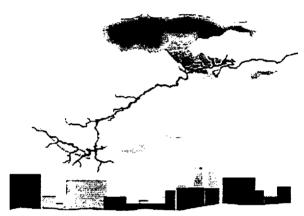
# U.S. Environmental Protection Agency Storm Water Training Course

# Participant's Manual



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This course is strictly a general overview of the NPDES storm water program and only covers permit requirements for permits issued in areas where EPA is the permitting authority. Participants of the course who are located in areas where EPA is not the permitting authority will need to contact their state NPDES permitting authority for information regarding specific permit/program requirements.

# EPA NPDES Storm Water Program Training Course

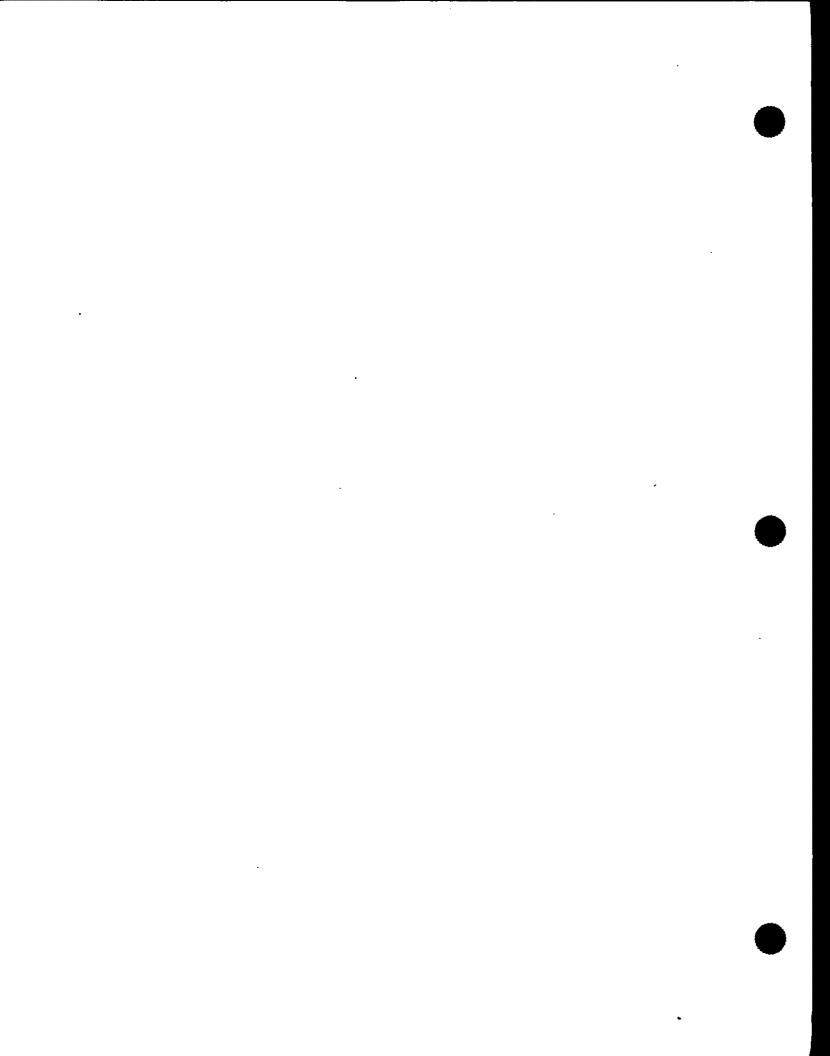
# Agenda

# Tuesday, September 26, 2000 - Denver, CO

8:00	Registration
8:30	Welcome/Introductions
9:00	Module 1: Overview of EPA's Water Quality Programs
10:00	Break
10:15	Module 2: The NPDES Industrial Storm Water Program
11:15	Exercise: Identifying Permit Requirements for Industrial Facilities
12:00	Lunch
1:15	Module 3: The NPDES Construction Storm Water Program
2:15	Break
2:30	Exercise: Determining the R Factor for the Construction Waiver
3:00	Exercise: Construction Storm Water Permitting
3:30	Module 4: Storm Water Pollution Prevention Plans
4:00	Regional/State Perspective

# Wednesday, September 27

8:30	Module 5: The NPDES MS4 Storm Water Program
9:45	Break
10:00	Exercise: Determining Applicability of the Phase II Program for Small MS4s
10:30	Module 6: Examples of Municipal BMPs and Measurable Goals
11:00	Module 7: Federal and State MS4s
11:30	Videos
12:00	Lunch
1:15	Module 8: Interaction of the Industrial, Construction, and MS4 Storm Water
	Programs
1:30	Exercise: Determining Requirements under all parts of the Storm Water Program
2:00	Module 9: Phase II Benefits, Costs, & Funding Mechanisms
2:30	Module 10: Additional Tools & Resources
3:00	Questions and Answers



# **EPA NPDES Storm Water Program Training Course: Evaluation Form**

Denver, CO

# Participant Information

Affiliation:					
	dustrial onsultant	Пo	ther		
Presentation  Module 1: Overview of EPA			Progra	ums	
Please rate the following aspects of this module:		Poor (	1) - Ex	cellent (5	<del></del> )
	1	2	3	4	5
Speaker(s)					
Slide Presentation (i.e., organization and format)					
Handout Materials					
Overall Content/Information Presented				<u> </u>	
Module 2: The NPDES Indus	trial Stori	m Wate	r Prog	ram	
Please rate the following aspects of this module:		Poor(1	) - Exc	ellent (5)	
	1	2	3	4	5
Speaker(s)					
Slide Presentation (i.e., organization and format)				v e	
Handout Materials					
Exercise 1 - Identifying Permit Requirements for Industrial facilities					
Overall Content/Information Presented					
Comments:					

Module 3: The NPDES Construction Storm Water Program

Please rate the following aspects of this module:		Poor (1) - Excellent (5)						
	1	. 2	3	4	5			
Speaker(s)								
Slide Presentation (i.e., organization and format)								
Overall Content/Information Presented								
Handout Materials								
Exercise 2 - Determining the R Factor for Constructions Waiver			:					
Exercise 3 - Construction Storm Water Permitting								

Comments:		 -	 		

Module 4: Storm Water Pollution Prevention Plans

Please rate the following aspects of this module:	Poor (1) - Excellent (5)						
	1	2	3	4	5		
Speaker(s)							
Slide Presentation (i.e., organization and format)							
Overall Content/Information Presented							

Comments:	 	 	

Module 5: NPDES MS4 Storm Water Program

Please rate the following aspects of this module:	Poor (1) - Excellent (5)				)
	1	2	3	4	5
Speaker(s)					
Slide Presentation (i.e., organization and format)					
Overall Content/Information Presented					
Exercise 4 - Determining Applicability of the Phase II Program for Small MS4s					

Comments:	 	 	··· ····	

# Module 6: Examples of Municipal BMPs and Measurable Goals

Please rate the following aspects of this module:	Poor (1) - Excellent (5)					
	1	2	3	4	5	
Speaker						
Slide Presentation (i.e., organization and format)						
Overall Content/Information Presented						

Comments:		 	

Module 7: Federal and State MS4s

Please rate the following aspects of this module:		Poor (1) - Excellent (5)					
	1	2	3	4	5		
Speaker							
Slide Presentation (i.e., organization and format)							
Overall Content/Information Presented							

Comments:	 		

Module 8: Interaction of the Industrial, Construction, and MS4 Storm Water Programs

Please rate the following aspects of this module:	Poor(1) - Excellent (5)			)	
	1	2	3	4	5
Speaker(s)					
Slide Presentation (i.e., organization and format)					
Overall Content/Information Presented					
Handout Materials					
Exercise 5 - Determining Multiple Responsibilities Under the NPDES Storm Water Program					

Comments:	****	 	

# Module 9: Phase II Benefits, Costs and Funding Mechanisms

Please rate the following aspects of this module:		Poor(1	) - Exc	ellent (5)	)
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Speaker					

Please rate the following aspects of this module:		Poor(	1) - Exe	cellent (5	)
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Slide Presentation (i.e., organization and format)					
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Module 10: Additional	Tools an	d Resou	rces		
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General C  Did the training meet your needs and expectate	ommer	Yes	N N	o <b>Q</b>	ng?
General C  Did the training meet your needs and expectate  Please explain:	ions?	Yes ing more	Ne useful	/interesti	

# **USEPA Storm Water Training Course**

# **Table of Contents**

# Module 1: Introduction to the Training and Overview of EPA's Water Quality Programs

#### Slides

#### Handouts

- Glossary of Common Terminology
- Relationship Between Imperviousness and Storm Water Runoff
- NPDES Storm Water Program Regulatory Overview
- NPDES Storm Water Program Timeline

## Module 2: The NPDES Industrial Storm Water Program

#### Slides

#### Handouts

- ► Notice of Intent (NOI) for Storm Water Discharges Associated with Industrial Activity Under an NPDES Permit
- Notice of Termination (NOT) of Coverage Under a NPDES General Permit for Storm Water Discharges Associated with Industrial Activity
- ➤ A Brief Guide to Requirements for Developing and Implementing Pollution Prevention Plans for Industrial Activities

# Exercise 1 — Identifying Permit Requirements for Industrial Facilities

# Exercise Attachments:

- ✓ Who is Subject to Phase I of the NPDES Storm Water Program and Needs a Permit?
- ✓ Industrial Facilities Storm Water Program Permitting Decision Tree
- ✓ No Exposure Certification for Exclusion from NPDES Storm Water Permitting
- ✓ Proposed MSGP Industrial Sectors

# Module 3: The NPDES Construction Storm Water Program

#### Slides

#### Handouts

- ► Notice of Intent (NOI) for Storm Water Discharges Associated with Construction Activity Under an NPDES General Permit
- ► Notice of Termination (NOT) of Coverage Under a NPDES General Permit for Storm Water Discharges Associated with Industrial Activity
- ► SWPP Guidelines for Construction Projects, California Regional Water Quality Control Board

# Exercise 2 — Determining the R Factor for the Construction Waiver

## Exercise Attachments:

- ✓ EI Distribution Zones for Contiguous United States
- ✓ Isoerodent Map of Eastern United States
- ✓ EI as percentage of Average Annual Value for geographic Areas shown in Figure 2-7

Exercise 3 — Construction Storm Water Permitting

Exercise Attachments:

✓ Construction Activities Storm Water Program Permitting Decision Tree

## Module 4: Storm Water Pollution Prevention Plans

Slides

# Module 5: The NPDES MS4 Storm Water Program

Slides

Handout

Small MS4 Flexible Permitting Options

Exercise 4 — Determining Applicability of the Phase II Program for Small MS4s Exercise Attachments:

- ✓ How to Determine if an MS4 is in an Urbanized Area
- ✓ Urbanized Area Maps
- ✓ IMS4 Storm Water Program Permitting Decision Tree

# Module 6: Examples of Municipal BMPs and Measurable Goals

Slides

Module 7: Federal and State MS4s

Slides

## Module 8: Interaction of the Industrial, Construction, and MS4 Storm Water Programs

Slides

Handouts

► Summary of Federal Permit Requirements Under the NPDES Storm Water Program Exercise 5 — Determining Multiple Responsibilities Under the NPDES Storm Water Program

# Module 9: Benefits, Costs and Funding Mechanisms

Slides

Module 10: Additional Tools and Resources

Slides

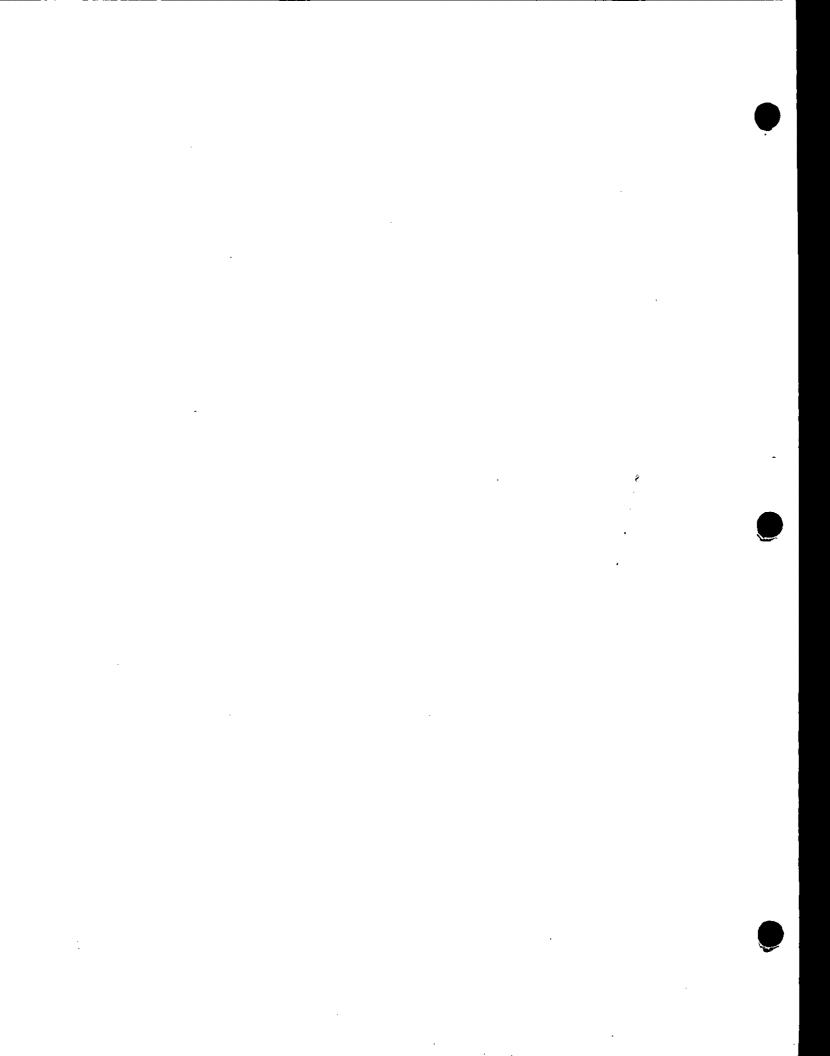
Appendix A: Phase I Regulations (40 CFR 122.26)

Appendix B: Phase II Regulations (Federal Register, December 8, 1999)

# Module I

Introduction to the Training and Overview of EPA's Water Quality Programs

[Slides and Handouts]





National Pollutant Discharge Elimination System (NPDES) Storm Water Program



# Module 1: Introduction to the Training and Overview of EPA's Water Quality Programs

- Why are we here?
- What is storm water and why are we concerned about it?
- What is the history of the storm water program?
- What are the other water quality programs you should be aware of?

# **Expected Benefits of Storm Water Program**

- Enhanced commercial, recreational and subsistence fishing
- Enhanced opportunities for swimming, boating and noncontact recreation
- **■** Reduced flood damage
- Drinking water benefits
- Navigational benefits
- Reduced illness from eating contaminated seafood & swimming in contaminated water
- **■** Enhanced aesthetic value

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# Purpose of the Storm Water Program Training Course

- Review the NPDES Phase I Storm Water Program
- Introduce the NPDES Phase II Storm Water Program
- Illustrate Phase I and Phase II Integration

# Overview of the Training Course Modules

- Module 1: Introduction to the Training and Overview of EPA's Water Quality Programs
- Module 2: The NPDES Industrial Storm Water Program
- Module 3: The NPDES Construction Storm Water Program

# Overview of the Training Course Modules (cont.)

- Module 4: Storm Water Pollution Prevention Plans
- Module 5: The NPDES MS4 Storm Water Program
- Module 6: Minimum Measures, BMPs and Measurable Goals
- Module 7: Federal & State MS4s

# Overview of the Training Course Modules (cont.)

- Module 8: Interaction of MS4, Industrial, and Construction Storm Water Programs
- Module 9: Phase II Benefits, Costs, and Funding Mechanisms
- Module 10: Additional Tools and Resources

## What is storm water?



Runoff from natural precipitation, such as rain events and snow melt and other surface runoff and drainage

# Why is Storm Water a Problem?

- Developed and disturbed land contributes to problems
  - Quality
  - Quantity
- Other pollutants enter storm sewer systems and pollute storm water
  - Illicit discharges
  - Illicit connections

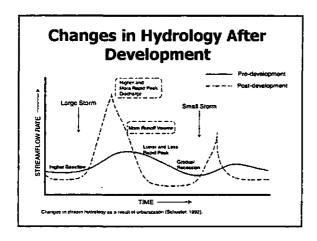
## **Storm Water Poliutants**

- **■** Sediment
- **■** Nutrients
- **■** Bacteria
- **■** Oxygen Demand
- **■** Oil and Grease
- **■** Trace Metals
- **■** Toxic Chemicals
- **■** Chlorides
- Thermal Impacts

# Imperviousness vs. Storm Water Runoff 10% - 20% Impervious Suriace 75% - 50% Impervious Suriace 75% - 100% Impervious Suriace Consider in qualifier information and agricument season conduction to the conduction of the conduc

# Imperviousness and Water Quality

- Consequences of impervious land coverage
  - Reduced infiltration of rainwater
  - Increased runoff volumes and velocity
  - Collects and concentrates pollutants
  - Increases ambient air and water temperature



# **Sources of Impairment**

## ■ From the 1998 305b report:

- 11% of impaired river miles are impaired due to urban runoff/storm sewers
- 12% of impaired lake acres are impaired due to urban runoff/storm sewers
- 28% of impaired estuarine square miles are impaired due to urban runoff/storm sewers

# Clean Water Act (Congress) Code of Federal Regulations (EPA) NPDES Permits (EPA, States) Policy and Guidance

### Federal Water Pollution Control Act Amendments of 1972

- Established NPDES, pretreatment, and construction grants programs
  - Permits are a privilege not a right
  - Effluent limits must be both technologyand water quality-based
  - Maximum duration is 5 years
  - Provided for State programs
  - Established significant penalties for permit violations

### **Clean Water Act of 1977**

- Shifted focus from conventional pollutants to toxic pollutants
- Continued focus on industrial and municipal wastewater

# **Water Quality Act of 1987**

- Specifies storm water permitting requirements
- Established nonpoint source grant program
- Increased penalties for noncompliance

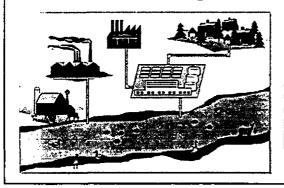
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# **NPDES Statutory Framework**

- s All "point" sources
- "Discharging pollutants"
- Into "waters of the U.S."

Must obtain an NPDES permit from EPA or an authorized State

# **NPDES Permit Program**



# A "Point" of Confusion: Point Source vs. Nonpoint Source

- **POINT source** 
  - Discharge from a discrete point into waters of the U.S.
  - Travels through a conveyance system
  - Regulated under NPDES permit program
- **NONPOINT** source
  - Runoff that is not a point source
  - Largely a voluntary program at the Federal level

# **Waters of the United States** 40 CFR §122.2

- All waters currently used, used in the past, or susceptible to use for interstate or foreign commerce including all waters which are subject to the ebb and flow of the tide...
- Examples of "Waters of the US" include:
  - rivers and streams sloughs
  - lakes and ponds
- playa lakes
- tributaries
- territorial seas
- wetlands
- others...

# **How is Storm Water Regulated Under the NPDES Program?**

- Phased approach to regulation
  - Phase I: Regulated discharges from MS4s and industrial activity
  - Phase II: Regulated discharges from small MS4s and small construction
- Issuance of permits to regulated dischargers

# **Storm Water Regulatory History**

- **■** Storm Water Phase I Final Rule
  - November 16, 1990
- Transportation Act of 1991
- Response to the 9th Circuit Court Decision: December 18, 1992

# **Storm Water Regulatory History**

- Storm Water Phase II Final Rule
  - December 8, 1999
  - addresses other sources to protect water quality
- Developed over four years with assistance from a Federal Advisory Committee
- Over 500 public comments received on proposed rule

# **Types of NPDES Permits**

- Individual
  - -1 application submitted --> 1 permit issued
- General
  - 1 permit issued --> many applications submitted
  - Issued on an area-wide (State, watershed, etc.) basis
  - Available when:
    - Same or similar operations
    - Discharge same wastes

# Permit Issuance Process Individual General Permit Application Indentify Need and Collect Date Permit and Fact Sheet Development Public Notice and Public Comments Administrative Record Final Permit Notice of Intent to be Covered

EPA	NPDES	Storm	Water	Program <sup>*</sup>	Training	Course

## **Enforcement**

- NPDES permits are federally enforceable
- Violators subject to federal and state enforcement actions and penalties
- Compliance with a permit issued pursuant to Section 402 deemed compliance with the Clean Water Act

# **Permitting Approach: Statutory Requirements**

- **Industrial Permits** 
  - Achieve BAT/BCT and WQS
- **MS4 Permits** 
  - May be issued on a system-wide basis
  - -- Effectively prohibit non-storm water discharges
  - Reduce pollutants to MEP

# **Permitting Framework**

- **■** Emphasis on pollution prevention
  - MS4 storm water management plan
  - Industrial and construction storm water pollution prevention plans
- Opportunity to develop priorities based on case-specific factors
- Allows system/jurisdiction wide permits

Recognizes industry specific characteristics	

# Who are the Permitting Authorities for the Storm Water Program?

- 43 States and one Territory serve as PAs for the NPDES Storm Water Program
- 9 non-delegated States/Territories where EPA is the PA include: AK, AZ, DC, ID, MA, ME, NH, NM, and PR
- EPA may still issue permits on Indian land and for Federal facilities in authorized States

# Who Implements the Program? Federal Government

- Develops regulations under the CWA
- Acts as permitting authority in nonauthorized States
- **■** Complies with regulations

# Who Implements the Program? State Government

- Acts as permitting authority where authorized
- Develops and implements additional state-specific program requirements
- **■** Complies with regulations

# Who Implements the Program? Regulated Entities

- Operators of regulated entities
  - MS4s
  - Industrial facilities
  - Construction activities
- **■** Implementation of permit requirements
  - Additional state requirements
  - Federal regulations

# Storm Water is just a piece of the Water Quality Puzzle



# Water Quality Standards (WQS)

- Set by States, Territories, and Tribes.
- Identify the uses for each waterbody e.g., drinking water supply, swimming, or fishing, and the scientific criteria to support that use.
- WQS provide goals for water quality restoration and protection
  - http://www.epa.gov/ost/standards/

## **Effluent Guidelines**

- Provide national, minimum discharge standards for over fifty major industries
- Implemented through NPDES permits
- http://www.epa.gov/ost/guide/

## **Sanitary Sewer Overflows**

- Discharges of raw sewage from municipal sanitary sewer systems
- Occur due to problems such as limited capacity and infiltration
- EPA will soon propose a rule to address SSOs through conditions in NPDES permits
- http://www.epa.gov/owm/sso.htm

#### **Combined Sewer Overflows**

- Combined Sewer Systems are not addressed by SW program
- CSS serve roughly 950 communities with about 40 million people
- CSOs contain not only storm water but also untreated human and industrial waste, toxic materials, and debris
- CSO Control Policy (published 1994)
- http://www.epa.gov/owm/cso.htm

# **Total Maximum Daily Load** (TMDL) Program

- A TMDL is a calculation of the maximum amount of a pollutant that a waterbody can receive and still meet water quality standards, and an allocation of that amount to the poliutant's sources.
  - http://www.epa.gov/owow/tmdl/

# Nonpoint Source (NPS)

- NPS Program encourages voluntary adoption of BMPs
- Section 319 provides grant funds to States, Territories and Indian Tribes
- **Coastal Nonpoint Pollution Control Program addresses NPS problems in** coastal waters
  - http://www.epa.gov/owow/nps/

Management	Program

TEA-21 Transportation Efficiency Act for the 21st Century

TMDL Total Maximum Daily Load **Total Suspended Solids** 

Urbanized Area

Whole Effluent Toxicity

TSS

UA

WET

# **Glossary of Common Terminology**

# **ABBREVIATIONS:**

BAT	Best Available Technology Economically Achievable (applies to non-conventional and toxic pollutants)
BCT	Best Conventional Pollutant Control Technology (applies to conventional pollutants)
BMP	Best Management Practice
BMR	Baseline Monitoring Report
BOD <sub>5</sub>	5-day Biochemical Oxygen Demand
BPJ	Best Professional Judgment
BPT	Best Practicable Control Technology Currently Available (generally applies to conventional pollutants and
	some metals)
CFR	Code of Federal Regulations
CGP	Construction General Permit
COD	Chemical Oxygen Demand
CSO	Combined Sewer Overflow
CWA	Clean Water Act (formerly referred to as the Federal Water Pollution Control Act or Federal Water Pollution
	Control Act Amendments of 1972)
CZARA	Coastal Zone Act Reauthorization Amendments
D.O.	Dissolved Oxygen
DMR	Discharge Monitoring Report
ELG	Effluent Limitations Guidelines
EPA	Environmental Protection Agency
FR	Federal Register
MEP	Maximum Extent Practicable
MS4	Municipal Separate Storm Sewer System
MSGP	Multi Sector General Permit
NFIP	National Flood insurance Program
NOI	Notice of Intent
NOT	Notice of Termination
NOV	Notice of Violation
NPDES	National Pollutant Discharge Elimination System
NPS	Non-point Source
M&O	Operation and Maintenance
OW	Office of Water
OWM	Office of Wastewater Management
PA	Permitting Authority
POTW	Publicly Owned Treatment Works
SIC	Standard Industrial Classification
SRF	State Revolving Fund
SWAP	Source Water Assessment Program
SWMP	Storm Water Management Plan/Program
<b>SWPPP</b>	Storm Water Pollution Prevention Plan

## **DEFINITIONS:**

Baseline General Permit: The first general permitting option available to regulated industrial facilities and large construction activities. EPA issued the construction baseline general permit on 9/9/92 (57 FR 41176) and the industrial baseline general permit on 9/25/92 (57 FR 44412). The construction baseline general permit has been replaced by the Construction General Permit, issued on 2/17/98 (63 FR 7857). The industrial baseline general permit has largely been replaced by the Multi-Sector General Permit, issued on 9/25/95 (60 FR 50804).

Best Available Treatment(BAT)/Best Control Technology (BCT): A level of technology based on the very best (state of the art) control and treatment measures that have been developed or are capable of being developed and that are economically achievable within the appropriate industrial category.

Best Management Practices (BMPs): Activities or structural improvements that help reduce the quantity and improve the quality of storm water runoff. BMPs include treatment requirements, operating procedures, and practices to control site runoff, spillage or leaks, sludge or waste disposal, or drainage from raw material storage.

Buffer Strip or Zones: Strips of grass or other erosion resistant vegetation located between a waterway and an area of more intensive land use.

Catch Basin: An entryway to the storm drain system, usually located at street corners.

Category (xi) facilities: Specific facilities classified as light industry with equipment or materials exposed to storm water.

Clean Water Act (Water Quality Act): (formerly the Federal Water Pollution Control Act or Federal Water Pollution Control Act Amendments of 1972). Public law 92-500; 33 U.S.C. 1251 et seq.; legislation which provides statutory authority for the NPDES program. Also know as the Federal Water Pollution Control Act.

Coastal Zone Act Reauthorization Amendments (CZARA): The Coastal Nonpoint Source Pollution Control Program (Section 6217) addresses nonpoint pollution problems in coastal waters. Section 6217 requires the 29 states and territories with approved Coastal Zone Management Programs to develop Coastal Nonpoint Pollution Control Programs. In its program, a state or territory describes how it will implement nonpoint source pollution controls, known as management measures, that conform with those described in Guidance Specifying Management Measures for Sources of Nonpoint Pollution in Coastal Waters (available at http://www.epa.gov/owow/nps/MMGI/.) This program is administered jointly with the National Oceanic and Atmospheric Administration (NOAA).

Conduit: Any channel or pipe used to transport flowing water.

Conveyance: The process of water moving from one place to another.

Culvert: A short, closed (covered) conduit that passes storm water runoff under an embankment, usually a roadway. A rectangular or square concrete culvert is referred to as a box culvert.

**Detention:** A storm water system that delays the downstream progress of storm water runoff in a controlled manner. This is typically accomplished using temporary storage areas and a metered outlet device.

Dike: An embankment used to confine or control water. Dikes are often built along the banks of a river to prevent overflow; a levee.

Discharge: The volume of water (and suspended sediment if surface water) that passes a given location within a given period of time.

Erosion: When land is diminished or worn away due to wind, water, or glacial ice. Often the eroded debris (silt or sediment) becomes a pollutant via storm water runoff. Erosion occurs naturally but can be intensified by land clearing activities such as farming, development, road-building, and timber harvesting.

Excavation: The process of removing earth, stone, or other materials from land.

Flood: A temporary rise in flow or stage of any watercourse or storm water conveyance system that results in storm water runoff exceeding its normal flow boundaries and inundating adjacent, normally dry areas.

Flood Control: The specific regulations and practices that reduce or prevent the damage caused by storm water runoff.

General Permit: A permit issued under the NPDES program to cover a certain class or category of storm water discharges. These permits reduce the administrative burden of permitting storm water discharges.

Grading: The cutting and/or filling of the land surface to a desired slope or elevation.

Holding Pond: A pond or reservoir, usually made of earth, built to store polluted runoff for a limited time.

Illicit Connection: Any discharge to a municipal separate storm sewer that is not composed entirely of storm water and is not authorized by an NPDES permit, with some exceptions (e.g., discharges due to fire fighting activities).

Industrial Activity: Any activity which is directly related to manufacturing, processing or raw materials storage areas at an industrial plant.

Large Municipal Separate Storm Sewer System (MS4): An MS4 located in an incorporated place or county with a population of 250,000 or more, as determined by the 1990 U.S. Census

Light Manufacturing Facilities: Described under Category (xi) of the definition of "storm water discharges associated with industrial activity." [40 CFR 122.26(b)(14)(xi)] Under the Phase I NPDES Storm Water Program, these facilities were eligible for exemption from storm water permitting requirements if certain areas and activities were not exposed to storm water. As a result of the Phase II Final Rule, these facilities must now certify to a condition of no exposure.

Maximum Extent Practicable (MEP): A standard for water quality that applies to all MS4 operators regulated under the NPDES Storm Water Program. Since no precise definition of MEP exists, it allows for maximum flexibility on the part of MS4 operators as they develop and implement their programs.

Medium Municipal Separate Storm Sewer System (MS4): MS4 located in an incorporated place or county with a population of 100,000 or more but less than 250,000, as determined by the 1990 U.S. Census.

Municipal Separate Storm Sewer System (MS4): A publically-owned conveyance or system of conveyances that discharges to waters of the U.S. and is designed or used for collecting or conveying storm water, is not a combined sewer, and is not part of a publicly-owned treatment works (POTW).

Multi-Sector General Permit (MSGP): An NPDES permit that regulates storm water discharges from eleven categories of industrial activities.

No exposure: All industrial materials or activities are protected by a storm resistant shelter to prevent exposure to rain, snow, snowmelt, and/or runoff. Industrial materials or activities include, but are not limited to, material handling equipment or activities, industrial machinery, raw materials, intermediate products, by-products, final products, or waste products. Material handling activities include the storage, loading and unloading, transportation, or conveyance of any raw material, intermediate product, final product or waste product.

Non-delegated State: Any State that does not have the authority to implement the NPDES Storm Water Program.

Non-point Source (NPS) Pollutants: Pollutants from many diffuse sources. NPS pollution is caused by rainfall or snowmelt moving over and through the ground. As the runoff moves, it picks up and carries away natural and human-made pollutants, finally depositing them into lakes, rivers, wetlands, coastal waters, and even our underground sources of drinking water.

Notice of Intent (NOI): An application to notify the permitting authority of a facility's intention to be covered by a general permit; exempts a facility from having to submit an individual or group application.

NPDES: "National Pollutant Discharge Elimination System" the name of the surface water quality program authorized by Congress as part of the 1987 Clean Water Act. This is EPA's program to control the discharge of pollutants to waters of the United States (see 40 CFR 122.2).

O&M Expenditures: The operating and maintenance costs associated with the continual workings of a project.

Outfall: The point where wastewater or drainage discharges from a sewer pipe, ditch, or other conveyance to a receiving body of water.

Permitting Authority (PA): The NPDES-authorized state agency or EPA regional office that administers the NPDES Storm Water Program. PAs issue permits, provide compliance assistance, and inspect and enforce the program.

Physically interconnected MS4: This means that one MS4 is connected to a second MS4 in such a way that it allows for direct discharges into the second system.

Point Source Pollutant: Pollutants from a single, identifiable source such as a factory or refinery.

Pollutant Loading: The total quantity of pollutants in storm water runoff.

Qualifying local program: A local, State or Tribal municipal storm water management program that imposes, at a minimum, the relevant requirements of one or more of the minimum control measures includes in 122.34(b).

Regulated MS4: Any MS4 covered by the NPDES Storm Water Program (regulated small, medium, or large MS4s).

Retrofit: The modification of storm water management systems through the construction and/or enhancement of wet ponds, wetland plantings, or other BMPs designed to improve water quality

Runoff: Drainage or flood discharge that leaves an area as surface flow or as pipeline flow. Has reached a channel or pipeline by either surface or sub-surface routes.

Sanitary Sewer: A system of underground pipes that carries sanitary waste or process wastewater to a treatment plant.

**Sediment:** Soil, sand, and minerals washed from land into water, usually after rain. Sediment can destroy fish-nesting areas, clog animal habitats, and cloud waters so that sunlight does not reach aquatic plants.

**Sheet flow:** The portion of precipitation that moves initially as overland flow in very shallow depths before eventually reaching a stream channel.

Site Plan: A graphical representation of a layout of buildings and facilities on a parcel of land.

Site Runoff: Any drainage or flood discharge that is released from a specified area.

Small Municipal Separate Storm Sewer System (MS4): Any MS4 that is not regulated under Phase I of the NPDES Storm Water Program.

Stakeholder: An entity that holds a special interest in an issue or program because it is or may be affected by it.

Standard Industrial Classification (SIC) Code: A four digit number which is used to identify various types of industries.

Storm Drain: A slotted opening leading to an underground pipe or an open ditch for carrying surface runoff.

Storm Water: Precipitation that accumulates in natural and/or constructed storage and storm water systems during and immediately following a storm event.

Storm Water Management: Functions associated with planning, designing, constructing, maintaining, financing, and regulating the facilities (both constructed and natural) that collect, store, control, and/or convey storm water.

Storm Water Pollution Prevention Plan (SWPPP): A plan to describe a process whereby a facility thoroughly evaluates potential pollutant sources at a site and selects and implements appropriate measures designed to prevent or control the discharge of pollutants in storm water runoff.

Surface Water: Water that remains on the surface of the ground, including rivers, lakes, reservoirs, streams, wetlands, impoundments, seas, estuaries, etc.

Total Maximum Daily Load (TMDL): The maximum amount of pollutants which can released into a water body without adversely affecting the water quality.

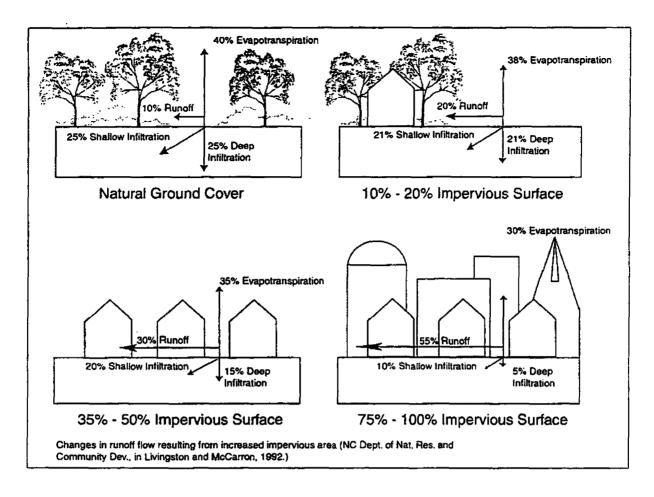
Tool Box: A term to describe the activities and materials that EPA plans to perform/produce to facilitate implementation of the storm water program in an effective and cost-efficient manner. The eight components include: 1) fact sheets; 2) guidance documents; 3) menu of BMPs; 4) compliance assistance; 5) information clearing house; 6) training and outreach efforts; 7) technical research; and 8) support for demonstration projects.

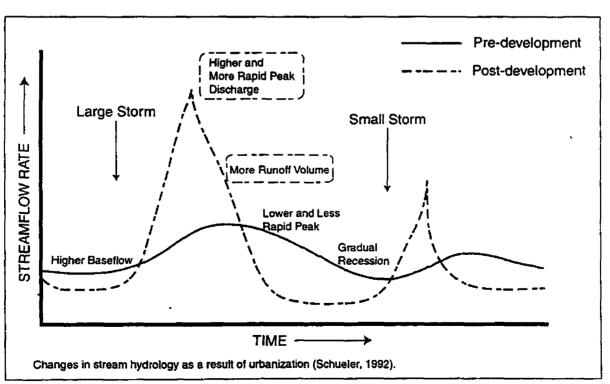
Urbanized Area (UA): A Bureau of the Census determination of a central place (or places) and the adjacent densely settled surrounding territory that together have a minimum residential population of 50,000 people and a minimum average density of 1,000 people/square mile.

Urban Runoff: Storm water from urban areas, which tends to contain heavy concentrations of pollutants from urban activities.

Watershed: That geographical area which drains to a specified point on a water course, usually a confluence of streams or rivers (also known as drainage area, catchment, or river basin).

Wet Weather Flows: Water entering storm drains during rainstorms/wet weather events.





# NPDES Storm Water Program Regulatory Overview

# Congress Authorizes creation of an NPDES Storm Water Program under the Clean Water Act (amends the Statute). **EPA Headquarters Develops the NPDES Storm Water Regulations** authorized by the CWA and oversees the administration of the NPDES Storm Water Program by EPA Regions and NPDES-authorized States. NPDES-Authorized **EPA Regions** State Water Pollution Administer program where states are not NPDES-**Control Agencies** authorized: Adminster program: Issue permits Issue permits Provide compliance Provide compliance assistance assistance Inspect and enforce Inspect and enforce Regulated Entities Obtain an NPDES storm water discharge permit and implement storm water management plans/programs as required by the permit. Municipalities/MS4s **Industrial Facilities Construction Activities** Large and medium MS4s Ten categories of industrial activity Construction activities disturbing 5 or Phase I 40 CFR 122.26(b)(4) and 40 CFR 122.26(b)(14)(i)-(ix) and (xi) greater acres 40 CFR 122.26(b)(14)(x) (7)Small construction activities disturbing Revised no exposure exclusion for facilities regulated under Phase I equal to or greater than 1 acre and less

Industrial activities operated by municipalities of less than 100,0001

122.26(g)

122.26(e)(1)(ii)

than 5 acres (waivers available)

122.26(b)(15)

Regulated small MS4s

(waivers available)

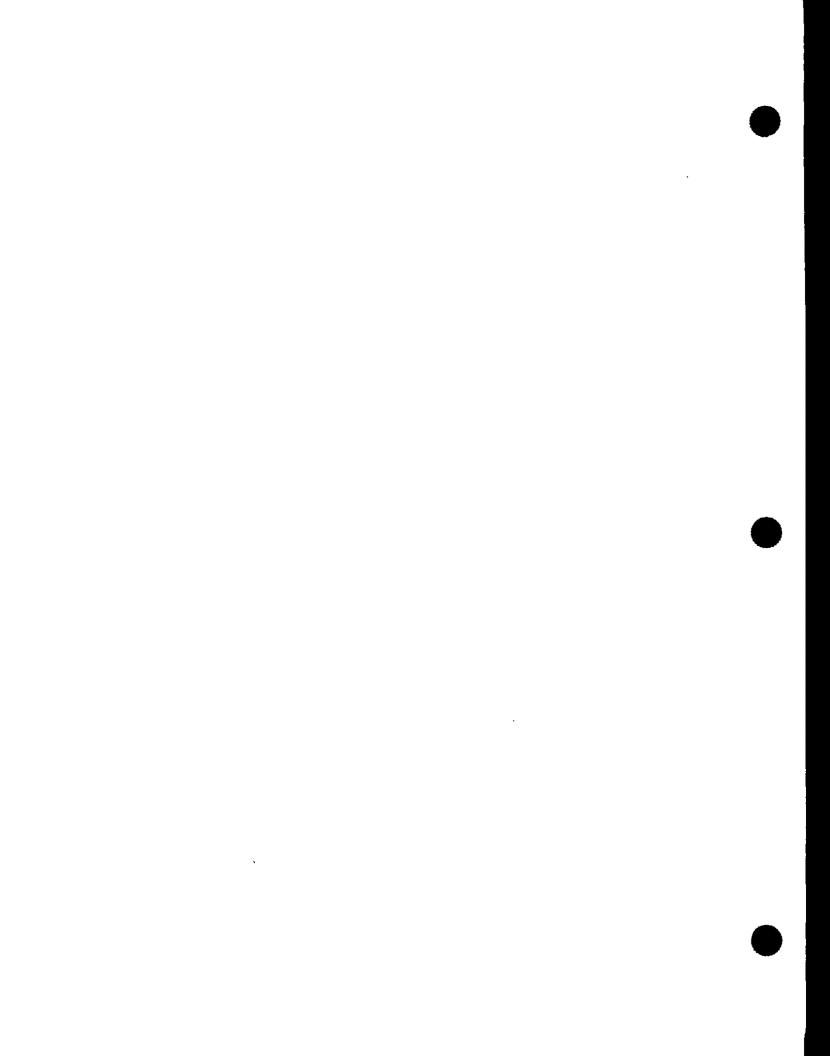
122.32(a)

Phase II

<sup>1.</sup> All such activities (except airports, uncontrolled sanitary landfills, and power plants) were previously exempted from the original Phase I application deadline.

# **Storm Water Program Timeline**

ACTIVITY	DEADLINE
Regulated industrial dischargers must submit No Exposure Certification or apply for permit coverage in States where EPA is the NPDES permitting authority	February 7, 2000
Submission of No Exposure Certification	Every 5 years
NPDES permitting authority determines designation of small MS4s located outside of an urbanized area that serve a jurisdiction with a population of 10,000 and population density of 1,000	By December 9, 2002; or by December 8, 2004 if applying designation criteria on a watershed basis
NPDES permitting authority determines waivers for regulated small MS4s in urbanized areas	By December 9, 2002
NPDES permitting authority issues general permits for regulated small MS4s and small construction activity	By December 9, 2002
Operators of regulated small MS4s and small construction activity designated by the rule must obtain permit coverage	By March 10, 2003
Operators of regulated small MS4s and small construction activity designated by NPDES permitting authority must obtain permit coverage	Within 180 days of notice
Temporarily exempted municipal operators of industrial activity must obtain permit coverage (ISTEA moratorium)	By March 10, 2003
The NPDES permitting authority may phase in coverage for small MS4s serving jurisdictions with a populations less than 10,000 on a schedule consistent with a State watershed permitting approach	Completion of phase-in by March 8, 2007
The regulated small MS4s must fully implement their storm water management programs	By the end of the first permit term – typically a 5-year period
Re-evaluation of the Phase II small MS4 regulations by EPA	By December 2012
NPDES permitting authority determination on a petition for designation of a non-regulated storm water discharger	Within 180 days of receipt



# Module 2

The NPDES Industrial Storm Water Program

[Slides and Handouts]

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# Module 2 The NPDES Industrial Storm Water Program

# The NPDES Industrial Storm Water Program

- ♦ What does the program cover?
- What are current industrial application options?
- What requirements does an industrial permit contain?
- ◆ Can a facility be exempt from permitting requirements under this program?

# Discharge of Storm Water Associated with Industrial Activity

- + Definition found at 40 CFR 122.26(b)(14)(i)-(xi)
- ♦ 11 categories of industrial activities
- ♦ Related to manufacturing, processing, or materials storage areas
- Includes Federal, State, and municipallyowned and operated facilities

# **Regulated Industrial Activities**

- + Facilities Subject to Standards (i)
- ✦ Heavy Manufacturing (ii)
- Mining/Oil and Gas (iii)
- ✦ Hazardous Waste Facilities (iv)
- + Landfills (v)
- ★ Recycling Facilities (vi)
- ♦ Steam Electric Power Plants (vii)
- Transportation Industries (viii)
- ◆ Sewage Treatment Plants (ix)

## Regulated Industrial Activities: Construction

- ◆ Found under Category (x)
- + Land Disturbance of five or more acres
  - · Clearing, grading or excavation
- + Activities part of a larger common plan of development
  - · Multiple activities within a contiguous area
  - Includes activities taking place on different schedules

# Regulated Industrial Activities: Light Manufacturing

- + Found in Category xi
- + Identified by SIC code
- + "No Exposure"

	MODES	Storm	Mater	Program	Training	Course
EPA.	NPUES	Storm	vvater	Program	Tamini	Course

## What is the "No Exposure" Provision?

- ◆ Original no exposure exemption
  - Only available to Category (xi) facilities with no exposure
  - · No certification required
- + 9th Circuit Court Decision
  - · Remanded for further rulemaking
- + Final Phase II Rule
  - No exposure provision
    - Applies to all Categories, except construction
    - Requires certification of no exposure

# How Does the No Exposure Certification Work?

- ◆ EPA's No Exposure Form asks a series of Yes/No questions to help determine if no exposure exists
  - May submit only if answer "no" to all
  - Applies in States where EPA is the permitting authority
- NPDES-authorized States will adopt own form after updating State rules

# How Do I Determine If an Industrial Facility Needs a Storm Water Permit?

- Does the facility have a storm water discharge to Waters of the U.S. or an MS4?
- ★ Is the industrial activity described in the regulations?
- Does the facility qualify for a conditional exemption?

