, nutrients, metals, and toxic chemicals. These contaminants can adversely affect receiving and coastal waters, associated biota, and public health. While the impact of urban runoff pollution may not be immediately realized, the eventual effect can be dramatic. Urban runoff pollution is not only a problem during rainy seasons, but also year-round due to urban water use.

Storm water pollution affects human life and aquatic plant and animal life. Potentially harmful viruses and bacteria are found in our coastal waters along with soil particles, solids/ debris, litter, oil, and chemical compounds. Oil and grease from parking lots and roads, leaking petroleum storage tanks, pesticides, cleaning solvents, and other toxic chemicals can contaminate storm water and these contamination can be transported into water bodies and receiving waters. Fertilizer constituents from lawns and golf

courses and leaking septic tanks can cause algal blooms and encourage microbial growth to create an increasing spiral of biological activity known as eutrophication. Disturbances of the soil from construction can allow silt to wash into storm channels and receiving waters making them muddy, turbid, and inhospitable to natural aquatic organisms. Many artificial surfaces of the urban environment such as galvanized metal, paint, or preserved wood containing metals, contribute to pollution by run on or leaching by storm water as the surfaces corrode, flake dissolve, or decay. Heavy metals are toxic to aquatic organisms and may bio-accumulate.

Because of the intermittent, variable and unpredictable nature of storm water discharges, the US Environmental Protection Agency (EPA), which administers the Clean Water Act, reasoned that the problems caused by storm water discharges were better managed at the local level through non-point source controls such as the use of specific management practices to prevent the pollutants from entering storm water and urban runoff. These practices are called storm water best management practices (SWPs). The US EPA has delegated its authority to the State of California. The State exercises its delegated authority through its agency, the State Water Resources Control Board, which uses a system of regional entities (the Regional Water Quality Control Boards) to enforce the Clean Water Act.

Municipalities in San Diego County collect and discharge storm water and urban runoff containing pollutants through their storm water conveyance systems. The San Diego Regional Water Quality Control Board (Regional Board) issued the required NPDES permit (commonly referred to as the Municipal Permit for San Diego Copermittees) to local jurisdictions including the City of San Diego, which requires the implementation of programs to reduce pollutants in storm water and urban runoff. This permit, originally issued in 1990, was significantly revised when it was renewed on February 21, 2001 as Order No. 2001-01, NPDES No. CA0108758, "Waste Discharge Requirements for Discharges of Urban Runoff From the Municipal Separate Storm Sewer Systems (MS4) Draining the Watersheds of the County of San Diego, the Incorporated Cities of San Diego County, and the San Diego Unified Port District."

Storm Water Ordinance

The City of San Diego enacted the *Storm Water Management and Discharge Control Ordinance*, (Storm Water Ordinance) SDMC §43.0301, et seq., in 1993. The ordinance seeks to ensure the health, safety, and general welfare of San Diegans by prohibiting pollutants from entering the storm water conveyance system, thereby enhancing the water quality of the City's beaches, bays, and wetlands. The Storm Water Ordinance was amended in 2001 to bring the ordinance into compliance with the requirements in the Municipal Permit.

In addition, the City Council adopted revisions to the City's Grading Regulations (Land Development Code [LDC] §142.0146, and Drainage Regulations LDC §142.0146, which have been renamed to the Storm Water Runoff Control and Drainage Regulations. The changes to the Grading and Storm Water Runoff Control and Drainage Regulations were approved by the California Coastal Commission on November 16, 2001. The objective of the ordinance revisions are to define and adopt storm water best management practices (SWPs) necessary to control storm water pollution from sediments, erosion, and construction materials to the maximum extent practicable during construction and during the permanent use of developed sites.

Storm Water Pollution Prevention Program

It is the mission of the Storm Water Pollution Prevention Program (Storm Water Program), a division of the General Services Department, to:

“Protect and improve the water quality of rivers, bays and the ocean for the citizens of San Diego and future generations by eliminating and reducing pollutants in urban runoff and storm water in an efficient, effective and professional manner as part of a high-performing team through public education, employee training, watershed collaboration, field testing, investigations, enforcement, regional programs and coordination.”

The Storm Water Program is the lead office for the City's efforts to reduce pollutants in urban runoff and storm water to the maximum extent practicable, and to achieve compliance with the Municipal Storm Water Permit. The City and the Storm Water Program have the additional goal of reducing beach postings and closures resulting from contamination by 50 percent in four years.