FPA	NPDFS	Storm	Water	Program	Training	Course
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# ISTEA Exempted Municipally Operated Industrial Sources

- ◆ Intermodal Surface Transportation Efficiency Act of 1991
- Delayed permitting for industrial activities operated by municipalities with populations less than 100,000
- Phase II set the deadline to obtain permit coverage to be no later than 3 years and 90 days from publication of the rule – March 2003

# What Industrial Permit Options are Currently Available?

- + Individual Permit
  - Depends on the state in which a facility is located
- + General Permit
  - EPA permitted states:
    - Multi-Sector General Permit (MSGP)
    - Submit a Notice of Intent (NOI) for coverage
  - Authorized NPDES states:
    - Applicable general permit

# EPA's Multi-Sector General Permit (MSGP)

- Developed using industry-specific data from previous permit application process
- Consolidated industry data into 29 industry sectors with tailored requirements
- Focuses on development and implementation of storm water pollution prevention plans

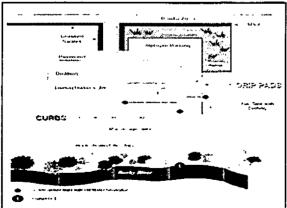
EPA NPDES Storm	Water	Program	Training	Course
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# **MSGP History**

- + Issued on 9/29/95 (60 FR 50804)
- ◆ Corrected/modified five times
  - 2/9/96 (61 FR 5248)
  - 2/20/96 (61 FR 6412)
  - 9/24/96 (61 FR 50020)
  - 8/7/98 (63 FR 42534)
  - 9/30/98 (63 FR 52430)

## Contents of the MSGP

- **♦** Notification requirements
- + Special conditions and requirements
- ◆ Storm Water Pollution Prevention Plan (SWPPP)
- ♦ Numeric effluent limitations
- ♦ Monitoring and reporting
- Specific requirements for industrial activities



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# **MSGP Monitoring Requirements**

- + Three types of monitoring
  - Visual examinations
  - Analytical (chemical) monitoring
  - Compliance monitoring
- **♦** Basic Regulatory Requirements
  - 40 CFR Part 136 methods
  - Representative storm event

## **Visual Monitoring**

- + Quarterly examination of discharges
  - Color
  - Odor
  - Solids
  - Foam
  - Sheen
- → No analytical tests
- + Results submitted only if requested

# Analytical "Benchmark" Monitoring

- Required only for certain industry sectors/subsectors
  - Table 5-I of the MSGP
  - · More than one sector may apply
- Quarterly sampling required in years two and four of the permit
  - · Low concentration waiver
- + Required to submit results
  - One DMR form per event
- ◆ No "limitations" applied

FΡΔ	MPDES	Storm	Water	Program	Training	Course

## **Compliance Monitoring**

- Required annually for facilities subject to numeric effluent limitations
- Grab samples within the first hour of discharge
  - · Prior to mixing with other discharges
- + Required to submit results
  - · One DMR form per storm event sampled

#### **Alternate Certification**

- ★ Exempts facilities from analytical monitoring requirements
  - If no sources of a pollutant are exposed to storm water
  - Pollutant-by-pollutant and outfall-by-outfall basis
  - · Not available for compliance monitoring
- Certification retained onsite and submitted to the permitting authority

## Representative Discharge Provision

- ♣ Applicable to analytical and visual monitoring requirements
  - Compliance monitoring not eligible
- Discharge from one outfall may represent discharge from other outfalls
  - Consideration of several factors
  - Quantitative data applies to other outfalls
- ◆ Required to document in SWPPP

<b>EPA NPDES</b>	Storm	Water	Program	Training	Course

# Sampling Waivers

- Adverse Weather Conditions/ Inaccessibility/Climatic
  - Allows substitute samples
  - · No prior approval required
- **◆** Unstaffed and Inactive Sites
  - · Analytical Monitoring Waiver
  - Visual Examination Waiver
  - · No prior approval required
- + No Representative Storm Event

# How Does a Facility Apply for Coverage Under the MSGP?

- ◆ SWPPP in place prior to NOI submittal
- + Complete ESA and NHPA screening
- **♦** Complete and submit NOI form
  - Facility information and certifications
  - MS4 notification
  - Deadlines
- ◆ Use a Notice of Termination (NOT) to discontinue coverage

# Endangered Species Act and the MSGP

- ◆ Permittees must certify on the NOI that no impacts to endangered species are likely or have previous ESA authorization for adverse effects
- + Addendum H of MSGP
  - ESA certification instructions
  - County-by-county list of species

EPA NPDES Storm Water Program Training Co
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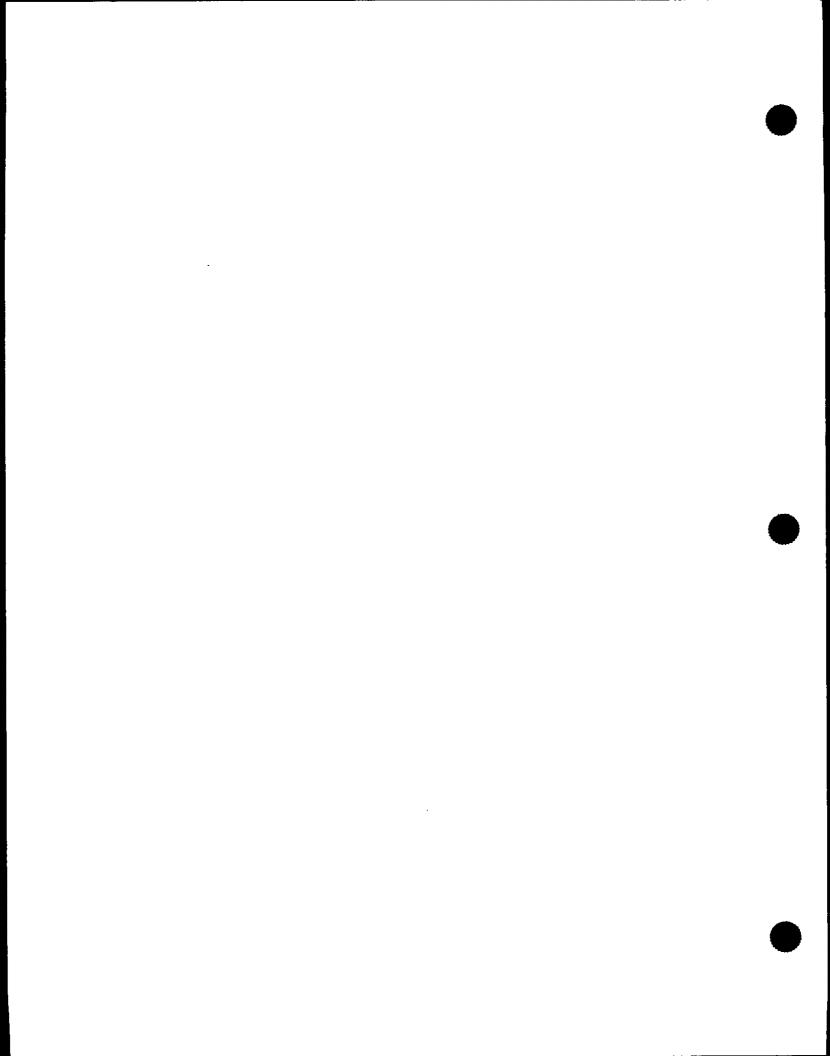
## National Historic Preservation Act and the MSGP

- + Must certify:
  - That discharges do not affect property that is listed, or eligible for listing, under the NHPA;
  - . That facility can obtain, and maintain compliance with, a written agreement with the State or Tribal Historic Preservation Officer
- → New Addendum I in 9/30/98 modifications contains guidance

# Where Can a Facility

- + List
- + Contact EPA's Water Resources Center
  - 202.260.7786 (phone)
  - 202.260.0386 (fax)
  - center.waterresources@epa.gov
- www.epa.gov/owm/sw
- + Contact your EPA Regional Office

of guidances available in bandouts	Obtain Resources?	
	of guidances available in handouts	





# Module 2-B

Re-issuing the Multi-Sector General Permit

# 95 MSGP Problems/Complaints

Too long
Too complicated
Too confusing

- + Difficulty/cost/value of benchmark monitoring
- + Permit administration problems



## MSGP-2000 Goals

Make it easier for "Mom & Pop" to understand and therefore comply Reduce complexity and redundancy

- + Make easier to administer
- + Make easier to enforce
- + Update as necessary
- Keep basics of 1995 permit (as modified)

# Ease of Use



"Plain English"

Full "family" paragraph numbering (old format "e" in Part I.B.3 = 1.2.3.5)

- + Clarified requirements
- + Simplified Notice of Intent Form
- + Plans for "Users Guide"
- + Accommodates electronic NOI/DMR when (if) available

# Complexity/Redundancy



Consolidated "common" and redundant "sector" requirements Cut permit size to 1/2

- + Cut Fact Sheet/Permit to 1/5
- + Clarified numerous requirements

## Administration



Areas of coverage clarified NOI improved for less errors and better tracking

- + Eligibility conditions clarified
- + Reapplication clarified
- + Accommodates "No Exposure"
- + Switching from individual permit clarified



## Compliance Enhancements

Mechanism to help assess eligibility Compliance & monitoring dates Must have copy of permit with SWP3

 Numerous links to Web sites for more information/resources



# Updates

New landfill guidelines

Non-storm water

Addresses discharge of solid materials and floating waste, offsite-tracking, and blown dust

- + NOT deadline added
- + Inactive mines on Federal lands eligible
- + Additional BMPs for sectors \$, T & Y



# Anyone have a better idea on benchmark monitoring???

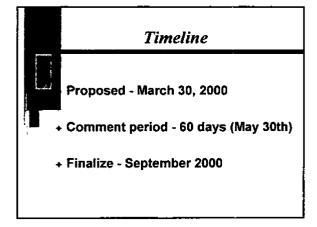
#### Goals:

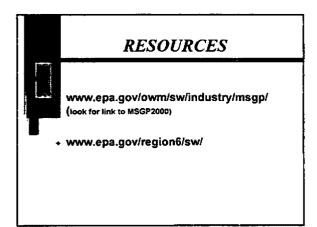
- · Identify potential problems
- · Assess effectiveness of the SWPPP

#### Possible Alternatives (pg 17030):

- · annual report on pollution control activities
- · group monitoring
- limit monitoring to WQ-impacted waters
- · simpler test methods or visual monitoring
- · environmental indicators

# Areas most likely to change TMDL/303(d) eligibility details Monitoring + ESA & NHPA eligibility & instructions + 401 certification conditions





# THIS FORM REPLACES PREVIOUS FORM 3510-6 (8-92) See Reverse for Instructions

Form Approved.

OMB No. 2040-0086 Approval expires 8-31-98

NPDES FORM



United States Environmental Protection Agency Washington, DC 20460

Notice of Intent (NOI) for Storm Water Discharges Associated with Industrial Activity Under a NPDES Permit

mission of this Notice of Intent constitutes notice that the party identified in Section II of this form intends to be authorized by a NPDES permit issued for srm water discharges associated with industrial activity in the State identified in Section III of this form. Becoming a permittee obligates such discharger to comply with the terms and conditions of the permit. ALL NECESSARY INFORMATION MUST BE PROVIDED ON THIS FORM.

1. Permit Selection: You must indicate the NPD	ES Storm Water general pe	ermit under which you are applying for coverage. Check one of these.
Baseline Industrial	Baseline Construction	Multi-Sector (Group Permit)
II. Facility Operator Information		
Name:		Phone: Status of Owner/Operator: State: ZiP Code:
III. Facility/Site Location Information		
Name:		Is the facility located on Indian Lands? (Y or N)
Address:		
City:	<u></u>	State: ZIP Code:
Latitude: Latitu	Quarter:	Section: Township: Range:
IV. Site Activity Information		
MS4 Operator Name:		
Receiving Water Body:		
you are filing as a co-permittee, ter storm water general permit number.		Multi-Sector Permit Applicants Only:  Based on the Instructions provided in Addendum H of the
SiC or Designated Activity Code: Primary:	2nd:	Multi-Sector permit, are species identified in Addendum H in proximity to the storm water discharges to be covered under this permit, or the areas of BMP construction to
Is the facility required to submit monitoring da	ata? (1, 2, 3, or 4)	control those storm water discharges? (Y or N)  Will construction (land disturbing activities) be conducted
If You Have Another Existing NPDES Permit, Enter Permit Number:		for storm water controls? (Y or N)  Is applicant subject to and in compliance with a written historic preservation agreement? (Y or N)
V. Additional Information Required for Construc	ction Activities Only	
Project Start Date: Completion Date:	Estimated Area to be Disturbed (in Acres):	Is the Storm Water Pollution Prevention Plan in compliance with State and/or Local sediment and erosion plans? (Y or N)
VI. Certification: The certification statement The certification statement	in Box 1 applies to <u>all</u> appli in Box 2 applies <u>only</u> to fac	cants. ilities applying for the Multi-Sector storm water general permit.
BOX 1 ALL APPLICANTS	BOX 2 MULTI-SECTOR	R STORM WATER GENERAL PERMIT APPLICANTS ONLY:
I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for bmitting false information, including the sibility of fine and imprisonment for knowing clations.	for coverage under the Murelating to the protection of To the best of my knowled BMPs to control storm was species identified in Addense ligible for coverage due To the best of my knowled to control storm water run on the National Register of otherwise eligible for coverservation Act.	aw that I have read and understand Part I.B. eligibility requirements ulti-Sector storm water general permit, including those requirements of species identified in Addendum H.  dge, the discharges covered under this permit, and construction of ater run-off, are not likely to and will not likely adversely affect any dum H of the Multi-Sector storm water general permit or are otherwise to previous authorization under the Endangered Species Act.  dge, I further certify that such discharges, and construction of BMPs noff, do not have an effect on properties listed or eligible for listing if Historic Places under the National Historic Preservation Act, or are verage due to a previous agreement under the National Historic discoverage under the Multi-Sector general permit is contingent upon rovided for in Part I.B.
Print Name:		Date:
Signature:	1	
EPA Form 3510-6 (8-98)		

# Instructions - EPA Form 3510-6 Notice Of Intent (NOI) For Storm Water Discharges Associated With Industrial Activity To Be Covered Under a NPDES General Permit

#### Who Must File A Notice Of Intent (NOI) Form

Federal law at 40 CFR Part 122 prohibits point source discharges of storm water associated with industrial activity to a water body(ies) of the U.S. without a National Pollutant Discharge Elimination System (NPDES) permit. The operator of an industrial activity that has such a storm water discharge must submit a NOI to obtain coverage under a NPDES Storm Water General Permit. If you have questions about whether you need a permit under the NPDES Storm Water program, or if you need information as to whether a particular program is administered by EPA or a state agency, telephone or write to the Notice of Intent Processing Center at (703) 931-3230.

#### Where To File NOI Form

NOIs must be sent to the following address:

Storm Water Notice of Intent (4203) 401 M Street, S.W. Washington, DC 20460

#### **Completing The Form**

You must type or print, using upper-case letters, in the appropriate areas only. Please place each character between the marks. Abbreviate if necessary to stay within the number of characters allowed for each item. Use one space for breaks between words, but not for punctuation marks unless they are needed to clarify your responses. If you have any questions on this form, call the Notice of Intent Processing Center at (703) 931-3230.

#### Section I Permit Selection

You <u>must</u> indicate the NPDES storm water general permit under which you are applying for coverage. Check one box only. The Baseline Industrial and Baseline Construction permits were issued in September 1992. The Multi-Sector Permit became effective October 1, 1995.

#### Section II Facility Operator Information

Provide the legal name of the person, firm, public organization, or any other entity that operates the facility or site described in this application. The name of the operator may or may not be the same as the name of the facility. The responsible party is the legal entity that controls the facility's operation, rather than the plant or site manager. Do not use a colloquial name. Enter the complete address and telephone number of the operator.

Enter the appropriate letter to indicate the legal status of the operator of the facility: F = Federal; S = State; M = Public (other than federal or state); P = Private

#### Section III Facility/Site Location Information

Enter the facility's or site's official or legal name and complete street address, including city, state, and ZIP code. Do not provide a P.O. Box number as the street address. If applying for a Baseline Permit and the facility or site tacks a street address, indicate the state and either the latitude and longitude of the facility to the nearest 15 seconds or the quarter, section, township, and range (to the nearest quarter section) of the approximate center of the site. If applying for the Multi-Sector Permit Indicate the complete street address and either the latitude and longitude of the facility to the nearest 15 seconds or the quarter, section, township, and range (to the nearest quarter section) of the approximate center of the site. quarter section) of the approximate center of the site.

All applicants must indicate whether the facility is located on Indian lands.

#### Section IV Site Activity Information

If the storm water discharges to a municipal separate storm sewer system (MS4), enter the name of the operator of the MS4 (e.g., municipality name, county name) and the receiving water of the discharge from the MS4. (A MS4 is defined as a conveyance or system of conveyances (including roads with drainage systems, municipal streets, catch basins, curbs, gutters, ditches, man-made channels, or storm drains) that is owned or operated by a state, city, town, borough, county, parish, district, association, or other public body which is designed or used for collecting or conveying storm water.)

If the facility discharges storm water directly to receiving water(s), enter the name of the receiving water(s).

If you are filing as a co-permittee and a storm water general permit number has been issued, enter the number in the place provided.

Indicate the monitoring status of the facility. Refer to the permit for information on monitoring requirements. Indicate the monitoring status by entering one of the following:

- 1 = Not subject to manitoring requirements under the conditions of the permit.

- 2 = Subject to monitoring requirements and required to submit data.
   3 = Subject to monitoring requirements but not required to submit data.
   4 = Subject to monitoring requirements but submitting certification for monitoring exclusion.

List, in descending order of significance, up to two 4-digit standard industrial classif (SIC) codes that best describe the principal products or services provided at the construction or site identified in Section III of this application. If you are applying for coverage under the construction general permit, enter "CO" (which represents SIC codes 1500-1799).

For industrial activities defined in 40 CFR 122.26(b)(14)(i)-(xi) that do not have SIC codes that accurately describe the principal products produced or services provided, use the following 2-character codes.

- HZ = Hazardous waste treatment, storage, or disposal facilities, including those that are operating under interim status or a permit under subtitle C of RCRA [40 CFR 122.26(b)(14)(iv)];
- Landfills, land application sites, and open dumps that receive or have received any industrial wastes, including those that are subject to regulation under subtitle D of RCRA [40 CFR 122.26(b)(14)(v)]; Steam electric power generating facilities, including coal handling sites [40 CFR
- 122.26(b)(14)(vii)];
- TW = Treatment works treating domestic sewage or any other sewage sludge or wastewater treatment device or system, used in the storage, treatment, recycling, and reclamation of municipal or domestic sewage [40 CFR 122.26(b)(ix)]; or CO = Construction activities [40 CFR 122.26(b)(14)(x)].

If there is another NPDES permit presently issued for the facility or site listed in Section III, enter the permit number. If an application for the facility has been submitted but no permit number has been assigned, enter the application number.

Facilities applying for coverage under the Multi-Sector storm water general permit must answer the last three questions in Section IV. Refer to Addendum H of the Multi-Sector general permit for a list of species that are either proposed or listed as threatened or endangered. "BMP" means "Best Management Practices" that are used to control storm water discharges.

Indicate whether any construction will be conducted to install or develop storm water runoff controls.

#### Section V Additional Information Required for Construction **Activities Only**

Construction activities must complete Section V in addition to Sections I through IV. Only construction activities need to complete Section V.

Enter the project start date and the estimated completion date for the entire develop plan.

Provide an estimate of the total number of acres of the site on which soil will be disturbed (round to the nearest acre).

Indicate whether the storm water pollution prevention plan for the site is in compliance with approved state and/or local sediment and erosion plans, permits, or storm water management plans.

#### Section VI Certification

Federal statutes provide for severe penalties for submitting false information on this application form. Federal regulations require this application to be signed as follows:

For a corporation: by a responsible corporate officer, which means: (i) president, secretary, treasurer, or vice-president of the corporation in charge of a principal business function, or any other person who performs similar policy or decision making functions, or (ii) the or any other person who performs similar policy or decision making functions, or (ii) the manager of one or more manufacturing, production, or operating facilities employing more than 250 persons or having gross annual sales or expenditures exceeding \$25 million (in second-quarter 1980 dollars), if authority to sign documents has been assigned or delegated to the manager in accordance with corporate procedures;

For a partnership or sole proprietorship: by a general partner or the proprietor; or

For a municipality, state, Federal, or other public facility: by either a principal executive officer or ranking elected official.

#### Paperwork Reduction Act Notice

Public reporting burden for this application is estimated to average 0.5 hours per application, including time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding the burden estimates, any other aspect of the collection of information, or suggestions for improving this form, including any suggestions which may increase or reduce this burden to: Chief, Information Policy Branch, 2136, U.S. Environmental Protection Agency, 401 M Street, SW, Washington, DC 20460, or Director, Office of Information and Berglaton Agency, 2015. Information and Regulator Affairs, Office of Management and Budget, Washington, DC 20503.

#### THIS FORM REPLACES PREVIOUS FORM 3510-7 (8-92)

Please See instructions Before Completing This Form

Form Approved. OMB No. 2010-0088
Approval expires: 8-21-08

NPDES FORM



United States Environmental Protection Agency Washington, DC 20460

Notice of Termination (NOT) of Coverage Under a NPDES General Permit for Storm Water Discharges Associated with Industrial Activity

Submission of this Notice of Termination constitutes notice that the party identified in Section II of this form is no longer authorized to discharge storm water associated with industrial activity under the NPDES program. ALL NECESSARY INFORMATION MUST BE PROVIDED ON THIS FORM.

1. Permit information
NPDES Storm Water General Permit Number:  Check Here if You are No Longer the Operator of the Facility:  Check Here if the Storm Water Discharge is Being Terminated:
II. Facility Operator Information
Name: Liiii III Phone: Liliii Phone: Liliii
Address: Liiidin Liililii Liiidin Liililii Liili
City: State: ZIP Code: ZIP Code:
III. Facility/Site Location Information
Name:
Address:
City: Little ZiP Code: Litilities ZiP Code: Litilities
Latitude: Longitude: Quarter: Section: Township: Range:
IV. Certification: I certify under penalty of law that all storm water discharges associated with industrial activity from the identified facility that are authorized by a NPDES general permit have been eliminated or that I am no longer the operator of the facility or construction site. I understand that by submitting this Notice of Termination, I am no longer authorized to discharge storm water associated with industrial activity under this general permit, and that discharging pollutants in storm water associated with industrial activity to waters of the United States is unlawful under the Clean Water Act where the discharge is not authorized by a NPDES permit. I also understand that the submittal of this Notice of Termination does not release an operator from liability for any violations of this permit or the Clean Water Act.
Print Name: Date:
Signature:

#### Instructions for Completing Notice of Termination (NOT) Form

#### Who May File a Notice of Termination (NOT) Form

Permittees who are presently covered under an EPA-issued National Pollutant Discharge Elimination System (NPDES) General Permit (Including the 1995 Multi-Sector Permit) for Storm Water Dicharges Associated with Industrial Activity may submit a Notice of Termination (NOT) form when their facilities no longer have any storm water discharges associated with industrial activity as defined in the storm water regulations at 40 CFR 122.26(b)(14), or when they are no longer the operator of the facilities.

For construction activities, elimination of all storm water discharges associated with industrial activity occurs when disturbed soils at the construction site have been finally stabilized and temporary erosion and sediment control measures have been removed or will be removed at an appropriate time, or that all storm water discharges associated with industrial activity from the construction site that are authorized by a NPDES general permit have otherwise been eliminated. Final stabilization means that all soil-disturbing activities at the site have been completed, and that a uniform perennial vegetative cover with a density of 70% of the cover for unpaved areas and areas not covered by permanent structures has been established, or equivalent permanent stabilization measures (such as the use of riprap, gabions, or geotextiles) have been employed.

#### Where to File NOT Form

Send this form to the the following address:

Storm Water Notice of Termination (4203) 401 M Street, S.W. Washington, DC 20460

#### Completing the Form

Type or print, using upper-case letters, in the appropriate areas only. Please place each character between the marks. Abbreviate it necessary to stay within the number of characters allowed for each item. Use only one space for breaks between words, but not for punctuation marks unless they are needed to clarify your response. If you have any questions about this form, telephone or write the Notice of Intent Processing Center at (703) 931-3230.

# Instructions - EPA Form 3510-7 Notice of Termination (NOT) of Coverage Under The NPDES General Permit for Storm Water Discharges Associated With Industrial Activity

#### Section | Permit Information

Enter the existing NPDES Storm Water General Permit number assigned to the facility or site identified in Section III. If you do not know the permit number, telephone or write your EPA Regional storm water contact person.

Indicate your reason for submitting this Notice of Termination by checking the appropriate box:

If there has been a change of operator and you are no longer the operator of the facility or site identified in Section III, check the corresponding box.

If all storm water discharges at the facility or site identified in Section III have been terminated, check the corresponding box.

#### Section II Facility Operator Information

Give the legal name of the person, firm, public organization, or any other entity that operates the facility or site described in this application. The name of the operator may or may not be the same name as the facility. The operator of the facility is the legal entity which controls the facility's operation, rather than the plant or site manager. Do not use a colloquial name. Enter the complete address and telephone number of the operator.

#### Section III Facility/Site Location Information

Enter the facility's or site's official or legal name and complete address, including city, state and ZIP code. If the facility tacks a street address, indicate the state, the latitude and longitude of the facility to the nearest 15 seconds, or the quarter, section, township, and range (to the nearest quarter section) of the approximate center of the site.

#### Section IV Certification

Federal statutes provide for severe penalties for submitting false information on this application form. Federal regulations require this application to be signed as follows:

For a corporation: by a responsible corporate officer, which means: (i) president, secretary, treasurer, or vice-president of the corporation in charge of a principal business function, or any other person who performs similar policy or decision making functions, or (ii) the manager of one or more manufacturing, production, or operating facilities employing more than 250 persons or having gross annual sales or expenditures exceeding \$25 million (in second-quarter 1980 dollars), if authority to sign documents has been assigned or delegated to the manager in accordance with corporate procedures;

For a partnership or sole proprietorship: by a general partner or the proprietor, or

For a municipality, State, Federal, or other public facility: by either a principal executive officer or ranking elected official.

#### Paperwork Reduction Act Notice

Public reporting burden for this application is estimated to average 0.5 hours per application, including time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding the burden estimate, any other aspect of the collection of information, or suggestions for improving this form, including any suggestions which may increase or reduce this burden to: Chief, Information Policy Branch, 2136, U.S. Environmental Protection Agency, 401 M Street, SW, Washington, DC 20460, or Director, Office of Information Regulatory Affairs, Office of Management and Budget, Washington, DC 2050

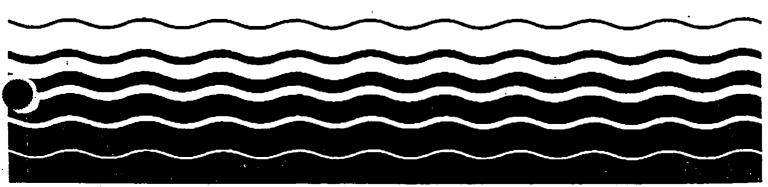


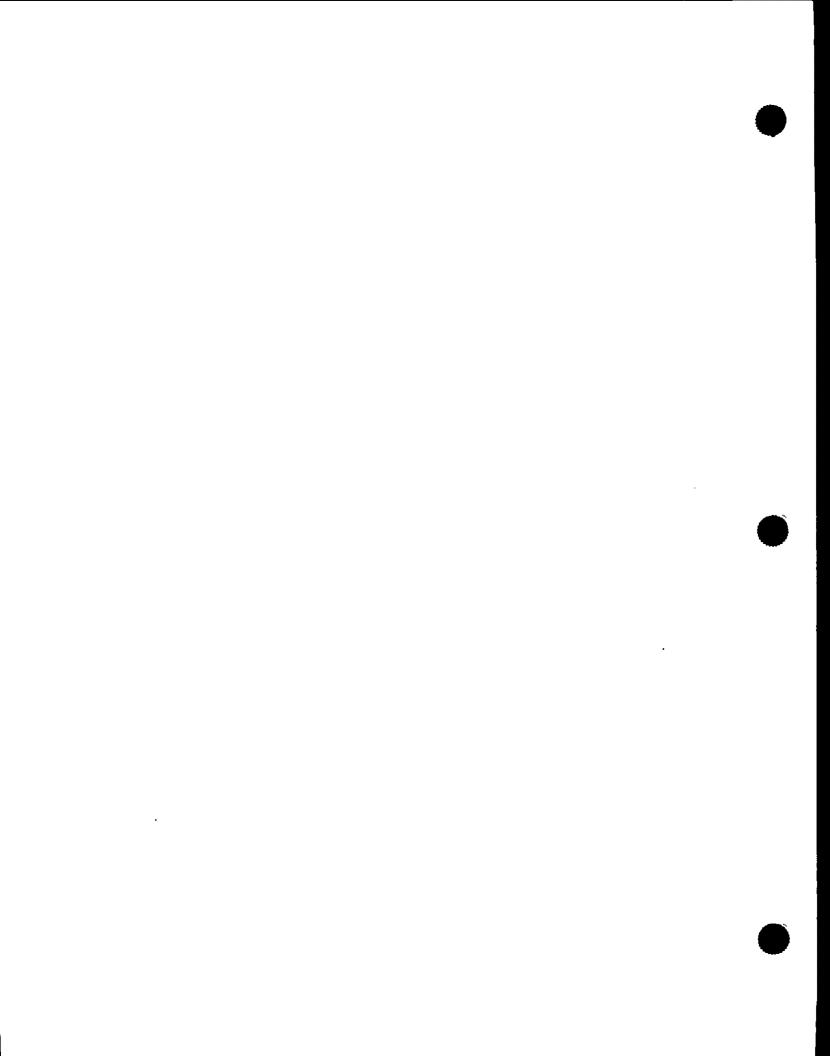
# Storm Water Management For Industrial Activities

Developing
Pollution Prevention Plans
And Best Management
Practices

SUMMARY GUIDANCE







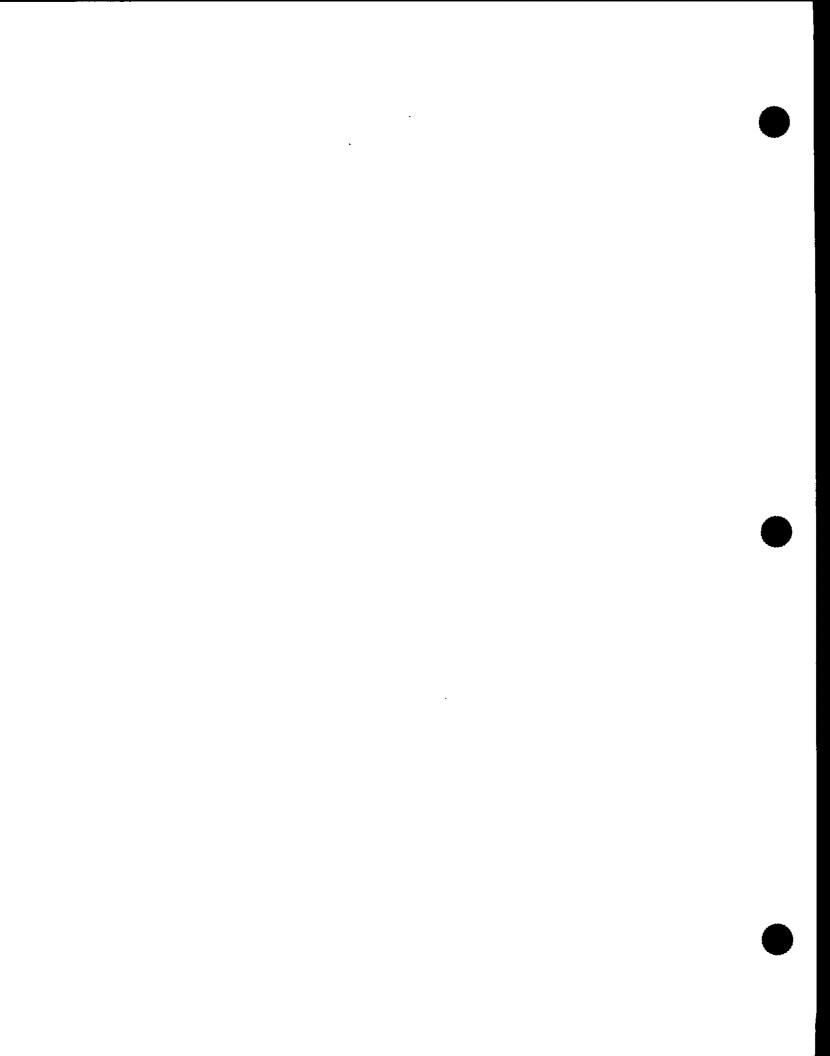
#### **FOREWORD**

This booklet provides industrial facilities with summary guidance on the development of storm water pollution prevention plans and identification of appropriate Best Management Practices (BMPs). It provides technical assistance and support to all facilities subject to pollution prevention requirements established under National Pollutant Discharge Elimination System (NPDES) permits for storm water point source discharges.

EPA's storm water program significantly expands the scope and application of the existing NPDES permit system for municipal and industrial process wastewater discharges. It emphasizes pollution prevention and reflects a heavy reliance on BMPs to reduce pollutant loadings and improve water quality. This booklet provides summary guidance in both of these areas.

The document summarized here was issued in support of EPA regulations and policy initiatives involving the development and implementation of a National storm water program. The document itself is Agency guidance only. It does not establish or affect legal rights or obligations. Agency decisions in any particular case will be made applying the laws and regulations on the basis of specific facts when permits are issued or regulations promulgated.

The document and this booklet will be revised and expanded periodically to reflect additional pollution prevention information and data on treatment effectiveness of BMPs. Comments from users will be welcomed. Send comments to U.S. EPA, Office of Wastewater Enforcement and Compliance, 401 M Street, SW, Mail Code EN-336, Washington, DC 20460.



# Industrial Guidance Executive Summary

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# A BRIEF GUIDE TO REQUIREMENTS FOR DEVELOPING AND IMPLEMENTING POLLUTION PREVENTION PLANS FOR INDUSTRIAL ACTIVITIES

Storm water runoff is part of the natural hydrologic cycle. However, human activities, particularly urbanization, can alter natural drainage patterns and add pollutants to the rainwater and snowmelt that run off the earth's surface and enter our Nation's rivers, lakes, streams, and coastal waters. In fact, recent studies have shown that storm water runoff is a major source of the pollutants that are damaging our sport and commercial fisheries, restricting swimming, and affecting the navigability of many of our Nation's waters.

The States and many municipalities have been taking the initiative to manage storm water discharges more effectively. Recognizing the importance of this problem, Congress also directed the U.S. Environmental Protection Agency (EPA) to develop a Federal program under the Clean Water Act to regulate certain high-priority storm water sources. The issuance of storm water discharge permits under the National Pollutant Discharge Elimination System (NPDES) is a major part of the Agency's efforts to restore and maintain the Nation's water quality. Discharges of storm water runoff from industrial facilities must now be covered by an NPDES permit. To deal with the thousands of industrial facilities which are now required to be covered by storm water permits, EPA strongly encourages the use of general permits. Under the NPDES program, a general permit authorizes discharges from a number of sources. To address storm water discharges from industrial facilities located in the States and territories that have not been delegated NPDES permitting authority, EPA issued NPDES General Permits for Storm Water Discharges Associated with Industrial Activity in the September 9 and September 25, 1992, Federal Register. (A complete list of these States and territories to which EPA's permits apply may be found on page 16 of this document.)

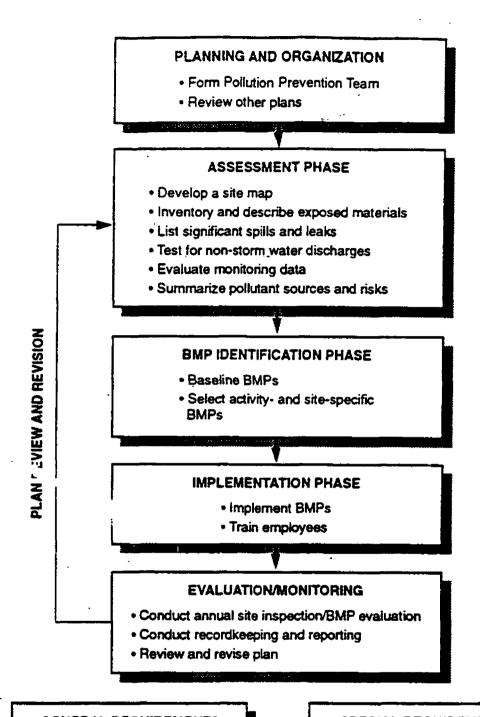
Under the NPDES General Permit for Storm Water Discharges Associated with Industrial Activity, EPA requires the development and implementation of a pollution prevention plan — designed to reduce pollution at the source, before it can cause environmental problems that cost the public and private sectors in terms of lost resources and expensive environmental restoration activities.

#### OVERVIEW OF POLLUTION PREVENTION PLAN REQUIREMENTS

This guide provides background information on pollution prevention planning requirements for permittees under the general permit. As shown on the chart on the following page, pollution prevention plan requirements provide you with a step-by-step process for ensuring that pollutants are not making their way into the storm water discharges from your site. Specifically, the pollution prevention plan requires that you select and implement Best Management Practices (BMPs). BMPs include schedules of activities, prohibitions of practices, maintenance procedures, and other management practices to prevent or reduce the pollution in runoff from your site. The five major phases of developing a pollution prevention plan are (1) planning and organization; (2) assessment; (3) BMP selection and plan design; (4) implementation; and (5) evaluation and site inspection. A set of worksheets and a model plan at the end of the document are provided to further clarify pollution prevention plan requirements. All permit holders under EPA's NPDES General Permit for Storm Water Discharges Associated with Industrial Activity must meet a number of general requirements. In addition, permittees who are subject to reporting requirements under Section 313 of the Emergency Planning and Community Right-to-Know Act (EPCRA), (also known as Title 3 of the Superfund Amendment and Reauthorization Act (SARA)), will have to meet special requirements under EPA's general permit. These requirements are listed in boxes throughout this guide, and then elaborated upon in the final section.

A more detailed manual on how to develop and implement a pollution prevention plan is available at a modest cost from the National Technical Information Service. The manual, titled Storm Water Management for Industrial Activities: Developing Pollution Prevention Plans and Best Management Practices, provides much more specific information than this brief guide. Instructions for ordering the detailed manual and a listing of other references that you may find useful can be found at the end of this guide.

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## **GENERAL REQUIREMENTS**

- Develop schedule
- Obtain required signatures
- Follow plan location and public access requirements
- Modify plan

#### SPECIAL REQUIREMENTS

- Plan for discharges through MS4s
- Plan for EPCRA, Section 313 facilities
- Plan for salt storage piles

SEVEN PHASES FOR DEVELOPING AND IMPLEMENTING INDUSTRIAL STORM WATER POLLUTION PREVENTION PLANS

# PLANNING AND ORGANIZATION PHASE

Before you start putting your Storm Water Pollution Prevention Plan together, there are two steps that will facilitate the development of your plan. These steps are designed to help you organize your staff and make preliminary decisions: (A) decide who will be responsible for developing and implementing your Storm Water Pollution Prevention Plan, and (B) look at other existing environmental facility plans for consistency and overlap.

# (A) Forming Your Pollution Prevention Team

As part of developing and implementing your pollution plan, you should (1) designate a specific individual or team who will develop, implement, maintain, and revise your pollution prevention plan, and (2) identify these individuals and describe each person's responsibilities at the site.

Since facilities differ in size and capacity, the number of team members will also vary. Designating one person may be appropriate as long as that individual is qualified to design and implement the plan. The plan should identify those people on site who are most familiar with the facility and its operations; these people, in turn, should provide structure and direction to the storm water management program. In all cases, someone in a senior management position must have overall responsibility for the plan.

The pollution prevention team is responsible for the following:

- Implementing all general permit and pollution prevention plan requirements
- Defining and agreeing upon an appropriate set of goals for the facility's storm water management program
- Being aware of any changes that are made in plant operations to determine whether any changes must be made to the Storm Water Pollution Prevention Plan
- Maintaining a clear line of communication with plant management to ensure a cooperative partnership.

Worksheet #1 (located at the end of this guide) is an example of an appropriate form on which to list the team members. To complete this worksheet, list the pollution prevention team members by name, facility position (title), and phone number; include a brief description of each member's specific responsibilities. This list can be directly incorporated into the Storm Water Pollution Prevention Plan, but it should also be displayed or posted within the facility so that other plant employees are aware of who is responsible for storm water management.

# (B) Building on Existing Environmental Management Plans

The pollution prevention team also must evaluate existing environmental management plans for consistency and determine which, if any, provisions can be incorporated into the Storm Water Pollution Prevention Plan.

Other related plans may include the Preparedness, Prevention and Contingency Plan (40 CFR Parts 264 and 265), the Spill Control and Countermeasures requirements (40 CFR Part 112), the National Pollutant

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Discharge Elimination System Toxic Organic Management Plan (40 CFR Parts 413, 433, and 469), and the Occupational Safety and Health Administration (OSHA) Emergency Action Plan (29 CFR Part 1910).

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Although you should build on relevant portions of other environmental plans as appropriate, it is important to note that your Storm Water Poliution Prevention Plan must be a comprehensive, stand-alone document.

ADDITIONAL REQUIREMENTS FOR FACILITIES SUBJECT TO REPORTING UNDER EPCRA, SECTION 313, FOR WATER PRIORITY CHEMICALS—EPCRA contains additional reporting requirements for designated hazardous waste management facilities. EPA's Baseline General Permit contains the following specific requirements for such facilities:

- The team must designate a person who will be accountable for spill prevention at the facility and identify this person in the plan.
- The designated person is responsible for setting up necessary spill emergency procedures and reporting requirements to isolate, contain, and clean up spills and emergency releases of Section 313 water priority chemicals.

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## ASSESSMENT PHASE

After identifying who is responsible for developing and implementing your plan and organizing your planning process, you should proceed to this next step—a pollutant source assessment. This is where you take a look at your facility and determine what materials or practices are (or may be) a source of contaminants to the storm water running off your site. To complete this phase, you will (A) create a map of the facility site to locate pollutant sources and determine storm water management opportunities, (B) conduct a material inventory, (C) evaluate past spills and leaks, (D) identify non-storm water discharges and illicit connections, (E) collect or evaluate storm water quality data, and (F) summarize the findings of this assessment. To select the most appropriate and effective control measures, consider that potential pollutant sources include areas where materials are handled or stored, outdoor processing areas, loading and unloading areas, and onsite waste management and disposal areas.

## (A) Developing a Site Map

A site map is a complete illustration of site features. At a minimum, the site map must include information on the following:

- Discharge points ("outfalls")
- Drainage patterns
- Identification of the types of pollutants likely to be discharged for each drainage area
- Direction of flow
- Surface water bodies, including any proximate stream, river, lake, or other water body receiving storm water discharges from the site
- · Structural control measures (physically constructed features used to control storm water flows)
- Locations of significant materials exposed to storm water
- Locations of industrial activities (such as fueling stations, loading and unloading areas, vehicle or equipment maintenance areas, waste disposal areas, storage areas).

Worksheet #2 (located at the end of this guide) provides guidance on completing your site map.

#### (B) Materials Inventory

Each facility must inventory the types of materials that are handled, stored, or processed onsite. "Significant materials" are of particular concern and are defined as follows:

Significant Materials: Raw materials; fuels; materials such as solvents, detergents, and plastic pellets; finished materials such as metallic products; raw materials used in food processing or production; hazardous substances designated under section 101(14) of CERCLA; any chemical the facility is required to report pursuant to EPCRA, Section 313; fertilizers; pesticides; and waste products such as ashes, slag, and sludge that have the potential to be released with storm water discharges [40 CFR 122.26(b)(12)].

To complete the materials inventory, the facility must do two specific tasks:

- List materials that have been exposed to storm water in the past 3 years (focus on areas where materials are stored, processed, transported, or transferred).
- Provide a narrative description of methods and location of storage and disposal areas, materials management practices, treatment practices, and any structural/nonstructural control measures.
  - Structural practices are fixed equipment such as berms, detention ponds, or grassed swales.
  - Nonstructural practices may include regularly scheduled actions such as sweeping or inspections.

Worksheet #3 (located at the end of this guide) will assist you in conducting a material inventory for your Storm Water Pollution Prevention Plan. If any of the significant materials on your site have been exposed to storm water in the 3 years prior to the effective date of your permit, complete Worksheet #3A and include it in your plan.

# (C) Identifying Past Spills and Leaks

Provide a list of significant spills and leaks of toxic or hazardous that have occurred in the past 3 years. "Significant spills" includes releases in excess of reportable quantities, defined as follows:

Reportable Quantity (RQ) Discharge: An RQ release occurs when a quantity of a hazardous substance or oil is spilled or released within a 24-hour period of time and exceeds the RQ level assigned to that substance under CERCLA or the Clean Water Act. These levels or quantities are defined in terms of gallons or pounds. Regulations listing these quantities are contained at 40 CFR 302.4, 40 CFR 117.21 and 40 CFR 110.

Permittees are encouraged to list spills and leaks of nonhazardous materials as well as spills of hazardous materials in their pollution prevention plans.

Worksheet #4 (located at the end of this guide) can help you organize this list of leaks and spills. The areas on your site where significant leaks or spills have occurred are areas on which you should focus very closely when selecting BMPs.

## (D) Non-Storm Water Discharges

To certify that your facility has been tested or evaluated for non-storm water discharges, you must:

- Identify potential non-storm water discharges
- Describe the method used and results of any test and/or evaluation for such discharges
- Indicate the location of the onsite drainage points that were checked during the test or evaluation
- Provide the date of the test or evaluation. (If you cannot test or evaluate potential non-storm water discharges, notice must still be made by certification.)

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Examples of non-storm water discharges include any water used directly in the manufacturing process (process water), air conditioner condensate, noncontact cooling water, vehicle wash water, or sanitary wastes.

To check for non-storm water discharges, you can use one of the following three common dry weather tests: visual inspection; plant schematic review; and/or dye testing.

Worksheet #5 (located at the end of this guide) will assist you in conducting a non-storm water discharge assessment and certification for outfalls at your site. If you are unable to test and/or provide certification for the presence of non-storm water discharges, please refer to Worksheet #6.

# (E) Existing Monitoring Data

Where existing storm water sampling data are available, the facility must (1) provide a summary of any existing storm water sampling data and (2) describe the sample collection procedures used.

# (F) Site Evaluation Summary

This step is critical, as it will become the foundation for the rest of the Storm Water Pollution Prevention Plan. Facilities must fulfill the following requirements:

- Provide a narrative description of activities with a high potential to contaminate storm water at
  your site, including those associated with materials loading and unloading, outdoor storage,
  outdoor manufacturing or processing, onsite waste disposal, and significant dust or particulate
  generating activities
- Describe any pollutants of concern that may be associated with such activities.

Once you have completed the above steps in your pollutant source assessment, you should have enough information to determine which areas, activities, or materials may contribute pollutants to storm water runoff from your site. With this information, you can select the most appropriate BMPs to prevent or control pollutants from these areas.

# BMP SELECTION AND PLAN DESIGN PHASE

Once you have identified and assessed potential and existing sources of storm water contamination at your facility, the next step is to select the proper Best Management Practices (BMPs) that will address these pollutant sources. To satisfy the requirements of this phase, you must provide a narrative description of the BMPs you have selected for your site. At a minimum, your plan must incorporate the following eight "baseline" BMPs: (A) good housekeeping, (B) preventive maintenance, (C) visual inspections, (D) spill prevention and response, (E) sediment and erosion prevention, (F) traditional storm water management practices, (G) other BMPs as appropriate, (H) employee training, and (I) recordkeeping and reporting. A number of these BMPs are discussed below.

## (A) Good Housekeeping

Good housekeeping practices are designed to maintain a clean and orderly work environment. Often the most effective first step towards preventing pollution in storm water from industrial sites involves merely using good common sense to improve the facility's basic housekeeping methods. The following are some simple procedures that a facility can consider incorporating into an effective good housekeeping program:

- Improve operation and maintenance of industrial machinery and processes.
- · Implement careful material storage practices.
- · Maintain up-to-date material inventory.
  - Identify all chemical substances present in the workplace.
  - Label all containers showing name and type of substance, stock number, etc.
- Schedule routine cleanup operations.
- Maintain well-organized work areas.
- Train employees about good housekeeping practices.

#### (B) Preventive Maintenance

Each permittee must develop a preventive maintenance program that involves inspections and maintenance of storm water management devices and routine inspections of facility operations to detect faulty equipment. Equipment (such as tanks, containers, and drums) should be checked regularly for signs of deterioration.

EPCRA, Section 313, Facility Preventive Maintenance Inspection Requirements—All areas of the facility must be inspected for the following at appropriate intervals as specified in the plan:

- Leaks or conditions that would lead to discharges of Section 313 water priority chemicals
- Conditions that could lead to direct contact of storm water with raw materials, intermediate materials, waste materials or products
- Piping, pumps, storage tanks and bins, pressure vessels, process and material handling equipment, and material bulk storage areas for leaks, wind blowing, corrosion, support or foundation failure, or other deterioration or noncontainment.

# (C) Visual Inspections

Regular visual inspections are your means to ensure that all of the elements of the plan are in place and working properly to prevent pollution of storm water runoff from your facility. Consider the following when conducting visual inspections:

- Designate qualified, trained plant personnel to regularly inspect the facility's equipment and areas, track results of inspections, make necessary changes, and maintain records of all inspections
- Ensure that inspection records note when inspections were done, who conducted the inspection, what areas were inspected, what problems were found, and what steps were taken to correct any problems.

These records should be kept with the plan. EPA's general permit requires that records be kept until at least one year after coverage under the permit expires.

# (D) Spill Prevention and Response

Areas where spills are likely to occur and their drainage points must be clearly identified in the storm water pollution prevention plan. You should ensure that employees are aware of response procedures, including material handling and storage requirements. Also ensure that there is access to appropriate spill cleanup equipment.

## **SPILL PREVENTION PLAN CONSIDERATIONS:**

- · Install leak detection devices.
- Adopt good housekeeping practices.
- Perform regular visual inspections to identify areas for potential leaks or spills.
- Recycle, reduce, and reuse process materials to minimize waste onsite.

#### SPILL RESPONSE PLAN CONSIDERATIONS:

- Identify a spill response team to implement the spill response plan.
- · Identify safety measures.
- Include procedures for notifying appropriate authorities (police, fire, hospital, Publicly Owned Treatment Works [POTW], etc.) in the event of a spill.
- · Describe spill containment, diversion, isolation, and cleanup practices.

EPCRA, Section 313, Facility SPILL PREVENTION AND RESPONSE REQUIREMENTS—When a leak or spill of a Section 313 water priority chemical has occurred, the contaminated soil, material, or debris must be removed promptly and disposed of in accordance with Federal, State, and local requirements and as described in the Storm Water Pollution Prevention Plan. These facilities are also required to designate a person responsible for spill prevention, response, and reporting procedures.

#### (E) Sediment and Erosion Control

The facility's pollution prevention plan must identify activities that present a potential for significant soil erosion and measures taken to control such erosion. More information on sediment and erosion control BMPs can be found in the reference section of this guide.

# (F) Management of Runoff

Permittees must describe existing storm water controls found at the facility and any additional measures that can be implemented to improve the prevention and control of polluted storm water. Examples include: vegetative swales, reuse of collected storm water, infiltration trenches, and detention ponds.

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### IMPLEMENTATION PHASE

At this point, you have designed your Storm Water Pollution Prevention Plan and the plan has been approved by facility management. Under the implementation phase, you must (A) implement the selected storm water BMPs, and (B) train all employees to carry out the goals of the plan.

### (A) Implementing Appropriate Controls

In implementing the plan, a facility will:

- Develop a schedule for implementation. For example, your schedule might include a deadline for putting improved housekeeping measures into practice. Some controls may be immediately put into action; others will be phased in.
- Assign specific individuals with responsibility for implementing aspects of the plan and/or monitoring implementation.
- Ensure that management approves of your implementation schedule and strategy, and schedule regular times for reporting progress to management.

### (B) Employee Training

Permittees must develop an employee training program that covers such topics as spill prevention and response, good housekeeping, and material management practices.

The goals of a training program are to teach personnel, at all levels of responsibility, the components and goals of the storm water pollution prevention plan and to create overall sensitivity to storm water pollution prevention concerns. The plan must include a schedule for training programs.

EPCRA, Section 313, FACILITY REQUIREMENTS—There are additional training requirements for employees and contractor personnel who work in areas where EPCRA, Section 313, water priority chemicals are used or stored. These individuals must be trained in the following areas, at least once per year:

- Preventive measures, including spill prevention and response and preventive maintenance
- Pollution control laws and regulations
- The facility's Storm Water Pollution Prevention Plan
- Features and operations of the facility that are designed to minimize discharges of Section 313
  water priority chemicals, particularly spill prevention procedures.

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### **EVALUATION PHASE**

Now that your Storm Water Pollution Prevention Plan has been put to action, you must keep it up-to-date by regularly evaluating the information you collected in the Assessment Phase and the controls you selected in the Plan Design Phase. Specifically, you must (A) conduct site evaluations, (B) keep records of all inspections and reports, and (C) revise the plan as needed.