In order to achieve these goals, the Storm Water Program is actively engaged in a number of activities that will cumulatively result in cleaner water quality. These activities, include but are not limited to, public education, employee training, water quality monitoring, source identification, code enforcement, watershed management, and storm water best management practices development/ implementation within the City of San Diego's jurisdictional boundaries. The Storm Water Program represents the City on storm water and NPDES storm water permit issues before the Principal Permittee, the County Department of Environmental Health, and the Regional Water Quality Control Board. In addition, the Storm Water Program provides technical expertise and guidance to all City departments to ensure implementation and compliance with the Municipal Permit. Furthermore, the Storm Water Program prepares and transmits an annual report of all City of San Diego activities governed by the permit to the County for submittal to the Regional Board and is the responsible agent that certifies that the City is in compliance with all Municipal Permit requirements.

Urban Runoff Management Plan

The Storm Water Program has led the City's efforts to create this document, the Urban Runoff Management Plan (URMP), details the complete list of activities the City will undertake to improve water quality in the region and comply with the Municipal Storm Water Permit. The URMP is also intended to make the City's additional goal – reducing beach postings and closures by 50 percent in four years – a reality.

The URMP is divided into three chapters as follows:

1. Program Framework
2. Storm Water Best Management Practices
3. Planning and Development

The Program Framework chapter addresses the broad issues and urban runoff management program structure. There are eight components within the Program Framework, as follows:

- Public Participation
- Education
- Enforcement of Storm Water Ordinance
- Water Quality Monitoring
- Inventories
- Watershed Planning
- Program Assessment
- Fiscal Analysis

The Storm Water Best Management Practices chapter describes the storm water best management practices that will be implemented by various City departments in order to ensure that the City will reduce pollutants in urban runoff and storm water to the maximum extent practicable while conducting the numerous activities and services that the City provides to the residents of the City of San Diego. There are eight components within the Storm Water Best Management Practices chapter, which have been organized based on the type of activity or service various City departments provide as follows:

- Municipal Facilities Operation and Management
- Household Hazardous Waste Program
- City-Owned Leased Properties
- Non-Emergency Fire Fighting
- Industrial & Commercial Uses
- Residential Uses

Within the Municipal Facilities component of the Storm Water Best Management Practices chapter, there are separate components for 15 facilities as follows:

- Airports
- Buildings
- Landfills
- Miramar Landfill Transfer Facility & Load Check Activities
- Landscape and Recreational Facilities
- Metropolitan Wastewater Collections
- Metropolitan Wastewater Operations
- Parking Facilities
- Stadium
- Low Flow Diversion System
- Storm Water Conveyance System
- Streets
- Vehicle Maintenance/ Equipment Yards & Materials Storage Facilities
- Water Systems
- Solid Waste Services

The Planning and Development chapter describes the storm water protection and watershed planning policies that will be incorporated into the City's Progress Guide and General Plan, and details the storm water best management practices and policies that will be included into the project planning and development review processes for both public and private development projects. There are four components within this chapter as follows:

- Land-Use Planning
- Development Review and Permitting
- City CIP Project Planning & Design
- Construction Contracts

Component Contents

An introduction in the beginning of each component discusses the responsible departments and the component-specific goals and objectives. A table within the introduction explains the pertinent permit requirements that are implemented by each particular component.

A discussion of the activities to be carried out under each component follows the introduction. The existing and new procedures, forms and/or requirements that will be implemented as part of the Urban Runoff Management Plan are described, and in some cases included or referenced. Relevant contact information is also provided, where applicable. The activities section also includes a discussion of the education and

training activities that will be implemented as part of each component. Where applicable, this section describes the general and activity-specific, and internal and external education and training activities that will be conducted by each department.

The third section in each component, called the “Phasing” section, summarizes the activities that will be carried out by each component’s responsible departments during each fiscal year of the Municipal Permit. The Phasing section may be updated each year and will be used to assist in identifying budget requirements for each fiscal year.

Reporting and program assessment requirements for each program component are included in the Plan to provide data and information that will be used in the annual assessment that will be submitted as part of the urban runoff management program annual report provided to the Regional Board. An example Annual Assessment Form is also included at the end of each component for reference. Compliance with the Municipal Permit requirements will be tracked by the Storm Water Program and the Regional Board through the annual reporting process, self-assessments, certifications, Storm Water Program audits and inspections, and Regional Board audits and inspections.

Urban Runoff Management Plan Implementation

Each department is responsible for implementing the Municipal Permit requirements applicable to their activities. Each department will perform the following:

- Certify acceptance of this document
- Establish applicable written policies and procedures
- Maintain records as required by the Municipal Permit
- Provide staff training
- Report the status of the Urban Runoff Management Program implementation to the Storm Water Pollution Prevention Program
- Annual certify compliance with all Municipal Permit requirements that apply to its department

Each division in a department engaged in any of the activities addressed in this document will receive copies of this Urban Runoff Management Plan. The creation and distribution of General Storm Water education and training materials to City departments is the responsibility of the Storm Water Program. Development of “Activity Specific” training and implementation of the corresponding behaviors and processes within a department is the department’s responsibility. However, the Storm Water Program is available to support the department efforts with technical expertise and guidance in implementing these procedures to meet Municipal Permit requirements.