### (A) Annual Site Compliance Evaluation

Qualified personnel must conduct site compliance evaluations at appropriate intervals, but at least once a year (at least once in 3 years for inactive mining sites). As part of your compliance evaluations, you are required to carry out the following:

- · Inspect storm water drainage areas for evidence of pollutants entering the drainage system.
- Evaluate the effectiveness of BMPs (for example, determine if your site cleaner or gauge whether employees are more familiar with good housekeeping measures and spill prevention/response practices).
- Observe structural measures, sediment controls, and other storm water BMPs to ensure proper operation.
- Revise the plan as needed within 2 weeks of inspection, and implement any necessary changes within 12 weeks of the inspection.
- Prepare a report summarizing inspection results and followup actions, identifying the date of inspection and personnel who conducted the inspection.
- · Sign the report and keep it with the plan.

### (B) Recordkeeping and Internal Reporting

Your facility must record and maintain records of spills, leaks, inspections, and maintenance activities for at least one year after the permit expires. For spills and leaks, records should include information such as the date and time of the incident, weather conditions, cause, and resulting environmental problems.

### (C) Plan Revisions

Major changes in a facility's design, construction, operation, or maintenance will necessitate changes in that facility's Storm Water Pollution Prevention Plan.

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### GENERAL REQUIREMENTS

This section provides guidance on some of the administrative requirements related to organizing and developing your Storm Water Pollution Prevention Plan. The guidance covers (A) deadlines for plan development and implementation, (B) required signatures. (C) requirements for plan location and access, and (D) Director-required plan modifications.

### (A) Deadlines for Plan Development and Implementation

Schedule for Plan Development and Implementation Part IV.A.		
Type of Facility	Deadline for Plan Development	Deadline for Plan Implementation
Facilities discharging storm water associated with industrial activity on or before October 1, 1992	April 1, 1993	October 1, 1993
Facilities beginning to discharge storm water after October 1, 1992, but on or before December 31, 1992	60 days after commencement of discharge	60 days after commencement of discharge
Facilities beginning to discharge storm water associated with industrial activity on or after January 1, 1993	48 hours prior to commencement of discharge (upon submittal of NOI)	48 hours prior to commencement of discharge (upon submittal of NOI)
Oil and gas exploration, production, processing, or treatment operations discharging a reportable quantity release in storm water after October 1, 1992	60 days after release	60 days after release
Industrial facilities rejected or denied from the group application process	365 days after date of rejection or denial	545 days after date of rejection or denial

Note: The Director may grant a written extension for plan preparation and compliance for new dischargers (after October 1, 1992) upon showing of good cause.

### (B) Required Signatures

As with the Notice of Intent (NOI), your plan must be signed by an "authorized representative," who is a person at or near the top of your facility's management chain (the president, vice president, or a production manager) who has been delegated the authority to sign and certify this type of document.

EPCRA, Section 313, Facility Plan Certification Requirements—The plan must be reviewed and certified by a Registered Professional Engineer and recertified every 3 years or after the plan is significantly changed. This certification that the plan was prepared in accordance with good engineering practices does not relieve the facility owner or operator of responsibility to prepare and implement the plan, however.

### (C) Plan Location and Public Access

Although all plans are required to be maintained onsite, some NPDES storm water permits may require that facilities submit copies of their Storm Water Pollution Prevention Plans to the Director for review. Examine your permit carefully to determine what submittal requirements apply to your facility. Plans and all required records must also be kept at least one year after the permit expires.

### (D) Director-Required Plan Modifications

Upon reviewing your plan, the permitting authority may find that it does not meet one or more of the minimum standards established by the pollution prevention plan requirements. In this case, the permitting authority will notify you of the changes that you must make to improve the plan.

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### SPECIAL REQUIREMENTS

In addition to the minimum "baseline" BMPs discussed in previous sections, facilities may be subject to additional "special" requirements. Not all facilities will have to include these special requirements in their Storm Water Pollution Prevention Plan. Be sure to check your permit closely for these conditions. In particular, EPA's general permit includes special requirements for (A) facilities that discharge storm water through municipal separate storm sewer systems, (B) facilities subject to EPCRA, Section 313, reporting requirements, and (C) facilities with salt storage piles.

# (A) Special Requirements for Discharges Through Municipal Separate Storm Sewer Systems

Industrial facilities that discharge storm water through a large or medium municipal separate storm sewer system (serving a population of 100,000 or more) must comply with any applicable conditions established by the municipality's storm water management program. These facilities will be notified by the municipality. Examples of conditions could include additional monitoring requirements and/or additional source control requirements.

### (B) Special Requirements for EPCRA, Section 313, Reporting Facilities

In addition to the other special requirements identified in this guide, the following specific control requirements must be practiced in areas where Section 313 water priority chemicals are stored, handled, processed, or transferred:

- Provide containment, drainage control, and/or diversionary structures (prevent or minimize runon by installing curbing, culverting, gutters, sewers, or other controls, and/or prevent or minimize exposure by covering storage piles).
- Prevent discharges from liquid storage areas (store liquid materials in compatible storage containers and/or provide secondary containment designed to hold the volume of the largest storage tank plus precipitation).
- Prevent discharges from material storage areas (install drainage and/or other control measures).
- Prevent discharges from loading/unloading areas (use drip pans and/or implement a strong spill contingency and integrity testing plan).
- Prevent discharges from handling/processing/transferring areas (use covers, guards, overhangs, door skirts and/or conduct visual inspections or leak tests for overhead piping).
- Prevent discharges from all the above areas (use manually activated valves with drainage controls
  in all areas, and/or equip the plant with a drainage system to return spilled material to the facility).
- Introduce facility security programs to prevent spills (use fencing, lighting, traffic control, and/or, secure equipment and buildings).

### (C) Special Requirements for Salt Storage Piles

Salt storage piles used for deicing or other commercial purposes must be enclosed or covered to prevent exposure to storm water (except when salt is being added or removed from the pile). Please note that piles do not need to be enclosed or covered where storm water is not discharged to waters of the United Sates. Compliance with this requirement must be met as expeditiously as practicable, but no later than 3 years after the NOI is submitted.

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### OTHER REFERENCES

In addition to this summary, other documents are available to assist in the preparation and implementation of pollution prevention plans. These documents include the guidance manual <u>Storm Water Management for Industrial Activities, Developing Pollution Prevention Plans and Best Management Practices</u> (EPA 832-R-92-006, September 1992), which is available from the National Technical Information Service [NTIS Order No. PB 922 359 69] at (703) 487-4650.

For any other information and guidance, please call EPA's National Storm Water Hotline at (703) 821-4823. From the Hotline, you may obtain numerous documents, including:

 September 9, 1992, <u>Federal Register</u> (57 FR 41236) - Final NPDES General Permits for Storm Water Discharges Associated with Industrial Activity; Notice

### - Applicability:

For the States of Alaska, Arizona, Florida, Idaho, Louisiana, Maine, New Hampshire, New Mexico, Oklahoma, South Dakota and Texas; for Indian lands located in Alaska, Arizona, California, Colorado (including the Ute Mountain Reservation in Colorado), Florida (two tribes), Idaho, Maine, Massachusetts, Mississippi, Montana, New Hampshire, Nevada, North Carolina, North Dakota, Utah, Washington and Wyoming; for Federal facilities in Colorado and Washington; for Federal facilities and Indian lands in Louisiana, New Mexico, Texas, and Oklahoma; and for the territories of Johnston Atoll, and Midway and Wake Island.

▲ September 25, 1992, <u>Federal Register</u> (57 FR 44438) - Final NPDES General Permits for Storm Water Discharges Associated with Industrial Activity; Notice

### Applicability:

For the States of Massachusetts and Puerto Rico; for American Samoa and Guam; for Indian lands located in New York; and for Federal facilities in Delaware.

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# Worksheet #1 **POLLUTION PREVENTION TEAM** Completed by: Title: \_\_\_\_\_ Date: MEMBER ROSTER Leader: \_\_\_\_\_ Title: Office Phone: Responsibilities: Members: \_\_\_\_\_\_ Title: \_\_\_\_\_\_ (1) \_\_\_\_\_ Office Phone: Responsibilities: Title: Office Phone: Responsibilities: \_\_\_\_\_\_ Title: \_\_\_\_\_ Office Phone: Responsibilities: (4) \_\_\_\_\_ Title: \_\_\_\_ Office Phone: \_\_\_\_\_ Responsibilities:

## Worksheet #2 Completed by: **DEVELOPING A SITE MAP** Title: Date: Instructions: • Draw a map of your site including a footprint of all buildings, structures, paved areas, and parking lots. The information below describes additional elements required by EPA's General Permit. EPA's General Permit requires that you indicate the following features on your site map: All outfalls and storm water discharges Drainage areas of each storm water outfall Structural storm water pollution control measures, such as: - Flow diversion structures - Retention/detention ponds - Vegetative swales - Sediment traps Name of receiving waters (or if through a Municipal Separate Storm Sewer System) Locations of exposed significant materials Locations of past spills and leaks Locations of high-risk, waste-generating areas and activities common on industrial sites such as: Fueling stations - Vehicle/equipment washing and maintenance areas Area for unloading/loading materials - Above-ground tanks for liquid storage

Industrial waste management areas (landfills, waste piles, treatment plants, disposal areas)

Outside storage areas for raw materials, by-products, and finished products

Outside manufacturing areas

- Other areas of concern (specify:\_\_\_\_\_)

	MATERIAL INVENTORY	NTORY		•	Worksheet #3 Completed by: Title: Date:			
Instructions: Lis	List all materials used, stored, or produced onsite. storm water runoff. Also complete Worksheet 3A	red, or pro	duced ons Worksheet		and evaluate these ma naterial has been expose	List all materials used, stored, or produced onsite. Assess and evaluate these materials for their potential to contribute pollutants to storm water runoff. Also complete Worksheet 3A if the material has been exposed during the last 3 years.	pollutan	ts to
			Quentity (unite)		Quentily Exposed in Last	Likelihood of contact with storm water. If	Past Sig Spill o	Past Significant Spill or Leak
Material	Purpose/Location	Ubed	Produced	Biored	3 Years	yes, describe reason.	Yes	No
				•				
•								
•	,							
								,
						-		
						-		

# Description of Material Management Practice (e.g., pile covered, drum seafed) Based on your material inventory, describe the significant materials that were exposed to storm water during the past three years and/or are currently exposed. For the definition of "significant materials" see page 5 of this summary. Method of Storage or Disposal (e.g., pile, drum, Worksheet #3A Completed by: tenk) Title: Date: (se indicated on the site DESCRIPTION OF EXPOSED SIGNIFICANT MATERIAL Location map) Quentity Exposed (unite) Period of Expoeure Description of Exposed Significant Material Instructions:

Preventive Measures Preventive Measures Preventive Messures Taken Taken Taken Directions: Record below all significant spills and significant leaks of toxic or hazardous pollutants that have occurred at the facility in the three Longer Exposed to Storm Weter to Storm Water (True/Falge) Longer Exposed Longer Exposed to Storm Weler (True/Fates) Meterial No (True/Fales) Material No Material No Definitions: Significant spills include, but are not limited to, releases of oil or hazardous substances in excess of reportable quantities. Response Procedure Response Procedure Response Procedure Material Recovered Amount of Amount of Recovered Recovered Amount of Material Meterial Resean Reseon Reston Completed by: Worksheet #4 Source, Il Known Source, If Known urce, If Known Description Description Description Date: Title: Quenthy Quentity Quently Type of Meterial Type of Meterial Type of Meterial LIST OF SIGNIFICANT SPILLS AND LEAKS ette no beteolbri se) (se indicated on site (se indicated on eite years prior to the effective date of the permit. Location Location Location de E E E Ē Lesk Leak Leak Spil Spill Spill (month/day/year) (month/day/year) (month/dey/yeer) 1st Year Prior 2nd Year Prior 3rd Year Prior Date 1 911

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- 4. . .

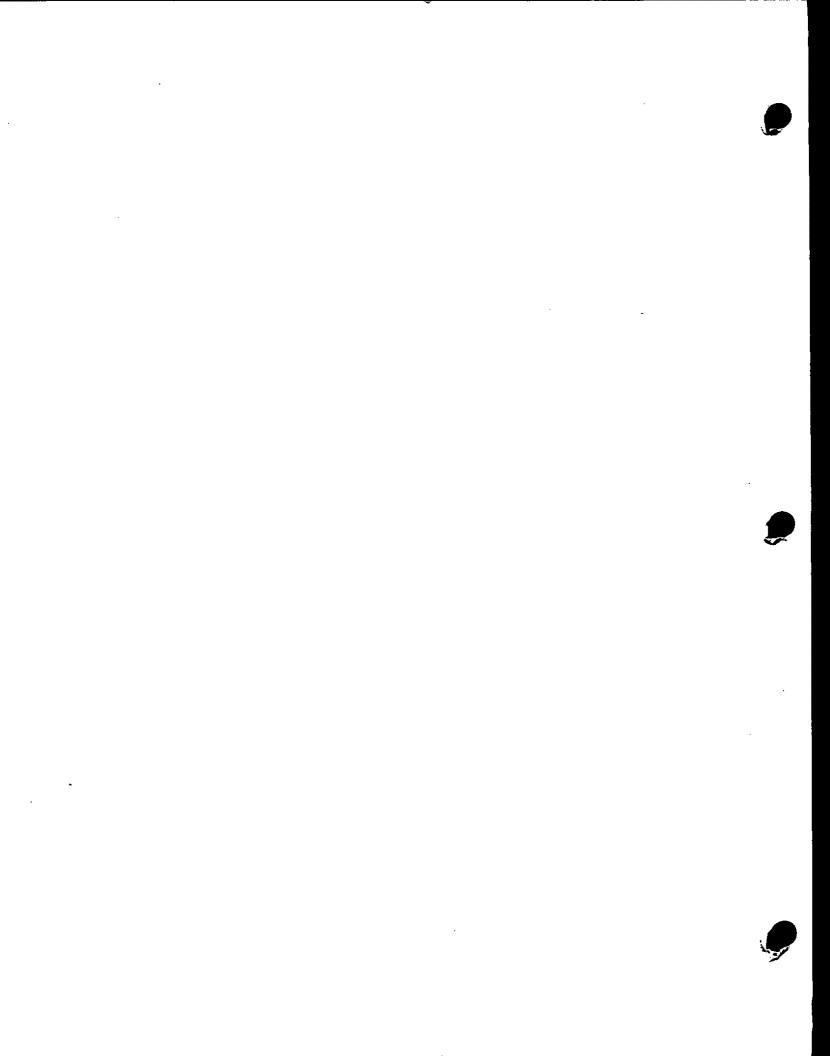
ASSESSMENT AND CERTIFICATION  ASSESSMENT AND CERTIFICATION  Outfall Directly  Date of Observed During the Test or Evaluate the site map)  Evaluation the site map)  Date of Observed During the Test or Evaluate the site map)  Less or Test (dentify as indicated on Test or Evaluate the site map)  Discharge				
Outfall Directly Observed During the Test (identify as indicated the site map)		Worksheet #5 Completed by: Title: Date:		
(responsible cornorate of		Describe Results from Test for the Presence of Non-Storm Water Discharge	Identify Potential	Name of Person Who Conducted the Test or
(responsible cornorate of				Evaluation
(responsible cornorate of				
(responsible compare of				
l. (responsible compare of				
(responsible cornorate of				برج
l, (responsible compare off)				7
(responsible cornerate offi		CERTIFICATION		·
prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel property information submitted. Based on my inquiry of the person or persons who manage the system or those persons directly respect the information, the information submitting false information, the information is an expected in the best of my knowledge and belief, true, accurate, and complete. I am aw significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.	fresponsible corporate of rmy direction or supervision in accordance with the mitted. Based on my inquiry of the person or n, the information submitted is, to the best of malties for submitting false information, including	fresponsible corporate official), certify under penalty of law that this document and all attachments were vision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the inquiry of the person or persons who manage the system or those persons directly responsible for gathering ritted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are ise information, including the possibility of fine and imprisonment for knowing violations.	v that this document and all a t qualified personnel properly or those persons directly respurate, and complete. I am averant for knowing violations	ittachments were gather and evaluate the ponsible for gathering ware that there are
A. Name & Official Title (type or print)	fficial Title (type or print)		B. Area Code and Telephone No.	No.
C. Signature			D. Date Signed	

# Directions: If you cannot feasibly test or evaluate an outfall, fill in the table below with the appropriate information and sign this form to certify the List all outfalls not tested or evaluated, describe any potential sources of non-storm water pollution from listed outfalls, and state the reasonfs) why I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to ensure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the Important Notice: A copy of this notification must be signed and submitted to the Director within 180 days of the effective date of this permit. Description of Potential Sources of Nonwho manage the system or those persons directly responsible for gathering the information, the information submitted is, to the best of my possibility of fine and imprisonment for knowing violations, and that such notification has been made to the Director within 180 days of Storm Water Pollution B. Area Code and Telephone No. Completed by: Worksheet #6 D. Date Signed Title: Date: certification is not possible. Use the key from your site map to identify each outfall. CERTIFICATION NON-STORM WATER DISCHARGE ASSESSMENT AND **Description of Why Certification** FAILURE TO CERTIFY NOTIFICATION Is infeasible (date permit was issued), the effective date of this permit. A. Name & Official Title (type or print) accuracy of the included information. Identify Outfall Not Tested/Evaluated C. Signature

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# Exercise I

Identifying Permit Requirements for Industrial Facilities



### Exercise 1: Identifying Permit Requirements for Industrial Facilities

For this exercise, you are going to step into the role of a storm water coordinator for an EPA NPDES permitting authority. As the storm water coordinator, it is your job to field questions about the NPDES industrial storm water program from industrial facilities in your region. All the following questions are from facilities located where EPA is the permitting authority.

Today is your first day on the job as storm water coordinator, and you receive several phone calls from industrial facilities. They want to know 1) if they are required to get a storm water permit under Federal storm water regulations; and 2) what permit requirements they are subject to under the MSGP.

For each call, answer the following questions to determine your response to the caller's question.

- 1. Does the facility have a storm water discharge to Waters of the U.S. or an MS4?
- 2. Is the industrial activity described in the regulations? (See "Who is subject to Phase I of the NPDES Storm Water Program and needs a permit?")
  - If yes, under what category?
- Is the facility covered under ISTEA?
  - Is the facility owned and operated by a municipality with a population of less than 100,000?
  - Is the facility a steam-generating electric plant, airport, or uncontrolled sanitary landfill?
- 4. Does the facility qualify for a conditional exemption based on "no exposure"? (See No Exposure Certification)
- 5. What must the facility do to comply with the industrial storm water regulations?
- 6. If this facility applies for storm water permit coverage under the modified MSGP, what is its sector? (See Table 1-1 of the proposed MSGP)

### CALLER ONE

Hello? I have a question about industrial storm water permits. I operate a Moose Burgers R Us, a fast food restaurant, in Maine. The storm water that leaves my parking lot runs into the storm drains near my restaurant. Do the storm water regulations affect me?

### **CALLER TWO**

Hi. My name is Dee Dee Tea and I own an insecticide manufacturing plant in the District of Columbia. I am in charge of complying with environmental regulations for the plant. Fortunately for me, we aren't subject to storm water effluent guidelines, new source performance standards, or toxic pollutant standards. But, I just heard about these storm water regulations. Even though the storm water that leaves my property drains into the storm drains, I don't think that these regulations would apply to my plant because we do everything indoors. And I mean everything – from the outside of our building you would have no idea of what takes place indoors. Am I right that we don't have to do anything?

### **CALLER THREE**

Hi there. I just read about some kind of storm water permit in a newsletter that I receive from my trade association. I operate an active 4-acre municipally-owned landfill in Idaho. We are in a really remote area of Idaho Falls, population 56,356. We are nowhere near the historical Barnum House or the historical bridge. We receive wastes from households, restaurants, commercial facilities, and some small industries such as a local furniture manufacturer. The leachate from the landfill is treated under our pretreatment program, and goes to the local POTW. We have runon and runoff controls that meet the RCRA subtitle D requirements. Do I need a storm water permit, and if I do, what are my permit requirements?

### **CALLER FOUR**

Hello. I want to find out what I need to do about the storm water that runs off my property and into a local river. I own Hunk O'Junk scrap yard in Albuquerque, New Mexico. We accept all types of scrap material, including plastics, rubber, iron, and rags. We sort them and distribute them. In addition to our scrap business, we also manufacture recycled garden hoses out of the rubber and plastics we reclaim. But most of our money comes from junk collecting, sorting, and distributing to other manufacturers. Portions of both businesses take place outdoors, and I am worried about the storm water that washes over the scrap materials and our hose manufacturing operation into the nearby ditches. I need a permit, right? What else do I need to know?

# Who is subject to Phase I the NPDES Storm Water Program and needs a permit?

The term "Storm Water Discharges Associated with Industrial Activity," defined in federal regulations 40 CFR 122.26(b)(14)(i)-(xi), determined which industrial facilities e potentially subject to Phase I of the storm water ogram. If you are subject to the program you need to apply for a permit. The definition uses either SIC (Standard Industrial Classification) codes or narrative descriptions to characterize the activities. You are responsible for identifying your facility's SIC code. The definition's 11 categories ((i)- (xi)) are listed below. You should review these 11 categories and decide if your type of facility is described by any of them (either by SIC code or by narrative descriptions). Please note that categories iii, viii, and xi have special conditions, or exceptions (described below) which may make a facility NOT subject to the program, and therefore not required to apply, even though the facility's activity matches one of the SIC codes.

### Category (i)

Facilities subject to storm water effluent limitations guideline, new source performance standards, or toxic pollutant effluent standards under 40 CFR subchapter N (except facilities with toxic pollutant effluent standards which are exempted under category (xi)). These types of facilities include the following:

- 40 CFR Subchapter N
- 405 Dairy products processing
- 406 Grain mills
- 407 Canned & preserved fruits & veg. processing
- 408 Canned & preserved seafood processing
- 409 Beet, crystalline & liquid cane sugar refining
- 410 Textile mills
- 411 Cement manufacturing 412 Feedlots
- 414 Organic Chemicals plastics and synthetic fibers
- 415 Inorganic chemical manufacturing
- 417 Soap and detergent manufacturing
- 418 Fertilizer manufacturing
- 419 Petroleum refining
- 420 Iron and steel manufacturing
- 21 Nonferrous metal manufacturing
- 2 Phosphate manufacturing
- 23 Steam electric power
- 424 Ferroallay manufacturing
- 425 Leather taming and finishing
- 426 Glass manufacturing \*
- 427 Asbestos manufacturing
- 428 Rubber manufacturing
- 429 Timber products processing
- 430 Pulp, paper, and paperboard
- 431 Builder's paper and board mills
- 432 Meat products
- 433 Metal finishing
- 434 Coal Mining
- 436 Mineral mining & processing
- 439 Pharmaceutical manufacturing
- 440 Ore mining & dressing
- 443 Paving and roofing materials
- 446 Paint formulating
- 447 Ink formulating
- 455 Pesticide Chemicals
- 458 Carbon Black manufacturing
- 461 Battery manufacturing
- 463 Plastics molding and forming
- 464 Metal molding and casting
- 465 Coil coating
- 466 Porcelain enameling
- 467 Aluminum forming
- 468 Copper forming \*
- 469 Electrical & electronic component
- 471 Nonferrous metal forming & powders some facilities in group do not have limits or standards, see 40 CFR subchapter N to verify.

### Category (ii)

Facilities classified by the following SIC codes: SIC Code

- lumber and wood products (except 2434 wood kitchen binets, see (xi))
- 26 paper & allied products (except 265 paperboard containers, 267 converted paper, see (xi))
- 28 chemicals & allied products (except 283 drugs, see (xi))
- 29 petroleum & coal products
- 311 leather tanning & finishing

- 32 stone, clay & glass production (except
- 323 products of purchased glass, see (xi))
- 33 primary metal industry
- 3441 fabricated structural metal
- 373 ship and boat building and repair

### Category (iii) Mineral Industry

Facilities classified as SIC codes 10-14 including active or inactive mining operations (except for areas of coal mining operations no longer meeting the definition of a reclamation area under 40 CFR 434.11 (1) because the performance bond issued to the facility by the appropriate SMCRA authority has been released, or areas of non-coal mining operations which have been released from applicable State or Federal reclamation requirements after December 17, 1990), and oil and gas exploration, production, processing, or treatment operations, or transmission facilities that discharge storm water contaminated by contact with or that has come into contact with I any overburden, raw material, intermediate products, finished products, byproducts or waste products located on the site of such operations (inactive mining operations are mining sites that are not being actively mined, but which have an identifiable owner/operator; inactive mining sites do not include sites where mining claims are being maintained prior to disturbances associated with the extraction, benefication, or processing of mined materials, nor sites where minimal activities are undertaken for the sole purpose of maintaining a mining claim).

### SIC Code

- 10 metal mining (metallic mineral/ores)
- 12 coal mining
- 13 oil and gas extraction
- 14 non-metallic minerals except fuels

Oil and gas operations that discharge contaminated storm water at any time between November 16,1987 and October 1, 1992, and that are currently not authorized by an NPDES permit, must apply for a permit. Operators of oil and gas exploration, production, processing, or treatment operations or transmission facilities, that are not required to submit a permit application as of October 1, 1992 in accordance with 40 CFR 122.26(c)(1)(iii), but that after October 1, 1992 have a discharge of a reportable quantity of oil or a hazardous substance (in a storm water discharge) for which notification is required pursuant to either 40 CFR 110.6, 117.21, or-302.6, must apply for a permit.

### Category (iv) Hazardous Waste

Hazardous waste treatment, storage, or disposal facilities including those that are operating under interim status or a permit under Subtitle C of RCRA.

### Category (v) Landfills

Landfills, land application sites, and open dumps that receive or have received any industrial waste (waste that is received from any of the facilities described under categories (i) - (xi)) including those that are subject to regulations under Subritle D of RCRA.

### Category (vi)

Facilities involved in the recycling of materials, including metal scrap yards, battery reclaimers, salvage yards, and automobile junkyards, including but limited to those classified as SIC 5015 (used motor vehicle parts) and 5093 (scrap and waste materials).

### Category (vii) Steam Electric Plants

Steam electric power generating facilities, including coal handling sites.

### Category (viii) Transportation

Transportation facilities classified by the SIC codes listed below which have vehicle maintenance shops, equipment cleaning operations, or airport deicing operations. Only those portions of the facility that are either involved in vehicle maintenance (including vehicle rehabilitation, mechanical repairs, painting, fueling, and lubrication), equipment cleaning operations, airport deicing operations, or which are otherwise identified under categories (i)-(vii) or (ix)-(xi) are associated with industrial activity, and need permit coverage.

### SIC Code

- 40 railroad transportation
- 41 local and interurban passenger transit
- 42 trucking & warehousing (except 4221-25, see (xi))

- 43 US postal service
- 44 water transportation
- 45 transportation by air
- 5171 petroleum bulk stations and terminals

### Category (ix) Treatment Works

Treatment works treating domestic sewage or any other sewage sludge or wastewater treatment device or system, used in the storage, treatment recycling, and reclamation of municipal or domestic sewage, including land dedicated to the disposal of sewage sludge that are located within the confines of the facility, with a design flow of 1.0 mgd or more, or required to have an approved pretreatment program under 40 CFR 403. Not included are farm lands, domestic gardens or lands used for sludge management where sludge is beneficially reused and which are not physically located in the confines of the facility, or areas that are in compliance with section 405 of the Clean Water Act.

### Category (x) Construction

Construction activity including clearing, grading and excavation activities except: operations that result in the disturbance of less than 5 acres of total land area which are not part of a larger common plan of development or sale.

[The construction "operator" must apply for permit coverage under the General Storm Water Permit for Construction Activities. The "operator" is the party or parties that either individually or taken together meet either of the following two criteria: 1) they have operational control over the site specification; 2) they have the day-to-day operational control of those activities at the site necessary to ensure compliance. For a typical commercial construction site, the owner and general contractor must both apply. For a typical residential development, the developer and all builders must apply. Each builder must apply even if they individually disturb less than 5 acres if the overall development is 5 or more acres. Only one Pollution Prevention Plan is required per site even though there may be multiple parties.]

### Category (xi) Light industry

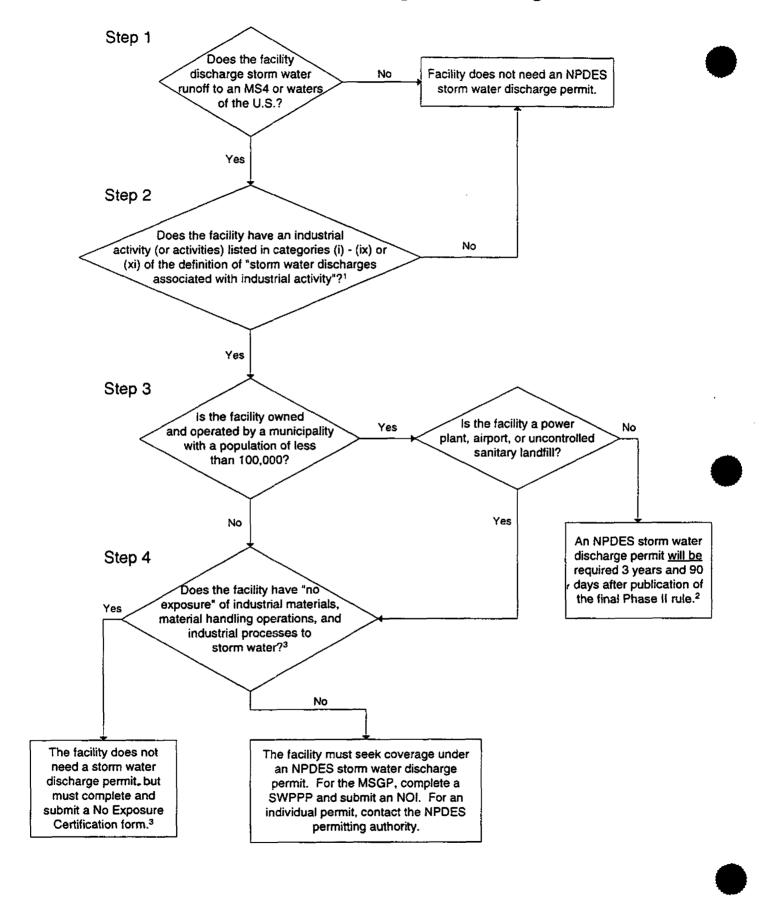
Facilities classified by the following SIC codes:

### SIC Code

- 20 food and kindred product
- 21 tobacco products
- 22 textile mill products
- 23 apparel and other textile product
- 2434 wood kitchen cabinets
- 25 furniture and fixtures
- 265 paperboard containers and boxes
- 267 miscellaneous converted paper products
- 27 printing and publishing
- 283 drugs
- 285 paints and allied products
- 30 rubber and miscellaneous plastic
- 31 leather and products (except 311)
- 323 products of purchased glass
- 34 fabricated metal products (except 3441) 35 industrial machinery and equipment
- 36 electronic and other electric equipment
- 37 transportation equipment (except 373)38 instruments and related products
- 39 miscellaneous manufacturing
- 4221 farm product storage
- 4222 refrigerated storage
- 4225 general warehouse and storage

(and which are not otherwise included in categories (ii) (x)) with storm water discharges from all areas (except access roads and rail lines) where material handling equipment or activities, raw materials, immediate products, final products, waste materials, by-products, or industrial machinery are exposed to storm water. Material handling activities include the storage, loading and unloading, transportation, or conveyance of any raw material, intermediate produce, finished product, by-product, or waste product.

### Industrial Facilities Storm Water Program Permitting Decision Tree



<sup>1.</sup> See 40 CFR 122.26(b)(14).

<sup>2.</sup> See 122.26(e)(1)(ii). A permit is required unless there is a condition of no exposure as defined at 122.26(g).

<sup>3.</sup> See 122.26(g) for the definition of "no exposure" and the certification requirements.

NPDES FORM 510-11



### United States Environmental Protection Agency Washington, DC 20460

Form Approved OMB No. 2040-0211

# NO EXPOSURE CERTIFICATION for Exclusion from NPDES Storm Water Permitting

Submission of this No Exposure Certification constitutes notice that the entity identified in Section A does not require permit authorization for its storm water discharges associated with industrial activity in the State identified in Section B under EPA's Storm Water Multi-Sector General Permit due to the existence of a condition of no exposure.

A condition of no exposure exists at an industrial facility when all industrial materials and activities are protected by a storm resistant shelter to prevent exposure to rain, snow, snowmelt, and/or runoff. Industrial materials or activities include, but are not limited to, material handling equipment or activities, industrial machinery, raw materials, intermediate products, by-products, final products, or waste products. Material handling activities include the storage, loading and unloading, transportation, or conveyance of any raw material, intermediate product, final product or waste product. A storm resistant shelter is not required for the following industrial materials and activities:

- drums, barrels, tanks, and similar containers that are tightly sealed, provided those containers are not deteriorated and do not leak. "Sealed" means banded or otherwise secured and without operational taps or valves;
- adequately maintained vehicles used in material handling; and
- final products, other than products that would be mobilized in storm water discharges (e.g., rock sait).

A No Exposure Certification must be provided for each facility qualifying for the no exposure exclusion. In addition, the exclusion from NPDES permitting is available on a facility-wide basis only, not for individual outfalls. If any industrial activities or materials are or will be exposed to precipitation, the facility is not eligible for the no exposure exclusion.

By signing and submitting this No Exposure Certification form, the entity in Section A is certifying that a condition of no exposure exists at its facility or site, and is obligated to comply with the terms and conditions of 40 CFR 122.26(g).

ALL INFORMATION MUST BE PROVIDED ON THIS FORM.

Detailed instructions for completing this form and obtaining the no exposure exclusion are provided on pages 3 and 4.

A. Facility Operator Information
1. Name: [
3. Mailing Address: a. Street:
b. City;
B. Facility/Site Location Information
1. Facility Name:
2. a. Street Address:
b. City: [
d. State:       e. Zip Code:
3. Is the facility located on Indian Lands? Yes No No
4. Is this a Federal facility? Yes No No
5. a. Latitude: LII°LII°LII" b. Longitude: LII°LII"
6. a. Was the facility or site previously covered under an NPDES storm water permit?  Yes  No
b. If yes, enter NPDES permit number:
7. SIC/Activity Codes: Primary:           Secondary (if applicable):
8. Total size of site associated with industrial activity: acres
9. a. Have you paved or roofed over a formerly exposed, pervious area in order to qualify for the no exposure exclusion? Yes 🗌 No 🗍
b. If yes, please indicate approximately how much area was paved or roofed over. Completing this question does not disqualify you for the no exposure exclusion. However, your permitting authority may use this information in considering whether storm water discharges from your site are likely to have an adverse impact on water quality, in which case you could be required to obtain permit coverage.
Less than one acre  One to five acres  More than five acres

NPDES FORM 3510-11



# NO EXPOSURE CERTIFICATION for Exclusion from NPDES Storm Water Permitting

Form Approved OMB No. 2040-0211

Ç.	Exp	posure Checklist		
	(Ple	e any of the following materials or activities exposed to precipitation, now or in the foreseeable future? ease check either "Yes" or "No" in the appropriate box.) If you answer "Yes" to any of these questions through (11), you are <u>not</u> eligible for the no exposure exclusion.	Yes	No
	1	Using, storing or cleaning industrial machinery or equipment, and areas where residuals from using, storing	[T]	
	١.	or cleaning industrial machinery or equipment remain and are exposed to storm water		<u></u>
	2.	Materials or residuals on the ground or in storm water inlets from spills/leaks		
	3.	Materials or products from past industrial activity		
	4.	Material handling equipment (except adequately maintained vehicles)		
	5.	Materials or products during loading/unloading or transporting activities		
	6.	Materials or products stored outdoors (except final products intended for outside use [e.g., new cars] where exposure to storm water does not result in the discharge of pollutants)		
	7.	Materials contained in open, deteriorated or leaking storage drums, barrels, tanks, and similar containers		
	8.	Materials or products handled/stored on roads or railways owned or maintained by the discharger		
	9.	Waste material (except waste in covered, non-leaking containers [e.g., dumpsters])		
	10.	Application or disposal of process wastewater (unless otherwise permitted)		
		Particulate matter or visible deposits of residuals from roof stacks and/or vents not otherwise regulated (i.e., under an air quality control permit) and evident in the storm water outflow		
).		tification Statement		
		rtify under penalty of law that I have read and understand the eligibility requirements for claiming a condition of "no ex lusion from NPDES storm water permitting.	xposure" and	I obtaining an
		rtify under penalty of law that there are no discharges of storm water contaminated by exposure to industrial activities or n lity or site identified in this document (except as allowed under 40 CFR 122.26(g)(2)).	naterials from	the industrial
	the allow	derstand that I am obligated to submit a no exposure certification form once every five years to the NPDES permitting aut operator of the local municipal separate storm sewer system (MS4) into which the facility discharges (where applicable) we the NPDES permitting authority, or MS4 operator where the discharge is into the local MS4, to perform inspections to obsure and to make such inspection reports publicly available upon request. I understand that I must obtain coverage unonly point source discharge of storm water from the facility.	). I understa confirm the c	and that I must condition of no
	syst pers knov	litionally, I certify under penalty of law that this document and all attachments were prepared under my direction or supervitem designed to assure that qualified personnel properly gathered and evaluated the information submitted. Based on resons who manage the system, or those persons directly responsible for gathering the information, the information subwildedge and belief true, accurate and complete. I am aware that there are significant penalties for submitting false informatione and imprisonment for knowing violations.	ny inquiry of mitted is to t	the person or the best of my
	Prin	nt Name: [		
	Prin	rt Title:		
	Sigr	nature:		
	Date	e:		

# Instructions for the NO EXPOSURE CERTIFICATION for Exclusion from NPDES Storm Water Permitting

Form Approved OMB No. 2040-0211

### Vho May File a No Exposure Certification

Federal law at 40 CFR Part 122.26 prohibits point source discharges of storm water associated with industrial activity to waters of the U.S. without a National Pollutant Discharge Elimination System (NPDES) permit. However, NPDES permit coverage is not required for discharges of storm water associated with industrial activities identified at 40 CFR 122.26(b)(14)(i)-(ix) and (xi) if the discharger can certify that a condition of "no exposure" exists at the industrial facility or site.

Storm water discharges from construction activities identified in 40 CFR 122.26(b)(14)(x) and (b)(15) are not eligible for the no exposure exclusion.

### Obtaining and Maintaining the No Exposure Exclusion

This form is used to certify that a condition of no exposure exists at the industrial facility or site described herein. This certification is only applicable in jurisdictions where EPA is the NPDES permitting authority and must be re-submitted at least once every five years.

The industrial facility operator must maintain a condition of no exposure at its facility or site in order for the no exposure exclusion to remain applicable. If conditions change resulting in the exposure of materials and activities to storm water, the facility operator must obtain coverage under an NPDES storm water permit immediately.

### Where to File the No Exposure Certification Form

Mail the completed no exposure certification form to:

Storm Water No Exposure Certification (4203) USEPA 401 M Street, SW Washington, D.C. 20460

### Completing the Form

You <u>must</u> type or print, using uppercase letters, in appropriate areas only. Enter only one character per space (i.e., between the marks). Abbreviate if necessary to stay within the number of characters allowed for each item. Use one space for breaks between words. One form must be completed for each facility or site for which you are seeking to certify a condition of no exposure. Additional guidance on completing this form can be accessed through EPA's web site at www.epa.gov/owm/sw. Please make sure you have addressed all applicable questions and have made a photocopy for your records before sending the completed form to the above address.

### Section A. Facility Operator Information

- Provide the legal name of the person, firm, public organization, or any other entity that operates the facility or site described in this certification. The name of the operator may or may not be the same as the name of the facility. The operator is the legal entity that controls the facility's operation, rather than the plant or site manager.
- 2. Provide the telephone number of the facility operator.
- Provide the mailing address of the operator (P.O. Box numbers may be used). Include the city, state, and zip code. All correspondence will be sent to this address.

### Section B. Facility/Site Location Information

- 1. Enter the official or legal name of the facility or site.
- Enter the complete street address (if no street address exists, provide a geographic description [e.g., Intersection of Routes 9 and 55]), city, county, state, and zip code. Do not use a P.O. Box number.
- 3. Indicate whether the facility is located on Indian Lands.
- Indicate whether the industrial facility is operated by a department or agency of the Federal Government (see also Section 313 of the Clean Water Act).
- 5. Enter the latitude and longitude of the approximate center of the facility or site in degrees/minutes/seconds. Latitude and longitude can be obtained from United States Geological Survey (USGS) quadrangle or topographic maps, by calling 1-(888) ASK-USGS, or by accessing EPA's web site at <a href="http://www.epa.gov/owm/sw/industry/index.htm">http://www.epa.gov/owm/sw/industry/index.htm</a> and selecting Latitude and Longitude Finders under the Resources/Permit section.

Latitude and longitude for a facility in decimal form must be converted to degrees (°), minutes ('), and seconds (") for proper entry on the certification form. To convert decimal latitude or longitude to degrees/minutes/seconds, follow the steps in the following example.

Example: Convert decimal latitude 45.1234567 to degrees (°), minutes ('), and seconds (\*').

- a) The numbers to the left of the decimal point are the degrees: 45°.
- b) To obtain minutes, multiply the first four numbers to the right of the decimal point by 0.006: 1234 x 0.006 = 7.404.
- c) The numbers to the left of the decimal point in the result obtained in (b) are the minutes: 7'.
- d) To obtain seconds, multiply the remaining three numbers to the right of the decimal from the result obtained in (b) by 0.06: 404 x 0.06 = 24.24. Since the numbers to the right of the decimal point are not used, the result is 24".
- e) The conversion for 45.1234567 = 45° 7' 24".
- Indicate whether the facility was previously covered under an NPDES storm water permit. If so, include the permit number.
- Enter the 4-digit SIC code which identifies the facility's primary activity, and second 4-digit SIC code identifying the facility's secondary activity, if applicable. SIC codes can be obtained from the <u>Standard Industrial</u> Classification Manual, 1987.
- Enter the total size of the site associated with industrial activity in acres.
   Acreage may be determined by dividing square footage by 43,560, as demonstrated in the following example.

Example: Convert 54,450 ft<sup>2</sup> to acres

Divide  $54,450 \text{ ft}^2$  by  $43,560 \text{ square feet per acre:} 54,450 \text{ ft}^2 + 43,560 \text{ ft}^2/\text{acre} = 1.25 \text{ acres.}$ 

9. Check "Yes" or "No" as appropriate to indicate whether you have paved or roofed over a formerly exposed, pervious area (i.e., lawn, meadow, dirt or gravel road/parking lot) in order to qualify for no exposure. If yes, also indicate approximately how much area was paved or roofed over and is now impervious area. NPDES FORM 3510-11

**\$EPA** 

# Instructions for the NO EXPOSURE CERTIFICATION for Exclusion from NPDES Storm Water Permitting

Form Approved OM8 No. 2040-0211

### Section C. Exposure Checklist

Check "Yes" or "No" as appropriate to describe the exposure conditions at your facility. If you answer "Yes" to ANY of the questions (1) through (11) in this section, a potential for exposure exists at your site and you cannot certify to a condition of no exposure. You must obtain (or already have) coverage under an NPDES storm water permit. After obtaining permit coverage, you can institute modifications to eliminate the potential for a discharge of storm water exposed to industrial activity, and then certify to a condition of no exposure.

### Section D. Certification Statement

Federal statutes provide for severe penalties for submitting false information on this application form. Federal regulations require this application to be signed as follows:

For a corporation: by a responsible corporate officer, which means:

- (i) president, secretary, treasurer, or vice-president of the corporation in charge of a principal business function, or any other person who performs similar policy or decision making functions for the corporation, or
- (ii) the manager of one or more manufacturing, production, or operating facilities, provided the manager is authorized to make management decisions which govern the operation of the regulated facility including having the explicit or implicit duty of making major capital investment recommendations, and initiating and directing other comprehensive measures to assure long term environmental compliance with environmental laws and regulations; the manager can ensure that the necessary systems are established or actions taken to gather complete and accurate information for permit application requirements; and where

authority to sign documents has been assigned or delegate the manager in accordance with corporate procedures;

For a partnership or sole proprietorship: by a general partner or the proprietor; or

For a municipal, State, Federal, or other public facility: by either a principal executive or ranking elected official.

### **Paperwork Reduction Act Notice**

Public reporting burden for this certification is estimated to average 1.0 hour per certification, including time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Burden means the total time, effort, or financial resources expended by persons to generate, maintain, retain, or disclose to provide information to or for a Federal agency. This includes the time needed to review instructions; develop, acquire, install, and utilize technology and systems for the purposes of collecting, validating, and verifying information, processing and maintaining information, and disclosing and providing information; adjust the existing ways to comply with any previously applicable instructions and requirements; train personnel to be able to respond to a collection of information; search data sources; complete and review the collection of information; and transmit or otherwise disclose the information. An agency may not conduct or sponsor, and a person is not required to respond to, a collection of information unless it displays a currently valid OMB control number. Send comments regarding the burden estimate, any other aspect of the collection of information, or suggestions for improving this form, including any suggestions which may increase or reduce this burden to: Director, OPPE Regulatory Information Division (2137), USEPA, 401 M Street, SW, Washington, D.C. 20462 Include the OMB control number of this form on any correspondence. not send the completed No Exposure Certification form to this address

EPA Form 3510-11 (10-99)

Page 4 of 4

Permit No.	Areas of Coverage/Where EPA is Permitting Authority
JAR05*### MWR05*### NIR05*### NVR05*##1	Johnston Atoll.  Midway Island and Wake Island.  Commonwealth of the Northern Mariana Islands.  Indian Country lands within the State of Nevada, including the Duck Valley Reservation in Idaho, the Fort McDermitt Reservation in Oregon and the Goshute Reservation in Utah.

1.1.10 Region 10: AK, ID (Except See Region 9 for Duck Valley Reservation Lands), OR (Except See Region 9 for Fort McDermitt Reservation), WA

The states of Oregon and Washington are the NPDES Permitting Authority for the majority of discharges within their respective states.

Permit No.	Areas of Coverage/Where EPA is Permitting Authority
AKR05*###	The State of Alaska, except Indian Country lands.
AKR05*##!	Indian Country lands within Alaska.
IDR05*###	The State of Idaho, except Indian Country lands.
IDR05*##I	Indian Country lands within the State of Idaho, except Duck Valley Reservation lands which are covered under Nevada permit NVR05*##I listed in Part 1.1.9.
ORR05*##I	Indian Country lands within the State of Oregon except Fort McDermitt Reservation lands that are covered under Nevada permit NVR10*#I listed in Part 1.1.9.
WAR05*##I	Indian Country lands within the State of Washington.
WAR05*##F	Federal Facilities in the State of Washington, except those located on Indian Country lands.

### 1.2 Eligibility

You must maintain permit eligibility to discharge under this permit. Any discharges that are not compliant with the eligibility conditions of this permit are not authorized by the permit and you must either apply for a separate permit to cover those ineligible discharges or take necessary steps to make the discharges eligible for coverage.

### 1.2.1 Facilities Covered

Your permit eligibility is limited to discharges from facilities in the "sectors" of

industrial activity based on Standard Industrial Classification (SIC) codes and Industrial Activity Codes summarized in Table 1–1. References to "sectors" in this permit (e.g., sector-specific monitoring requirements, etc.) refer to these sectors.

TABLE 1-1.—SECTORS OF INDUSTRIAL ACTIVITY COVERED BY THIS PERMIT

SIC Code or activity code 1	Activity represented
	Sector A: Timber Products
2411	ditives are used in the spray water or applied to the logs).  General Sawmills and Planning Mills.  Hardwood Dimension and Flooring Mills.  Special Product Sawmills, Not Elsewhere Classified.  Millwork, Veneer, Plywood, and Structural Wood (see Sector W).  Wood Containers.  Wood Buildings and Mobile Homes.  Wood Preserving.  Reconstituted Wood Products.
Se	ector B: Paper and Allied Products
2611	Paper Mills. Paperboard Mills. Paperboard Containers and Boxes.
Sec	tor C: Chemical and Allied Products
2812–2819 2821–2824 2833–2836 2841–2844	<ul> <li>Plastics Materials and Synthetic Resins, Synthetic Rubber, Cellulosic and Other Manmade Fibers Except Glass.</li> <li>Medicinal chemicals and botanical products; pharmaceutical preparations,; in vitro and in vivo diagnostic substances; biological products, except diagnostic substances.</li> </ul>
2851 2861–2869 2873–2879	Paints, Varnishes, Lacquers, Enamels, and Allied Products. Industrial Organic Chemicals.

SIC Code or activity code 1	Activity represented
2873	Miscellaneous Chemical Products.
Sector D: Asp	halt Paving and Roofing Materials and Lubricants
2951, 2952 2992, 2999	
Sector E: Glas	s Clay, Cement, Concrete, and Gypsum Products
3211 3221, 3229 3231 3241 3251–3259 3262–3269 3271–3275 3295	Glass and Glassware, Pressed or Blown. Glass Products Made of Purchased Glass. Hydraulic Cement. Structural Clay Products. Pottery and Related Products. Concrete, Gypsum and Plaster Products. Minerals and Earth's, Ground, or Otherwise Treated.
	Sector F: Primary Metals
3312–3317	Iron and Steel Foundries. Primary Smelting and Refining of Nonferrous Metals. Secondary Smelting and Refining of Nonferrous Metals. Rolling, Drawing, and Extruding of Nonferrous Metals. Nonferrous Foundries (Castings).
Sector	G: Metal Mining (Ore Mining and Dressing)
1011	Copper Ores. Lead and Zinc Ores. Gold and Silver Ores. Ferroalloy Ores, Except Vanadium. Metal Mining Services.
Sector H:	Coal Mines and Coal Mining Related Facilities
1221–1241	Coal Mines and Coal Mining-Related Facilities.
18. 10	Sector I: Oil and Gas Extraction
1311 1321 1381–1389 2911	Natural Gas Liquids Oil and Gas Field Services.
S	ector J: Mineral Mining and Dressing
1411 1422–1429 1442,1446 1455,1459 1474–1479 1481	Crushed and Broken Stone, Including Rip Rap. Sand and Gravel. Clay, Ceramic, and Refractory Materials. Chemical and Fertilizer Mineral Mining. Nonmetallic Minerals Services, Except Fuels.
Sector K: Hazard	ous Waste Treatment, Storage, or Disposal Facilities
HZ	Hazardous Waste Treatment Storage or Disposal.
Secto	r L: Landfills and Land Application Sites
LF	Landfills, Land Application Sites, and Open Dumps.

### TABLE 1-1.—SECTORS OF INDUSTRIAL ACTIVITY COVERED BY THIS PERMIT—Continued

SIC Code or activity code <sup>1</sup>	Activity represented			
Sec	ctor M: Automobile Salvage Yards			
5015	Automobile Salvage Yards.			
Sector N: Scrap Recycling Facilities				
5093	Scrap Recycling Facilities.			
Sector (	D: Steam Electric Generating Facilities			
SE	Steam Electric Generating Facilities.			
Sector P:	Land Transportation and Warehousing			
4011, 4013	Railroad Transportation.  Local and Highway Passenger Transportation.  Motor Freight Transportation and Warehousing.			
4311 5171	United States Postal Service. Petroleum Bulk Stations and Terminals.			
	Sector Q: Water Transportation			
4412–4499	Water Transportation.			
Sector R: S	hip and Boat Building or Repairing Yards			
3731, 3732	Ship and Boat Building or Repairing Yards.			
	Sector S: Alr Transportation			
4512-4581	Air Transportation Facilities.			
	Sector T: Treatment Works			
TW	Treatment Works.			
Sector U: Food and Kindred Products  2011–2015				
2011–2015	Meat Products. Dairy Products.			
2032	Canned, Frozen and Preserved Fruits, Vegetables and Food Specialties.			
2041–2048	Grain Mill Products.			
2061–2068	Bakery Products. Sugar and Confectionery Products.			
2074–2079	Fats and Oils.			
2082–2087	Beverages.			
2091–2099	Miscellaneous Food Preparations and Kindred Products.			
2111–2141	Tobacco Products.			
Sector V: Textile Mills, Apparel, and Other Fabric Product Manufacturing, Leather and Leather Products				
2211–2299	Textile Mill Products.			
2311–2399 3131–3199 (except 3111)	Apparel and Other Finished Products Made From Fabrics and Similar Materials.  Leather and Leather Products, except Leather Tanning and Finishing (see Sector Z).			
s	ector W: Furniture and Fixtures			
2434	Wood Kitchen Cabinets			
2511–2599	Furniture and Fixtures.			
Se	ector X: Printing and Publishing			
2711–2796	Printing, Publishing, and Allied Industries.			
	Plastic Products, and Miscellaneous Manufacturing Industries			
3011	Tires and Inner Tubes.			
3021	Rubber and Plastics Footwear.			
3052, 3053	Gaskets, Packing, and Sealing Devices and Rubber and Plastics Hose and Belting.			
3061, 3069	Fabricated Rubber Products, Not Elsewhere Classified.			
3081-3089	Miscellaneous Plastics Products.  Musical Instruments.			
3942–3949	Dolls, Toys, Games and Sporting and Athletic Goods.			
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### TABLE 1-1.—SECTORS OF INDUSTRIAL ACTIVITY COVERED BY THIS PERMIT—Continued

SIC Code or activity code 1	Activity represented
3951-3955 (except 3952 facilities as specified in Sector C).	Pens, Pencils, and Other Artists' Materials.
3961, 3965	Costume Jewelry, Costume Novelties, Buttons, and Miscellaneous Notions, Except Precious Metal.
3991–3999	Miscellaneous Manufacturing Industries.
Secto	r Z: Leather Tanning and Finishing
3111	Leather Tanning and Finishing.
Sect	tor AA: Fabricated Metal Products
3411–3499	Fabricated Metal Products, Except Machinery and Transportation Equipment. Jewelry, Silverware, and Plated Ware.
Sector AB: Transporta	tion Equipment, Industrial or Commercial Machinery
3511-3599 (except 3571-3579)	Industrial and Commercial Machinery (except Computer and Office Equipment) (see Sector AC).
3711-3799 (except 3731, 3732)	Transportation Equipment (except Ship and Boat Building and Repairing) (see Sector R).
Sector AC: Electron	nic, Electrical, Photographic, And Optical Goods
3571–3579 3612–3699 3812	Computer and Office Equipment. Electronic, Electrical Equipment and Components, except Computer Equipment. Measuring, Analyzing and Controlling Instrument; Photographic and Optical Goods.
Sec	ctor AD: Non-Classified Facilities
N/A	Other storm water discharges designated by the Director as needing a permit (see 40 CFR 122.26(g)(1)(I)) or any facility discharging storm water associated with industrial activity not described by any of Sectors A-AC. NOTE: Facilities may not elect to be covered under Sector AD. Only the Director may assign a facility to Sector AD.

¹A complete list of SIC codes (and conversions from the newer North American Industry Classification System" (NAICS)) can be obtained from the Internet at <a href="https://www.census.gov/epcd/www/naics.htm/">www.census.gov/epcd/www/naics.htm/</a> or in paper form from various locations in the document entitled "Handbook of Standard Industrial Classifications," Office of Management and Budget, 1987. Industrial activity codes are provided on the Multi-Sector General Permit Notice of Intent (NOI) application form (EPA Form Number xxxxx).

1.2.1.1 Co-located Activities. If you have co-located industrial activities on-site that are described in a sector(s) other than your primary sector, you must comply with all other applicable sector-specific conditions found in Part 6 for the co-located industrial activities. The extra sector-specific requirements are applied only to those areas of your facility where the extra-sector activities occur. An activity at a facility is not considered co-located if the activity, when considered separately, does not meet the description of a category of industrial activity covered by the storm water regulations, and identified by the MSGP-2000 SIC code list. For example, unless you are actually hauling substantial amounts of freight or materials with your own truck fleet or are providing a trucking service to outsiders, simple maintenance of vehicles used at your facility is unlikely to meet the SIC code group 42 description of a motor freight transportation facility. Even though Sector P may not apply, the runoff from your vehicle maintenance facility would likely still be considered storm water associated with industrial activity. As

such, your SWPPP must still address the runoff from the vehicle maintenance facility—although not necessarily with the same degree of detail as required by Sector P—but you would not be required to monitor as per Sector P.

If runoff from co-located activities commingle, you must monitor the discharge as per the requirements of all applicable sectors (regardless of the actual location of the discharge). If you comply with all applicable requirements from all applicable sections of Part 6 for the co-located industrial activities, the discharges from these co-located activities are authorized by this permit.

### 1.2.2 Discharges Covered

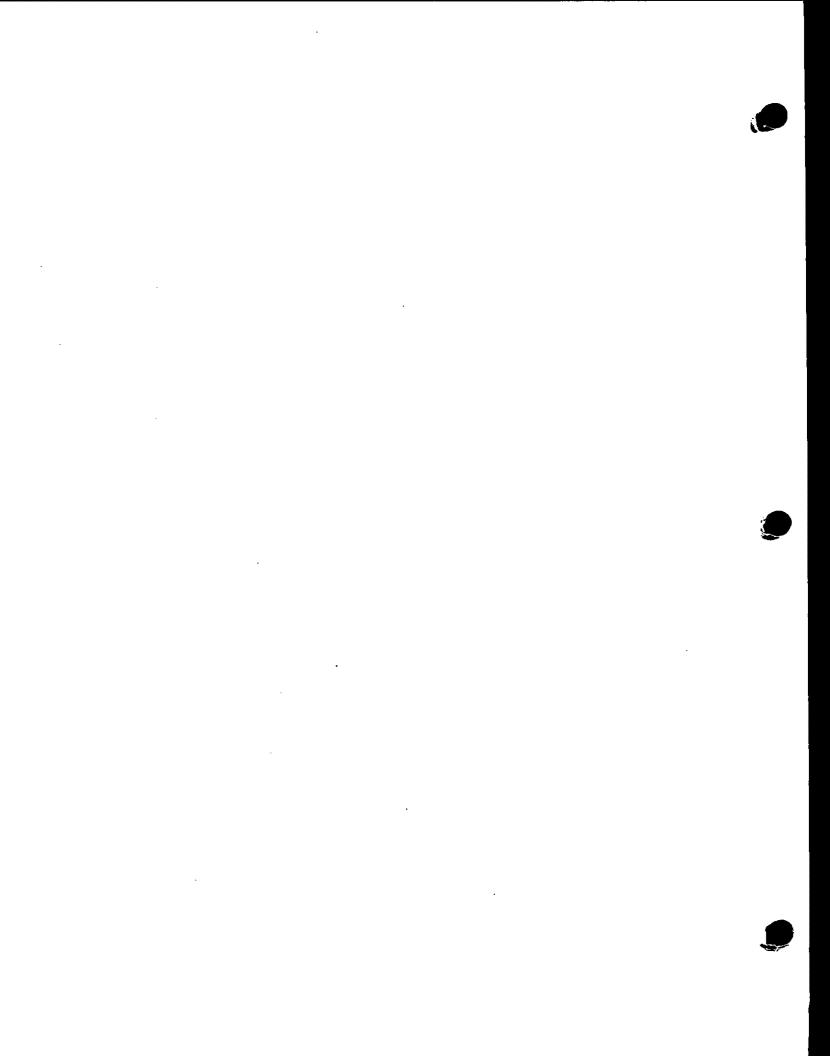
- 1.2.2.1 Allowable Storm Water Discharges. Subject to compliance with the terms and conditions of this permit, you are authorized to discharge pollutants in:
- 1.2.2.1.1 Discharges of storm water runoff associated with industrial activities as defined in 40 CFR 122.26 (b)(14)((i)-(ix) and (xi)) from the sectors of industry described in

- Table 1-1, and that are specifically identified by outfall or discharge location in the pollution prevention plan (see Part 4.2.2.3.7);
- 1.2.2.1.2 Non-storm water discharges as noted in Part 1.2.2.2 or otherwise specifically allowed by the permit;
- 1.2.2.1.3 Discharges subject to an effluent guideline listed in Table 1-2 that also meet all other eligibility requirements of the permit. Discharges subject to a New Source Performance Standard (NSPS) effluent guideline must also meet the requirements of Part 1.2.4;
- 1.2.2.1.4 Discharges designated by the Director as needing a storm water permit under 40 CFR 122.26(a)(1)(v) or under 122.26(a)(9) and 122.26(g)(1)(i); and
- 1.2.2.1.5 Discharges comprised of a discharge listed in Parts 1.2.2.1.1 to 1.2.2.1.4 above commingled with a discharge authorized by a different NPDES permit. Also authorized are discharges not needing authorization by an NPDES permit commingled with discharges authorized by this permit.

# Module 3

The NPDES Construction Storm Water Program

[Slides and Handouts]



### Module 3

# The NPDES Construction Storm Water Program







# The NPDES Construction Storm Water Program

- · What does the program cover?
- What are the current permit application options?
- What requirements does a construction permit contain?
- How do municipal and NPDES construction storm water program requirements interact?

### Goals of the Construction Storm Water Program

- Prevent or minimize impact of construction
- Minimize erosion during construction
- Consider postconstruction storm water management



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# Erosion Process

### History of the Construction Storm Water Program

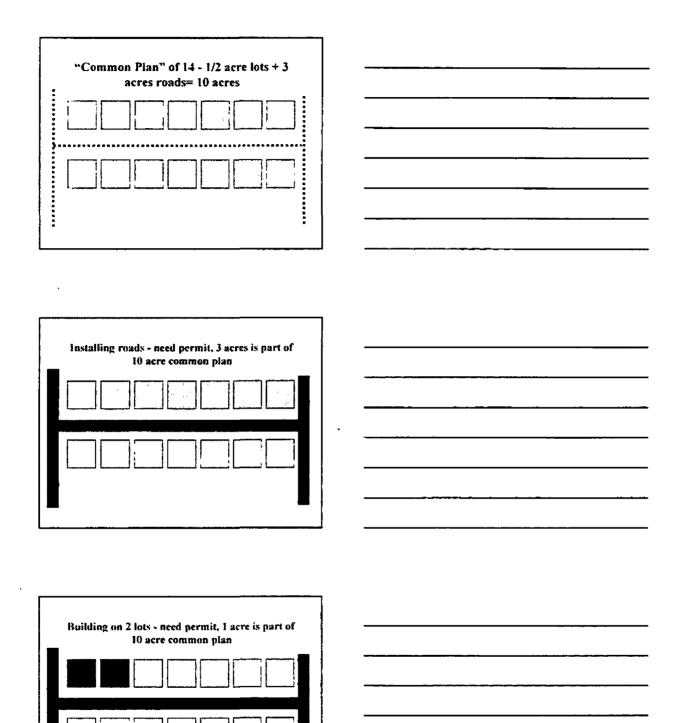
- · Large Construction Requirements
  - Component of storm water "discharge associated with industrial activity" [FWPCA 402(p)(2)]
- Small Construction Requirements
  - Response to Ninth Circuit Court decision
  - Component of "other" storm water discharges, "to be regulated to protect water quality" [FWPCA 402(p)(6)]

### Key Terms in the NPDES Construction Storm Water Program

- · Land disturbance
  - Clearing
  - Grading
  - Excavation



- · Larger common plan of development or sale
  - Multiple activities on a contiguous area
  - Possibly different times, schedules, and/or contractors



No "stabilized" gap in time, 4 acres left - need permit since still part of common plan	
Gap in time with "stabilization" - need permit since have 5 acres left that could be built on from common plan	
Gap in time with "stabilization" - don't need	
Phase I permit since have <5 acres left, treat like "new" common plan	

Addi	ng pool				at as ne	w plan	
33 G 23 E							
	<u>a</u>	AL AL	of d	of develop	of development.	of development.	

# Who is Responsible for Permit Requirements?

- · Operator
  - Operational control over site specifications
  - Day-to-day site operational control
  - Files for permit coverage

### · Other key players

- Important during planning/implementation
- Includes subcontractors, owner, developer, general contractor



# What Do the Large Construction Requirements Cover?

- All construction activity disturbing
   ≥ 5 acres
- Activity below 5 acres also included if part of a common plan of development or sale with a planned disturbance of ≥ 5 acres of land

# What Do the Small Construction Requirements Cover?

- · Requires permit coverage for:
  - Construction activity disturbing ≥ 1 acre and
     5 acres
  - Construction activity below 1 acre that is part of a larger common plan of development or sale
- · Potential permit coverage for:
  - Construction activity that disturbs <u>less than 1</u> <u>acre</u> of land may be designated based on water quality impact

# What Permitting Options Are Available?

- Construction General Permit (CGP) applies to large construction activities
- No permit yet for small construction activities
  - EPA expects permit to be similar to CGP
  - To be issued by December 10, 2002

# Large Construction (Phase I) Permitting

- · Construction General Permit (CGP)
  - Reissued on Feb. 17, 1998 [63 FR 7858-8014]
- · Regional CGPs
  - Region 4: 4/28/00 [65 FR 25121]
  - Region 6: 7/6/98 [63 FR 36489]
- · Some discharges not covered
- · No waivers available
- · State-specific requirements

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# Construction General Permit (CGP) Provisions

- Must not adversely affect endangered or threatened species or critical habitat
- Develop a storm water pollution prevention plan (SWPPP)



· Submit Notice of Intent (NOI)

# Construction General Permit (CGP) Provisions (cont.)

- · Prohibit most non-SW discharges
- · Report release of hazardous substances
- · Conduct regular inspections
- Submit Notice of Termination (NOT)

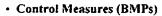
# Endangered Species Act and the CGP

- Six step certification process in Addendum A of CGP
- · If adverse impacts are likely:
  - Verify that activity will not cause harm
  - Obtain approval for an "incidental take permit" if harm cannot be avoided
- · If species or habitat are in proximity:
  - Include information in SWPPP
  - Describe measures and controls

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### **CGP SWPPP Elements**

- · Site Description
  - Potential pollutant sources
  - Runoff coefficient
  - ESA information



- Sediment and erosion control
- Storm water management control
- Proper material storage



### **CGP SWPPP Elements (cont.)**

- · Inspections
  - Seasonal waiver
  - Maintain report in SWPPP
  - Medify SWPPP
- · Maintenance
  - BMPs in effective operating condition
  - Perform before next storm event
- Signature
- · Accessibility

# Effluent Guidelines for Construction and Development (not yet proposed)

- Could standardize minimum requirements for erosion and sediment control
- Effluent guidelines could apply to construction activities associated with new development and redevelopment
- Based on performance/costs of control and treatment technologies
- http://www.epa.gov/OST/guide/construction/

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# How Do I Obtain a Copy of the CGP?

- · Contact your State PA
- If EPA is your PA, you may:
  - Contact EPA's Water Resources Center
    - 202.260,7786 (phone)
    - 202.260.0386 (fax)
    - · center.water-resources@epa.gov
  - Download a copy at www.cpa.gov/owm/sw
  - Contact your EPA Regional Office

# Who Signs the NOI/NOT and Other Reports?

- · For a corporation:
  - Responsible Corporate Officer
- · For a partnership or sole proprietorship
  - General partner or proprictor
- · For a public facility:
  - Principal Executive Officer
  - Ranking Elected Official

# When and Where Do I Submit the NOI?

- · Check with your State PA
- · If EPA is your PA:
  - Send the completed form at least 48 hrs before construction begins
  - Storm Water NOI, USEPA (4203), 1200 Pennsylvania Ave, N.W. Washington, D.C. 20460
  - The form is then forwarded to EPA's NOI Processing Center

EPA NPDES Storm	Water	Program	Training	Course

# Who Do I Call About Permit Status?

- · Check with your State PA
- · If EPA is your PA:
  - EPA's NOI Processing Center 301,495,4145



# When and Where Do I Submit the NOT?

- · Check with your State PA
- · If EPA is your PA:
  - Send the completed form to: U.S. EPA, Washington, DC
  - The address is included on the form
  - The form is then forwarded to EPA's NOI Processing Center

# Qualifying State, Tribal and Local Programs

- Construction permits can reference a qualifying erosion and sediment control program (to avoid overlapping requirements)
- Compliance with qualifying program = compliance with NPDES permit

<b>EPA NPDES</b>	Storm	Water	Program	Training	Course

# Qualifying State, Tribal and Local Programs (cont.)

- · For small construction, must have requirements to:
  - Implement erosion and sediment BMPs
  - Control wastes
  - Develop and implement a SWPPP
  - Submit a site plan for review

# Qualifying State, Tribal and Local Programs (cont.)

- · For large construction, must have:
  - Same elements as small construction; and
  - Any additional requirements to achieve **BAT and BCT**
- · Only certain NPDES-permitted MS4 construction programs will qualify
- · Reduces confusion between duplicative construction requirements

_		¬
	Waivers for Small Construction Activities	
•	Rainfall erosivity factor less than 5 ("low rainfall erosivity")	
•	Storm water controls are not needed based on a TMDL or equivalent assessment that addresses the	
	pollutants of concern	

#### Low Rainfall Waiver

- Requires erosivity factor (R factor from RUSLE) < 5</li>
  - Varies based on location and time period
- Creates an incentive for operators to build during dry times of the year

# Water Quality Assessment Waiver

- Must certify that controls are not needed based on a TMDL, or
- For non-impaired waters that do not require TMDLs, an equivalent analysis that determines allocations for small sites.
- Must address the pollutants of concern (sediment or other pollutant causing impairment)

### **Issues Specific to Small Construction**

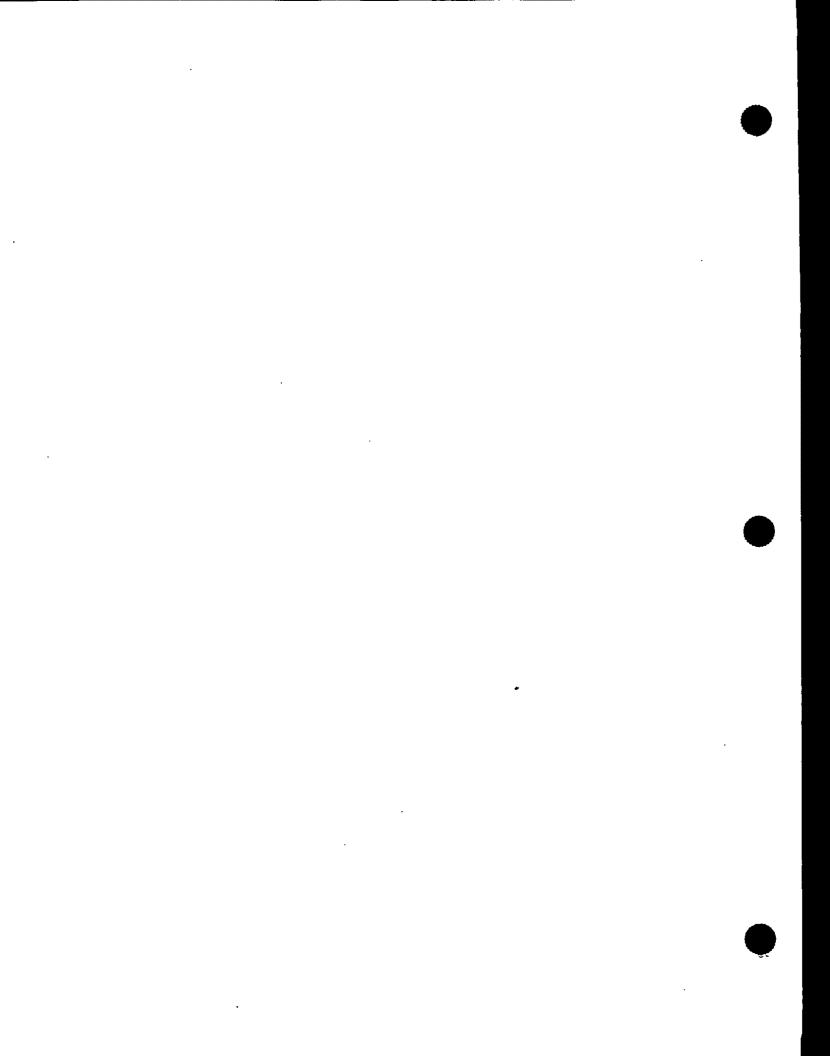
- Waivers are available (no waivers for sites disturbing > 5 acres)
- Small construction definition does not include routine maintenance
- Permitting Authority does not need to require an NOI for small construction

<b>EPA</b>	<b>NPDES</b>	Storm	Water	Program	Training	Course

# The Interaction of Federal and Municipal Construction Programs

- NPDES Storm Water Construction Program
  - Administered by the NPDES PA
  - Requires the construction operator to obtain an NPDES storm water permit
  - Nationwide coverage
- · NPDES-regulated MS4 Construction Programs
  - -Administered by the MS4 operator
  - Requirements vary between MS4s

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		-	



# THIS FORM REPLACES PREVIOUS FORM 3510-6 (8-98) See Reverse for Instructions

Form Approved. OMB No. 2040-0188





United States Environmental Protection Agency Washington, DC 20460

# Notice of Intent (NOI) for Storm Water Discharges Associated with CONSTRUCTION ACTIVITY Under a NPDES General Permit

Submission of this Notice of Intent constitutes notice that the party identified in Section I of this form intends to be authorized by a NPDES permit issued for storm water discharges associated with construction activity in the State/Indian Country Land identified in Section II of this form. Submission of this Notice of Intent also constitutes notice that the party identified in Section I of this form meets the eligibility requirements in Part I.B. of the general permit (including those related to protection of endangered species determined through the procedures in Addendum A of the general permit), understands that continued authorization to discharge is contingent on maintaining permit eligibility, and that implementation of the Storm Water Pollution Prevention Plan required under Part IV of the general permit will begin at the time the permittee commences work on the construction project identified in Section II below. IN ORDER TO OBTAIN AUTHORIZATION, ALL INFORMATION REQUESTED MUST BE INCLUDED ON THIS FORM. SEE INSTRUCTIONS ON BACK OF FORM.

OBIAIN AUTHORIZATION, ALE IN CHIMATION NEGOESTED MOST DE INCLUDER	ON THIS TORNI. SEE INSTRUCTIONS ON BACK OF FORMI.
I. Owner/Operator (Applicant) Information	
Name:	Phone:
Address:	Status of Owner/Operator:
City: L   L   L   L   L   L   L   L   L   L	State: Zip Code: L L L L L L L L L L L L L L L L L L L
II. Project/Site Information	Is the facility located on Indian Country Lands?
Project Name: LIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIII	Yes No
Project Address/Location:	
City:	State: Zip Code: 1 1 1-1 1 1
Latitude: Longitude: Cou	nty:
Has the Storm Water Pollution Prevention Plan (SWPPP) been prepared? Yes	No [
Optional: Address of location of SWPPP for viewing Address in Section I above Address	dress in Section II above Other address (if known) below:
SWPPP Address:	Phone:
City:	State: Zip Code: LIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIII
Name of Receiving Water:	
Month Day Year Month Day Year  Estimated Construction Start Date Estimated Completion Date	Based on instruction provided in Addendum A of the permit, are there any listed endangered or threatened species, or designated critical habitat in the project area?
Estimate of area to be disturbed (to nearest acre):	Yes No No
Estimate of Likelihood of Discharge (choose only one):	I have satisfied permit eligibility with regard to protection of endangered species through the indicated section of Part I.B.3.e.(2)
1. Unlikely 3. Once per week 5. Continual	of the permit (check one or more boxes):
2. Once per month 4. Once per day	(a) (b) (c) (d) (
III. Certification	
I certify under penalty of law that this document and all attachments were prepare designed to assure that qualified personnel properly gather and evaluate the informat manage this system, or those persons directly responsible for gathering the informat belief, true, accurate, and complete. I am aware that there are significant penalties imprisonment for knowing violations.	ation submitted. Based on my inquiry of the person or persons who tion, the information submitted is, to the best of my knowledge and for submitting false information, including the possibility of fine and
Print Name:   1	Date:
Signature:	



# Notice of Intent (NOI) for Storm Water Discharges Associated with Construction Activity to be Covered Under a NPDES Permit

#### Who Must File a Notice of Intent Form

Under the provisions of the Clean Water Act, as amended, (33 U.S.C. 1251 et.seq.; the Act), except as provided by Part I.B.3 the permit, Federal law prohibits discharges of pollutants in storm water from construction activities without a National Pollutant Discharge Elimination System Permit. Operator(s) of construction sites where 5 or more acres are disturbed, smaller sites that are part of a larger common plan of development or sale where there is a cumulative disturbance of at least 5 acres, or any site designated by the Director, must submit an NOI to obtain coverage under an NPDES Storm Water Construction General Permit. If you have questions about whether you need a permit under the NPDES Storm Water program, or if you need information as to whether a particular program is administered by EPA or a State agency, write to or telephone the Notice of Intent Processing Center at (703) 931-3230.

#### Where to File NOI Form

NOIs must be sent to the following address:

Storm Water Notice of Intent (4203) USEPA 401 M. Street, SW Washington, D.C. 20460

Do not send Storm Water Pollution Prevention Plans (SWPPPs) to the above address. For overnight/express delivery of NOIs, please include the room number 2104 Northeast Mall and phone number (202) 260-9541 in the address.

#### When to File

This form must be filed at least 48 hours before construction begins.

#### Completing the Form

OBTAIN AND READ A COPY OF THE APPROPRIATE EPA STORM WATER CONSTRUCTION GENERAL PERMIT FOR YOUR AREA. To complete this form, type or print, using uppercase letters, in the appropriate areas only. Please place each character between the marks (abbreviate if necessary to stay within the number of characters allowed for each item). Use one space for breaks between words, but not for punctuation marks unless they are needed to clarify your response. If you have any questions on this form, call the Notice of Intent Processing Center at (703) 931-3230.

#### Section I. Facility Owner/Operator (Applicant) Information

Provide the legal name, mailing address, and telephone number of the person, firm, public organization, or any other entity that meet either of the following two criteria: (1) they have operational control over construction plans and specifications, including the ability to make modifications to those plans and specifications; or (2) they have the day-to-day operational control of those activities at the project necessary to ensure compliance with SWPPP requirements or other permit conditions. Each person that meets either of these criteria must file this form. Do not use a colloquial name. Correspondence for the permit will be sent to this address.

Enter the appropriate letter to indicate the legal status of the owner/operator of the project: F = Federal; S = State; M = Public (other than federal or state); P = Private.

#### Section II. Project/Site Information

Enter the official or legal name and complete street address, including city, county, state, zip code, and phone number of the project or site. If it lacks a street address, indicate with a general statement the location of the site (e.g., Intersection of State Highways 61 and 34). Complete site information must be provided for permit coverage to be granted.

The applicant must also provide the latitude and longitude of the facility in degrees, minutes, and seconds to the nearest 15 seconds. The latitude and longitude of your facility can be located on USGS quadrangle maps. Quadrangle maps can be obtained by calling 1-800 USA MAPS. Longitude and latitude may also be obtained at the Census Bureau Internet site: http://www.census.gov/ogi-bin/gazetteer.

Latitude and longitude for a facility in decimal form must be converted to degrees, minutes and seconds for proper entry on the NOI form. To convert decimal latitude or longitude to degrees, minutes, and seconds, follow the steps in the following example.

Convert decimal latitude 45.1234567 to degrees, minutes, and second

- 1) The numbers to the left of the decimal point are degrees.
- To obtain minutes, multiply the first four numbers to the right of the decimal point by 0.006. 1234 x .006 = 7.404.
- 3) The numbers to the left of the decimal point in the result obtained in step 2 are the minutes: 7'.
- 4) To obtain seconds, multiply the remaining three numbers to the right of the decimal from the result in step 2 by 0.06: 404 x 0.06 = 24.24. Since the numbers to the right of the decimal point are not used, the result is 24\*.
- 5) The conversion for 45.1234 = 45° 7' 24".

Indicate whether the project is on Indian Country Lands.

Indicate if the Storm Water Pollution Prevention Plan (SWPPP) has been developed. Refer to Part IV of the general permit for information on SWPPPs. To be eligible for coverage, a SWPPP must have been prepared.

Optional: Provide the address and phone number where the SWPPP can be viewed if different from addresses previously given. Check appropriate box.

Enter the name of the closest water body which receives the project's construction storm water discharge.

Enter the estimated construction start and completion dates using four digits for the year (i.e. 05/27/1998).

Enter the estimated area to be disturbed including but not limited to: grubbing, excavation, grading, and utilities and infrastructure installation. Indicate to the nearest acre; if less than 1 acre, enter "1." Note: 1 acre = 43,560 sq. ft.

Indicate your best estimate of the likelihood of storm water discharges from the project. EPA recognizes that actual discharges may differ from this estimate due to unforeseen or chance circumstances.

Indicate if there are any listed endangered or threatened species, or designated critical habitat in the project area.

Indicate which Part of the permit that the applicant is eligible with regute to protection of endangered or threatened species, or designated critical habitat.

#### Section III. Certification

Federal Statutes provide for severe penalties for submitting false information on this application form. Federal regulations require this application to be signed as follows:

For a corporation: by a responsible corporate officer, which means: (i) president, secretary, treasurer, or vice president of the corporation in charge of a principal business function, or any other person who performs similar policy or decision making functions, or (ii) the manager of one or more manufacturing, production, or operating facilities employing more than 250 persons or having gross annual sales or expenditures exceeding \$25 million (in second-quarter 1980 dollars), if authority to sign documents has been assigned or delegated to the manager in accordance with corporate procedures;

For a partnership or sole proprietorship: by a general partner of the proprietor, or

For a municipality, state, federal, or other public facility: by either a principal executive or ranking elected official. An unsigned or undated NOI form will not be granted permit coverage.

#### **Paperwork Reduction Act Notice**

Public reporting burden for this application is estimated to average 3.7 hours. This estimate includes time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. An agency may not conduct or sponsor, and a person is not required to respond to, a collection of information unless it displays a currently valid OMB control number. Send comments regarding the burden estimate, any other aspect of the collection of information, or suggestions for improving this form, including any suggestions which may increase or reduce this burden to: Direct OPPE Regulatory Information Division (2137), U.S. Environmental Protect Agency, 401 M Street, SW, Washington, D.C. 20460. Include the OMScontrol number on any correspondence. Do not send the completed form to this address.

# THIS FORM REPLACES PREVIOUS FORM 3510-7 (8-92)

Please See Instructions Before Completing This Form

Form Approved. ONB No. 2010-0036 Approval expires: 8-31-68

NPDES FORM



United States Environmental Protection Agency Washington, DC 20460

Notice of Termination (NOT) of Coverage Under a NPDES General Permit for Storm Water Discharges Associated with Industrial Activity

Submission of this Notice of Termination constitutes notice that the party identified in Section II of this form is no longer authorized to discharge storm water associated with industrial activity under the NPDES program. ALL NECESSARY INFORMATION MUST BE PROVIDED ON THIS FORM.

1. Permit Information
NPDES Storm Water  General Permit Number:  Check Here if You are No Longer  Check Here if the Storm Water  the Operator of the Facility:  Discharge is Being Terminated:
II. Facility Operator Information
Name: Lilii Phone: Lilii Phone: Lilii
Address: Lilia I I I I I I I I I I I I I I I I I I I
City: Lilia ZIP Code: ZIP Code
III. Facility/Site Location Information
Name: L. t.
Address:
City: L ZiP Code: ZiP Code: ZiP Code: L L L L L L L L L L L L L L L L L L L
Latitude: Longitude: Quarter: Section: Township: Range:
IV. Certification: I certify under penalty of law that all storm water discharges associated with industrial activity from the identified facility that are authorized by a NPDES general permit have been eliminated or that I am no longer the operator of the facility or construction site. I understand that by submitting this Notice of Termination, I am no longer authorized to discharge storm water associated with industrial activity under this general permit, and that discharging pollutants in storm water associated with industrial activity to waters of the United States is unlawful under the Clean Water Act where the discharge is not authorized by a NPDES permit. I also understand that the submittal of this Notice of Termination does not release an operator from liability for any violations of this permit or the Clean Water Act.
Print Name: Lilit
Signature:

#### Instructions for Completing Notice of Termination (NOT) Form

#### Who May File a Notice of Termination (NOT) Form

Permittees who are presently covered under an EPA-issued National Pollutant Discharge Elimination System (NPDES) General Permit (including the 1995 Multi-Sector Permit) for Storm Water Dicharges Associated with Industrial Activity may submit a Notice of Termination (NOT) form when their facilities no longer have any storm water discharges associated with industrial activity as defined in the storm water regulations at 40 CFR 122.26(b)(14), or when they are no longer the operator of the facilities.

For construction activities, elimination of all storm water discharges associated with industrial activity occurs when disturbed soils at the construction site have been finally stabilized and temporary erosion and sediment control measures have been removed or will be removed at an appropriate time, or that all stream water discharges associated with industrial activity from the construction site that are authorized by a NPDES general permit have otherwise been eliminated. Final stabilization means that all soil-disturbing activities at the site have been completed, and that a uniform perennial vegetative cover with a density of 70% of the cover for unpaved areas and areas not covered by permanent structures has been established, or equivalent permanent stabilization measures (such as the use of riprap, gabions, or geotaxtiles) have been employed.

#### Where to File NOT Form

Send this form to the the following address:

Storm Water Notice of Termination (4203) 401 M Street, S.W. Washington, DC 20460

#### Completing the Form

Type or print, using upper-case letters, in the appropriate areas only. Please place each character between the marks. Abbreviate if necessary to stay within the number of characters allowed for each item. Use only one space for breaks between words, but not for punctuation marks unless they are needed to clarify your response. If you have any questions about this form, telephone or write the Notice of Intent Processing Center at (703) 931-3230.

# Instructions - EPA Form 3510-7 Notice of Termination (NOT) of Coverage Under The NPDES General Permit for Storm Water Discharges Associated With Industrial Activity

#### Section I Permit Information

Enter the existing NPDES Storm Water General Permit number assigned to the facility or site identified in Section III. If you do not know the permit number, telephone or write your EPA Regional storm water contact person.

Indicate your reason for submitting this Notice of Termination by checking the appropriate box:

If there has been a change of operator and you are no longer the operator of the facility or site identified in Section III, check the corresponding box.

If all storm water discharges at the facility or site identified in Section III have been terminated, check the corresponding box.

#### Section II Facility Operator Information

Give the legal name of the person, firm, public organization, or any other entity that operates the facility or site described in this application. The name of the operator may or may not be the same name as the facility. The operator of the facility is the legal entity which controls the facility's operation, rather than the plant or site manager. Do not use a colloquial name. Enter the complete address and telephone number of the operator.

#### Section III Facility/Site Location Information

Enter the facility's or site's official or legal name and complete address, including city, state and ZIP code. If the facility lacks a street address, indicate the state, the latitude and longitude of the facility to the nearest 15 seconds, or the quarter, section, township, and range (to the nearest quarter section) of the approximate center of the site.

#### Section IV Certification

Federal statutes provide for severe penalties for submitting false information on this application form. Federal regulations require this application to be signed as follows:

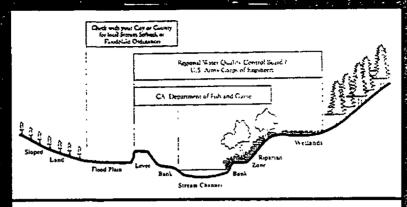
For a corporation: by a responsible corporate officer, which means: (i) president, secretary, treasurer, or vice-president of the corporation in charge of a principal business function, or any other person who performs similar policy or decision making functions, or (ii) the manager of one or more manufacturing, production, or operating facilities employing more than 250 persons or having gross annual sales or expenditures exceeding \$25 million (in second-quarter 1980 dollars), if authority to sign documents has been assigned or delegated to the manager in accordance with corporate procedures;

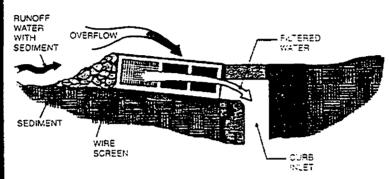
For a partnership or sole proprietorship: by a general partner or the proprietor; or

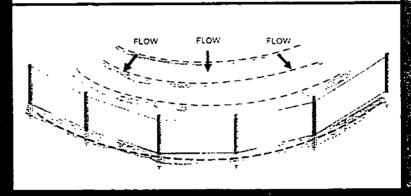
For a municipality, State, Federal, or other public facility: by either a principal executive officer or ranking elected official.

#### Paperwork Reduction Act Notice

Public reporting burden for this application is estimated to average 0.5 hours per application, including time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding the burden estimate, any other aspect of the collection of information, or suggestions for improving this form, including any suggestions which may increase or reduce this burden to: Chief, Information Policy Branch, 2136, U.S. Environmental Protection Agency, 401 M Street, SW, Washington, DC 20460, or Director, Office of Information and Regulatory Affairs, Office of Management and Budget, Washington, DC 2050







CALIFORNIA
REGIONAL WATER QUALITY
CONTROL BOARD
SAN FRANCISCO BAY REGION

GUIDE TO THE RWOCK / RWOCK CONTACTS

PREPARING A SWPPP

STATEWIDE NPDES GENERAL PERMIT - CONSTRUCTION

NOTICE-OF-INTENT FORM / LINE INSTRUCTIONS

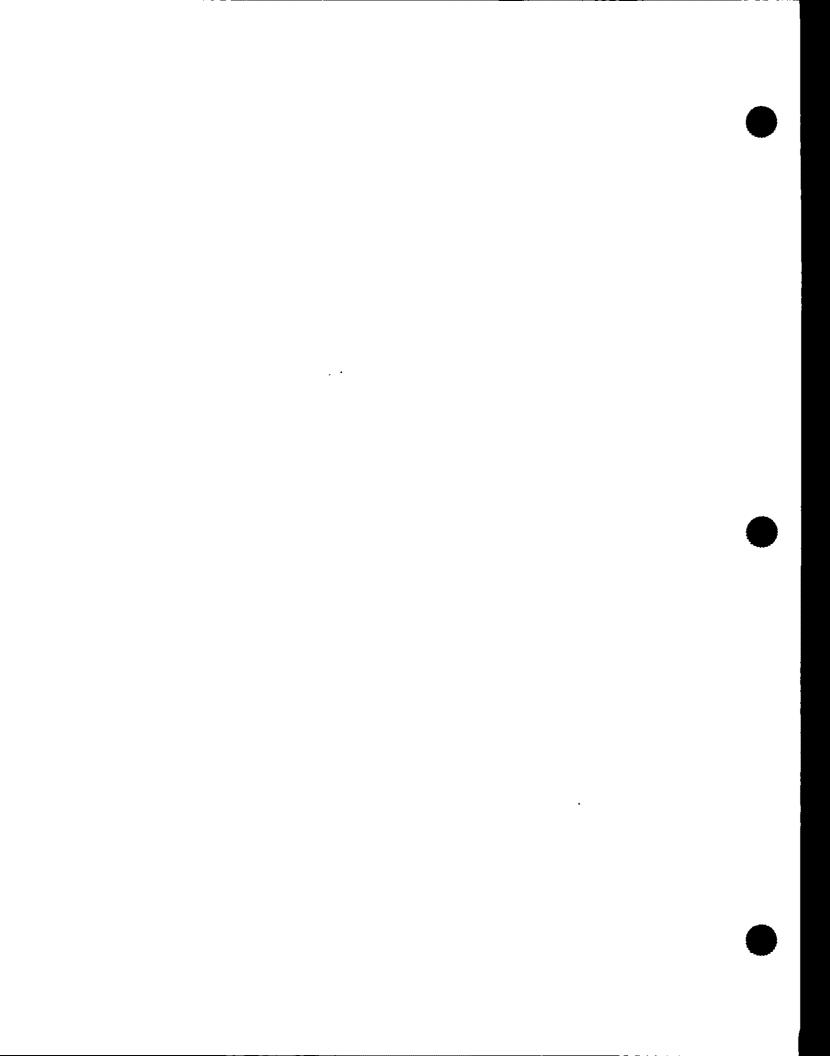
CHANGE OF OWNERSHIP / NOTICE-OF-TERMINATION

CLEAN WATER ACT SECTION 401 / 404 PERMIT

CONTRACT PROVISIONS ETC.

GUIDELINES

FOR



#### INTRODUCTION

These are comprehensive directions for preparing a Storm Water Pollution Prevention Plan (SWPPP) for construction activities. The directions provide instruction to produce a SWPPP that will comply with the revised State Water Resources Control Board's National Pollutant Discharge Elimination System (NPDES) General Permit for Discharges of Storm Water Runoff Associated With Construction Activity (NPDES Permit No. CAS000002), hereafter referred to as the General Permit. The directions are also designed to meet the specific, more detailed objectives of the California Regional Water Quality Control Board.

At a minimum, it is the intention of the California Regional Water Quality Control Board (Regional Board) that the SWPPP meet the following objectives:

- 1. To identify pollutant sources that may affect the quality of storm water discharges associated with construction activity from the construction site; and
- 2. To identify, construct, and implement storm water pollution prevention measures (control practices) to reduce pollutants in storm water discharges from the construction site, both during construction and after construction is completed.

The documents below can help the author of a SWPPP select appropriate control measures and management practices. In particular, the *Erosion and Sediment Control Field Manual* (referenced throughout the following directions) should be consulted during and after the preparation of a SWPPP. The *Field Manual* is also highly recommended for practical use by field inspectors.

The SWPPP

is intended

to be implemented.

It should be modified and amended as changes occur aconstruction or operation activities that affect the discharge of storm waters

Accordingly,

ages of the SWPPP

should be dated

to facilitate

necessary revisions.

from the construction site.

Erosion and Sediment Control Field Manual (Third Edition)
California Regional Water Quality Control Board

Order from:

San Francisco Estuary Project

1515 Clay Street, Suite 1400

Oakland, CA 94612 (510) 622-2465

Manual of Standards for Erosion and Sediment Control Association of Bay Area Governments

Order from:

**ABAG** 

P.O. Box 2050

Oakland, CA 94604

(510) 464-7900

Most importantly,
the SWPPP should
demonstrate
an active concern
by the owner/operator
of a construction site
for the prevention
and control of
water pollution.

# PROPOSED FRAMEWORK FOR THE SWPPP

The guidelines are based on a proposed framework that contains all of the required elements of a SWPPP in accordance with the General Permit. The framework is only suggested, not required. An alternative framework may be used as long as it contains all of the required elements. Where sections overlap, references may be included to avoid duplication.

- Title Page
- II. Certification Page
- III. Amendments
- Table of Contents
- Introduction
- VI. Source Identification
  - A. Topography Map
  - B. Site Map
    - 1. Areas of Soil Disturbance
    - 2. Surface Water Locations

    - Areas of Existing Vegetation
       Location of Control Practices Used During Construction
    - Drainage Patterns and Slopes Anticipated After Major Grading

Activities are Completed

- 6. Areas Used to Store Soils and Wastes
  - a. Soil Storage
  - b. Waste Storage
  - c. Materials Storage
- 7. Vehicle and Equipment Storage and Service Areas
- 8. Existing and Planned Paved Areas and Buildings
- 9. Location of Post-Construction Control Practices
- VII. Narrative Descriptions
  - A. Site Estimates and Description of On Site Soil
  - B. Pollutants Likely to be Present in Storm Water Discharges
  - C. Toxic Materials
  - D. Erosion and Sediment Control Practices
    - 1. General Practices
    - 2. Soil Stabilization
    - Practices to Reduce Tracking Sediment Onto Public and Private Roads
    - 4. Wind Erosion
      - a. Dust Control
      - b. Sweeping
    - 5. Practices to Minimize Contact with Storm Water
      - Construction Vehicles and Equipment
        - i) Maintenance
        - ii) Fueling
        - iii) Washing
      - b. Materials
    - 6. Construction Material Loading, Unloading, and Access Areas
    - 7. Waste Management and Disposal
      - a. Concrete Wash-Out
      - b. Concrete / Asphalt Debris
      - c. Miscellaneous Waste
    - 8. Preconstruction Control Practices
  - E. Non-Storm Water Management
  - F. Maintenance, Inspection, and Repair of Structural Controls
  - G. Spill Prevention and Control
    - 1. Minor Spills
    - 2. Major Spills
  - H. Post-Construction Storm Water Management
  - I. Personnel Training
  - J. List of Contractors / Subcontractors
  - K. Other Plans
  - L. Monitoring
    - 1. General Plan Summary
    - 2. Site Inspections
    - 3. Compliance Certification
    - 4. Noncompliance Reporting
    - 5. Records

#### EXPLANATION OF TERMS

### I. Title Page

The title page should primarily identify that the document is a Storm Water Pollution Prevention Plan (SWPPP). Elements that should be included on the title page are the following:

- Name of the project;
- Owner and contractor of the project;
- Waste Discharge Identification Number (WDID No.) for the project (every project is assigned a WDID No. upon submittal of a Notice of Intent for coverage under the General Permit; and
- · Contact person(s) / address / daytime and emergency phone number.

#### II. Certification Page

This page shall contain the following certification and shall be signed in accordance with the Signatory Requirements (Standard Provision C.9.b, see sidebar) of the General Permit.

"I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to ensure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted, is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations."

Name, Title

Date of Preparation

Standard Provision C.9.b states that all SWPPPs, reports, certifications, or other information required by the General Permit and/or requested by the Regional Board, State Board, USEPA, or local storm water management agency shall be signed by a responsible corporate officer, principal executive officer, general partner or proprietor, or by a duly authorized representative. A person is a duly authorized representative only if (see sidebar to right) >>

A person is a
duly authorized
representative only if:

- 1. The authorization is made in writing by a person described above and retained as part of the SWPPP.
- 2. The authorization specifies either an individual or a position having responsibility for the overall operation of the construction activity, such as the position of manager, operator, superintendent, or position of equivalent responsibility or an individual or position having overall responsibility for environmental matters of the company.
- 3. If an authorization is no longer accurate because a different individual or position has responsibility for the overall operation of the facility, a new a uthorization must be reported to the Regional Board and attached to the SWPPP prior to submittal of any reports, certifications, or information signed by the authorized representative.

#### III. AMENDMENTS

The discharger shall amend the SWPPP whenever there is a change in construction or operations which may affect the discharge of significant quantities of pollutants to surface waters, ground waters, or a municipal separate storm sewer system. The SWPPP should also be amended if it is in violation of any condition of this general permit or has not achieved the general objective of reducing pollutants in storm water discharges. In addition, the Regional Water Board, or local agency with the concurrence of the Regional Water Board, may require the discharger to amend the SWPPP.

The following items should be discussed in the Amendment section as appropriate:

- 1) Location of proposed change (also indicate location on site map). Use landmarks, street names and other reference points to identify the location.
- 2) Describe existing conditions, including the type and placement of all materials. What area and/or control measures are involved? What Best Management Practices (BMPs) were originally proposed or implemented?
- 3) What led to the amendment? Was there a change in construction or operation? Was a BMP not functioning adequately? Who requested the amendment?
- 4) What is the new proposal? What BMP is now proposed? Briefly describe the type and placement of materials. How is the new proposal an improvement over the original proposal?
- 5) Make specific references to the SWPPP, as appropriate.
- 6) Include plans for design changes.
- 7) A signed copy of the appropriate certification page shall be attached at the beginning of the amendment.