Each department shall have a designated coordinator to keep informed about the NPDES storm water permit so that he/she can provide the necessary guidance to implement these procedures. The Storm Water Program will interact with the coordinators to provide the latest Municipal Permit information and to request the necessary compliance reports from the department.

The following are recommended steps to implement the elements of the program that apply to each department.

1) Adopt

The first step toward implementation is to adopt the Plan. A department head or appointing authority must accept and certify that the department will formally establish policies and procedures to implement the Plan.

2) Distribute

The second step is to distribute the Plan to the affected divisions within the department with the appropriate transmittal requiring them to begin implementation. The department will make copies of the Plan (or Plan applicable sections) and distribute these to the appropriate personnel.

3) Train/ Develop Awareness

The department must schedule and ensure both the General Storm Water training for all personnel, and “Activity Specific” training for those personnel engaged in activities covered by the Plan. The department must maintain records of the personnel trained so that the status of the training can be reported to the Regional Board.

4) Practice/ Implement

The next step is to apply the practices, policies, and procedures to daily activities within the department. Personnel should be informed that they must apply the practices that are appropriate for their activities.

5) Assessment/ Review

Periodically, the department, along with the Storm Water Program, will assess and review the practices that the department has applied to its daily activities. They will record any practice that needs modification or any new practices, policies or procedures that should be adopted.

6) Update

If needed, and after an assessment and review of the department’s activities, the practices and guidelines may be updated by the Storm Water Program and any changes will be submitted to the department for review and co-approval. Once

approved, the new guidelines should be incorporated into the department's guide and the appropriate employee awareness and training should be provided.

7) Report

The department will need to maintain records and provide reports to the Storm Water Program. The reporting format and requirements are detailed in the applicable sections of the Plan. Departments must maintain such records as are necessary to provide the information that will be required by the Regional Board. Additionally, records of any required training should be maintained. As part of the annual report, the Storm Water Program will ask for the number of employees trained for each element. The Storm Water Program will compile the reports for all City departments and prepare the annual report to the Regional Board. Departmental information for the annual report is due to the Storm Water Program in October of each year. Departments are responsible for taking the initiative and collecting information in anticipation of an October reporting deadline. The Storm Water Program will notify departments of specific reporting dates.

8) Inspection

Voluntary self-assessment and periodic inspections or audits by the Storm Water Program are important to the success of this Program. The inspections will check what practices and policies have been adopted and implemented so that the general effectiveness of the Program in instilling practices to reduce pollutants in urban runoff can be assessed.

Inspections are specifically required for some elements of the program, such as municipal facilities, construction contracts, private industrial uses, commercial uses, and storm drain operation and management. For other activities, no inspections are required but voluntary inspections are encouraged to ensure that effectiveness of the storm water best management practices and compliance with the requirements of the Permit. Additional guidance for inspections is in the various sections of the Plan.

Voluntary self-inspections, performed by department staff, should be held as frequently as deemed necessary to assess SWP effectiveness. Occasional inspections by Storm Water Program staff may be made to assess facilities' compliance with Permit requirements. In addition, facilities are subject to periodic inspection by Regional Board staff.

9) Certify

Each department will sign and return a statement of compliance along with the department's required reporting data to the Storm Water Program in October of each year as part of the proof that the City is doing its part to reduce pollutants in storm water and urban runoff.

Contact List

City of San Diego

Storm Water Pollution Prevention Program

Storm Water Hotline In the City of San Diego (619) 235-1000

General Number: (619) 525-8647

Karen Henry (619) 525-8647
Deputy Director

Deborah Castillo (619) 525-8649
Supervising Public Information Officer
(education and training)

Antonius Evans (619) 525-8683
Supervising Code Compliance Officer
(enforcement and investigations)

Marnell Gibson (619) 525-8609
Senior Civil Engineer
(storm water best management practices development)

Drew Kleis (619) 525-8623
Storm Water Specialist
(Standard Urban Storm Water Mitigation Plan [SUSMP] and watershed
coordination)

Ruth Kolb (619) 525- 8636
Storm Water Specialist
(water monitoring)

Lisa McHorney (619) 525-8619
Associate Management Analyst
(budget and fiscal analysis)

Spill Response Agencies

Sewer Emergency – Metropolitan Wastewater (619) 515-3525

Hazardous Chemicals – Fire & Life Safety (858) 974-9891

Recycling and Hazardous Waste Disposal

Recycling – Environmental Services Recycling Hotline (619) 533-5353
Household Hazardous Waste –Environmental Services Hotline (858) 694-7000

Illegal Dumping

Environmental Services, Code Enforcement Section (858) 694-7000

Clogged Catch Basin

Transportation, Streets Division (619) 527-7500

Regional Resources

Countywide Hotline 888- THINK BLUE