#### IV. TABLE OF CONTENTS

The table of contents shall identify each element of the SWPPP by its alpha numeric designation, section title, and page number.

#### V. INTRODUCTION

The introduction shall provide basic and essential information about the project. At a minimum, it should answer the following questions in a narrative format that can be easily understood by a non-technical person who is not familiar with the project.

- What is the type and size of the construction project? Example: The project is an 85-acre residential development of 200 single family units.
- Where is the project located? Include items such as county, city, street, and neighborhood. If known, provide the project's latitude and longitude for computerized mapping.
- What is (or was) the beginning date of the project?
- What is the estimated completion date of the project? If the project is implemented in phases, such phases and estimated times frames for their completion should be identified.
- Are there any unique features to the project?

The Introduction should also inform the reader of any supplemental documents that may be available for review. The reader should be directed as to where and when they might be able to examine the documents.

#### VI. SOURCE IDENTIFICATION

The SWPPP shall provide a geographical description of potential sources that are likely to add significant quantities of pollutants to storm water discharges or may result in non-storm water discharges from the construction site.

# A. Topography Map

The General Permit requires a map extending approximately one-quarter mile beyond the property boundaries of the construction site showing: the construction site, surface water bodies (including known springs and wetlands), known wells, an outline of off-site drainage discharging into the construction site, general topography, and the anticipated discharge location(s) where the construction site's storm water discharges to a municipal storm sewer system or other water bodies.

It is recommended that a U.S. Geological Survey (USGS) quad map be used to show the project site and the one-quarter mile extension beyond the property boundaries of the construction site. USGS maps display much of the required information, however, the map will need to be modified to demonstrate anticipated drainage paths (onto and off the construction site) and site boundaries.

The following are additional recommendations for the development of the topography map:

- A color coded legend;
- Dimensions of the construction site area;
- Flow directions of nearby creeks, stream, and rivers;
- Delineation of major permanent erosion and sediment control measures; and
- Discharge points and flow direction of site runoff, including nearby storm drains.

#### B. Site Map

The site map should be similar to the topographic map with greater detail as outlined below. It shall be a series of one or more drawings of the construction site at a scale sufficient to clearly show on-site drainage patterns and the location of erosion and sediment controls. The following items shall be delineated on the site map.

### 1. Areas of Soil Disturbance

All areas of soil disturbance should be clearly identifiable on the site map. These include areas of soil removal or augmentation, such as holes, pits, excavations, trenches, berms, slopes, fill, and imported top soil.

### 2. Surface Water Locations

All surface water locations should be clearly delineated on the site map. Surface water bodies include: oceans, lakes, rivers, creeks or streams, ponds, springs, and wetlands. Be sure to include intermittent or seasonal surface water bodies.

#### 3. Areas of Existing Vegetation

Existing vegetation that is to be preserved on the site must be protected from mechanical or other injury while the land is being developed. Areas of existing vegetation should be clearly delineated on the site map.

### 4. Location of Control Practices Used During Construction

Briefly list and locate on the site map all control practices used for diverting, mitigating, or eliminating sediments, contaminants, or pollutants from the construction site.

# 5. Drainage Patterns and Slopes Anticipated After Major Grading Activities are Completed

Drainage patterns that are modified during the construction of the project should be clearly shown on the site map. All slopes should indicate grading ratio and flow direction.

#### 6. Areas Used to Store Soils and Wastes

Delineate all areas of storage and waste disposal on the site map. Different storage areas for soil, waste, and materials should be delineated by different textures and/or colors. In addition to the following, please consult the *Erosion and Sediment Control Field Manual (Third Edition)*, pages 95 to 98, pages 103 to 108 and pages 111 to 112 for recommended storage practices.

### a. Soil Storage

Place soil storage areas near construction entrances, away from waterways. Areas should have appropriate control measures for minimizing run-on and preventing the loss of sediments from stockpiles.

# b. Waste Storage

Place waste storage areas near construction entrances, away from waterways. Areas should be covered and have measures for preventing water from entering containment regions. Areas should also include different covered storage containers for separating various types of wastes. In addition, hazardous wastes should be separated from non-hazardous wastes and dry hazardous wastes should be separated from saturated hazardous wastes.

#### c. Materials Storage

Place materials storage areas near construction entrances, away from waterways. Areas should have appropriate control measures that prevent water from entering the storage area.

# 7. Vehicle and Equipment Storage and Service Areas

Vehicle and construction equipment storage and service areas shall be delineated on the site map. Sites should be chosen based on the following criteria:

- minimize the risks associated with vehicle and equipment leaks impacting receiving waters;
- contain vehicle and equipment wastes within a specific area;
- · allow for easy cleanup or servicing of vehicles and equipment; and
- prevent run-on / runoff from passing through the area.

# 8. Existing and Planned Paved Areas and Buildings

Areas that are covered by concrete, asphalt, or other permanent coverage of the soil should be clearly delineated on the site map. Imprints of buildings should also be indicated whether they are permanent or temporary.

### 9. Location of Post-Construction Control Practices

All permanent structural and nonstructural control measures that are planned for the project to control pollutants in storm water discharges after construction is completed shall be delineated on the site map. Post-Construction BMPs include, but are not limited to:

- the minimization of land disturbance:
- the minimization of impervious surfaces;
- treatment of storm water runoff using infiltration;
- detention/retention;
- biofilter BMPs;
- use of efficient irrigation systems;
- ensuring that interior drains are not connected to a storm sewer system; and
- appropriately designed and constructed energy dissipation devices.

Post construction BMPs must be consistent with all local post-construction storm water management requirements, policies and guidelines.

Operation and maintenance of control practices after construction is complete shall be addressed, including short and long-term funding sources and the responsible party.

For more information, please consult the <u>Erosion and Sediment Control</u>
<u>Field Manual (Third Edition)</u> and <u>Start at the Source: A Design Guidance</u>
<u>Manual for Stormwater Quality Protection</u> (by the Bay Area Stormwater
<u>Management Agencies Association</u>. Available by calling 1-877-773-7247).

#### VII. NARRATIVE DESCRIPTIONS

# A. Site Estimates and Descriptions of On-Site Soil Include the following estimates:

- size of the construction site (in acres or square feet);
- runoff coefficient of the construction site before and after construction;
- percentage of the area of the construction site that is impervious before and after construction.

If the project is to be phased, such estimates shall also address the state of the site at the completion of each phase.

Also, describe the soil that can be found at the construction site. Indicate whether the fill material is native or non-native, contaminated or uncontaminated, in addition to its coverage technique (i.e. native soil coverage, asphalt or concrete coverage, and/or landscape).

# B. Pollutants Likely to be Present in Storm Water Discharges

List and describe the pollutants (other than those listed in Section VII.C., Toxic Materials) that are likely to be present in storm water discharges from the site. Also describe the source of such pollutants such as daily operation of equipment, stockpiling of materials, and grading activities.

#### C. Toxic Materials

Describe all toxic materials known to have been (or anticipate being) treated, stored, disposed of, spilled, or leaked in significant quantities onto or near the construction site. If toxic materials are used during construction, alert construction personnel of the possibility of discovering toxic or hazardous wastes on-site.

Indications of contaminated soils include discoloration, odor, or unusual soil properties, that may be observed during construction. Presence of abandoned underground tanks or discovery of buried debris or trash are also indicators of potential contamination.

Describe methods to prevent and control pollution from toxic materials. Examples of such methods should include the following:

- Dispose of wastes in accordance with Federal, State, and local regulations.
   Wastes likely to contain toxic or hazardous materials include those materials listed to the right and: sandblasting grit mixed with lead, cadmium, or chromium based paints, asbestos, and PCBs.
- Do not apply herbicides and pesticides just before it rains. Instead, apply surface dressings in several smaller applications to allow time for infiltration.
- Do not clean out brushes or paint containers into the dirt, street, gutter, storm drain, or stream.

Many of the materials or chemicals used on-site can be hazardous or toxic. The following materials or chemicals are examples:

- Adhesives
- Cleaners
- Paint
- · Asbestos
- Polishes
- · Curing Compounds
- · Insulation
- · Petroleum Products
- Wash Waters
- · Pesticides
- · Herbicides
- · Septic Fluids
- · Sealing Agents
- · Masonry/Concrete
- Vehicle Fluids

If contamination

is suspected,

test for pollutants,

and call the

Regional Water

Quality Control

Board.

#### D. Erosion and Sediment Control Practices

# 1. General Practices

Describe the erosion and sediment control practices intended to prevent a net increase of sediment load into storm water discharge. Describe the protection that the practice is providing, geographic location of the practice, when it will be implemented, and how it will be maintained. Also, specify the sequence in which the practice(s) will be implemented. Please consult the Erosion and Sediment Control Field Manual (Third Edition) for additional information on such practices.

#### 2. Soil Stabilization Practices

Describe the soil stabilization practices that will be used to preserve existing vegetation and to re-vegetate open graded areas on the construction site. Also, discuss how and when the practices will be implemented. Practices may include hydroseeding, erosion blankets or filter, fabrics, stabilizing stakes, or other methods (please consult the *Erosion and Sediment Control Field Manual (Third Edition)*, pages 31 to 39 and 45 to 48, for additional information).

# 3. Practices to Reduce the Tracking of Sediment Onto Public and Private Roads

Describe the control practices that will be employed to reduce the tracking of sediment onto public and private roads. These practices prevent the deposition of sediments into local storm drains and prevent the production of airborne dust (please consult the *Erosion and Sediment Control Field Manual (Third Edition)*, pages 51 to 53, for additional information).

#### 4. Wind Erosion

#### a. Dust Control

Briefly describe dust control BMPs that will generally stabilize exposed surfaces and minimize activities that suspend or track dust particles (please consult the *Erosion and Sediment Control Field Manual (Third Edition)*, pages 41 to 43, for additional information).

#### b. Sweeping

Describe a frequency of sweeping that will ensure that sediments are removed from hard surfaces within and adjacent to the site. Do not wash sediment or debris into storm drain systems. Debris should be collected and deposited into areas of open soil as long as debris consists mainly of soil material.

#### 5. Practices to Minimize Contact with Storm Water

Storm water management practices to minimize contact of construction vehicles, equipment, and materials with storm water shall be discussed within this section (please consult the *Erosion and Sediment Control Field Manual (Third Edition)*, pages 93 to 115).

# a. Construction Vehicles and Equipment

#### i) Maintenance

- Maintain all construction equipment to prevent oil or other fluid leaks.
- Keep vehicles and equipment clean, prevent excessive build-up of oil and grease.
- Use off-site repair shops.
- Keep stockpiled spill cleanup materials readily accessible.
- Regularly inspect on-site vehicles and equipment for leaks, and repair immediately.
- Check incoming vehicles and equipment (including delivery trucks, and employee and subcontractor vehicles) for leaking oil and fluids. Do not allow leaking vehicles or equipment on-site.
- Segregate and recycle wastes, such as greases, used oil or oil filters, antifreeze, cleaning solutions, automotive batteries, hydraulic, and transmission fluids.

# ii) Fueling

- If fueling must occur on-site, use designated areas away from drainage.
- Locate on-site fuel storage tanks within a bermed area designed to hold the tank volume.
- Cover retention area with an impervious material and install it in a manner to ensure that any spills will be contained in the retention area.
- Always use secondary containment, such as a drain pan or drop cloth, to catch spills or leaks when removing or changing fluids.
- Use drip pans for any oil or fluid changes.

#### iii) Washing

- Use as little water as possible to avoid installing erosion and sediment controls for the wash area.
- If washing must occur on-site, use designated, bermed wash areas to prevent waste water discharge into storm water, creeks, rivers, and other water bodies.
- Use phosphate-free, biodegradable soaps.
- Do not permit steam cleaning on-site.

#### b. Materials

- List materials delivered and stored on-site in this section.
- Describe methods planned to minimize the amount of such materials on site.
- Describe methods for secondary containment (during periods of rain or during the rainy season, store materials in covered areas and in secondary containment structures such as earthen dikes, horse trough, or spill blankets with a surrounding berm).
- Describe chemical storage methods. Keep chemicals in their original containers and well labeled at all times. If drums must be kept uncovered, store them at a slight angle to reduce corrosion and ponding of rainwater on the lids.

## 6. Construction Material Loading, Unloading, and Access Areas

General practices for preventing and reducing storm water pollution from construction material loading and unloading should be described. Access areas should also be described in this section.

## 7. Waste Management and Disposal

Describe waste disposal practices on the construction site. The discharge of pollutants to storm water from solid or construction wastes will be reduced or prevented by providing designated waste collection areas and containers, arranging for regular disposal, and training employees and contractors (please consult the *Erosion and Sediment Control Field Manual (Third Edition)*, pages 95 to 115, for additional information).

#### a. Concrete Wash-Out

Indicate the location and description of concrete wash out areas on the construction site. Please consult the *Erosion and Sediment Control Field Manual (Third Edition)*, page 107 to 108, for information on concrete waste management techniques.

#### b. Miscellaneous Waste

Describe miscellaneous waste plans. Be sure to conduct a weekly pickup of miscellaneous waste around the construction site. Because erosion control devices tend to collect waste, waste should be removed regularly.

### 8. Pre-Construction Control Practices

This section shall describe all pre-construction practices aimed at reducing sediment and other pollutants in storm water discharges. Also describe permanent control measures within the vicinity of the project that can be used for this purpose. The amount of anticipated storm water run-on must be considered to determine the appropriateness of the BMP chosen. Show all calculations for anticipated storm water run-on, and describe all BMPs implemented to divert off-site drainage around or through the construction project.

#### E. Non-Storm Water Management

Describe all non-storm water discharges to receiving waters that are proposed for the construction project. Non-storm water discharges should be eliminated or reduced to the extent feasible. Include the locations of such discharges and descriptions of all BMPs designed for the control of pollutants in such discharges. One-time discharges shall be monitored during the time that such discharges are occuring. A qualified person should be assigned the responsibility for ensuring that no materials other than storm water are discharged in quantities which will have an adverse effect on receiving waters or storm drain systems. The name and contact number of that person should be included in the SWPPP document.

Non-storm water liquids and wastes that are present on the construction site shall be described in this section or other sections. The discussion should include procedures to minimize risks, conserve water, prevent erosion, and reduce the transport of pollutants.

Discharging sediment laden water which will cause or contribute to water pollution from a dewatering site or sediment basin into any receiving water or storm drain without filtration or equivalent treatment is prohibited. Contact the Regional Board if you are uncertain as to whether water is polluted.

# F. Maintenance, Inspection, and Repair of Structural Controls

Structural controls require ongoing inspection, maintenance, and repair. The discharger at all times shall properly operate and maintain any facilities and systems of treatment and control which are installed or used by the discharger to achieve compliance with the General Permit and the requirements of the SWPPP.

Describe procedures for responding to a potential failure of structural controls. Indicate who will be responsible for inspection, maintenance, and repair, in addition to the equipment available to rectify any immediate problems within a 2 hour period, an 8 hour period, and 24 hour period. A list of emergency contact people should also be listed.

Discharging

sediment laden water

which will cause

or contribute to

water pollution

from a dewatering site

or sediment basin

into any receiving water

or storm drain

without filtration

or equivalent treatment

is prohibited.

# G. Spill Prevention and Control

Measures to prevent, control, and cleanup spills shall be described in this section. Clean up of spills should be immediate, automatic, and routine. They should also be performed by a trained staff member or a licensed cleaning company. Emergency contact numbers should also be listed in this section.

Contact the appropriate local emergency response agencies immediately to report all minor and major spills.

# 1. Minor Spills

Minor spills are those which are likely to be controlled by on-site personnel. After contacting local emergency response agencies, the following actions should occur upon discovery of a minor spill:

- Contain the spread of the spill.
- If the spill occurs on paved or impermeable surfaces, clean up using "dry" methods (i.e. absorbent materials, cat litter, and/or rags).
- If the spill occurs in dirt areas, immediately contain the spill by constructing an earthen dike. Dig up and properly dispose of contaminated soil.
- If the spill occurs during rain, cover the impacted area to avoid runoff.
- Record all steps taken to report and contain spill.

#### 2. Major Spills

On-site personnel should not attempt to control major spills until the appropriate and qualified emergency response staff have arrived at the site. In addition to local authorities, notify the Governor's Office of Emergency Services Warning Center at (800) 852-7550. For spills of federal reportable quantities, also notify the National Response Center at (800) 424-8802. A written report should be sent to all notified authorities. Failure to report major spills can result in significant fines and penalties.

### H. Post-Construction Storm Water Management

Describe the control practices to reduce pollutants in storm water discharges after all construction phases have been completed at the site. The plan should address short and long-term funding sources, responsible party and maintenance of post-construction measures once construction is complete.

Most post-construction BMPs or permanent control measures should be prepared early in the planning or design stage of the project. For most projects there will be no single practice to address all post-construction storm water quality problems. Instead, a multi-level strategy will need to be developed and implemented. In addition, measures should be consistent with all regional, state, or local post-construction storm water management requirements, policies, and guidelines.

Most
post-construction BMPs

01

permanent control measures
should be prepared
early in the planning
or design stage
of the project.

#### 1. Personnel Training

Briefly describe the formal and informal training of those individuals responsible for:

- responsible for SWPPP preparation, implementation, and permit compliance;
- installation, inspection, maintenance, and repair of BMPs
- overseeing, revising, and amending the SWPPP.

All maintenance, repair, monitoring, reporting, and inspection requirements of the SWPPP and the General Permit shall be conducted by trained personnel.

#### J. List of Contractors / Subcontractors

The SWPPP shall include a list of all contractors and subcontractors responsible for implementing the SWPPP.

Provide the company's name, address, and telephone number. In addition, a contact person from within the company(s) should be named along with telephone number and address.

#### K. Other Plans

Other agencies may have issued permits for the construction project or imposed certain conditions. If so, describe the conditions and include a copy of the permit in an appendix to the SWPPP.

#### L. Monitoring and Reporting Requirements

# 1. General Plan Summary

Describe the project's monitoring program and reporting system (please consult the *Erosion and Sediment Control Field Manual (Third Edition)*, pages 123 to 129, for additional information). Such a program and system is a record keeping process to find out how well the BMPs are working and to evaluate whether additional BMPs are required.

If special project requirements call for monitoring using chemical analyses, a description of the sampling and analysis plan should be included in an appendix to the SWPPP and noted within this section of the Plan.

Note: The RWQCB may require the discharger to conduct additional site inspections, to submit reports and certifications, or perform sampling and analysis.

#### 2. Site Inspections

Describe site inspection plans in this section. List the name(s) and contact number(s) of those qualified personnel responsible for inspections of the construction site prior to anticipated storm events, during extended storm events, and after actual storm events.

Pre-storm inspections are to ensure that BMPs are properly installed and maintained. Post-storm inspections are to ensure that the BMPs have functioned adequately.

The results of the inspection and assessment must be recorded, and should include the date of inspection, name(s) of inspector, and the observations. Also describe tracking or follow-up procedures to address deficiencies in control practices or in the SWPPP implementation process.

## 3. Compliance Certification

Each discharger or qualified assigned personnel listed by name and contact number must certify annually that the project is in compliance with the requirements of the General Permit and its SWPPP. This certification will be based on the site inspections described above and should be attached to the Plan. Certification must be complete by July 1 of each year.

# 4. Noncompliance Reporting

Dischargers who cannot certify compliance with the General Permit and the SWPPP, and/or who have had other instances of noncompliance, must submit a noncompliance notification within 30 calendar days of identification of noncompliance. Corrective measures should be implemented immeduiately following discovery that water quality standards were exceeded. The notification must identify the type(s) of non-compliance, including an initial assessment of any impact caused by the event; describe the actions taken to achieve compliance; and include a time schedule (subject to modifications by the RWQCB) indicating when compliance will be achieved.

With

the exception of

noncompliance reporting,

dischargers are not required

to submit these records.

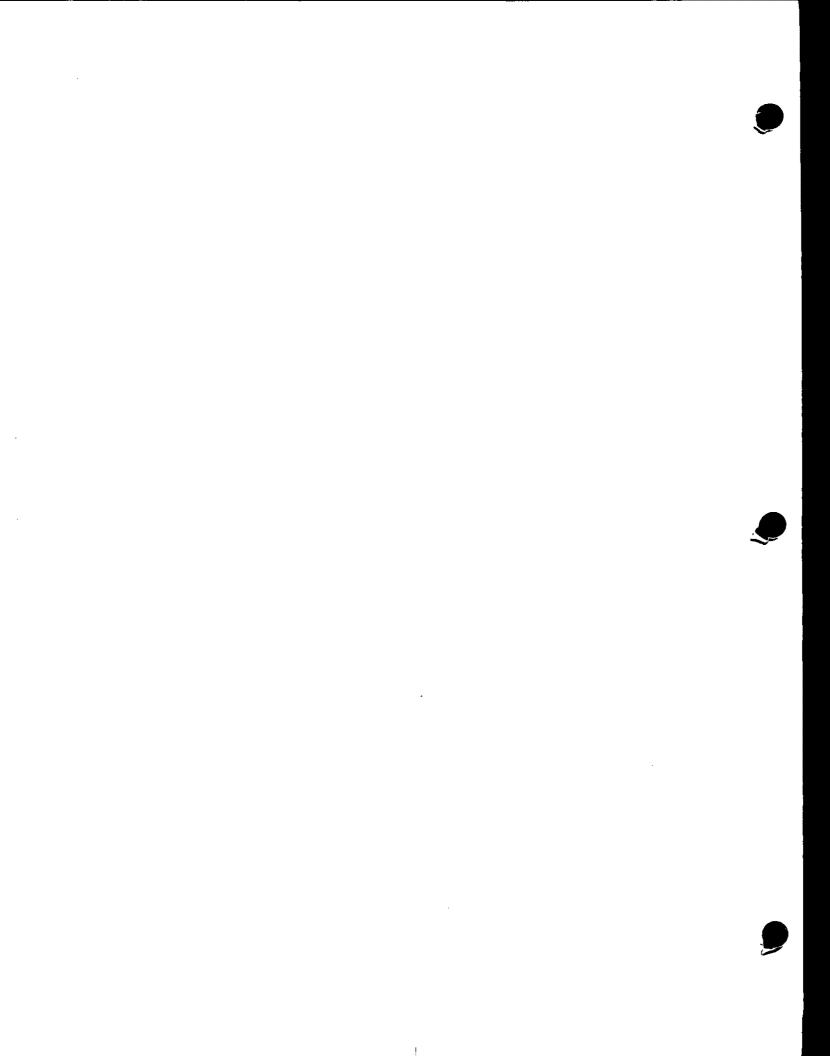
#### 5. Records

Records of all inspections, compliance certifications, and noncompliance reporting must be retained as part of the SWPPP for a period of at least three years. Upon completion of the project's construction and termination of coverage under the General Permit, all records shall be retained by the owner/operator with a copy of the final Plan.

During
extended storm events,
inspections shall be required.

# Exercise 2

Determining the R Factor for the Construction Waiver



### Exercise 2:

# Construction Site Waiver Determining the Rainfall Erosivity ("R" factor) For Your Construction Site

#### Background

On December 8, 1999, EPA published final regulations for storm water discharges, including discharges from construction activity disturbing between one and five acres. Under these rules, permitting authorities have the option of providing a waiver from construction general permit requirements to construction site operators, under two sets of circumstances. The first, based on a low R factor, is described in this fact sheet. (Note that although EPA uses the maximum R factor of 5 in this fact sheet, permitting authorities may set a lower threshold.)

### What is the R Factor?

The R factor (Rainfall Erosivity factor) is a measure of the average annual erosive force of rainfall. R factor values have been assigned to every geographic area of the United States. The R factor is an annual value. To calculate the R factor for a period less than a year, the erosivity index (EI) must be used. The EI factor has been distributed throughout the calendar year in two-week increments and is a cumulative percentage of the expected energy and intensity of storms which historically occur during the year. To calculate the R factor for a period less than a year, you must first find the EI percentage for that period and multiply it by the annual R factor.

R factors will tend to decline during seasonal dry periods, since there is a lower probability that a runoff-producing storm will occur. Certain construction projects that are scheduled within these low R-factor windows may be eligible for waivers. Each waiver is specific to the applicant's planned construction schedule, so if the project extends beyond the planned completion date, the applicant must recalculate the project's R factor and apply for a new waiver, or seek permit coverage if the R factor is too high for waiver eligibility. This could happen if, for instance, a late fall project extended into the winter snowy season.

#### What is the waiver provision?

If the construction general permit allows, operators of construction activity disturbing one to five acres have the option to apply for a waiver from the NPDES General Permit if the R factor for their period of disturbance is less than five.

The intent of the waiver provisions is to waive only those sites which are not reasonably expected to impact water quality. Before applying for a waiver, operators of constructing sites are encouraged to consider the potential water quality impacts which may result from their project and to carefully examine such factors as proximity to water resources, and sensitivity of receiving waters.

# How is the waiver provision applied?

Waivers are only available through the permitting authority, which has been given considerable flexibility regarding the implementation of the waiver provision. The permitting authority may decide to implement waivers in limited areas of its jurisdiction, to use waivers only during certain times of the year, to set an R-factor threshold lower than five, or to not implement the provision at all.

What Reference Materials Do I Need to Determine the R Factor for My Project? There are three important reference sources, and all are located in Chapter 2 of USDA's Predicting Soil Loss Erosion by Water: A Guide to Conservation Planning With the Revised Universal Soil Loss Equation (RUSLE) (U.S. Government Printing Office, January, 1997). They are:

- Figure 2-7: EI Distribution Zones for the Contiguous U.S.
- Figures 2-1 through 2-5: Isoerodent Maps of the Eastern U.S., Western U.S., California, Oregon/Washington, and Hawaii, respectively.
- Table 2-1: El As a Percentage of Average Annual Value Computed for Geographic Areas Shown in Figure 2-7.

## Can I use a personal computer to determine the R factor?

The RUSLE program is available for personal computers. Unfortunately, the R factor calculations are based on the closest major city and are not detailed enough to determine a site-specific waiver. EPA will work with USDA and States to try to make the above maps available electronically.

### Where can I get help?

Your local soil conservation district office can provide assistance with R values, RUSLE, and other conservation related issues. To find the office nearest you look in the government section of the phone book under soil conservation district, conservation district, natural resource conservation district, etc.

Copies of the Rainfall Erosivity Chapter from Predicting Soil Erosion By Water, A Guide to Conservation Planning With the Revised Universal Soil Loss Equation (RUSLE) are available from EPA's storm water Phase II web site (www.epa.gov/owm/sw/phase2)

# Calculating the R Factor: Exercise 2A

Construction started and completed within one calendar year.

Location: Belle Fourche, South Dakota

Project Details: Start date will be March 1 with an estimated completion date of May 15.

- 1. Estimate the start date for your project. This is the day you expect to begin disturbing soils, which includes all grubbing, excavating, stockpiling, and grading activities. Round to the nearest 15-day period (e.g., June 1 or 15)
- 2. Estimate the completion date for your project. This is the day you expect to have established a permanent vegetative cover of at least 70% over all remaining disturbed areas. Round to the nearest 15-day period.
- 3. **Identify your EI Distribution Zone.**Refer to **Figure 2-7** and find your EI distribution zone based on your geographic location.
- 4. Identify your percent EI Value.

  Refer to Table 2-1. Find your El Distribution

  Zone (Step 3) in the left column. Next, locate 15day periods which correspond to the dates
  obtained in Steps 1 and 2 to find the percent EI
  for your site. Subtract the starting EI percentage
  from the ending EI percentage. The maximum
  annual EI value for a project is 100%.
- Identify your Isoerodent Value.
   Refer to Figure 2-1. Enter the isoerodent value for your area.
- 6. Calculate your R Factor.

  Multiply the percent value obtained in Step 4 by the annual isoerodent value obtained in Step 5.

  This is your R Factor.

-	_	
Start Date:		(1)
Completion Date:		(2)
EI Distribution Zone:		(3)
Ending EI%:		(4a)
Starting EI%:	•••••••••••••	(4b)
EI Value:	(End% – Start%)	(4c)
Isoerodent Value:		(5)
R Factor:		(6)

# Calculating the R Factor: Exercise 2B

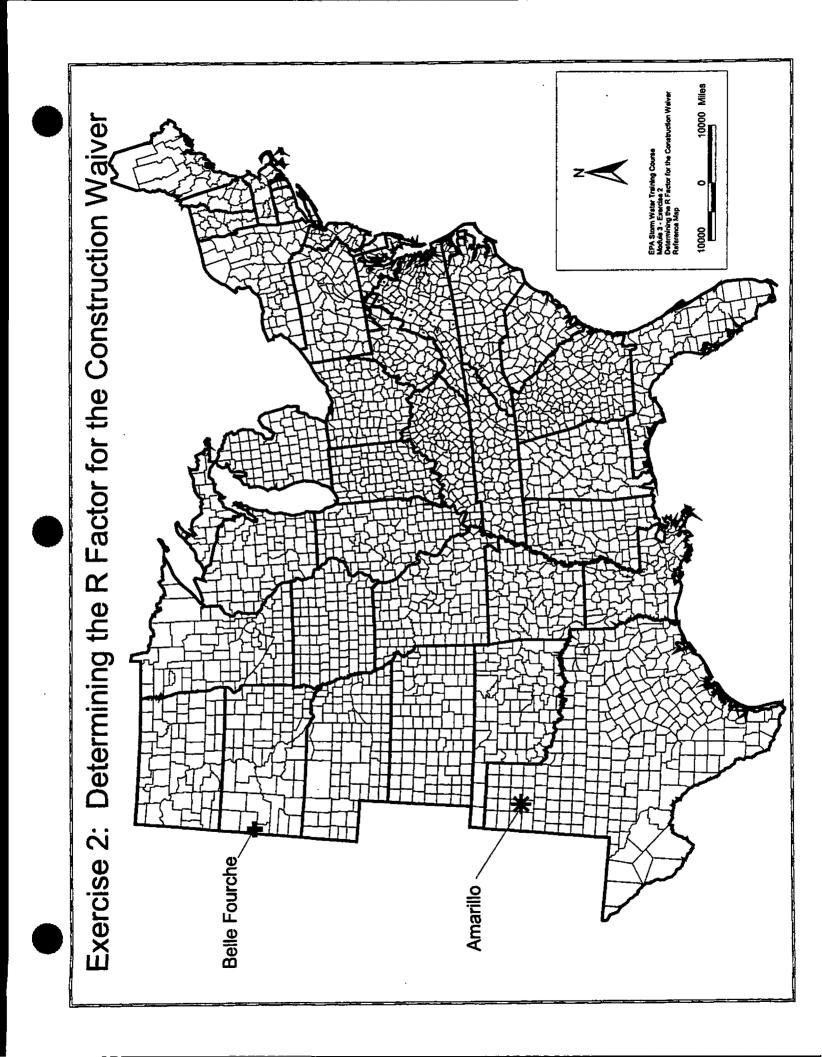
# Construction spanning two calendar years Amarillo, Texas

For a construction project spanning two calendar years, R Factors must be calculated for each portion of each calendar year. For a project lasting from August 1 to April 15, EI percentages must be calculated for August 1 - December 31 AND for January 1 - April 15. The sum of these two values is then used to determine the R Factor for the project.

- 1. Estimate the start date for your project. This is the day you expect to begin disturbing soils, which includes all grubbing, excavating, stockpiling, and grading activities. Round to the nearest 15-day period (e.g., June 1 or 15)
- 2. Estimate the completion date for your project. This is the day you expect to have established a permanent vegetative cover of at least 70% over all remaining disturbed areas. Round to the nearest 15-day period.
- 3. Identify your EI Distribution Zone.

  Refer to Figure 2-7 and find your EI distribution zone based on your geographic location.
- 4. Identify your percent EI Value.
  Refer to Table 2-1. Find your EI Distribution
  Zone (Step 3) in the left column. Next, locate
  15day periods which correspond to the dates
  obtained in Steps 1 and 2 to find the percent EI
  for your site. Subtract the starting EI percentage
  from the ending EI percentage.
- 5. Add the EI values.
- Identify your Isoerodent Value.
   Refer to Figure 2-1. Enter the isoerodent value for your area.
- Calculate your R Factor.
   Multiply the percent value obtained in Step 4 by the annual isoerodent value obtained in Step 5.
   This is your R Factor.

Start Date:		(1)
Completion Date:		(2)
EI Distribution Zone:		(3)
Ending EI%:		(4a)
Starting EI%:		(4b)
EI Values:	(End% - Start%)	(4c)
Sum of EI Values:		(5)
Isoerodent Value:		(6)
R Factor:		(7)



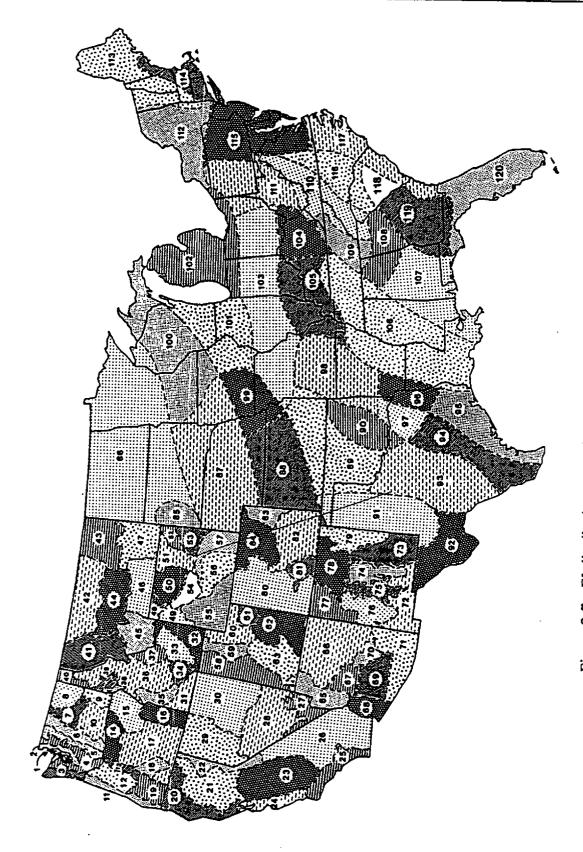


Figure 2-7. El distribution zones for contiguous United States

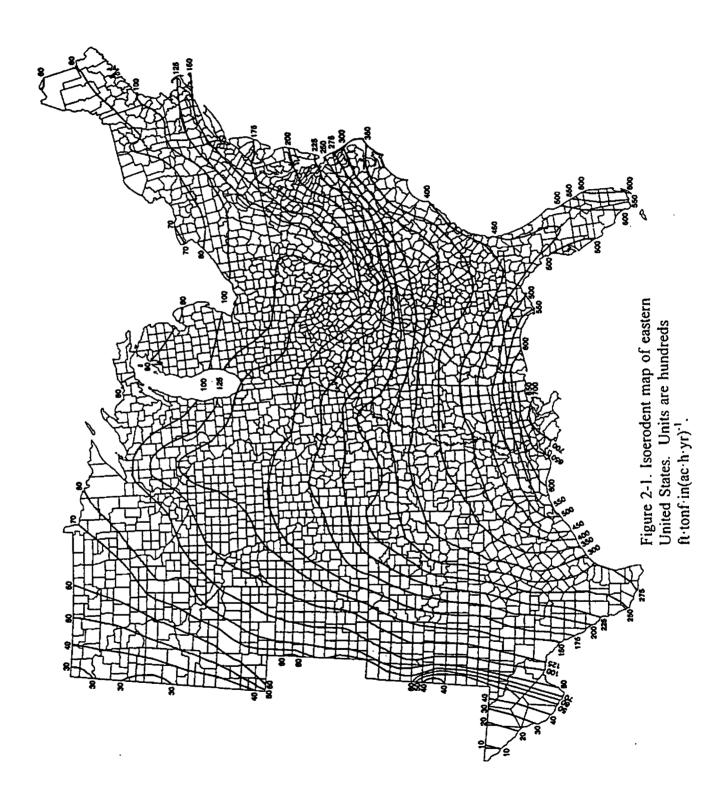


Table 2-1 El as percentage of average annual value computed for geographic areas shown in Figure 2-7 (Excerpt)

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Dec	16-31		100.0	100.0	100.0	100.0	97.0		100.0	100.0	97.0	97.5	99.4		98.8	100.0	100.0	100.0	99.9		100.0	99.8	100.0	100.0	99.3		99.9	99.9	100.0	99.9	100.0		100.0	100.0	100.0	100.0	99.0	100.0
Dec	1-15		100.0	100.0	100.0	100.0	94.8		100.0	100.0	93.9	94.9	98.1		97.3	99.9	99.8	100.0	9.66		100.0	99.5	100.0	100.0	98.7	! 	99.7	99.8	100.0	99.8	100.0		100.0	100.0	99.0	99.0	98.0	400.0
Nov	16-31		99.3	98.6	100.0	98.1	92.7		99.4	99.5	91.9	93.2	96.4		96.7	99.9	93.6	99.8	98.8		99.6	99.1	99.8	99.9	98.2		9.66	99.8	99.9	8.66	100.0		100.0	100.0	99.0	98.0	97.0	99.0
Nov	1-15		97.3	98.1	100.0	92.4	91.3		97.7	97.9	89.2	90.8	93.4		96.0	8.66	99.1	99.2	96.7		98.4	98.2	99.2	99.5	97.3		99.3	99.7	99.8	9.66	100.0		100.0	99.0	98.0	97.0	95.0	99.0
Oct	16-31		91.1	95.5	98.5	90.1	90.4		94.6	9.96	85.7	87.8	90.9	!	94.7	99.2	97.5	98.4	94.7		92.8	96.0	98.2	98.9	96.1		98.7	99.3	99.5	99.2	99.0		99.0	98.0	96.0	94.0	92.0	95.0
Oct	1-15		78.6	89.4	93.9	87.0	88.8		88.1	94.3	78.6	81.8	86.4		91.7	97.7	93.3	96.1	90.3		89.5	90.8	95.9	97.3	93.2		97.2	98.1	98.6	98.2	98.0		98.0	96.0	94.0	90.0	87.0	88.0
Sep	16-31		71.6	83.4	88.8	81.9	85.4		83.2	92.0	69.4	75.0	80.9		86.3	93.8	87.7	91.6	83.9		83.7	86.5	92.9	94.2	88.8	-	94.9	96.4	96.5	96.4	95.0		95.0	91.0	91.0	83.0	81.0	81.0
Sep	$\vdash$		65.1	72.6	78.3	72.1	77.2		74.4	86.5	54.4	63.6	70.3		74.0	83.6	77.2	81.2	71.6		72.9	78.3	86.0	86.5	79.4		89.0	92.2	91.2	91.6	90.0		90.0	85.0	85.0	76.0	74.0	74.0
Aug			26.0	56.9	64.7	61.4	66.2		59.7	73.6	35.0	50.4	55.8		59.7	71.5	67.0	68.7	59.4		57.5	66.3	75.4	75.7	67.5		77.1	83.1	84.6	83.9	77.0		77.0	77.0	78.0	69.0	99.0	0.79
Aug	1-15		49.2	40.1	46.8	48.0	50.0		38.9	48.3	24.5	36.7	36.5		40.6	51.4	54.1	50.7	44.7		37.3	46.5	56.6	58.4	51.7		54.1	64.2	72.4	68.8	63.0		63.0	67.0	69.0	62.0	65.0	0.09
Jul	16-31		46.0	27.3	29.0	32.3	32.0		19.8	24.8	19.9	22.7	15.7		18.5	24.7	40.2	31.0	28.3		17.4	21.5	35.8	41.6	36.4		30.7	44.5	59.2	52.8	49.0		49.0	55.0	61.0	55.0	60.0	53.0
Jul	1-15		41.8	20.8	19.9	24.4	23.6		1.1	12.1	18.4	17.1	7.4		9.1	9.9	28.3	18.4	17,6		8.4	10.3	21.8	28.8	26.6		18.2	29.8	44.0	38.3	36.0		36.0	43.0	51.0	48.0	54.0	46.0
Jun	16-30		29.8	16.5	15.8	21.0	20.5		7.6	5.0	18.3	15.7	5.4		6.5	3.5	18.1	10.2	10.0		4.9	7.2	13.2	18.8	19.7		12.8	20.1	30.0	27.2	23.0		23.0	29.0	37.0	38.0	46.0	39.0
Jun	1-15		15.5	13.7	13.3	19.4	19.3		6.0	2.4	18.2	15.1	4.7		5.6	1.3	11.5	6.4	9.9	<u> </u>	3.5	5.9	8.9	12.7	15.5		9.6	14.4	19.4	19.5	11.0		11.0	17.0	23.0	27.0	37.0	29.0
May	16-31		8.5	9.7	7.8	17.3	18.4		3.6	1.9	18.1	14.7	3.9		4.5	0.8	4.1	2.7	4.1		2.0	3.9	3.8	5.8	9	· ·	3.9	6.7	8.3	9.6	0.0		0.9	10.0	13.0	18.0	29.0	16.0
May			5.0	6.5	3.7	15.6	17.7		2.2	1.6	17.7	14.3	3.4		4.0	0.7	1.3	1.2	3.0		1.3	2.8	1.6	2.7	6.9		1.5	3.1	3.5	4.9	3.0		3.0	0.9	6.0	12.0	21.0	6.0
Apr		1	5.	3.6	0.0	14.4	16.3			0.9	16.3	13.7	2.8		3.6	0.2	0.6	0.5	1.9		9.0	2.0	0.5	1.3	4.5	<del></del> ;	6.0	1.2	9.	1.7	2.0		2.0	3.0	3.0	7.0	13.0	2.0
Apr	1-15		0.0	2.1	0.0	12.4	14.4		0.5	4.0	13.3	12.4	2.2		3.3	0	0.3	0.2	1.3		0.2	1.5	0.2	0.7	3.3	[	0.8	0.5	6.0	9.0	1.0		1.0	2.0	2.0	4.0	8.0	1.0
Mar	16-31	i	0.0	0.8	0.0	7.4	13.0		0.1	0.1	12.0	10.5	1.7		2.8	0.0	0.2	0.1	0.5		0.1	0.8	0.0	0.2	2.5		0.5	0.2	0.3	0.3	0.0		0.0	1.0	6.	3.0	6.0	1.0
Mar	1-15	:	0.0	0.3	0.0	2.8	11.4		0.0	0.0	10.4	7.8	1.3		2.1	0.0	0.2	0'0	0.2		0.0	0.4	0.0	0.0	2.1	-	4.0	0.2	0.1	0.2	0.0		0.0	1.0	1.0	2.0	4.0	1.0
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Feb			0.0	0.0	0.0	0.0	7.0		0.0	0.0	4.5	3.7	0.7		1.2	0.0	0.1	0.0	0.1		0.0	0.3	0.0	0.0	1.2		0.1	0.1	0.1	0.1	0.0		0.0	0.0	0.0	1.0	2.0	0.0
Jan	16-31	į	0	0.0	0.0	0.0	3.6		0.0	0.0	2.3	2.0	0.5		0.7	8	0.0	0.0	0.1		0.0	0.2	0.0	0.0	9.0		5	0.0	0.0	0.0	0.0		0.0	0.0	0.0	0.0	1.0	0.0
Jan		. ,	0.0	0.0	0.0	0.0	0.0		0.0	0.0	0.0	0.0	0.0		0.0	0.0	0.0	0.0	0.0		0.0	0.0	0.0	0.0	0.0	!	0.0	0.0	0.0	0.0	0.0		0.0	0.0	0.0	0.0	0.0	0
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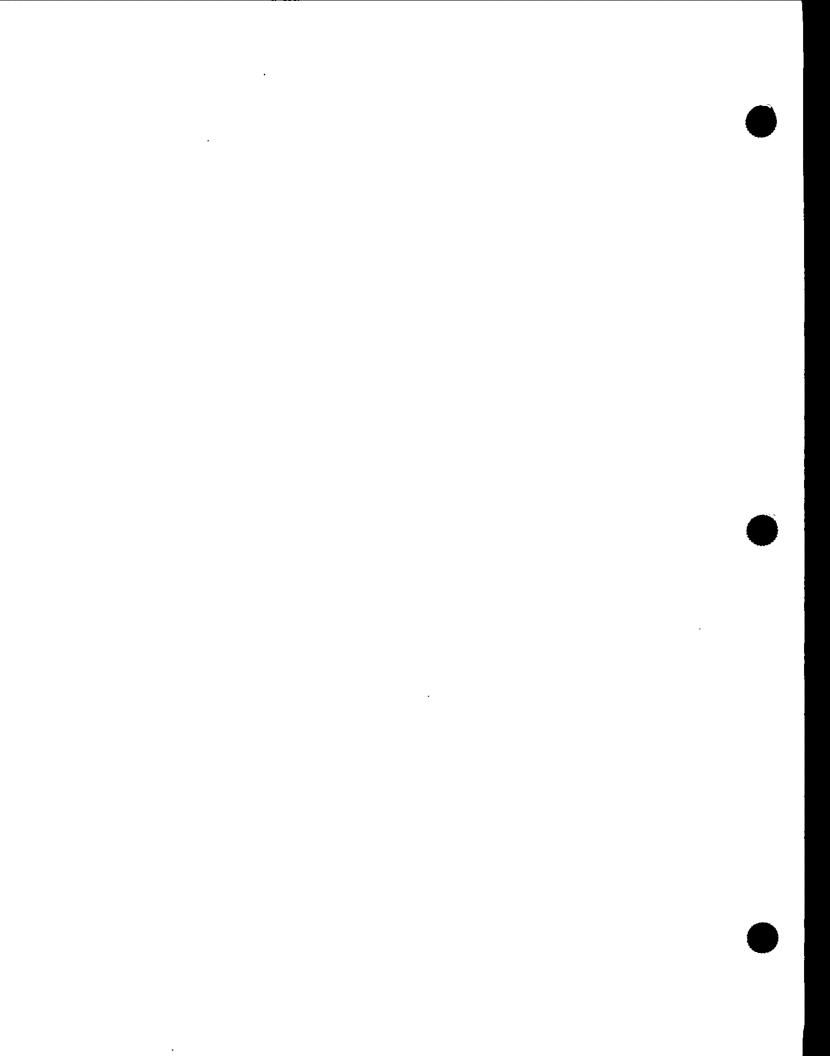
Construction Storm Water Permitting

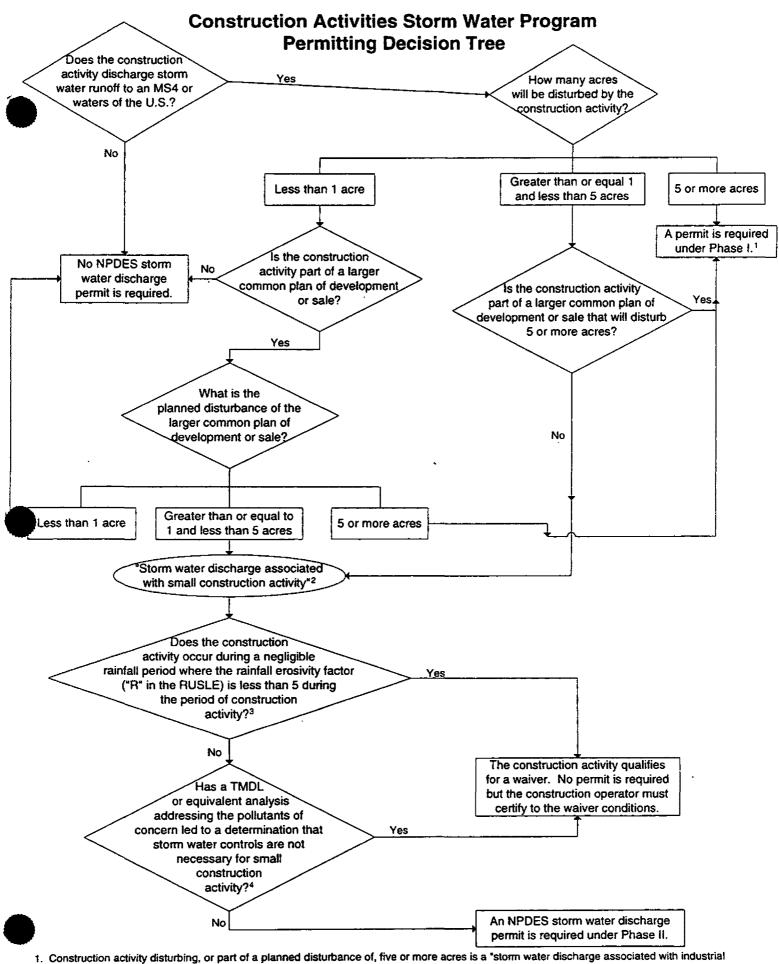
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# Exercise 3: Construction Storm Water Permitting

For this exercise, you will be presented with scenarios describing different types of construction activities. It is your job to determine, for each scenario, whether the construction activity should be permitted under either Phase of the Storm Water Program, and if so, who is the party responsible for permit compliance. Assume that a general permit for small construction activity has been issued in all of these locations and includes waivers for an R factor less than 5 and TMDL indicates storm water controls are not needed.

Read along on your exercise handout as the speaker describes each construction scenario. After each scenario, use the decision tree to help determine whether the construction activity described should be permitted under the NPDES Storm Water Program. For those construction activities which you determine should be permitted, determine the party responsible for SWPPP development and implementation and NOI and NOT submittal.





- activity" under category (x). See 40 CFR 122.26(b)(14)(x).
- 2. See new 122.26(b)(15) for the definition of \*storm water discharge associated with small construction activity.\*
- 3. See new 122.26(b)(15)(i)(A) for more details.
- See new 122.26(b)(15)(i)(B) for more details.

### Scenario A

Ms. Ella Bowroom buys a 13-acre lot in a rural area. She plans to build a house and a garage on the lot, overseeing and approving the site plans and work of the contractor. The construction of each building will disturb 1 1/4 acres. The RUSLE has been applied to this construction site and the R (rainfall erosivity) factor for the estimated period of construction is 14.

Does this project require a permit? Who is responsible for developing and implementing the SWPPP and submitting the NOI?

### Scenario B

State MegaFone plans to replace 40 miles of its overhead telephone lines along a major highway with underground fiber-optic cables. This project will be completed in ten 4-mile segments. Each of which will disturb approximately 3 acres.

Does this project require a permit?

### Scenario C

Paveall, Inc. plans to convert fifteen acres of farmland to an upscale suburban shopping mall. The construction will disturb all fifteen acres. The site engineers have applied the Revised Universal Soil Loss Equation and determined the R factor to be 4.5 during the period of construction.

Is Paveall, Inc. required to obtain permit coverage for storm water discharges from this site?

### Scenario D

Mr. Morehouse is a homebuilder who buys eight quarter-acre lots. He plans to build a home on each lot, the construction of which will disturb the full quarter-acre on each lot. The rainfall erosivity factor for this site during the period of construction is 17. A TMDL has been developed for the stream this project discharges to which determined that the sediment impairment is due to agricultural runoff and small construction in the watershed is an insignificant contributor to that sediment loading.

Is a permit required?

### Scenario E

Mr. Morehouse is also building a custom home on a half-acre lot in a six-acre subdivision, comprised of six half-acre lots and three acres of open space (which will not be disturbed). A general contractor is overseeing the construction on all lots in the subdivision. The construction of the homes will disturb the full half-acre on each lot. The R (rainfall erosivity) factor from the RUSLE is 6 for the period of construction.

Is a permit required?

### Scenario F

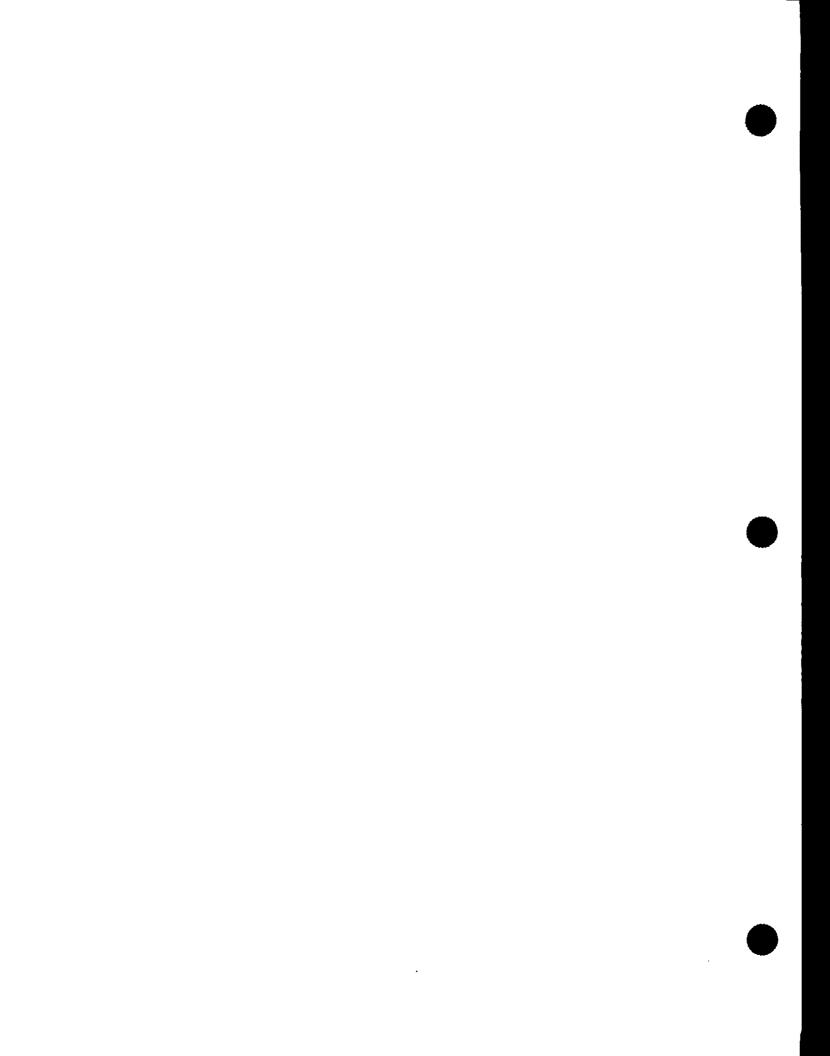
Ken Structer is a contractor working for an out-of-state landowner who has purchased a one-acre lot in a five-acre planned shopping center. Mr. Structer has been hired to oversee the construction of a record store and parking area on this lot. The RUSLE has been applied to this site and the R (rainfall erosivity) factor has been determined to be 3 during the period of construction activity.

Does this construction activity require a storm water permit and, if so, who needs to get the permit?

### Scenario G

XYZ Construction Company hired and is supervising a subcontractor to clear and grade a 1.5 acre lot. An R (rainfall erosivity) factor of 8 has been calculated for this construction activity.

Does this project require a permit? Who is responsible for developing and implementing the SWPPP and submitting an NOI?



# Module 4

Storm Water Pollution Prevention Plans

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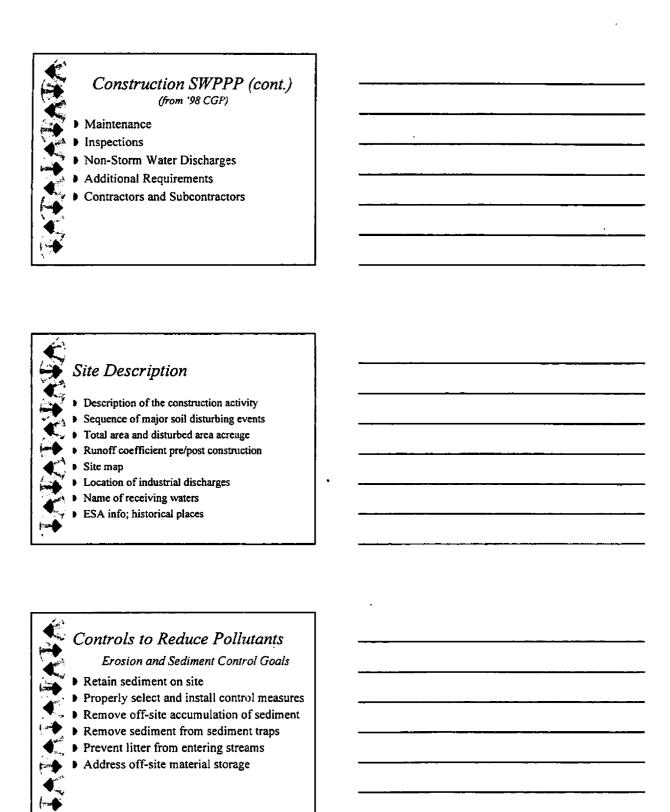
# 5 Major Phases in Developing and Implementing a SWPPP

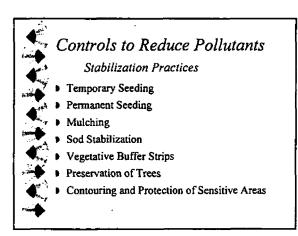
- ▶ Planning and Organization
- Assessment
- **▶** BMP Identification
- ▶ Plan Implementation
- Evaluation



# Construction SWPPP (from '98 CGP)

- **▶** Site Description
- Controls to Reduce Pollutants
  - Erosion and Sediment Controls
  - · Stabilization Practices
  - · Structural Practices
  - Storm Water Management
  - · Other Controls
  - · State/Tribal and Local Controls







# Controls to Reduce Pollutants

Structural Practices

- Earth Dike
- ▶ Silt Fence
- Drainage Swales
- Sediment Traps
- Check Dams
- ▶ Level Spreader
- Subsurface Drain
- ▶ Pipe Slope Drain
- ▶ Temporary Storm Drain Diversion
- ▶ Storm Drain Inlet Protection
- Rock Outlet Protection
- Other Controls

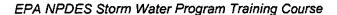


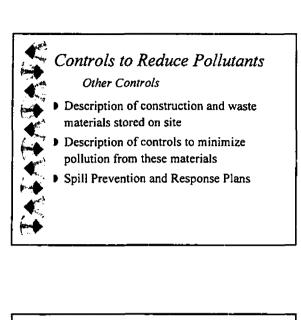
# Controls to Reduce Pollutants

Storm Water Management

- Description of storm water management measures
- Construction permit only covers installation of these measures
- Measures should address the volume and velocity of runoff, as well as reduce the quantify of pollutants discharged postconstruction









# Controls to Reduce Pollutants

State/Tribal and Local Controls

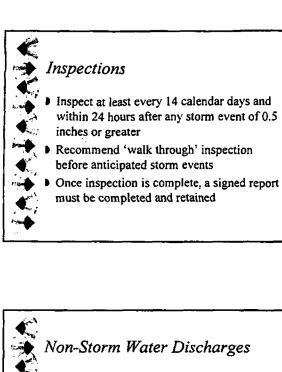
SWPPP should be consistent with procedures and requirements of State/Tribal and local sediment and erosion control plans and storm water management plans.

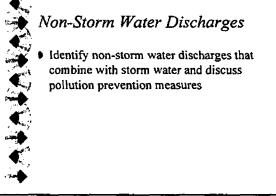


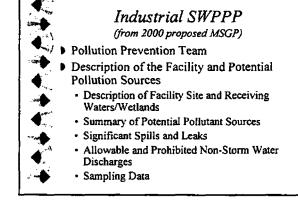
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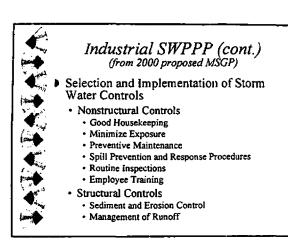
### Maintenance

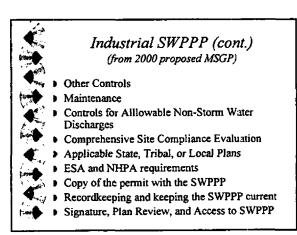
- BMPs must be maintained in effective operating condition
- Any repairs must be performed before next anticipated storm event, if possible.







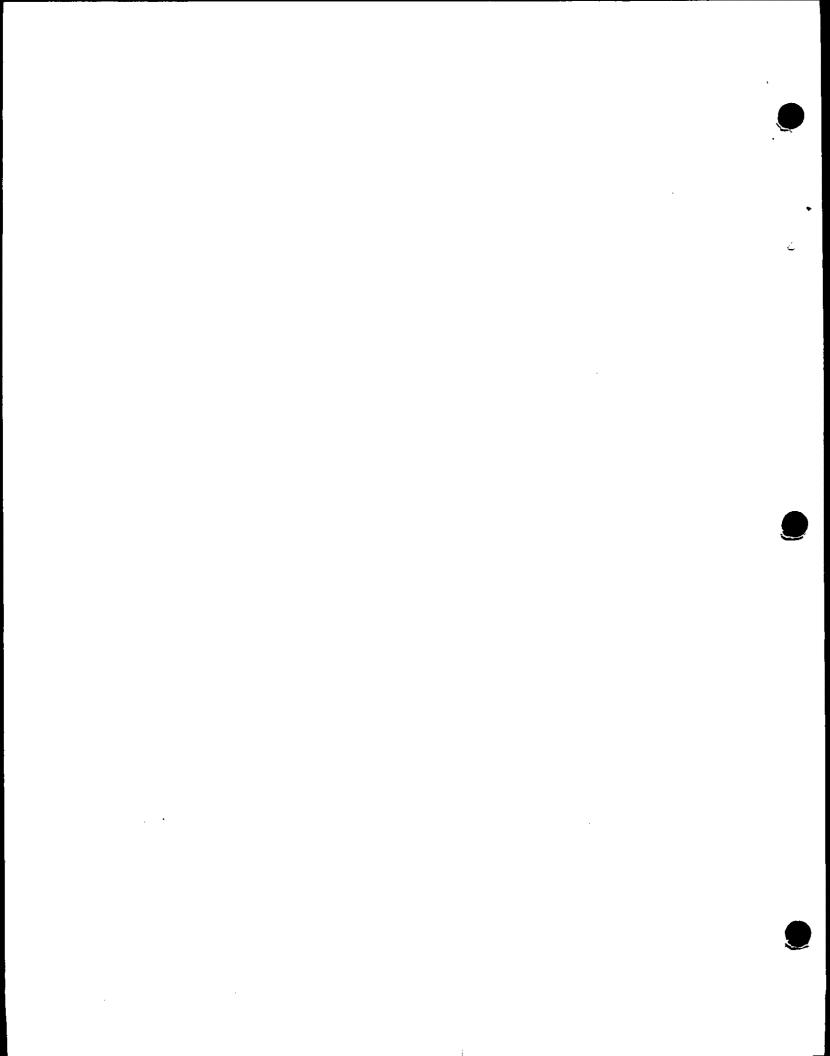




# Module 5

The NPDES MS4 Storm Water Program

[Slides and Handouts]



# Module 5

# The MS4 Storm Water Program

# MS4 Storm Water Program

- ■Coverage: Three types of regulated MS4s
- Permit options
- ■Permit application requirements
- ■Permit requirements
- Exercise: Determining status as a regulated small MS4

### What is an MS4?

A municipal separate storm sewer system (MS4) is:

A conveyance or system of conveyances... owned by a State, city, town, or other public entity that discharges to waters of the U.S. and is:

- designed or used for collecting or conveying storm water
- not a combined sewer
- hot part of a Publicly Owned Treatment Works (POTW)

EPA NPDES Storm Water Program Training Co	oursi	Cour:	rs
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### Phase I MS4 Coverage

### Phase I covers Medium and Large MS4s

- ► Medium MS4s are in places with a population of 100,000 ≤ 249,999
- ► Large MS4s are in places with a population of ≥250,000
- Many MS4s in places less than 100,000 have also been designated by the PA

# Medium and Large MS4s Permit Application — Part 1

### **Key Elements:**

- General information
- Existing legal authority
- Source identification information
- Discharge and representative outfall characterization
- Existing storm water management programs description
- Proposed Part 2 sampling plans

# Medium and Large MS4s Permit Application — Part 2

### **Key Elements:**

- Enhanced information from Part 1
- Description of proposed storm water management program
- Assessment of proposed storm water management program
- Fiscal analysis

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# Medium and Large MS4 Program Permit Requirements

- MS4 operators required to "reduce the discharge of pollutants to the MEP"
- MS4 Storm Water Management Programs:
  - Identify major outfalls and pollutant loadings
  - Detect and eliminate non-storm water discharges to the storm sewer system
  - Reduce pollutants in runoff from industrial, commercial and residential areas
  - Control storm water discharges from new development & redevelopment areas

### Medium and Large MS4 Program Permit Requirements

- Storm Water Management Programs must be approved by the PA
- Once approved, an individual permit is created and issued by the PA
- Under permit, MS4 operators must also:
  - Conduct analytical and visual monitoring
  - Submit periodic program assessment reports

# Medium and Large MS4 Program The Permittees

Status of Medium/Large MS4 Permitting:

- 179 permits issued; 56 permits in the process
- 994 total permittees including State DOTs, municipalities, universities, and regional authorities/districts
- Majority of permittees were designated by the PA (located in areas <100,000)

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# Storm Water Phase II Final Rule Small MS4 Coverage

What is a "small" MS4?

A small MS4 is any MS4 that is not already designated and regulated as a medium or large MS4, and includes Federally-operated systems.

# Storm Water Phase II Final Rule Small MS4 Coverage

A <u>regulated</u> small MS4 is any small MS4:

- Located in an "urbanized area"
  ("automatic" nationwide designation)
  and not waived by the PA; or
- Designated by the PA

### Small MS4 Coverage Urbanized Area Definition

A central place (or places) and the adjacent densely settled surrounding territory that together have a minimum residential population of 50,000 people and a minimum average density of 1,000 people/square mile.

# Small MS4 Coverage Urbanized Area Map Central Place Incorpor ded Place Incorpor ded Place Vinincorpor ded Urbanized Area Parca Fortan of a Town (MCD) or Courty Urbanized Area Town or Township es a face town (Courty area of a Courty area of

# Small MS4 Coverage Determining Location in a UA

- Operators of small MS4s should determine if they are located within the boundaries of a Bureau of the Census-defined "urbanized area" that is based on the latest decennial Census
- Operators have several options for finding the necessary information concerning UA boundaries

# Small MS4 Coverage Determining Location in a UA

- Appendix 6 to the preamble
- www.census.gov/mp/www/geo/msgeo12.html
- http://factfinder.census.gov/java\_prod/dads. ui.homePage.HomePage
- State Data Centers

### Small MS4 Coverage Designation by the PA

■ The PA must develop and apply designation criteria to small MS4s, located outside of a UA, serving a jurisdiction with ≥10,000 population and ≥1,000/sq. mile population density

# Designation by the PA Designation Criteria

- Discharge to sensitive waters
- High growth or growth potential
- High population density
- Contiguity to an urbanized area
- Significant contributor of pollutants to waters of the U.S.
- Ineffective protection of water quality by other programs

### Designation by the PA

■ The PA must also designate any small MS4 that is substantially contributing pollutants to a physically interconnected regulated MS4

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# Regulated Small MS4 Waivers Waiver Option 1

### Available where...

- The regulated small MS4 serves a population of less than 1,000 within the UA
- The regulated small MS4 is not contributing to the pollutant loadings of a physically interconnected regulated MS4
- If the regulated small MS4 is discharging to an impaired water body, storm water controls are not needed based on a TMDL that addresses the pollutants of concern

# Regulated Small MS4 Waivers Waiver Option 2

#### Available where...

- The regulated small MS4 serves a population of less than 10,000
- The PA has evaluated all waters that receive a discharge from the regulated small MS4
- The PA has determined that storm water controls are not needed based on a TMDL or equivalent analysis that addresses the pollutants of concern
- The PA has determined that future discharges will not impact water quality.

### Regulated Small MS4 Phase-In

The PA may phase-in the requirements for regulated small MS4s with populations less than 10,000 on a schedule consistent with a State watershed permitting approach

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### Regulated Small MS4 Permit Requirements

- Required to develop, implement and enforce a program to:
  - Reduce the discharge of pollutants to the maximum extent practicable (MEP)
  - > Protect water quality
  - Satisfy the appropriate water quality requirements of the Clean Water Act
- Program must include:
  - Six minimum control measures
  - Evaluation/assessment efforts & recordkeeping

# Regulated Small MS4 Permit Requirements

- Must submit an NOI or individual permit application and identify the following elements for each minimum control measure:
  - Best management practices
  - Measurable goals
  - Firming and frequency of the actions
  - Responsible persons
- EPA will issue a "menu" of BMPs as guidance

# Regulated Small MS4 Permit Requirements

Must evaluate program and submit reports:

- Annual reports in the first permit term, in years 2 and 4 in subsequent terms
- No monitoring is required under the rule, but may be required by the PA
- Also need to keep relevant records for at least 3 years

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# Regulated Small MS4 Permit Requirements

### Reports must include:

- Status of compliance with permit conditions:
  - Assessment of BMPS and measurable goals
- Results of any info collected and analyzed, including monitoring data
- A summary of the storm water activities planned for the next reporting cycle
- A change in any measurable goals or BMPs
- Notice that relying on another entity, if applicable

# Regulated Small MS4 Permit Options

### **General Permit**

- Strongly encouraged by EPA
- Application: Notice of Intent (NOI) required
- Application requirements: Follow rule requirements in sections 122.33-122.35
- Permit requirements: Found in section 122.34

# Regulated Small MS4 Permit Options

### Individual Permit

- Application requirements:
  - Option 1 Phase II application
  - Poption 2 Phase I application
- Permit requirements: As found in 122.34 or 122.26(d)

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# Regulated Small MS4 Permit Options

Modification of Existing Phase I Permit — Co-permittee with Medium/Large MS4

- Application requirements:
  - Comply with applicable Phase I MS4 application requirements in lieu of Phase II requirements
- Permit requirements:
  - Comply with the applicable terms of the modified permit in lieu of Phase II requirements

# Regulated Small MS4 Permit Flexibility for the PA

Qualifying State, Tribal and Local Programs

- PA may include conditions in permit that direct the operator to follow a "qualifying" program's requirements rather than the requirements of the minimum control measures in 122.34(b)
- The permittee's compliance with the qualifying program is deemed compliance with the NPDES permit for the particular measure(s)

# Regulated Small MS4 Permit Flexibility for the PA

Recognizing Existing State, Tribal and Local Responsibilities

- In the small MS4 permit, the PA may recognize that another governmental entity is responsible, under an NPDES permit, for one or more of the minimum control measures
- The permittee is not obligated to include the particular measure(s) in their program

# Regulated Small MS4 Permit Flexibility Examples

- Qualifying local programs
  - State program requires MS4 operators to eliminate illicit discharges
- Recognizing existing programs
  - Phase I county has developed outreach program for whole county

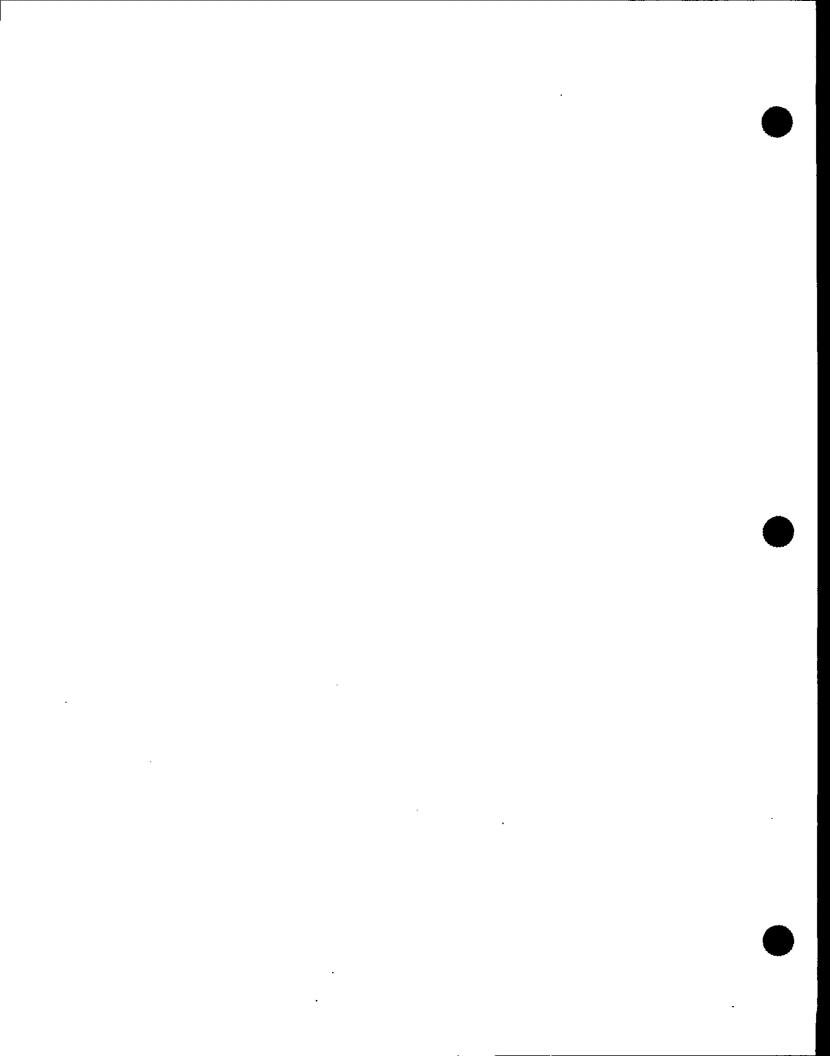
### **Small MS4 Implementation Options**

- Become a co-permittee with another regulated small, medium, or large MS4
- Seek own permit but rely on another entity for one or more of the minimum control measures
  - Must be as stringent
  - Make a note in NOI and reports
  - Must have permission
  - Permittee remains liable

### Deadlines for Small MS4 Compliance

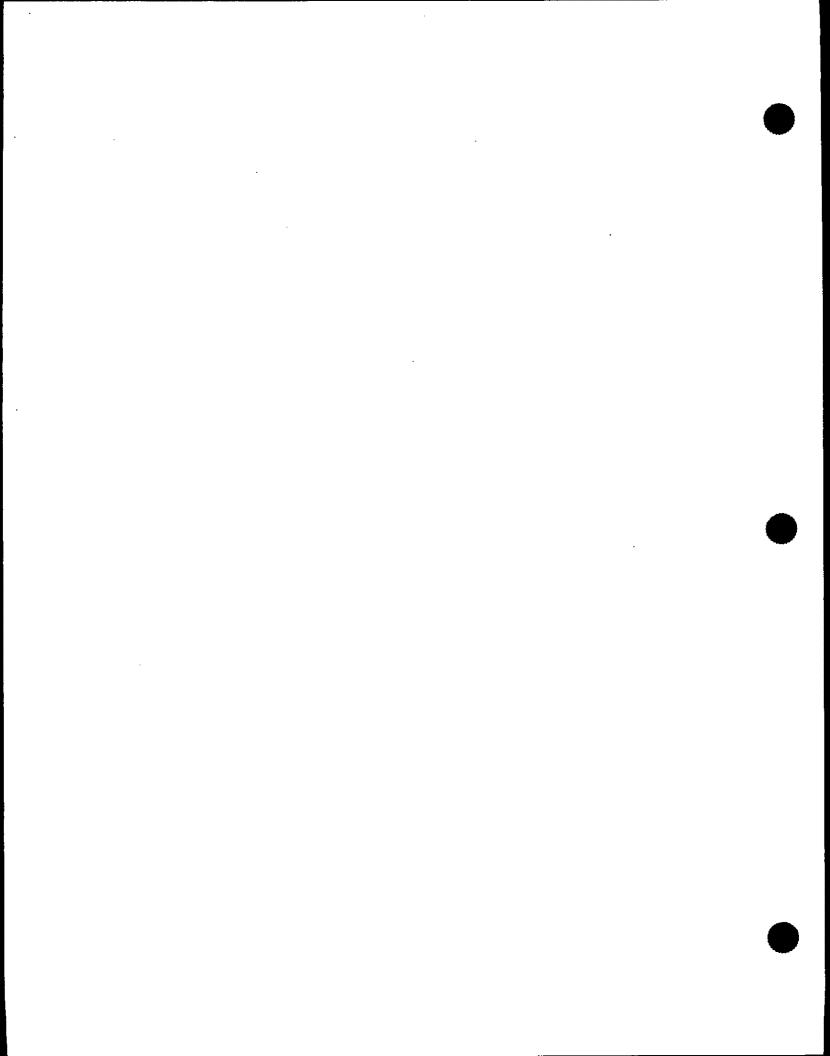
- "Automatically" designated small MS4s:
  - Permit coverage by March 10, 2003
  - If PA has approved schedule for phasing coverage for MS4s <10,000 - coverage by March 8, 2007
- Individually designated small MS4s:
  - Permit coverage within 180 days of notice
- Full implementation of MS4's program:
  - \* Within 5 years of permit issuance

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# STORM WATER PHASE II RULE SMALL MS4 FLEXIBLE PERMITTING OPTIONS

CO-PERMITTEE with an NPDES:Regulated Entity	N/A	Operator chooses     whether to be a copermittee with another regulated MS4 and submits a single NOI or individual permit application     The operators determine who will do what and include this information in the permit application	
RELYING on Another Entity	N/A	Operator chooses, under its own permit, whether to rely on another entity to implement 1 or more minimum measure on its behalf—can be a non-NPDES regulated entity.      Operator notes in NOI or indiv. permit application that it is relying on another entity to implement a measure.      Remain liable if other entity fails to perform the measure effectively.	An environmental group is doing educational outreach on the impacts of storm water runoff.     A county is already implementing a construction runoff control program under a Phase I NPDES permit.
RECOGNIZING an NPDES-Regulated Entity	PA assesses entities that are, or will be, performing the equivalent of I or more of the small MS4 minimum measures under an NPDES permit.     PA chooses whether to recognize such an entity in a small MS4 permit.	Operator has no responsibility to perform the measure(s) that is being done by the recognized entity.     Not held liable if the other entity fails to perform the measure effectively; however, PA may then require the operator to implement the measure itself.	A county doing educational outreach for the whole county under a Phase I NPDES permit could be recognized, thereby relieving all small MS4s in the county from having to have their own educational outreach programs.
Referencing a QUALIFYING LOCAL PROGRAM (QLP)	<ul> <li>PA assesses local, State, and Tribal NPDES and non-NPDES programs to determine if their requirements are equivalent to one or more Phase II minimum measures for regulated small MS4s</li> <li>PA chooses whether to reference a QLP in small MS4 permit. Requires permittee to follow requirements of QLP rather than new permit requirements.</li> <li>PA does not need to notify the administrator of the QLP or obtain permission since referencing the QLP has no bearing/no affect on the administrator.</li> </ul>	<ul> <li>The operator should already be complying with any QLP referenced in the permit.</li> <li>Compliance with the QLP is considered compliance with the NPDES permit; therefore operator held liable if doesn't comply with the QLP.</li> </ul>	The QLP in the small MS4 permit could be a State program that requires MS4 operators to detect & eliminate illicit discharges into their systems.
	AUTHORITY Responsibilities	SMALL MS4 OPERATOR Responsibilities	EXVAISTES



# Exercise 4

Determining Applicability of the Phase II Program for Small MS4s

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#### Exercise 4: Determining Applicability of the Phase II Program for Small MS4s

For this exercise, you are presented with 1990 census population information and maps for four municipalities that are not currently regulated under the NPDES storm water program. For each municipality, answer the series of questions to help you determine whether coverage is required under Phase II and what the permitting authority and the MS4 must do.

- 1. Peoria, Illinois has a population of 113, 504 with a population density of 2,775 people per square mile. The city is served partially by combined sewers and partially by separate sewers. 77,000 people are served by combined sewers and 36,504 people are served by separate sewers.
- 2. Leesburg, Virginia has a population of 16,202 with a population density of 1,404 people per square mile. The city is completely served by separate sewers.
- 3. Lisbon, Connecticut has a population of 3,830 with a population density of 232 people per square mile. 405 people are in the part of the city located within the UA and 3,425 people are in the part of the city located outside the UA. The city is completely served by separate sewers.
- 4. Burlington, Vermont has a population of 39,127 with a population density of 3,709 people per square mile. The city is completely served by separate sewers.
- 1. Is the population served by the MS4 greater than 100,000?
- 2. Is the MS4 located within an urbanized area (UA)?
- 3. If the MS4 is located within a UA, is the population served by the MS4 within the UA less than 1,000 or less than 10,000?
- 4. If the MS4 is not located in a UA, is the population greater than 10,000 people and is the density greater than 1,000 people per square mile?
- 5. What is required of the PA and the MS4/

#### How to Determine if an MS4 is in an Urbanized Area

Appendix 6: The most readily available resource is Appendix 6 to the Preamble of the December 8, 1999 Rule. Appendix 6 lists governmental entities that are partially, or fully located within an urbanized area boundary. Appendix 6 is a general guidance list only, it is not a listing of all governmental entities that are subject to Phase II and, therefore, EPA recommends that a small MS4 operator confirm its potentially regulated status through alternative means.

#### Enviromapper:

EPA is modifying a web-based geographic program called *Enviromapper*. This will allow MS4 operators to enter a location and see a detailed map of the UA boundary. Information about *Enviromapper* will be available at www.epa.gov/owm/phase2.

#### The Bureau of the Census: Urbanized Areas Staff: 301 457-1099

A publication titled *Urbanized Areas of the U.S. and Puerto Rico* provides 8x11 maps of every UA and listings of all governmental entities located fully or partially within the UAs. This book is currently out of print but is still available at considerable cost.

#### www.census.gov:

The site provides information on purchasing UA maps and electronic files for use with computerized mapping systems. Obtain free UA cartographic boundary files (Arc/Info export format) for Geographical Information System (GIS) use at: www.census.gov:80/geo/www/cob/ua.html.

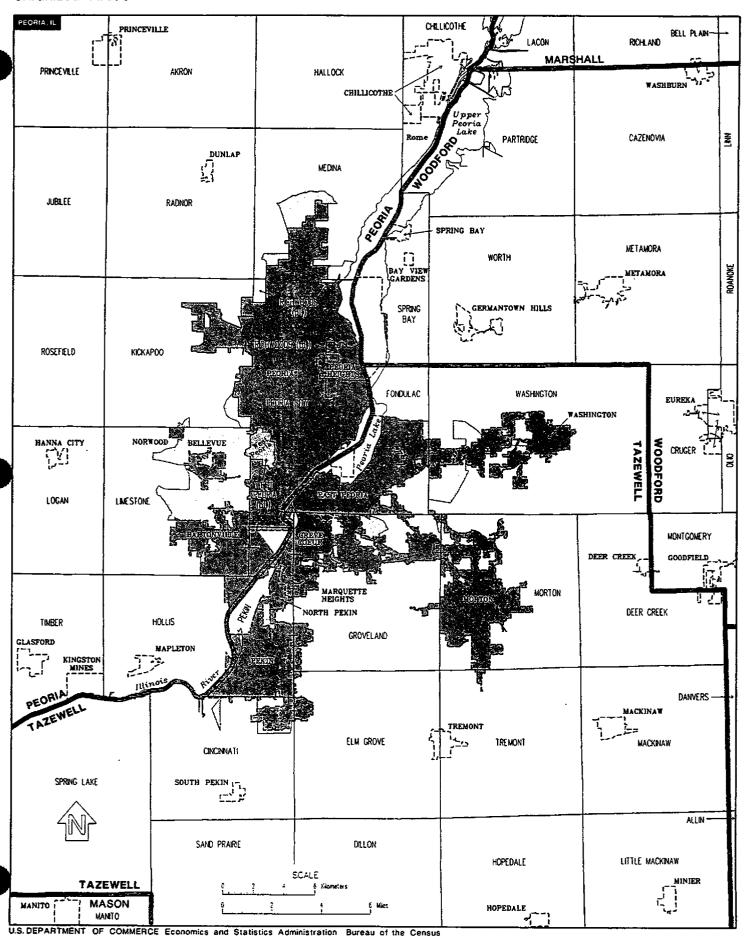
To view and print maps that display the urbanized areas, go to: http://factfinder.census.gov/java\_prod/dads.ui.homePage.HomePage and click on reference maps. To only display the urbanized areas, click on boundaries under display and make sure that Census Track, Block Group and Place are not checked.

UA Maps: Detailed UA maps are available for purchase with a \$25 minimum order (\$5 per map sheet). Each map sheet measures 36 by 42 inches. For prices and a listing of UAs, visit www.census.gov/mp/www/geo/msgeo12.html. Order from the Department of Commerce, Bureau of the Census (MS 1921), P.O. Box 277943, Atlanta, GA 30384-7943 (Phone: 301 457-4100; Toll-free fax: 1-888-249-7295).

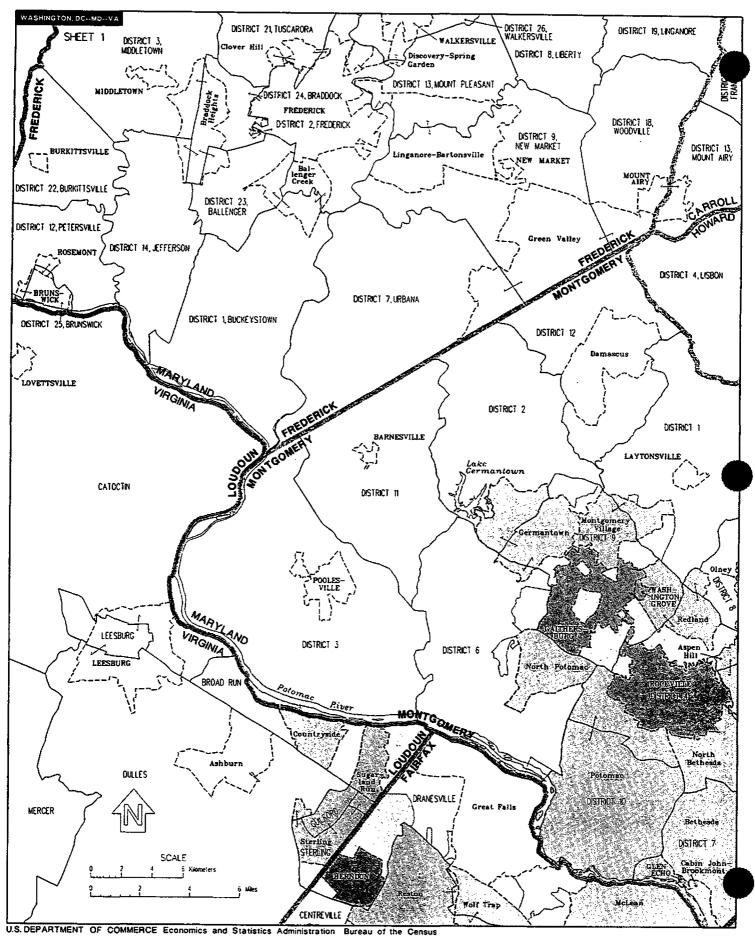
Planning Agencies: Consult with a local, regional, or State planning agency.

NPDES Permitting Authority: Consult with your NPDES permitting authority. Each PA should have gathered the relevant UA information from the Bureau of the State Data Center that houses Bureau of the Census data (every state has one).

State Data Centers: Each State's Data Center receives listings of all entities that are located in UAs, as well as detailed maps and electronic files of UA boundaries. The Bureau of the Census web site includes a list of contact names and phone numbers for the data in each State at www.census.gov/sdc/www.

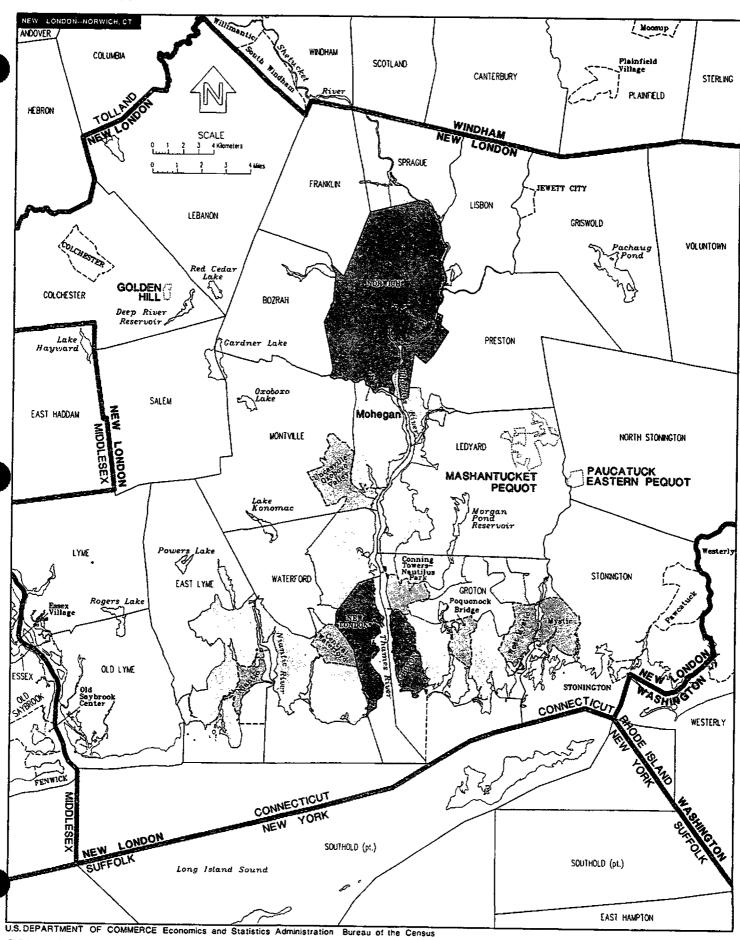


#### **Urbanized Areas**

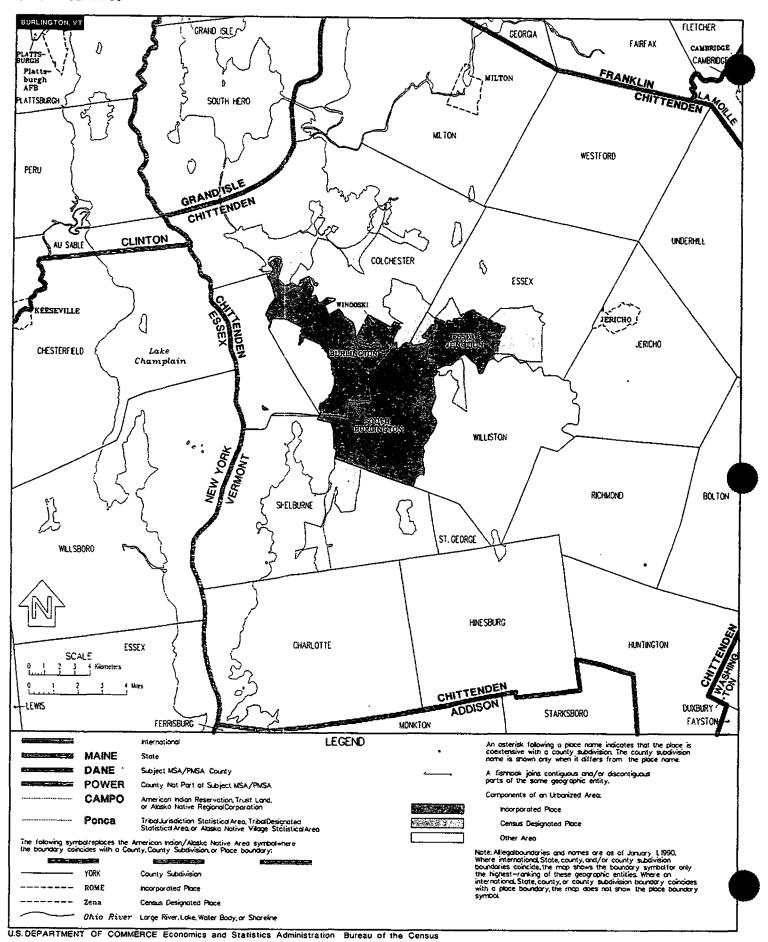


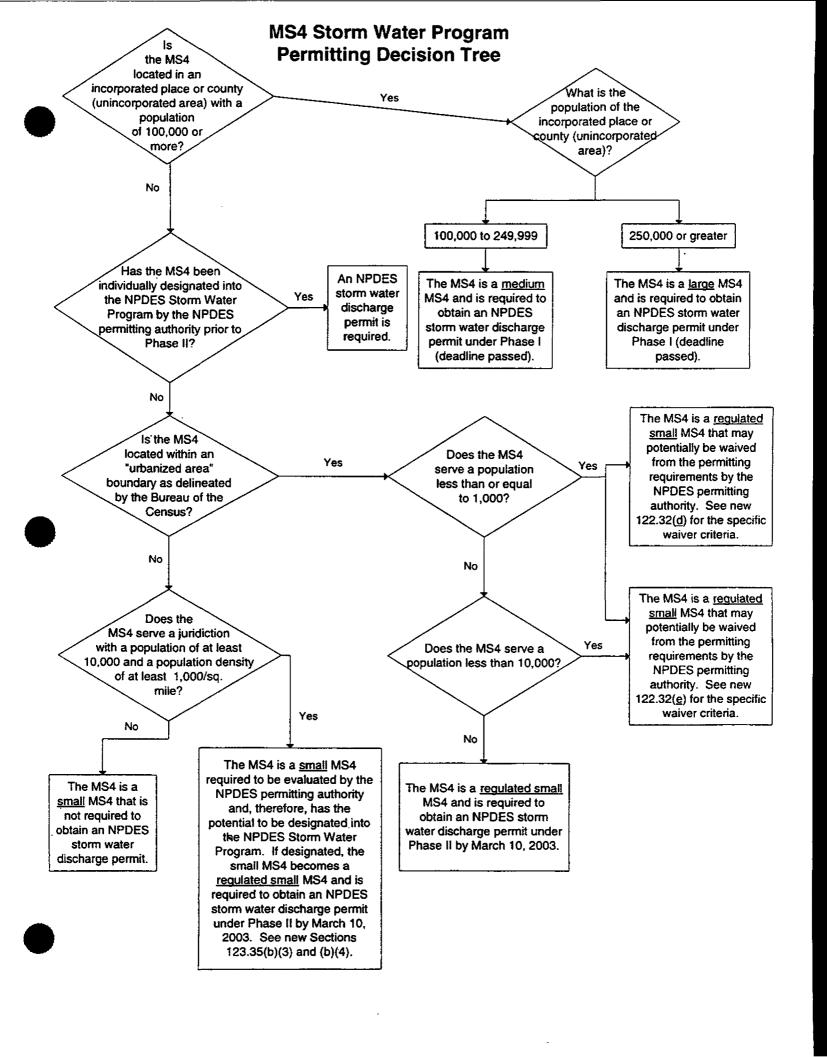
**MAPS** 

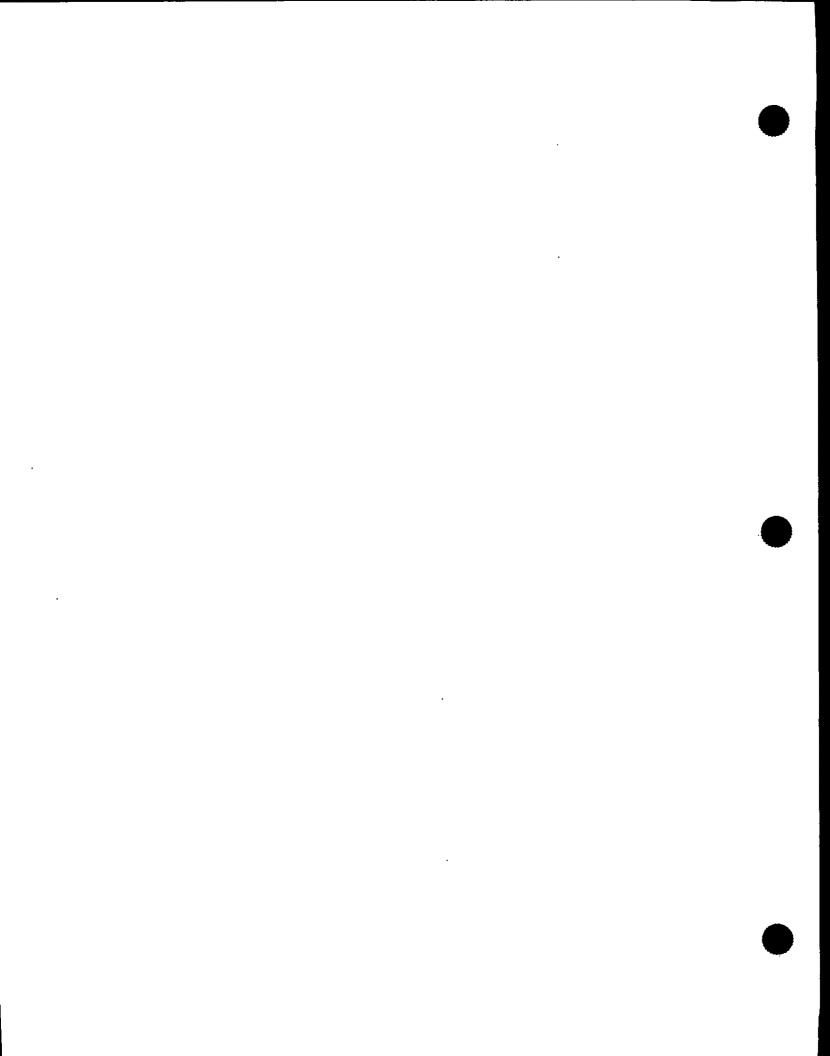
#### **Urbanized Areas**



#### **Urbanized Area**







# Module 6

Examples of Municipal BMPs and Measurable Goals

[Slides]

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#### Module 6

# Minimum Measures, BMPs and Measurable Goals

#### Minimum Control Measure: Public Education and Outreach

#### MUST:

- →Distribute educational materials to the community, 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 storm water runoff

#### Minimum Control Measure: Public Education and Outreach

#### RECOMMEND:

- → May use materials provided by others
- → Inform public on how to get involved in storm water program activities
- → Tailor program to target specific groups of entities, particularly those likely to have significant storm water impacts
- → Address the viewpoints and concerns of minority and disadvantaged communities

EPA	<b>NPDES</b>	Storm	Water	Program	Tra	inina	Course

## Public Education and Outreach What Are Some BMPs for Implementing This Measure?

- → Develop and distribute brochures on proper septic system maintenance
- → Target specific groups outreach to restaurants on impact of grease clogging storm drains
- → Develop alternative information sources, such as web sites, bumper stickers, refrigerator magnets, and restaurant placemats
- ⇒Storm Drain Stenciling
- → Develop educational programs for school-age children

# Public Education and Outreach What Are Appropriate Measurable Goals?

Target	Activity
l year	3 Brochures developed and distributed in water utility bills
2 years	A web site created; school curricula developed; storm drains stenciled.
3 years	75% of public reached with storm water educational material
4 years	Survey shows 20% increase in public awareness of storm water

# Minimum Control Measure: Public Involvement/Participation

#### MUST:

→ Comply with State, Tribal and local public notice requirements

#### **RECOMMEND:**

- → Provide opportunities for the public to participate, such as:
  - Local storm water management panel
  - Volunteer monitoring

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## Public Participation What Are Some BMPs for Implementing This Measure?

- → Set up a local storm water management panel which includes members of the public
- → Establish volunteer water quality monitoring program
- →Stream Clean Up Days
- →Use volunteers groups to find/map outfalls
- -Set up a hotline for water quality complaints

# Public Participation What Are Appropriate Measurable Goals?

Target	Activity
1 year	Notice of a public meeting in different print media and bilingual flyers; local SW panel established
2 years	Final recommendations of local SW panel; radio spots promoting program and participation.
3 years	3 Stream Clean Up days held every year
4 years	Volunteer monitoring results published

# Minimum Control Measure: Illicit Discharge Detection and Elimination

What are some sources of illicit discharges?

- ⇒Sanitary wastewater
- →Effluent from septic tanks
- →Improper auto and household toxics disposal
- →Do all illicit discharges need to be addressed?
- →No, not all illicit discharges are illegal (e.g., fire fighting, dechlorinated swimming pool water, etc.)

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# Minimum Control Measure: Illicit Discharge Detection and Elimination

#### **MUST**

- → Develop a sewer system map of all outfalls and the names of all receiving waters
- →Prohibit non-storm water discharges, through an ordinance or other means, and implement appropriate enforcement procedures
- →Implement a plan to detect and address non-storm water discharges
- →Inform public of hazards associated with illegal discharges and improper disposal of waste

# Minimum Control Measure: Illicit Discharge Detection and Elimination

#### RECOMMEND:

- → A plan with procedures for:
  - Locating priority problem areas
  - Tracing the source of an illicit discharge
  - Removing the source
  - Program evaluation & assessment
- Promotion of public reporting of discharges
- → Distribution of outreach materials
- Storm drain stenciling

# Illicit Discharge Detection & Elimination What Are Some BMPs for Implementing This Measure?

- → Collect all existing information on outfall locations (e.g., city records, drainage maps, storm drain maps), and then conduct field surveys to verify locations;
- Coordinate volunteers for locating outfalls or stenciling storm drains.
- → Locate problem areas for detailed screening using methods such as public complaints; visual screening; water sampling from manholes and outfalls during dry weather; and infrared and thermal photography.
- → Initiate recycling programs for commonly dumped wastes, such as motor oil, antifreeze, and pesticides.

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EPA	<b>NPDES</b>	Storm	Water	Program	Training	Course

## Illicit Discharge Detection & Elimination What Are Some BMPs for Implementing This Measure?

- → Determine the source of the problems using methods such as:
  - · dye-testing buildings in problem areas;
  - · dye- or smoke-testing buildings at the time of sale;
  - · tracing the discharge upstream in the storm sewer;
  - employing a certification program that shows that buildings have been checked for illicit connections;
  - implementing an inspection program of existing septic systems; and
  - · using video to inspect the storm sewers.

## Illicit Discharge Detection & Elimination What Are Appropriate Measurable Goals?

Target	Activity
l year	Outfall locations mapped; recycling program for household hazardous waste in place.
2 years	Ordinance in place; training for public employees completed
3 years	50% of priority areas have been screened for illicit discharges; households participating in quarterly household hazardous waste special collection days.
4 years	all identified illicit connections have been fixed.

#### Minimum Control Measure: Construction Site Storm Water Runoff Control

#### MUST:

- → Develop a program to reduce pollutants from construction activities that disturb ≥ 1 acre
- →Use an ordinance, or other regulatory means, with penalties, that requires appropriate E&S controls and requirements to control waste
- → Have procedures for:
  - · site plan review
  - site inspection & enforcement
  - public input

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FDA	NDDES	Storm	Water	Program	Training	Course
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#### Minimum Control Measure: Construction Site Storm Water Runoff Control

#### RECOMMEND:

- Procedures for site plan review should include review of individual pre-construction site plans
- → Procedures for site inspections and enforcement could include steps to identify priority sites based on the nature of the site, topography, soil characteristics, and receiving water quality.
- → Provide appropriate educational and training measures for construction site operators

# Construction Site Runoff Control What Are Some BMPs for Implementing This Measure?

- → Develop an ordinance that requires controls for polluted runoff from construction sites that disturb more than one acre;
- → Develop procedures for site plan reviews and inspections:
- → Provide guídance or training to local construction operators on appropriate E&S controls

# Construction Site Runoff Control What Are Appropriate Measurable Goals?

Target	Activity
l year	Ordinance or other regulatory mechanism in place: procedures for information submitted by the public in place.
2 years	Procedures for site inspections implemented; educational program for construction operators in place
3 years	75% of local construction operators trained
4 years	90+% of sites complying with local ordinance

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#### **Minimum Control Measure:**

#### Post-construction Storm Water Management in New Development and Redevelopment

- →Develop a program, using an ordinance or other regulatory means, to address runoff from new development and redevelopment projects that disturb ≥ 1 acre
- →Implement strategies with a combination of structural and/or non-structural BMPs
- ⇒Ensure adequate long-term operation & maintenance (O&M) of BMPs

#### **Minimum Control Measure:**

#### Post-construction Storm Water Management in New Development and Redevelopment

#### RECOMMEND:

- The BMPs chosen should:
  - · be appropriate for the local community
  - · minimize water quality impacts
  - attempt to maintain pre-development runoff conditions
- Participate in watershed planning efforts
- Assess existing ordinances, policies, and programs that address storm water runoff quality
- Provide opportunities for public participation

- - low impact development
  - smart growth
- Establish site-based local controls such as buffer strip and riparian zone preservation, minimization of disturbance and imperviousness, and maximization of open space.

Post-Construction/ New Development/ Redevelopment	
What Are Some Non-Structural BMPs for Implementing This Measure?	
Address post-construction impacts through a planning approach that considers water quality:	
- master plans	
- watershed plans	

# Post-Construction/ New Development/ Redevelopment What Are Some Structural BMPs for Implementing This Measure?

- → Incorporate storm water storage into your system:
  - wet ponds,
  - dry basins, or
  - multi-chamber catch basins
- → Promote infiltration systems:
  - infiltration basins/trenches,
  - dry wells, and
  - porous pavement

#### Post-Construction/ New Development/ Redevelopment What Are Appropriate Measurable Goals?

Target	Activity	
1 year	Strategies developed that include structural and/or non-structural BMPs.	
2 years	Strategies codified by use of ordinance or other regulatory mechanism.	
3 years	Reduced percent of new impervious surfaces associated with new development projects.	
4 years	Improved clarity and reduced sedimentation of local waterbodies.	

# Minimum Control Measure: Pollution Prevention/Good Housekeeping for Municipal Operations

#### MUST:

- → Develop an O&M program to prevent or reduce pollutant runoff from operations
- → Include employee training to prevent and reduce storm water pollution from activities such as the maintenance of park and open space, buildings, and storm water systems.

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#### **Minimum Control Measure:**

Pollution Prevention/Good Housekeeping for Municipal Operations

#### **RECOMMEND:**

- → Maintenance activities and schedules, and long-term inspection procedures
- → Controls on the discharge of pollutants from streets, salt/sand storage areas, waste transfer stations, etc.
- -Procedures for disposing of waste from the MS4
- → Ensure new flood management projects assess impacts on water quality

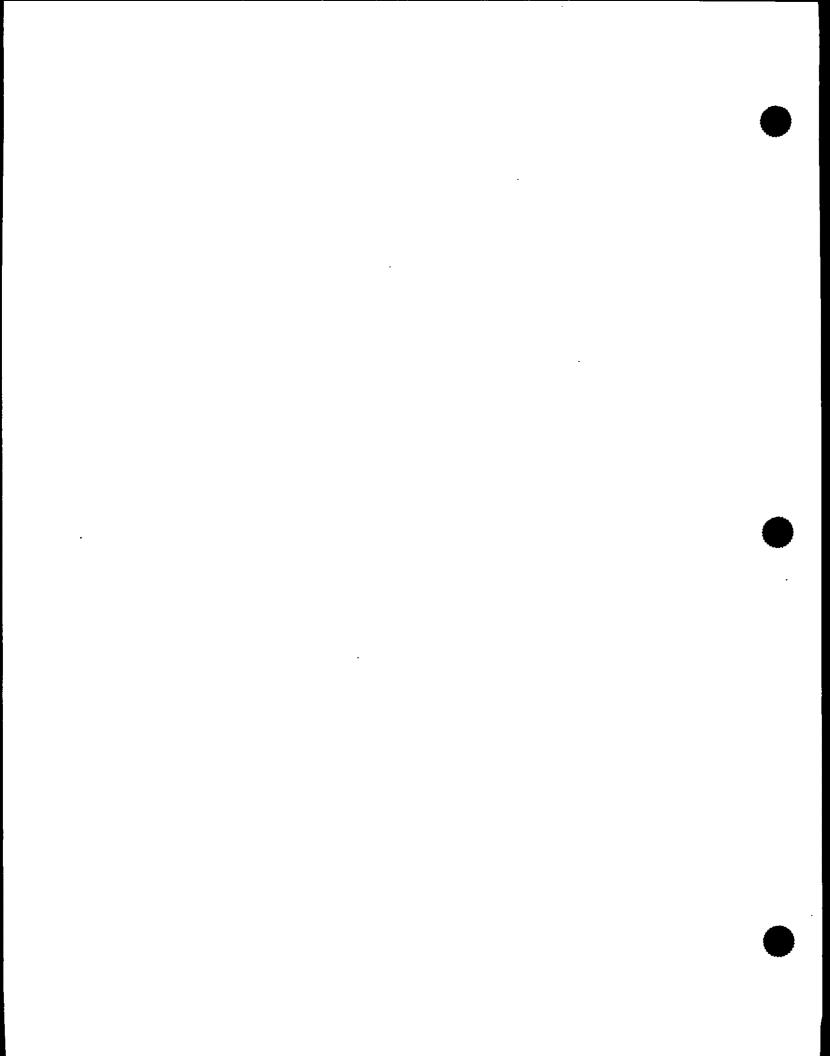
#### Pollution Prevention/ Good Housekeeping for Municipal Operations What Are Some BMPs for Implementing This Measure?

- → Establish maintenance activities, maintenance schedules, and long-term inspection procedures for structural and non-structural controls
- → Establish procedures for the proper disposal of waste removed from the separate storm sewer systems, including dredge spoil, accumulated sediments, floatables, and other debris.
- → Develop programs that promote recycling, minimize pesticide use and protect salt sand storage

# Pollution Prevention/ Good Housekeeping for Municipal Operations What Are Appropriate Measurable Goals?

Target	Activity
l year	Pollution prevention plan completed; employee training materials developed; procedures in place for catch basin cleaning and street sweeping.
2 years	Training for appropriate employees completed; recycling program fully implemented.
3 years	Some pollution prevention BMPs incorporated into master plan; a certain percentage reduction in pesticide and sand/salt use; maintenance schedule for BMPs established.
4 years	A certain percentage reduction in floatables discharged; a certain compliance rate with maintenance schedules for BMPs; controls in place for all areas of concern.

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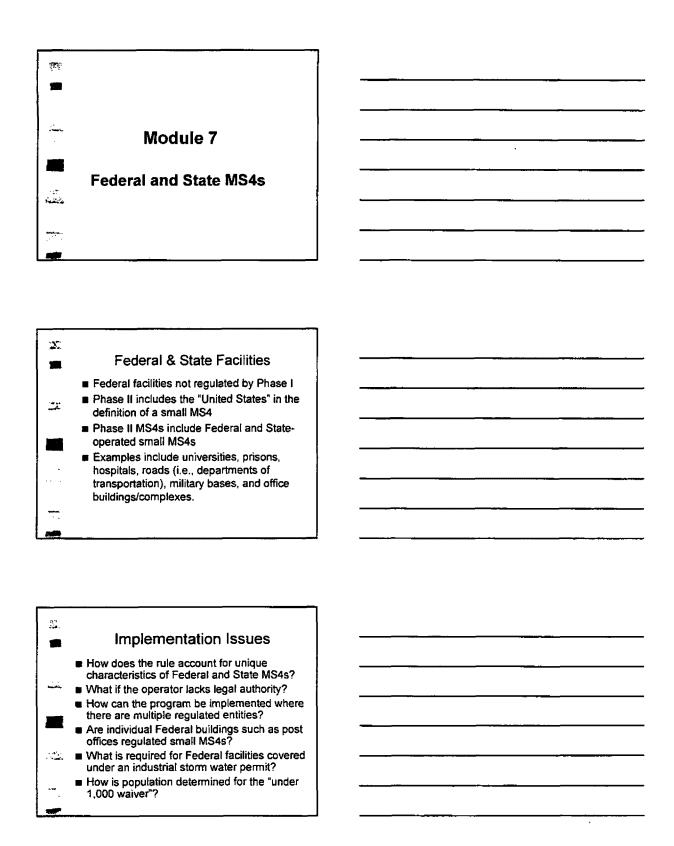


# Module 7

Federal and State MS4s

[Slides]

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	Populations	
 <b>-∷</b>	<ul> <li>Many Federal or State-operated MS4s, such as medical clinics and DOTs serve non- resident populations</li> </ul>	
**	Others, such as military bases, prisons, and State universities, serve populations that differ from a typical municipal population	
	■ Population should be people served by MS4	
	<ul> <li>Waiver decision may be complicated by other factors</li> </ul>	
		1
	Legal Authority	
	■ Some Federal and State operators do	
	not have the necessary legal regulatory	
	authority to implement some minimum	
	measures	
	■ Rule does not require legal authority ■ State and Federal MS4s are expected	
	to utilize the authority they do possess	
	and to seek cooperative arrangements	
e y mages		
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Ţ	Implementation Where There Are	
·	Multiple Regulated Entities	
	. •	
	■ Coverage of multiple governments and	
	agencies in a single area is likely	
_	■ EPA encourages State and Federal	
	small MS4 operators to establish	
. Airis	cooperative agreements with cities and counties in implementing their storm	
	water programs.	

Phase II rechoose approximation of that Federal	entation Strategies - e Appropriate BMPs quires the permittee to propriate (BMPs) for each control measure examples of tailored BMPs al or State operators can for each measure:	
		7
■ Distribute educate e hospital al	brochures and post fliers to mployees of a Federal bout the problems associated water runoff	
discarding	nployees against carelessly trash on the ground or neir cars to leak oil/fluids in the	
<b>.</b>		
= Partici <sub>l</sub>	Public pation/Involvement	
manageme	tice of storm water nt plan development and unteers to help develop the	
Federal offi	ngs at which employees of a ice complex are encouraged ir ideas about the effort	

.2.	Illicit Discharge Detection and
=	Elimination
	•
سيهدف	<ul> <li>Develop a map of the storm sewer system on a military base</li> </ul>
	■ Perform visual dry weather monitoring of any
37,	outfalls to determine whether the storm sewer is receiving any non-storm water discharges
	If a dry weather flow is found, trace it back to
	the source and stop the discharge  If a military base traces an illicit discharge to
	its border, the base should notify the
377	adjoining MS4 for further action
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₩.	Construction Site Runoff Control
-	
	■ Require the implementation of erosion and
32%	sediment controls for any Federal or State DOT road construction
	■ The DOT would review site plans, perform
	inspections, and establish penalties in the
	construction contract
73/2	If construction is done by the regulated DOT instead of a private contractor, the DOT could
_	be penalized by the NPDES PA for non-
	compliance with its MS4 permit if controls are not properly implemented.
prober	посргорену впретенцео.
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**4.4*	
*****	Post-Construction Runoff
	Control
	<ul> <li>Require the implementation of post- construction storm water controls for</li> </ul>
	any new construction on the grounds of
200	a prison
	■ This can be required as part of a
	construction contract, instituted as
	internal policy, and considered during
-	site plan review

3	Pollution Prevention/Good
	Housekeeping for Municipal Operations
Sie.	<ul> <li>Train maintenance staff at a State university to employ pollution prevention techniques</li> </ul>
-	■ Examples:
****	<ul> <li>routinely pick up trash from the university grounds</li> <li>use less salt on the parking lots and access roads in the winter</li> </ul>
ord of	<ul> <li>perform any maintenance of university vehicles under shelter only</li> </ul>
ng 🖦	<ul> <li>limit pesticide use to the minimum needed</li> <li>keep dumpster lids closed</li> </ul>
(1117)	
*/~ . ****	Implementation Strategies -
100	Working with Other Entities
**	<ul> <li>In the case of limited capabilities or legal authority the permittee can work</li> </ul>
	with neighboring small MS4s to form a shared storm water management program
	<ul> <li>Each permittee is responsible for activities within individual legal authorities and abilities</li> </ul>
	■ Permittees may rely on other entities, with their permission, to implement those
	minimum measures that the permittee is otherwise unable to implement
7.57°	
	Working with Other Entities -
	Examples
مند	■ A State DOT with limited regulatory
	legal authority can reference a local sewer district's illicit detection and
	elimination program in its permit application, provided the program
	sufficiently addresses illicit discharges into the DOT's storm sewer system.
	into the DOT 3 storill sewer system.
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# Working with Other Entities - Examples

- The permittee or permitting authority can reference programs such as:
  - Coastal nonpoint pollution control programs
  - State or local watershed programs
  - State or local construction programs
  - Environmental education efforts by public or private entities.

# Working with Other Entities - Examples

- The permittee can become a copermittee with a neighboring Phase I MS4 through a modification of the Phase I MS4's individual permit.
- This may be the most logical and preferable option for those Federal and State entities located in close proximity to Phase I MS4s

#### Individual Federal or State Buildings: Are They Regulated Small MS4s?

- Phase II states that the definition of small MS4 does not include individual buildings.
- Most of these buildings have, at most, a parking lot with runoff or a storm sewer that connects with a municipality's MS4
- These buildings may have a municipal separate storm sewer but they do not have a "system" of conveyances
- A federal complex of two or three buildings could be treated as a single building and not be required to apply for coverage

# Individual Federal or State Buildings: Are They Regulated Small MS4s? Permitting authorities should use their best judgment as to the nature of a complex and its storm water conveyance system and whether it should be regulated as a small MS4 Permitting authorities should also consider whether the federal or State complex cooperates with its

#### DOTs

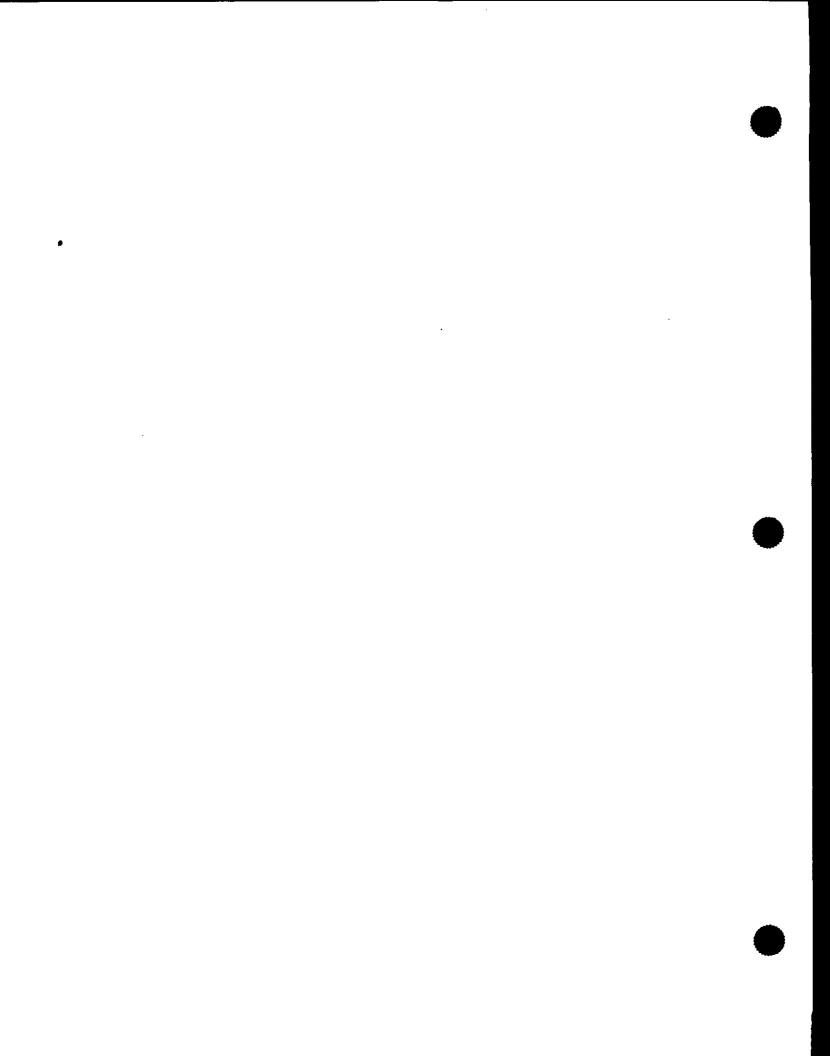
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municipality's efforts to implement their storm water management program

- Storm water discharges from State DOTs in Phase 1 areas should already be regulated under Phase I
- The preamble to Phase 1 clearly states that "all systems within a geographical area including highways and flood control districts will be covered"
- Many permitting authorities regulated State DOTs as co-permittees with the Phase 1 municipality in which the highway is located.

#### **Permit Coverage**

- Do federal facilities already covered under an industrial storm water permit have to get additional permit coverage as an MS4?
- Federally or State-operated industrial sources are currently regulated
- Sources regulated due to their industrial discharges may already be implementing some Phase II municipal requirements



# Module 8

Interaction of the Industrial, Construction, and MS4 Storm Water Programs

[Slides and Handouts]

# Module 8 7.7 Interaction of the MS4, Construction, and **Industrial Programs Training Review** 2 We have addressed: ■ Who is covered ■ Who is responsible for obtaining permit coverage ■ What is required and when Now will address: ■ Similar but different requirements ■ Multiple responsibilities

#### Review of Industrial Program

■ Permit can be:

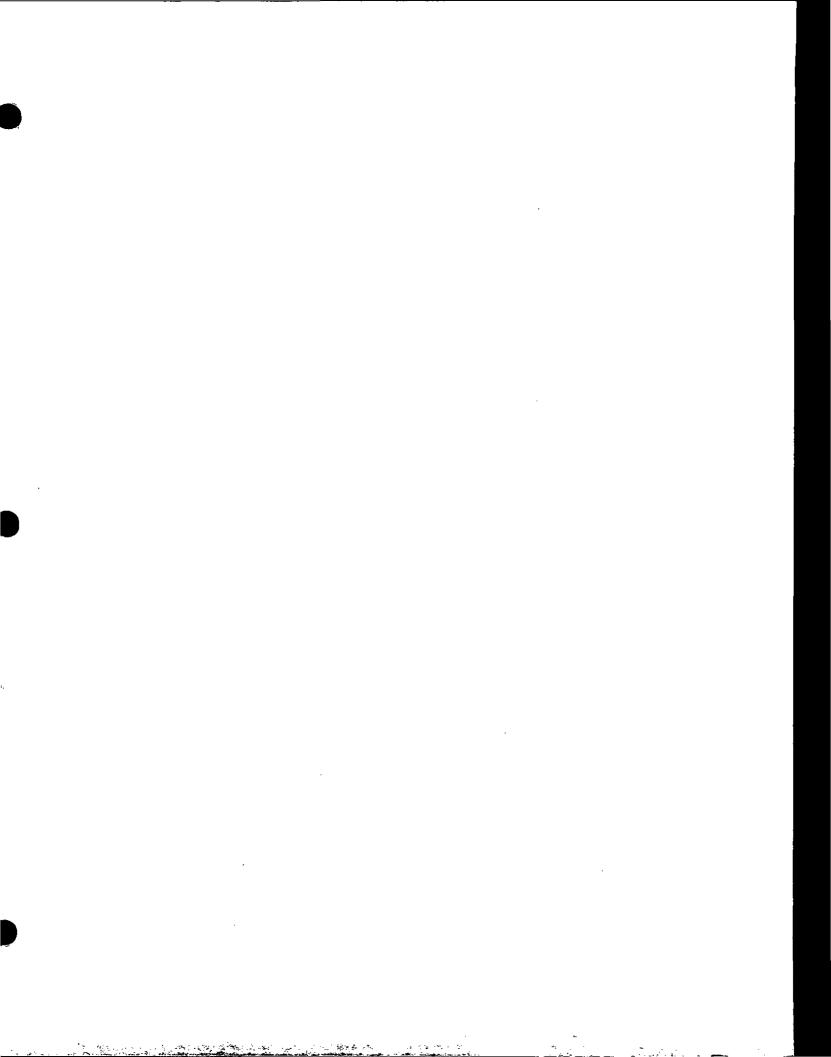
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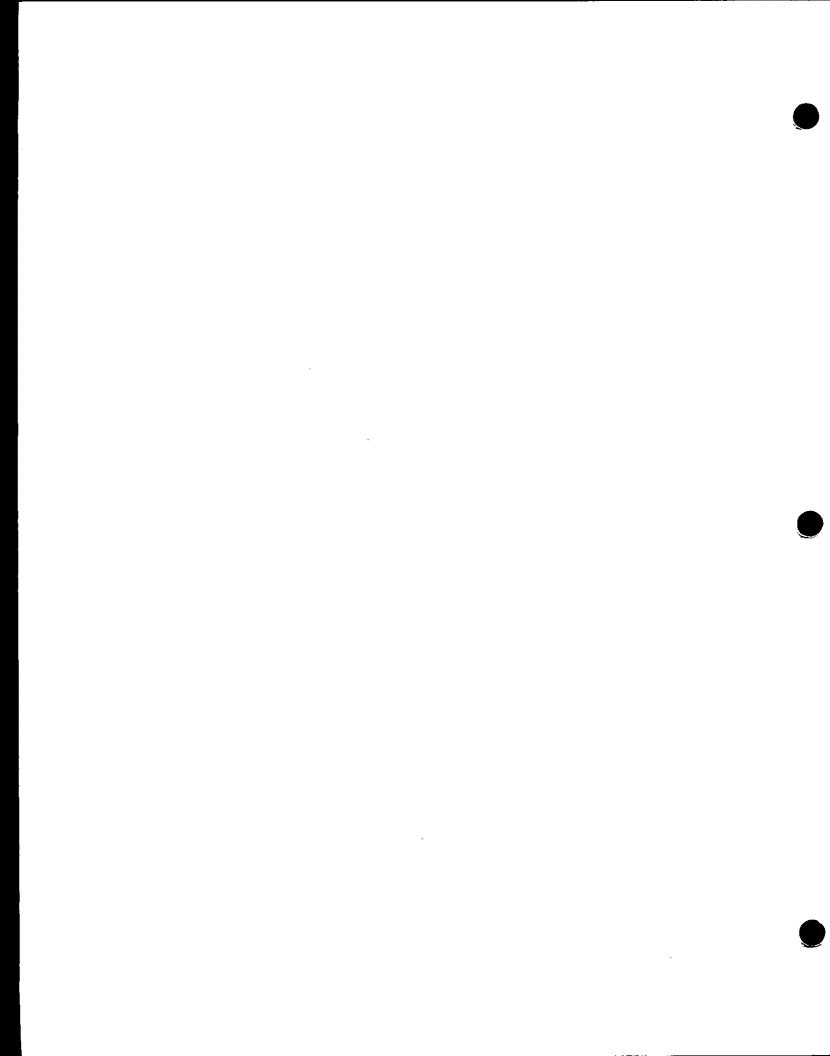
- EPA's MSGP
- -State General Permit
- Individual Permit
- Covers 10 categories of industrial activity

# Changes to Industrial Program 27 ■ ISTEA moratorium will expire ■ "No exposure" exclusion expanded to all industrial categories ■ All industrial categories must either: - Submit No Exposure Certification - Apply for Permit Coverage **Review of Construction Program** 100 ■ Construction disturbing 5 or more acres is regulated as industrial activity ■ Construction disturbing 1-5 acres is regulated "to protect water quality" ■ Different CWA basis allows for waivers for "small construction" **Construction Permits** ■ Specific Requirements for small construction will be in GP ■ Current CGP expires 2/2003 ■ Small CGP will be issued by 12/2002 EPA's next CGP will contain requirements for all construction activity ■ Requirements may be different for small and large construction

	_
Review of MS4 Program	
■ Medium/Large MS4 program required	
detailed application & individual permit  Small MS4 program will have general	
permits & NOIs as application	
■ All MS4s required to meet MEP standard ■ Small MS4s have no requirements for:	
- Monitoring	
- Oversight of Industrial Activity	
artiting.	
Multiple Responsibilities	
Construction Operators	
■ Any location - must obtain NPDES coverage	<del></del>
Located in regulated MS4 - must also comply with MS4's construction requirements	
■ MS4 construction requirements similar to	
CGP but no SWPPP required  CGP can reference qualifying local program	
■ Compliance with QLP is compliance with	
NPDES permit	
Possons for MSA Construction	
Reasons for MS4 Construction Requirements	
■ Requirements tailored to locality	
■ Local oversight more effective	
than just State oversight	
April 100 pm 1	
\$4.	

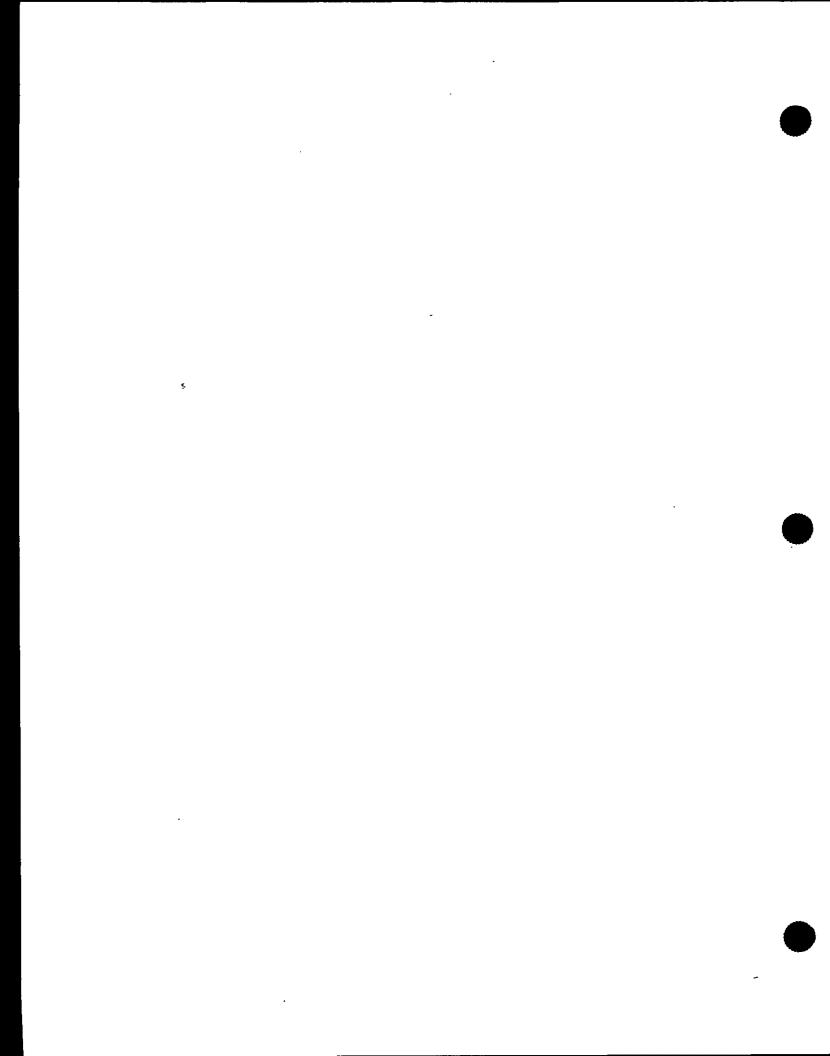
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	Reasons for NPDES Construction Requirements	
	■ SWPPP required	
f#r	■ Federal and Citizen enforcement	
	■ Controls discharges from	
1250	construction to all waters of US,	
	not just to MS4s	
*.227.1		
77/8/87		
r		1
.51	Multiple Responsibilities	
20	Industrial Operators	
	■ Industry in medium/large MS4 must	
:3::	notify MS4	
	■ Industry that undertakes construction must comply with construction permit	
	requirements	
n page Habili		
7.57		
***************************************		
		1
	Multiple Responsibilities	
323	Municipal Operators	
	■ If MS4 is construction or industrial	
	operator it must obtain permit coverage for those activities	
-	■ Coverage may be through 3 GPs or	
Z-telle.	individual permit that includes industrial and municipal requirements	
,	■ Small MS4 application date is same for	
	municipal and industrial requirements	
,		





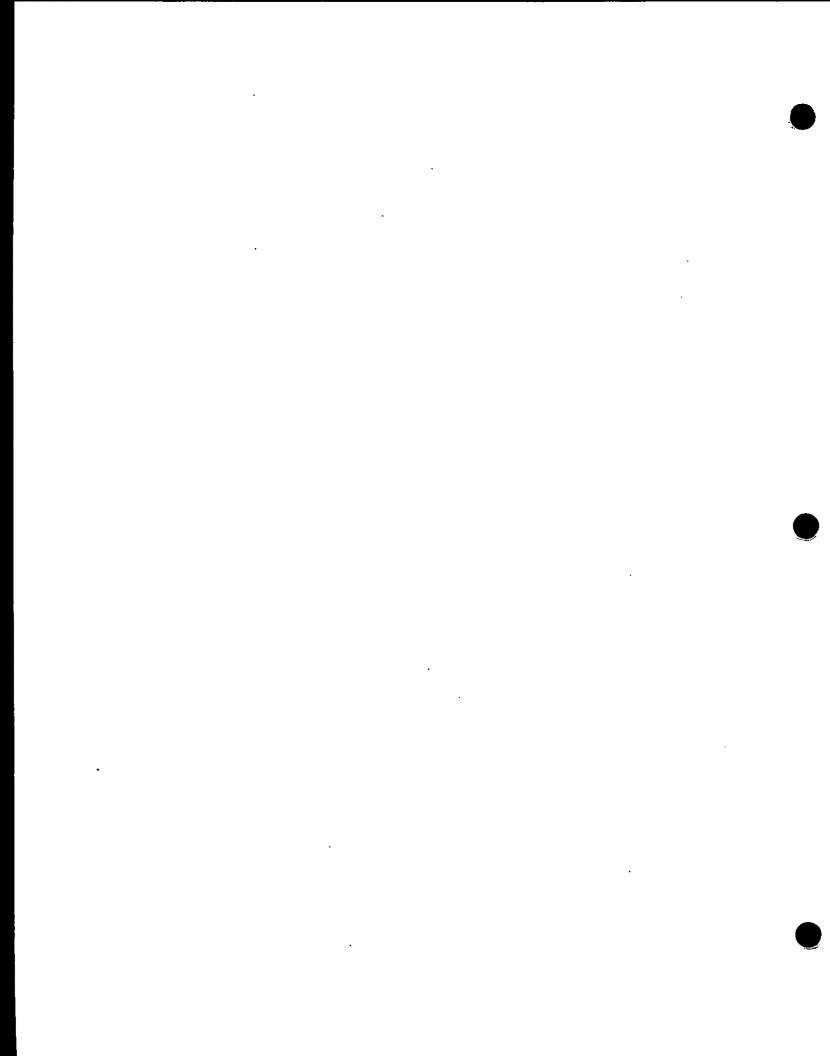
# Summary of Federal Permit Requirements Under the NPDES Storm Water Program

	Municipal Separate Storm Sewer Systems (MS4s)	Construction Activity	Industrial Activity
Requirements in Effect Now (Phase I)	Medium and Large MS4s (§ 122.26(d))  Storm Water Management Program:  - Public education and outreach - Public participation efforts - Illicit discharge detection and elimination program - Construction and post-construction runoff control program for all construction activity (no size threshold) - BMPs to reduce pollutants from industrial, commercial, and residential areas  - Track/oversee industrial facilities regulated under the NPDES storm water program  - Conduct analytical and visual monitoring of MS4 discharges - Submit periodic program assessment reports	Category (x) Construction Activity (5+ Acres)*  CGP: Storm Water Pollution Prevention Plan (SWPPP) Site description Description of BMPs for erosion and sediment, post-construction storm water management, and other controls Self-evaluation and reporting *Category (x) is one of the categories of "storm water discharges associated with industrial activity." Temporarily excluded from permitting: Category (x) construction activity operated by a municipality of <100,000 (ISTEA moratorium).	Ten Categories of Industrial Activity (Categories (i)-(ix),(xi))*  MSGP:  SWPPP  Site evaluation  Description of appropriate storm water management BMPs  Self-evaluation, monitoring, and reporting  If discharging into a medium or large MS4, notify the MS4 operator  Temporarily excluded from permitting: Industrial activity operated by a municipality of < 100,000, except for power plants, airports, and uncontrolled sanitary landfills (ISTEA moratorium).
Requirements that Will Be in Effect by 2003 (Phase II)	Regulated Small MS4s (§ 122.34 outlined here, but may choose permit coverage under § 122.26(d) instead)  Storm Water Management Program:  Public education and outreach  Public participation efforts  Illicit discharge detection and elimination program  Construction runoff control program for construction activity disturbing 1 acre or greater  Post-construction runoff control program for construction activity disturbing 1 acre or greater  Good housekeeping/pollution prevention for municipal operations  Conduct assessment of identified BMPs and measurable goals for each minimum control measure  Submit annual program assessment reports	Small Construction Activity (<1 and <5 Acres)  • Expected to be similar to Category (x) Construction Activity requirements above  Municipality of < 100,000  • Same requirements as for Category (x) Construction Activity above	Industrial Activity Operated by a Municipality of <100,000*  Same requirements as for Ten Categories of Industrial Activity above  *Does not include: Power plants, airports, and uncontrolled sanitary landfills



### Exercise 5

Determining Multiple Responsibilities Under the NPDES Storm Water Program



# Determining Multiple Responsibilities Under the NPDES Storm Water Program Exercise 5:

# Note:

Phase I municipality: The municipality operates a medium or large MS4 and is permitted under the NPDES Storm Water Program Phase II municipality: The municipality operates a regulated small MS4 and will be permitted under the NPDES Storm Water Program

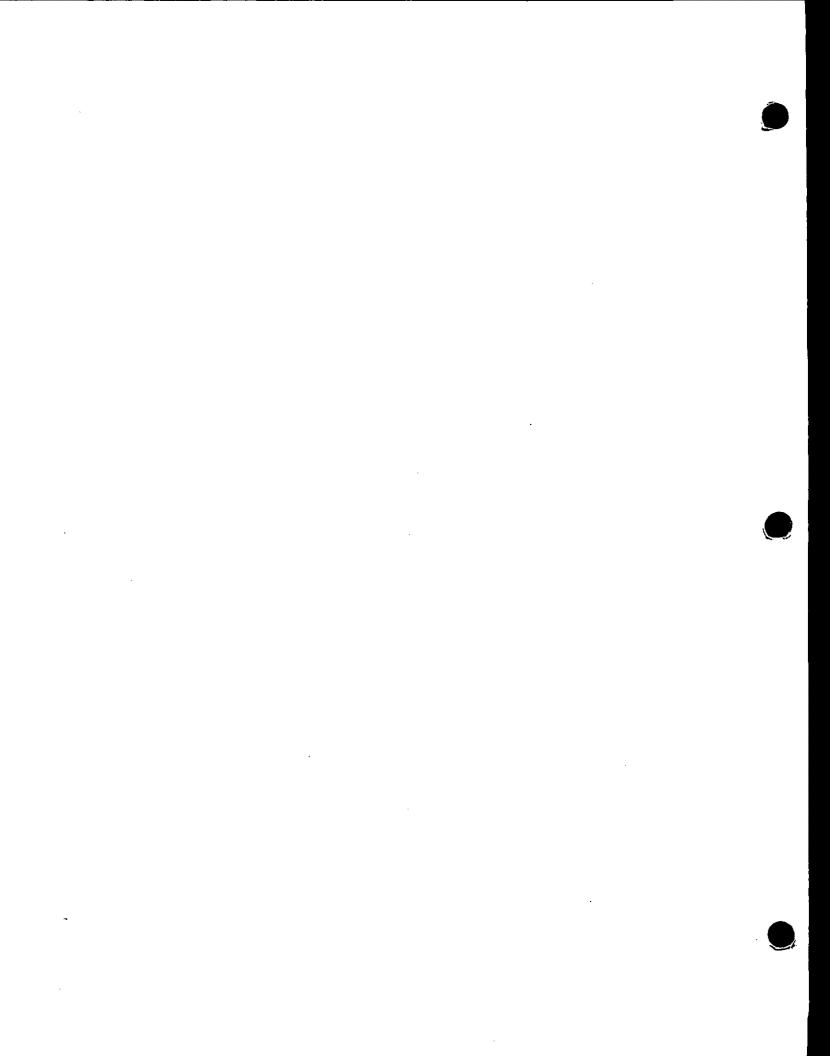
What is/will be required?  (Which NPDES permits? Compliance with a local regulated MS4 program? Or any other responsibilities concerning NPDES-regulated entities?)	ctivity disturbing 2	ctivity disturbing 2	e MSGP rity disturbing 5 sipality	e MSGP turbing 1.5 acres y	on activity cipality over
Scenario	<ol> <li>Privately-operated construction activity di acres in a Phase I municipality</li> </ol>	2) Privately-operated construction activity disturbing 2 acres in a Phase II municipality	3) Industrial site permitted under the MSGP performing linear construction activity distunacres and located in a Phase I municipality	4) Industrial site permitted under the MSGP performing construction activity disturbing and located in a Phase I municipality	5) Municipally-operated construction activity disturbing 6 acres in a Phase I municipality over 100,000

6) Municipally-operated construction activity disturbing 6 acres in a Phase II municipality under	
100,000	
7) A Phase I municipality of less than 100,000 people owns and operates a scrap and waste recycling facility (Sector N under the MSGP) that discharges into its	
storm sewer system  8) A Phase II municipality of less than 100,000 people owns and operates an uncontrolled sanitary landfill	
(Sector L under the MSGP) that discharges into its storm sewer system	
9) Privately-operated construction activity disturbing 7 acres on a federal military base which is a Phase II	
MS4 operator	
10) Military-operated construction activity disturbing 7 acres on a federal military base which is a Phase II	
MS4 operator	
11) Military-operated vehicle maintenance facility (Sector P under the MSGP) on a federal military base that discharges storm water runoff into a phase I MS4	
12) Military-operated hazardous waste storage facility (Sector K under the MSGP) on a federal military base	

# Module 9

Benefits, Costs and Funding Mechanisms

[Slides]



#### Module 9

Phase II Benefits, Costs and Funding Mechanisms

#### Potential Impacts from Storm Water

- · Destruction/Degradation of aquatic habitat
- Accelerated loss of storage in lakes/reservoirs
- · Diminished water recreation experiences
- · Reduced aesthetic and preservation values
- · Increased hydroelectric facility impairment
- · Accelerated stream bank crosion
- · Increased flood damages
- Reduced infiltration/groundwater recharge

#### Phase II Cost/Benefit Estimates

Very difficult to estimate costs because:

- · Lots of flexibility in the rule
- Permit writers can specify more stringent requirements
- Each city is has different climate, topography, pollutants of concern, and existing programs

How much is clean water worth?

				•	
EPA NPDES	Storm	Water	Program	Training	Course

# Comparison of Annual Compliance Cost and Benefit Estimates

Total Annual Benefits \$671 M - 1.63 B

#### Costs

Municipal Minimum Measures

\$298 M

· Construction Controls

S545 - 679 M

Fed/State Admin, Costs

\$5 M

**Total Annual Costs** 

\$848 - 981 M

average annual per household cost = \$9.16

Source: EPA, Phase II Final Rule Cost-Benefit Analysis

#### Another Phase II Cost Estimate

Basic Program for city with 50,000

- Initial start-up (Year 1) \$37,600
  - \$0.75 per person per year
- Annual Costs (Years 2-5) \$81, 700
   \$1.63 per person per year

Goal is to meet the minimum requirements. Permit writer may want more.

EPA estimated an average of \$3.50 per person per year.

Nource: Reese, Andrew, 2000. NPDES Phase II Cest listimates. IN: Proceedings, National Conference on Tools for Urban Water Resources Management & Protection, Chicago, Feb. 2000.

#### Another Phase II Cost Estimate

Expanded Program for city with 50,000

- Initial start-up (Year 1) \$308,150
  - \$6,16 per person per year
- Annual Costs (Years 2-5) \$381,850
   \$7.64 per person per year

Goal is to improve water quality through an aggressive program, not to just meet the minimum requirements.

EPA estimated an average of \$3.50 per person per year.

Source: Reese, Andrew, 2000. NPDES Phase II Cost Estimates. IN: Proceedings, National Conference on Tools for Urban Water Resources Management & Protection, Chicago, Feb. 2000.

#### Putting It Into Perspective

Using even Andy's highest cost estimate of \$7.64 per capita for year one:

- · Don't forget business pays their share
- · Things that you already do are not "new"
- \$7.64 per year is \$0.66 per month
- · Can you afford to lose a local water resource?
- · Can you afford to have a 303(d) waterbody?

#### Phase II Action Plan (Reese, 2000)

- Assess your status
  - in, potentially in, or out of Phase II?
- · Get to know your permit writer
- · Assess your surface waters
- · Assess your own program
- · Check out your neighbors
- · Get a team together
- · Develop an action plan
- · Get started

#### Phase II Funding/Financing Strategies

- · Debt Financing used for capital-intensive projects, debt is issued to finance SWM programs and facilities
- Federal, State, or Regional Grants and Loans
- ex: State Revolving Loan Fund (SRF)
- · Utility Service Charges rates billed to customers for providing storm water management services

Source: APWA, 2000, Designing an Effective Storm Water Management Program

	-			
FPA NPI	DES Storm V	Vater Progran	nTraining :	Course

# Phase II Funding/Financing Strategies (cont.)

- Local Improvement Districts Individual properties benefited by storm water projects are assessed to fund the project
- · General Fund
- · Plan Review and Inspection Fees
- Fec-in-Lieu of On-Site Construction

# Phase II Funding/Financing Strategies (cont.)

- <u>Developer Participation</u> Developers construct needed facilities as a condition of development, and bear associated costs
- System Development Fees/Connection Charges - One time charges assessed at the time of development
- Combination Approaches

#### Storm Water Utilities

- An enterprise fund that can provide a stable source of funding for storm water operations and capital projects
- Developed property can be charged a user fee in proportion to the need for storm water facilities or services

Fee typically based on the amount of runoff generated by the property

• Establishing a Storm Water Utility in Florida (http://fasu.org/fasu/manual/index.html)

EPA	<b>NPDES</b>	Storm	Water	Program	Training	Course
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# Module I0

Additional Tools and Resources

[Slides]

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#### Module 10

# Additional Tools and Resources

#### **Tool Box**

- ✓ Fact Sheets
- ✓ Guidance
- ✓ Menu of BMPs
- ✓ Information Clearinghouse
- √ Training / Outreach
- √ Technical Research
- ✓ Support for Demonstration Projects
- ✓ Compliance Monitoring/Assistance Tools

#### **Fact Sheets**

- ✓ 14 Fact sheets available on the Phase II Rule
  - http://www.epa.gov/owm/sw/phase2/factshts.htm
- √ Technical fact sheets available on storm water BMPs
  - http://www.epa.gov/owm/mtbfact.htm

#### Guidance

- ✓ Phase I Guidance documents
  - Construction and Industrial BMP Guidance
  - Phase I MS4 Part 1 and 2 Guidance Manuals
- ✓ Storm Water Phase II Compliance Assistance Guide
- ✓ No Exposure Guidance
- ✓ Guidance on Developing Measurable Goals

#### Menu of BMPs



- ✓ Will help small MS4 operators select appropriate BMPs for their program
- ✓ Will not provide design specifications, but will provide general information on each BMP
- ✓ Available by October 2000 followed by a 6 month peer review

#### **Model General Permit**

- ✓ EPA to develop model general permit for small MS4s
- ✓ Available by October 2000
- ✓ Basis for Regulated Small MS4 permits which will be issued by Dec. 2002

#### Information Clearinghouse

- ✓ Part of EPA's storm water web page
- ✓ Will include a collection of relevant storm water web pages, research, guidance, links to State and local programs, etc.

#### Training / Outreach

- ✓2-Day Storm Water Training
- ✓ 1-Day Phase II workshop
- ¬ ✓ Center for Watershed
  ¬ Protection training
  - ✓IECA Construction operator training

#### Research / Demonstration

#### Projects

- ✓ ASCE BMP Effectiveness Database
- ✓ EPA sponsored research on storm water
   impacts/BMPs
  - ✓ Other research on storm water BMPs
  - ✓ Limited funding for demonstration projects

EPA NPDE	S Storm	Water Program	Training	Course

#### ASCE BMP Database

The purpose is to improve water quality nationwide by sharing consistent and transferable information on storm water best management practices.

http://www.bmpdatabase.org/

# Compliance Monitoring / Assistance Tools

- ✓ Protocol for Conducting Environmental
  Compliance Audits under the Storm Water
  Program (Fall 2000)
- LGEAN (Local Government Environmental Assistance Network)
  - www.lgean.org

#### Center for Watershed Protection

Provides objective and scientifically sound information on effective techniques to protect:

- and restore urban watersheds
  - ✓ Model Ordinances
  - ✓ Watershed Protection Techniques
  - ✓ Storm Water Resource Center (Fall 2000)
    - √http://www.stormwatercenter.net
  - √http://www.cwp.org

#### Urban Nonpoint Source Guidances

- ✓ Coastal Zone Management Measures Guidance -
- Chapter 4



- ✓ Tracking Implementation of Urban BMPs
- ✓ Economic Benefits of **Runoff Controls**

http://www.epa.gov/owow/nps

#### TMDL Guidance

- ✓ Total Maximum Daily Loads (TMDLs)
  - Protocol for Developing Nutrient TMDLs
  - Protocol for Developing Sediment TMDLs
- ✓ Atlas of America's Polluted Waters
- √ http://www.epa.gov/owow/tmdl

#### **Funding Tools**

- ✓CWA § 106 (Grants for pollution control programs)
- ✓ CWA § 319 (Non-point source management programs)
- ✓ State Revolving Fund (SRF)
- ✓ Transportation Efficiency Act for the 21st Century (TEA-21)
- ✓ Storm Water Utilities

<b>EPA</b>	<b>NPDES</b>	Storm	Water	Program	Training	Course

#### **Associations to Contact**

- ↑ ✓ American Public Works Association (APWA)
  - 202.393.2792 or www.apwa.net
  - ✓ Water Environment Federation (WEF)
    - 1.800.666.0206 or www.wef.org
- ✓ American Society of Civil Engineers (ASCE)
  - 1.800.548.2723 or www.asce.org
- ✓ International Erosion Control Association
  - 1.800.455.4322 or www.ieca.org
- ✓ Industry Associations

#### Who to Contact General Information

✓USEPA Headquarters -- Phase II Questions 202.260.5816

sw2@epa.gov

http://www.epa.gov/owm/sw

- **✓** USEPA Regional Offices
- ✓ State Offices

#### Who to Contact

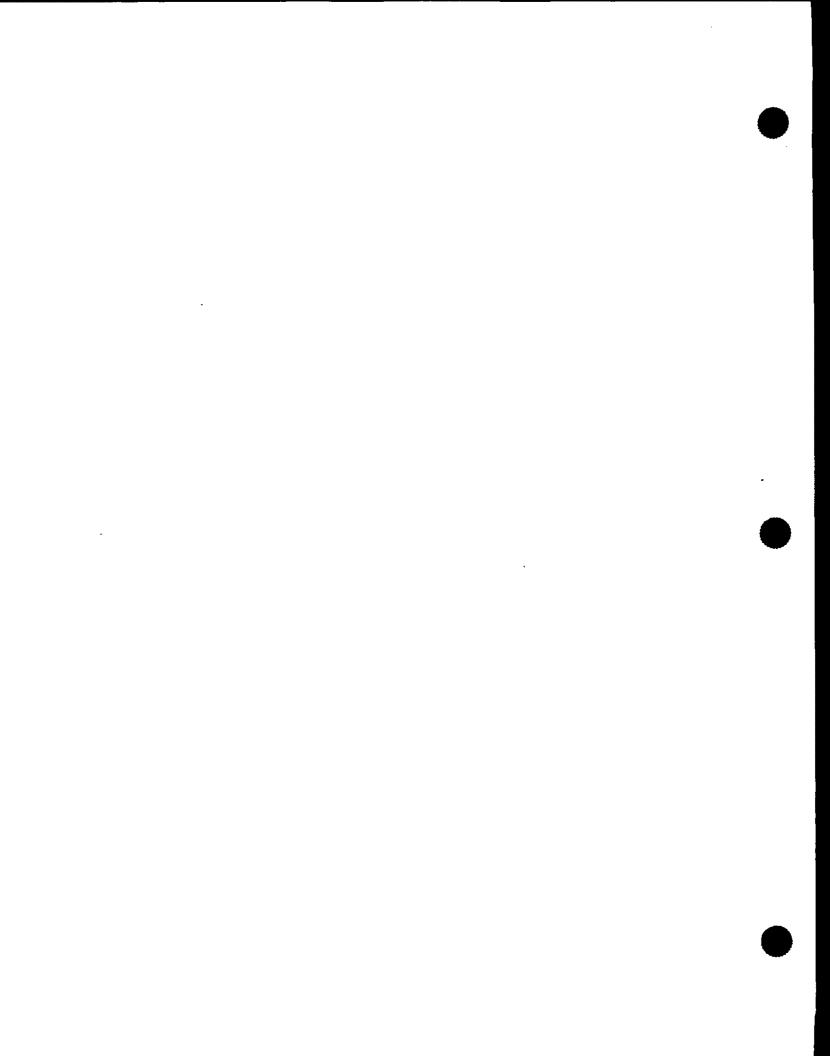
To Obtain Copies of Rules and Permits:

- EPA Water Resources Center
  - 202.260.7786 (ph)
  - · 202.260.0386(fax)
  - · center.water-resources@epa.gov
- EPA's OWM Web Site (to download copies)
  - www.epa.gov/owm/sw

To Obtain Status of Permit (EPA issued):

- EPA NOI Processing Center
  - 301.495.4145

EPA Storm Water Contacts	
Dan Weese – 202-260-6809 – Weese daniel@epa.gov	
Wendy Bell – 202-260-9534 – Bell.wendy@epa.gov	
John Kosco – 202-260-6385 – <u>Kosco john@epa.gov</u>	



any warm or cold water aquatic animal production facility as a concentrated aquatic animal production facility upon determining that it is a significant contributor of pollution to waters of the United States. In making this designation the Director shall consider the following factors:

- (i) The location and quality of the receiving waters of the United States;
- (ii) The holding, feeding, and production capacities of the facility;
- (iii) The quantity and nature of the pollutants reaching waters of the United States; and
  - (iv) Other relevant factors.
- (2) A permit application shall not be required from a concentrated aquatic animal production facility designated under this paragraph until the Director has conducted on-site inspection of the facility and has determined that the facility should and could be regulated under the permit program.

# § 122.25 Aquaculture projects (applicable to State NPDES programs, see § 123.25).

- (a) Permit requirement. Discharges into aquaculture projects, as defined in this section, are subject to the NPDES permit program through section 318 of CWA, and in accordance with 40 CFR part 125, subpart B.
- (b) Definitions. (1) Aquaculture project means a defined managed water area which uses discharges of pollutants into that designated area for the maintenance or production of harvestable freshwater, estuarine, or marine plants or animals.
- (2) Designated project area means the portions of the waters of the United States within which the permittee or permit applicant plans to confine the cultivated species, using a method or plan or operation (including, but not limited to, physical confinement) which, on the basis of reliable scientific evidence, is expected to ensure that specific individual organisms comprising an aquaculture crop will enjoy increased growth attributable to the discharge of pollutants, and be harvested within a defined geographic area.

§122.26 Storm water discharges (applicable to State NPDES programs, see §123.25).

- ,(a) Permit requirement. (1) Prior to October 1, 1994, discharges composed entirely of storm water shall not be required to obtain a NPDES permit except:
- (i) A discharge with respect to which a permit has been issued prior to February 4, 1987;
- (ii) A discharge associated with industrial activity (see § 122.26(a) (4));
- (iii) A discharge from a large municipal separate storm sewer system;
- (iv) A discharge from a medium municipal separate storm sewer system;
- (v) A discharge which the Director. or in States with approved NPDES programs, either the Director or the EPA Regional Administrator, determines to contribute to a violation of a water quality standard or is a significant contributor of pollutants to waters of the United States. This designation may include a discharge from any conveyance or system of conveyances used for collecting and conveying storm water runoff or a system of discharges from municipal separate storm sewers, except for those discharges from conveyances which do not require a permit under paragraph (a)(2) of this section or agricultural storm water runoff which is exempted from the definition of point source at §122.2.

The Director may designate discharges from municipal separate storm sewers on a system-wide or jurisdiction-wide basis. In making this determination the Director may consider the following factors:

- (A) The location of the discharge with respect to waters of the United States as defined at 40 CFR 122.2.
  - (B) The size of the discharge;
- (C) The quantity and nature of the pollutants discharged to waters of the United States; and
  - (D) Other relevant factors.
- (2) The Director may not require a permit for discharges of storm water runoff from mining operations or oil and gas exploration, production, processing or treatment operations or

#### § 122.26

transmission facilities, composed entirely of flows which are from conveyances or systems of conveyances (including but not limited to pipes, conduits, ditches, and channels) used for collecting and conveying precipitation runoff and which are not contaminated by contact with or that has not come into contact with, any overburden, raw material, intermediate products, finished product, byproduct or waste products located on the site of such operations.

- (3) Large and medium municipal separate storm sewer systems. (i) Permits must be obtained for all discharges from large and medium municipal separate storm sewer systems.
- (ii) The Director may either issue one system-wide permit covering all discharges from municipal separate storm sewers within a large or medium municipal storm sewer system or issue distinct permits for appropriate categories of discharges within a large or medium municipal separate storm sewer system including, but not limited to: all discharges owned or operated by the same municipality; located within the same jurisdiction; all discharges within a system that discharge to the same watershed; discharges within a system that are similar in nature; or for individual discharges from municipal separate storm sewers within the system.
- (iii) The operator of a discharge from a municipal separate storm sewer which is part of a large or medium municipal separate storm sewer system must either:
- (A) Participate in a permit application (to be a permittee or a co-permittee) with one or more other operators of discharges from the large or medium municipal storm sewer system which covers all, or a portion of all, discharges from the municipal separate storm sewer system;
- (B) Submit a distinct permit application which only covers discharges from the municipal separate storm sewers for which the operator is responsible; or
- (C) A regional authority may be responsible for submitting a permit application under the following guidelines:

(1) The regional authority together with co-applicants shall have authority over a storm water management program that is in existence, or shall be in existence at the time part 1 of the application is due;

(2) The permit applicant or co-applicants shall establish their ability to make a timely submission of part 1 and part 2 of the municipal application;

- (3) Each of the operators of municipal separate storm sewers within the systems described in paragraphs (b) (4) (i), (ii), and (iii) or (b) (7) (i), (ii), and (iii) of this section, that are under the purview of the designated regional authority, shall comply with the application requirements of paragraph (d) of this section.
- (iv) One permit application may be submitted for all or a portion of all municipal separate storm sewers within adjacent or interconnected large or medium municipal separate storm sewer systems. The Director may issue one system-wide permit covering all, or a portion of all municipal separate storm sewers in adjacent or interconnected large or medium municipal separate storm sewer systems.

(v) Permits for all or a portion of all discharges from large or medium municipal separate storm sewer systems that are issued on a system-wide, jurisdiction-wide, watershed or other basis may specify different conditions relating to different discharges covered by the permit, including different management programs for different drainage areas which contribute storm water to the system.

(vi) Co-permittees need only comply with permit conditions relating to discharges from the municipal separate storm sewers for which they are operators.

(4) Discharges through large and medium municipal separate storm sewer systems. In addition to meeting the requirements of paragraph (c) of this section, an operator of a storm water discharge associated with industrial activity which discharges through a large or medium municipal separate storm sewer system shall submit, to the operator of the municipal separate storm sewer system receiving the discharge no later than May 15, 1991, or 180 days prior to commencing such discharge:

the name of the facility; a contact person and phone number; the location of the discharge; a description, including Standard Industrial Classification, which best reflects the principal products or services provided by each facility; and any existing NPDES permit number.

(5) Other municipal separate storm sewers. The Director may issue permits for municipal separate storm sewers that are designated under paragraph (a)(1)(v) of this section on a system-wide basis, jurisdiction-wide basis, watershed basis or other appropriate basis, or may issue permits for indi-

vidual discharges.

- (6) Non-municipal separate storm sewers. For storm water discharges associated with industrial activity from point sources which discharge through a non-municipal or non-publicly owned separate storm sewer system, the Director, in his discretion, may issue: a single NPDES permit, with each discharger a co-permittee to a permit issued to the operator of the portion of the system that discharges into waters of the United States; or, individual permits to each discharger of storm water associated with industrial activity through the non-municipal conveyance system.
- (i) All storm water discharges associated with industrial activity that discharge through a storm water discharge system that is not a municipal separate storm sewer must be covered by an individual permit, or a permit issued to the operator of the portion of the system that discharges to waters of the United States, with each discharger to the non-municipal conveyance a co-permittee to that permit.

(ii) Where there is more than one operator of a single system of such conveyances, all operators of storm water discharges associated with industrial activity must submit applications.

- (iii) Any permit covering more than one operator shall identify the effluent limitations, or other permit conditions, if any, that apply to each operator.
- (7) Combined sewer systems. Conveyances that discharge storm water runoff combined with municipal sewage are point sources that must obtain NPDES permits in accordance with the

procedures of §122.21 and are not subject to the provisions of this section.

(8) Whether a discharge from a municipal separate storm sewer is or is not subject to regulation under this section shall have no bearing on whether the owner or operator of the discharge is eligible for funding under title II, title III or title VI of the Clean Water Act. See 40 CFR part 35, subpart

I, appendix A(b)H.2.j.

(9) On and after October 1, 1994, dischargers composed entirely of storm water, that are not otherwise already required by paragraph (a)(1) of this section to obtain a permit, shall be required to apply for and obtain a permit according to the application requirements in paragraph (g) of this section. The Director may not require a permit for discharges of storm water as provided in paragraph (a)(2) of this section or agricultural storm water runoff which is exempted from the definition of point source at §§ 122.2 and 122.3.

(b) Definitions. (1) Co-permittee means a permittee to a NPDES permit that is only responsible for permit conditions relating to the discharge for which it is

operator.

- (2) Illicit discharge means any discharge to a municipal separate storm sewer that is not composed entirely of storm water except discharges pursuant to a NPDES permit (other than the NPDES permit for discharges from the municipal separate storm sewer) and discharges resulting from fire fighting activities.
- (3) Incorporated place means the District of Columbia, or a city, town, township, or village that is incorporated under the laws of the State in which it is located.
- (4) Large municipal separate storm sewer system means all municipal separate storm sewers that are either:
- (i) Located in an incorporated place with a population of 250,000 or more as determined by the latest Decennial Census by the Bureau of Census (appendix F); or
- (ii) Located in the counties listed in appendix H, except municipal separate storm sewers that are located in the incorporated places, townships or towns within such counties; or
- (iii) Owned or operated by a municipality other than those described in

#### § 122.26

paragraph (b)(4) (i) or (ii) of this section and that are designated by the Director as part of the large or medium municipal separate storm sewer system due to the interrelationship between the discharges of the designated storm sewer and the discharges from municipal separate storm sewers described under paragraph (b)(4) (i) or (ii) of this section. In making this determination the Director may consider the following factors:

- (A) Physical interconnections between the municipal separate storm sewers:
- (B) The location of discharges from the designated municipal separate storm sewer relative to discharges from municipal separate storm sewers described in paragraph (b)(4)(i) of this section:
- (C) The quantity and nature of pollutants discharged to waters of the United States;
- (D) The nature of the receiving waters; and
  - (E) Other relevant factors; or
- (iv) The Director may, upon petition, designate as a large municipal separate storm sewer system, municipal separate storm sewers located within the boundaries of a region defined by a storm water management regional authority based on a jurisdictional, watershed, or other appropriate basis that includes one or more of the systems described in paragraph (b)(4) (i), (ii), (iii) of this section.
- (5) Major municipal separate storm sewer outfall (or "major outfall") means a municipal separate storm sewer outfall that discharges from a single pipe with an inside diameter of 36 inches or more or its equivalent (discharge from a single conveyance other than circular pipe which is associated with a drainage area of more than 50 acres); or for municipal separate storm sewers that receive storm water from lands zoned for industrial activity (based on comprehensive zoning plans or the equivalent), an outfall that discharges from a single pipe with an inside diameter of 12 inches or more or from its equivalent (discharge from other than a circular pipe associated with a drainage area of 2 acres or more).
- (6) Major outfall means a major municipal separate storm sewer outfall.

- (7) Medium municipal separate storm sewer system means all municipal separate storm sewers that are either:
- (i) Located in an incorporated place with a population of 100,000 or more but less than 250,000, as determined by the latest Decennial Census by the Bureau of Census (appendix G); or
- (ii) Located in the counties listed in appendix I, except municipal separate storm sewers that are located in the incorporated places, townships or towns within such counties; or
- (iii) Owned or operated by a municipality other than those described in paragraph (b)(4) (i) or (ii) of this section and that are designated by the Director as part of the large or medium municipal separate storm sewer system due to the interrelationship between the discharges of the designated storm sewer and the discharges from municipal separate storm sewers described under paragraph (b)(4) (i) or (ii) of this section. In making this determination the Director may consider the following factors:
- (A) Physical interconnections between the municipal separate storm sewers:
- (B) The location of discharges from the designated municipal separate storm sewer relative to discharges from municipal separate storm sewers described in paragraph (b)(7)(i) of this section:
- (C) The quantity and nature of pollutants discharged to waters of the United States;
- (D) The nature of the receiving waters: or
- (E) Other relevant factors; or
- (iv) The Director may, upon petition, designate as a medium municipal separate storm sewer system, municipal separate storm sewers located within the boundaries of a region defined by a storm water management regional authority based on a jurisdictional, watershed, or other appropriate basis that includes one or more of the systems described in paragraphs (b)(7) (i), (ii), (iii) of this section.
- (8) Municipal separate storm sewer means a conveyance or system of conveyances (including roads with drainage systems, municipal streets, catch basins, curbs, gutters, ditches, manmade channels, or storm drains):

- (i) Owned or operated by a State, city, town, borough, county, parish, district, association, or other public body (created by or pursuant to State law) having jurisdiction over disposal of sewage, industrial wastes, storm water, or other wastes, including special districts under State law such as a sewer district, flood control district or drainage district, or similar entity, or an Indian tribe or an authorized Indian tribal organization, or a designated and approved management agency under section 208 of the CWA that discharges to waters of the United States;
- (ii) Designed or used for collecting or conveying storm water;
- (iii) Which is not a combined sewer; and
- (iv) Which is not part of a Publicly Owned Treatment Works (POTW) as defined at 40 CFR 122.2.
- (9) Outfall means a point source as defined by 40 CFR 122.2 at the point where a municipal separate storm sewer discharges to waters of the United States and does not include open conveyances connecting two municipal separate storm sewers, or pipes, tunnels or other conveyances which connect segments of the same stream or other waters of the United States and are used to convey waters of the United States.
- (10) Overburden means any material of any nature, consolidated or unconsolidated, that overlies a mineral deposit, excluding topsoil or similar naturally-occurring surface materials that are not disturbed by mining operations.
- (11) Runoff coefficient means the fraction of total rainfall that will appear at a conveyance as runoff.
- (12) Significant materials includes, but is not limited to: raw materials; fuels; materials such as solvents, detergents, and plastic pellets; finished materials such as metallic products; raw materials used in food processing or production: hazardous substances designated under section 101(14) of CERCLA; any chemical the facility is required to report pursuant to section 313 of title III of SARA; fertilizers; pesticides; and waste products such as ashes, slag and sludge that have the potential to be released with storm water discharges.

- (13) Storm water means storm water runoff, snow melt runoff, and surface runoff and drainage.
- (14) Storm water discharge associated with industrial activity means the discharge from any conveyance which is used for collecting and conveying storm water and which is directly related to manufacturing, processing or raw materials storage areas at an industrial plant. The term does not include discharges from facilities or activities excluded from the NPDES program under 40 CFR part 122. For the categories of industries identified in paragraphs (b)(14) (i) through (x) of this section, the term includes, but is not limited to, storm water discharges from industrial plant yards; immediate access roads and rail lines used or traveled by carriers of raw materials, manufactured products, waste material, or by-products used or created by the facility; material handling sites: refuse sites; sites used for the application or disposal of process waste waters (as defined at 40 CFR part 401); sites used for the storage and maintenance of material handling equipment; sites used for residual treatment, storage, or disposal; shipping and receiving areas; manufacturing buildings; storage areas (including tank farms) for raw materials, and intermediate and finished products; and areas where industrial activity has taken place in the past and significant materials remain and are exposed to storm water. For the categories of industries identified in paragraph (b)(14)(xi) of this section, the term includes only storm water discharges from all the areas (except access roads and rail lines) that are listed in the previous sentence where material handling equipment or activities. raw materials, intermediate products. final products, waste materials, byproducts, or industrial machinery are exposed to storm water. For the purposes of this paragraph, material handling activities include the storage, loading and unloading, transportation, or conveyance of any raw material, intermediate product, finished product, by-product or waste product. The term excludes areas located on plant lands separate from the plant's industrial activities, such as office buildings and accompanying parking lots as long as the

drainage from the excluded areas is not mixed with storm water drained from the above described areas. Industrial facilities (including industrial facilities that are Federally, State, or municipally owned or operated that meet the description of the facilities listed in this paragraph (b)(14)(i)-(xi) of this section) include those facilities designated under the provisions of paragraph (a)(1)(v) of this section. The following categories of facilities are considered to be engaging in "industrial activity" for purposes of this subsection:

(i) Facilities subject to storm water effluent limitations guidelines, new source performance standards, or toxic pollutant effluent standards under 40 CFR subchapter N (except facilities with toxic pollutant effluent standards which are exempted under category (xi) in paragraph (b) (14) of this section);

(ii) Facilities classified as Standard Industrial Classifications 24 (except 2434), 26 (except 265 and 267), 28 (except 283), 29, 311, 32 (except 323), 33, 3441, 373;

(iii) Facilities classified as Standard Industrial Classifications 10 through 14 (mineral industry) including active or inactive mining operations (except for areas of coal mining operations no longer meeting the definition of a reclamation area under 40 CFR 434.11(1) because the performance bond issued to the facility by the appropriate SMCRA authority has been released, or except for areas of non-coal mining operations which have been released from applicable State or Federal reclamation requirements after December 17, 1990) and oil and gas exploration, production, processing, or treatment operations, or transmission facilities that discharge storm water contaminated by contact with or that has come into contact with, any overburden, raw material, intermediate products. intermediate products. finished products, byproducts or waste products located on the site of such operations: (inactive mining operations are mining sites that are not being actively mined, but which have an identifiable owner/operator; inactive mining sites do not include sites where mining claims are being maintained prior to disturbances associated with the extraction, beneficiation, or processing of mined materials, nor sites where minimal activities are undertaken for the sole purpose of maintaining a mining claim):

(iv) Hazardous waste treatment, storage, or disposal facilities, including those that are operating under interim status or a permit under subtitle C of RCRA:

(v) Landfills, land application sites, and open dumps that receive or have received any industrial wastes (waste that is received from any of the facilities described under this subsection) including those that are subject to regulation under subtitle D of RCRA;

(vi) Facilities involved in the recycling of materials, including metal scrapyards, battery reclaimers, salvage yards, and automobile junkyards, including but limited to those classified as Standard Industrial Classification 5015 and 5093:

(vii) Steam electric power generating facilities, including coal handling sites;

(viii) Transportation facilities classified as Standard Industrial Classifications 40, 41, 42 (except 4221-25), 43, 44, 45, and 5171 which have vehicle maintenance shops, equipment cleaning operations, or airport deicing operations. Only those portions of the facility that are either involved in vehicle maintenance (including vehicle rehabilitation, mechanical repairs, painting, fueling, and lubrication), equipment cleaning operations, airport deicing operations, or which are otherwise identified under paragraphs (b)(14) (i)-(vii) or (ix)-(xi) of this section are associated with industrial activity;

(ix) Treatment works treating domestic sewage or any other sewage sludge or wastewater treatment device or system, used in the storage treatment, recycling, and reclamation of municipal or domestic sewage, including land dedicated to the disposal of sewage sludge that are located within the confines of the facility, with a design flow of 1.0 mgd or more, or required to have an approved pretreatment program under 40 CFR part 403. Not included are farm lands, domestic gardens or lands used for sludge management where sludge is beneficially reused and which are not physically located in the confines of the facility, or areas that are in compliance with section 405 of the CWA;

(x) Construction activity including clearing, grading and excavation activities except: operations that result in the disturbance of less than five acres of total land area which are not part of a larger common plan of development or sale:

(xi) Facilities under Standard Industrial Classifications 20, 21, 22, 23, 2434, 25, 265, 267, 27, 283, 285, 30, 31 (except 311), 323, 34 (except 3441), 35, 36, 37 (except 373), 38, 39, 4221-25, (and which are not otherwise included within categories (ii)-(x));

(15) Uncontrolled sanitary landfill means a landill or open dump, whether in operation or closed, that does not meet the requirements for runon or runoff controls established pursuant to subtitle D of the Solid Waste Disposal Act.

(c) Application requirements for storm water discharges associated with industrial activity—(1) Individual application. Dischargers of storm water associated with industrial activity are required to apply for an individual permit, apply for a permit through a group application, or seek coverage under a promulgated storm water general permit. Facilities that are required to obtain an individual permit, or any discharge of storm water which the Director is evaluating for designation (see 40 CFR 124.52(c)) under paragraph (a)(1)(v) of this section and is not a municipal separate storm sewer, and which is not part of a group application described under paragraph (c)(2) of this section, shall submit an NPDES application in accordance with the requirements of §122.21 as modified and supplemented by the provisions of the remainder of this paragraph. Applicants for discharges composed entirely of storm water shall submit Form 1 and Form 2F. Applicants for discharges composed of storm water and non-storm water shall submit Form 1, Form 2C, and Form 2F. Applicants for new sources or new discharges (as defined in §122.2 of this part) composed of storm water and non-storm water shall submit Form 1, Form 2D, and Form 2F.

(i) Except as provided in §122.26(c)(1) (ii)-(iv), the operator of a storm water discharge associated with industrial activity subject to this section shall provide:

(A) A site map showing topography (or indicating the outline of drainage areas served by the outfall(s) covered in the application if a topographic map is unavailable) of the facility including: each of its drainage and discharge structures; the drainage area of each storm water outfail; paved areas and buildings within the drainage area of each storm water outfall, each past or present area used for outdoor storage or disposal of significant materials, each existing structural control measure to reduce pollutants in storm water runoff, materials loading and access areas, areas where pesticides, herbicides, soil conditioners and fertilizers are applied, each of its hazardous waste treatment, storage or disposal facilities (including each area not required to have a RCRA permit which is used for accumulating hazardous waste under 40 CFR 262.34); each well where fluids from the facility are injected underground; springs, and other surface water bodies which receive storm water discharges from the facility;

(B) An estimate of the area of impervious surfaces (including paved areas and building roofs) and the total area drained by each outfall (within a mile radius of the facility) and a narrative description of the following: Significant materials that in the three years prior to the submittal of this application have been treated, stored or disposed in a manner to allow exposure to storm water; method of treatment, storage or disposal of such materials; materials management practices employed, in the three years prior to the submittal of this application, to minimize contact by these materials with storm water runoff; materials loading and access areas; the location, manner and frequency in which pesticides, herbicides, soil conditioners and fertilizers are applied; the location and a description of existing structural and nonstructural control measures to reduce pollutants in storm water runoff; and a description of the treatment the storm water receives, including the ultimate disposal of any solid or fluid wastes other than by discharge;

(C) A certification that all outfalls that should contain storm water discharges associated with industrial activity have been tested or evaluated for the presence of non-storm water discharges which are not covered by a NPDES permit; tests for such non-storm water discharges may include smoke tests, fluorometric dye tests, analysis of accurate schematics, as well as other appropriate tests. The certification shall include a description of the method used, the date of any testing, and the on-site drainage points that were directly observed during a test:

- (D) Existing information regarding significant leaks or spills of toxic or hazardous pollutants at the facility that have taken place within the three years prior to the submittal of this application;
- (E) Quantitative data based on samples collected during storm events and collected in accordance with § 122.21 of this part from all outfalls containing a storm water discharge associated with industrial activity for the following parameters:
- (1) Any pollutant limited in an effluent guideline to which the facility is subject;
- (2) Any pollutant listed in the facility's NPDES permit for its process wastewater (if the facility is operating under an existing NPDES permit):
- (3) Oil and grease, pH, BOD5, COD, TSS, total phosphorus, total Kjeldahl nitrogen, and nitrate plus nitrite nitrogen:
- (4) Any information on the discharge required under paragraph §122.21(g)(7) (iii) and (iv) of this part;
- (5) Flow measurements or estimates of the flow rate, and the total amount of discharge for the storm event(s) sampled, and the method of flow measurement or estimation; and
- (6) The date and duration (in hours) of the storm event(s) sampled, rainfall measurements or estimates of the storm event (in inches) which generated the sampled runoff and the duration between the storm event sampled and the end of the previous measurable (greater than 0.1 inch rainfall) storm event (in hours);
- (F) Operators of a discharge which is composed entirely of storm water are exempt from the requirements of §122.21 (g)(2), (g)(3), (g)(4), (g)(5), (g)(7)(i), (g)(7)(ii), and (g)(7)(v); and

- (G) Operators of new sources or new discharges (as defined in §122.2 of this part) which are composed in part or entirely of storm water must include estimates for the pollutants or parameters listed in paragraph (c)(1)(i)(E) of this section instead of actual sampling data, along with the source of each estimate. Operators of new sources or new discharges composed in part or entirely of storm water must provide quantitative data for the parameters listed in paragraph (c)(1)(i)(E) of this section within two years after commencement of discharge, unless such data has already been reported under the monitoring requirements of the NPDES permit for the discharge. Operators of a new source or new discharge which is composed entirely of storm water are exempt from the requirements of  $\S122.21$  (k)(3)(ii), (k)(3)(iii), and (k)(5).
- (ii) The operator of an existing or new storm water discharge that is associated with industrial activity solely under paragraph (b)(14)(x) of this section, is exempt from the requirements of §122.21(g) and paragraph (c)(1)(i) of this section. Such operator shall provide a narrative description of:
- (A) The location (including a map) and the nature of the construction activity:
- (B) The total area of the site and the area of the site that is expected to undergo excavation during the life of the permit;
- (C) Proposed measures, including best management practices, to control pollutants in storm water discharges during construction, including a brief description of applicable State and local erosion and sediment control requirements;
- (D) Proposed measures to control pollutants in storm water discharges that will occur after construction operations have been completed, including a brief description of applicable State or local erosion and sediment control requirements;
- (E) An estimate of the runoff coefficient of the site and the increase in impervious area after the construction addressed in the permit application is completed, the nature of fill material and existing data describing the soil or the quality of the discharge; and

(F) The name of the receiving water. (iii) The operator of an existing or new discharge composed entirely of storm water from an oil or gas exploration, production, processing, or treatment operation, or transmission facility is not required to submit a permit application in accordance with paragraph (c)(1)(i) of this section, unless the facility:

(A) Has had a discharge of storm water resulting in the discharge of a reportable quantity for which notification is or was required pursuant to 40 CFR 117.21 or 40 CFR 302.6 at anytime

since November 16, 1987; or

(B) Has had a discharge of storm water resulting in the discharge of a reportable quantity for which notification is or was required pursuant to 40 CFR 110.6 at any time since November 16, 1987; or

(C) Contributes to a violation of a

water quality standard.

(iv) The operator of an existing or new discharge composed entirely of storm water from a mining operation is not required to submit a permit application unless the discharge has come into contact with, any overburden, raw material, intermediate products, finished product, byproduct or waste products located on the site of such operations.

(v) Applicants shall provide such other information the Director may reasonably require under §122.21(g)(13) of this part to determine whether to issue a permit and may require any facility subject to paragraph (c)(l)(ii) of this section to comply with paragraph

(c)(1)(i) of this section.

(2) Group application for discharges associated with industrial activity. In lieu of individual applications or notice of intent to be covered by a general permit for storm water discharges associated with industrial activity, a group application may be filed by an entity representing a group of applicants (except facilities that have existing individual NPDES permits for storm water) that are part of the same subcategory (see 40 CFR subchapter N, part 405 to 471) or, where such grouping is inapplicable, are sufficiently similar as to be appropriate for general permit coverage under § 122.28 of this part. The part 1 application shall be submitted to

the Office of Water Enforcement and Permits, U.S. EPA, 401 M Street, SW., Washington, DC 20460 (EN-336) for approval. Once a part 1 application is approved, group applicants are to submit Part 2 of the group application to the Office of Water Enforcement and Permits. A group application shall consist of:

- (i) Part 1. Part 1 of a group application shall:
- (A) Identify the participants in the group application by name and location. Facilities participating in the group application shall be listed in nine subdivisions, based on the facility location relative to the nine precipitation zones indicated in appendix E to this part.

(B) Include a narrative description summarizing the industrial activities of participants of the group application and explaining why the participants, as a whole, are sufficiently similar to be a

covered by a general permit;

(C) Include a list of significant materials stored exposed to precipitation by participants in the group application and materials management practices employed to diminish contact by these materials with precipitation and storm water runoff;

(D) For groups of more than 1,000 members, identify at least  $100\ dis$ chargers participating in the group application from which quantitative data will be submitted. For groups of 100 or more members, identify a minimum of ten percent of the dischargers participating in the group application from which quantitative data will be submitted. For groups of between 21 and 99 members identify a minimum of ten dischargers participating in the group application from which quantitative data will be submitted. For groups of 4 to 20 members, identify a minimum of 50 percent of the dischargers participating in the group application from which quantitative data will be submitted. For groups with more than 10 members, either a minimum of two dischargers from each precipitation zone indicated in appendix E of this part in which ten or more members of the group are located, or one discharger from each precipitation zone indicated in appendix E of this part in which nine

or fewer members of the group are located, must be identified to submit quantitative data. For groups of 4 to 10 members, at least one facility in each precipitation zone indicated in appendix E of this part in which members of the group are located must be identifed to submit quantitative data. A description of why the facilities selected to perform sampling and analysis are representative of the group as a whole in terms of the information provided in paragraphs (c)(1)(i)(B) and (c)(1)(i)(C) of this section, shall accompany this section. Different factors impacting the nature of the storm water discharges, such as the processes used and material management, shall be represented, to the extent feasible, in a manner roughly equivalent to their proportion in the group.

(ii) Part 2. Part 2 of a group application shall contain quantitative data (NPDES Form 2F), as modified by paragraph (c)(1) of this section, so that when part 1 and part 2 of the group application are taken together, a complete NPDES application (Form 1, Form 2C, and Form 2F) can be evaluated for each discharger identified in paragraph (c)(2)(i)(D) of this section.

- (d) Application requirements for large and medium municipal separate storm sewer discharges. The operator of a discharge from a large or medium municipal separate storm sewer or a municipal separate storm sewer that is designated by the Director under paragraph (a)(1)(v) of this section, may submit a jurisdiction-wide or system-wide permit application. Where more than one public entity owns or operates a municipal separate storm sewer within a geographic area (including adjacent or interconnected municipal separate storm sewer systems), such operators may be a coapplicant to the same application. Permit applications for discharges from large and medium municipal storm sewers or municipal storm sewers designated under paragraph (a)(!)(v) of this section shall include:
- (1) Part 1. Part 1 of the application shall consist of;
- (i) General information. The applicants' name, address, telephone number of contact person, ownership status and status as a State or local government entity.

- (ii) Legal authority. A description of existing legal authority to control discharges to the municipal separate storm sewer system. When existing legal authority is not sufficient to meet the criteria provided in paragraph (d)(2)(i) of this section, the description shall list additional authorities as will be necessary to meet the criteria and shall include a schedule and commitment to seek such additional authority that will be needed to meet the criteria.
- (iii) Source identification. (A) A description of the historic use of ordinances, guidance or other controls which limited the discharge of nonstorm water discharges to any Publicly Owned Treatment Works serving the same area as the municipal separate storm sewer system.
- (B) A USGS 7.5 minute topographic map (or equivalent topographic map with a scale between 1:10,000 and 1:24,000 if cost effective) extending one mile beyond the service boundaries of the municipal storm sewer system covered by the permit application. The following information shall be provided:
- (1) The location of known municipal storm sewer system outfalls discharging to waters of the United States;
- (2) A description of the land use activities (e.g. divisions indicating undeveloped, residential, commercial, agricultural and industrial uses) accompanied with estimates of population densities and projected growth for a ten year period within the drainage area served by the separate storm sewer. For each land use type, an estimate of an average runoff coefficient shall be provided;
- (3) The location and a description of the activities of the facility of each currently operating or closed municipal landfill or other treatment, storage or disposal facility for municipal waste;
- (4) The location and the permit number of any known discharge to the municipal storm sewer that has been issued a NPDES permit;
- (5) The location of major structural controls for storm water discharge (retention basins, detention basins, major infiltration devices, etc.); and

scription of procedures, processes and uses are known to be impaired; a dethose publicly owned lakes for which (include the following: A description of quired under section 314(a) of the CWA owned lakes listed in State reports reto entrophic condition of publicly (4) Identified and classified according tion of water quality standards);

pollucion (or contributing to a violamunicipal sludge adding significant and runoff from municipal landfills and construction, highway maintenance quality standards due to storm sewers. pected to attain or maintain water pollution, cannot reasonably be exaction to control nonpoint sources of of the CWA that, without additional Assessments required by section 319(a) (3) Listed in State Nonpoint Source

or water quality goals; pecced to meet water quality standards 304(I)(I)(B) of the CWA that is not exsection 304(1)(1)(A)(ii), or section (3) Listed under section 304(1)(1)(A)(i),

nonsupport of designated uses; and swimmable waters), and causes of Clean Water Act (CWA) goals (fishable ignated use support and attainment of or monitored), a summary of desthe basis for the assessment (evaluated 305(b) reports submitted by the State, (1) Assessed and reported in section

such discharges have been: whether the water bodies receiving pacts shall include a description of At a minimum, the description of imtion of known water quality impacts. water degradation and a brief descripcharges may accumulate and cause where pollutants from the system disstream segments, lakes and estuaries, storm sewer system, including downdischarges from the municipal separate

(C) A list of water bodies that receive and analytical methods used outfalls sampled, sampling procedures sewer, including a description of the charges from the municipal storm

scriping the volume and quality of dis-(B) Existing quantitative data de-

of storm events. data) and the monthly average number mates (or summary of weather bureau Monthly mean rain and snow fall esti-

(iv) Discharge characterization. (A) other open lands.

owned parks, recreational areas, and (6) The identification of publicly

bornes (or any other point of access ther major outfalls or other outfall test. Field screening points shall be eiwith the range and accuracy of the ufacturer of the test method along od used including the name of the manshall provide a description of the methunder 40 CFR part 136, the applicant volve analytical methods approved Where the field analysis does not insurfactants) shall be provided along with a description of the flow rate. copper, total phenol, and detergents (or to estimate pH, total chlorine, total a field analysis using suitable methods a narrative description of the results of dumping shall be provided. In addition, non-storm water discharges or illegal regarding the potential presence of well as any other relevant observations ence of an oil sheen or surface scum as of the color, odor, turbidity, the pressuch samples, a narrative description four hours between samples. For all hour period with a minimum period of samples shall be collected during a 24 ods. If any flow is observed, two grab vations made during dry weather peripoint or major outfall, of visual obsertion, for either each field screening ysis shall include a narrative description. At a minimum, a screening analoutfalls covered in the permit applicalected field screening points or major tions and illegal dumping for either sescreening analysis for illicit connec-(D) Field screening. Results of a field

placing a grid over a drainage system

throughout the storm sewer system by

such as manholes) randomly located

ascs. tom sediments, fish tissue or biosurvey (9) Found to have pollutants in bot-

lands inventory as wetlands; and and Wildlife Services's National Wet-

(8) Defined by the State or U.S. Fish

highly valued or sensitive waters; (A) Recognized by the applicant as

tion 320 of the CWA; National Estuary Program under sec-(6) Designated estuaries under the

Joint Commission:

Lakes identified by the International (5) Areas of concern of the Great restore the quality of such lakes);

scription of methods and procedures to scorm sewers into such lakes; and a depollutants from municipal separate methods to control the discharge of

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map and identifying those cells of the grid which contain a segment of the storm sewer system or major outfall. The field screening points shall be established using the following guidelines and criteria:

(1) A grid system consisting of perpendicular north-south and east-west lines spaced ½ mile apart shall be overlayed on a map of the municipal storm sewer system, creating a series of cells:

(2) All cells that contain a segment of the storm sewer system shall be identified; one field screening point shall be selected in each cell; major outfalls may be used as field screening points;

(3) Field screening points should be located downstream of any sources of suspected illegal or illicit activity;

- (4) Field screening points shall be located to the degree practicable at the farthest manhole or other accessible location downstream in the system, within each cell; however, safety of personnel and accessibility of the location should be considered in making this determination;
- (3) Hydrological conditions; total drainage area of the site; population density of the site; traffic density; age of the structures or buildings in the area; history of the area; and land use types:
- (6) For medium municipal separate storm sewer systems, no more than 250 cells need to have identified field screening points; in large municipal separate storm sewer systems, no more than 500 cells need to have identified field screening points; cells established by the grid that contain no storm sewer segments will be eliminated from consideration; if fewer than 250 cells in medium municipal sewers are created, and fewer than 500 in large systems are created by the overlay on the municipal sewer map, then all those cells which contain a segment of the sewer system shall be subject to field screening (unless access to the separate storm sewer system is impossible); and

(7) Large or medium municipal separate storm sewer systems which are unable to utilize the procedures described in paragraphs (d)(1)(iv)(D) (1) through (6) of this section, because a sufficiently detailed map of the separate storm sewer systems is unavail-

able, shall field screen no more than 500 or 250 major outfalls respectively (or all major outfalls in the system, if less); in such circumstances, the applicant shall establish a grid system consisting of north-south and east-west lines spaced 1/4 mile apart as an overlay to the boundaries of the municipal storm sewer system, thereby creating a series of cells; the applicant will then select major outfalls in as many cells as possible until at least 500 major outfalls (large municipalities) or 250 major outfalls (medium municipalities) are selected; a field screening analysis shall be undertaken at these major outfalls.

(E) Characterization plan. Information and a proposed program to meet the requirements of paragraph (d)(2)(iii) of this section. Such description shall include: the location of outfalls or field screening points appropriate for representative data collection under paragraph (d)(2)(iii)(A) of this section, a description of why the outfall or field screening point is representative, the seasons during which sampling is intended, a description of the sampling equipment. The proposed location of outfalls or field screening points for such sampling should reflect water quality concerns (see paragraph (d)(l)(iv)(C) of this section) to the extent practicable.

(v) Management programs. (A) A description of the existing management programs to control pollutants from the municipal separate storm sewer system. The description shall provide information on existing structural and source controls, including operation and maintenance measures for structural controls, that are currently being implemented. Such controls may include, but are not limited to: Procedures to control pollution resulting from construction activities; floodplain management controls; wetland protection measures; best management practices for new subdivisions; and emergency spill response programs. The description may address controls established under State law as well as local

(B) A description of the existing program to identify illicit connections to the municipal storm sewer system. The description should include inspection

procedures and methods for detecting and preventing illicit discharges, and describe areas where this program has been implemented.

(vi) Fiscal resources. (A) A description of the financial resources currently available to the municipality to complete part 2 of the permit application. A description of the municipality's budget for existing storm water programs, including an overview of the municipality's financial resources and budget, including overall indebtedness and assets, and sources of funds for storm water programs.

(2) Part 2. Part 2 of the application shall consist of:

(i) Adequate legal authority. A demonstration that the applicant can operate pursuant to legal authority established by statute, ordinance or series of contracts which authorizes or enables

the applicant at a minimum to:

(A) Control through ordinance, permit, contract, order or similar means, the contribution of pollutants to the municipal storm sewer by storm water discharges associated with industrial activity and the quality of storm water discharged from sites of industrial activity;

(B) Prohibit through ordinance, order or similar means, illicit discharges to the municipal separate storm sewer;

- (C) Control through ordinance, order or similar means the discharge to a municipal separate storm sewer of spills, dumping or disposal of materials other than storm water;
- (D) Control through interagency agreements among coapplicants the contribution of pollutants from one portion of the municipal system to another portion of the municipal system;

(E) Require compliance with conditions in ordinances, permits, contracts or orders; and

- (F) Carry out all inspection, surveillance and monitoring procedures necessary to determine compliance and noncompliance with permit conditions including the prohibition on illicit discharges to the municipal separate storm sewer.
- (ii) Source identification. The location of any major outfall that discharges to waters of the United States that was not reported under paragraph (d)(1)(iii)(B)(1) of this section. Provide

an inventory, organized by watershed of the name and address, and a description (such as SIC codes) which best reflects the principal products or services provided by each facility which may discharge, to the municipal separate storm sewer, storm water associated with industrial activity;

(iii) Characterization data. When 'quantitative data" for a pollutant are required under paragraph (d)(a)(iii)(A)(3) of this paragraph, the applicant must collect a sample of effluent in accordance with 40 CFR 122.21(g)(7) and analyze it for the pollutant in accordance with analytical methods approved under 40 CFR part 136. When no analytical method is approved the applicant may use any suitable method but must provide a description of the method. The applicant must provide information characterizing the quality and quantity of discharges covered in the permit application, including:

(A) Quantitative data from representative outfalls designated by the Director (based on information received in part 1 of the application, the Director shall designate between five and ten outfalls or field screening points as representative of the commercial, residential and industrial land use activities of the drainage area contributing to the system or, where there are less than five outfalls covered in the application, the Director shall designate all outfalls) developed as follows:

(1) For each outfall or field screening point designated under this subparagraph, samples shall be collected of storm water discharges from three

storm events occurring at least one month apart in accordance with the requirements at §122.21(g)(7) (the Director may allow exemptions to sampling three storm events when climatic conditions create good cause for such ex-

emptions);

(2) A narrative description shall be provided of the date and duration of the storm event(s) sampled, rainfall estimates of the storm event which generated the sampled discharge and the duration between the storm event sampled and the end of the previous measurable (greater than 0.1 inch rainfall) storm event;

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(3) For samples collected and described under paragraphs (d)(2)(iii) (A)(I) and (A)(2) of this section, quantitative data shall be provided for: the organic pollutants listed in Table II; the pollutants listed in Table III (toxic metals, cyanide, and total phenols) of appendix D of 40 CFR part 122, and for the following pollutants:

Total suspended solids (TSS)
Total dissolved solids (TDS)
COD
BODs
Oil and grease
Fecal coliform
Fecal streptococcus
pH
Total Kjeldahl nitrogen
Nitrate plus nitrite
Dissolved phosphorus
Total ammonia plus organic nitrogen
Total ohosphorus

- (4) Additional limited quantitative data required by the Director for determining permit conditions (the Director may require that quantitative data shall be provided for additional parameters, and may establish sampling conditions such as the location, season of sample collection, form of precipitation (snow melt, rainfall) and other parameters necessary to insure representativeness);
- (B) Estimates of the annual pollutant load of the cumulative discharges to waters of the United States from all identified municipal outfalls and the event mean concentration of the cumulative discharges to waters of the United States from all identified municipal outfalls during a storm event (as described under §122.21(c)(7)) for BODs, COD, TSS, dissolved solids, total nitrogen, total ammonia plus organic nitrogen, total phosphorus, dissolved phosphorus, cadmium, copper, lead, and zinc. Estimates shall be accompanied by a description of the procedures for estimating constituent loads and concentrations, including any modelling, data analysis, and calculation methods;
- (C) A proposed schedule to provide estimates for each major outfall identified in either paragraph (d)(2)(ii) or (d)(1)(iii)(B)(I) of this section of the seasonal pollutant load and of the event mean concentration of a representative storm for any constituent detected in any sample required under

paragraph (d)(2)(iii)(A) of this section; and

- (D) A proposed monitoring program for representative data collection for the term of the permit that describes the location of outfalls or field screening points to be sampled (or the location of instream stations), why the location is representative, the frequency of sampling, parameters to be sampled, and a description of sampling equipment.
- (iv) Proposed management program. A proposed management program covers the duration of the permit. It shall include a comprehensive planning process which involves public participation and where necessary intergovernmental coordination, to reduce the discharge of pollutants to the maximum extent practicable using management practices, control techniques and system, design and engineering methods, and such other provisions which are appropriate. The program shall also include a description of staff and equipment available to implement the program. Separate proposed programs may be submitted by each coapplicant. Proposed programs may impose controls on a systemwide basis, a watershed basis, a jurisdiction basis, or on individual outfalls. Proposed programs will be considered by the Director when developing permit conditions to reduce pollutants in discharges to the maximum extent practicable. Proposed management programs shall describe priorities for implementing controls. Such programs shall be based on:
- (A) A description of structural and source control measures to reduce pollutants from runoff from commercial and residential areas that are discharged from the municipal storm sewer system that are to be implemented during the life of the permit, accompanied with an estimate of the expected reduction of pollutant loads and a proposed schedule for implementing such controls. At a minimum, the description shall include:
- (1) A description of maintenance activities and a maintenance schedule for structural controls to reduce pollutants (including floatables) in discharges from municipal separate storm sewers;

- (2) A description of planning procedures including a comprehensive master plan to develop, implement and enforce controls to reduce the discharge of pollutants from municipal separate storm sewers which receive discharges from areas of new development and significant redevelopment. Such plan shall address controls to reduce pollutants in discharges from municipal separate storm sewers after construction is completed. (Controls to reduce pollutants in discharges from municipal separate storm sewers containing construction site runoff are addressed in paragraph (d)(2)(iv)(D) of this section;
- (3) A description of practices for operating and maintaining public streets, roads and highways and procedures for reducing the impact on receiving waters of discharges from municipal storm sewer systems, including pollutants discharged as a result of deicing activities.
- (4) A description of procedures to assure that flood management projects assess the impacts on the water quality of receiving water bodies and that existing structural flood control devices have been evaluated to determine if retrofitting the device to provide additional pollutant removal from storm water is feasible;
- (5) A description of a program to monitor pollutants in runoff from operating or closed municipal landfills or other treatment, storage or disposal facilities for municipal waste, which shall identify priorities and procedures for inspections and establishing and implementing control measures for such discharges (this program can be coordinated with the program developed under paragraph (d)(2)(iv)(C) of this section); and
- (6) A description of a program to reduce to the maximum extent practicable, pollutants in discharges from municipal separate storm sewers associated with the application of pesticides, herbicides and fertilizer which will include, as appropriate, controls such as educational activities, permits, certifications and other measures for commercial applicators and distributors, and controls for application in public right-of-ways and at municipal facilities.

- (B) A description of a program, including a schedule, to detect and remove (or require the discharger to the municipal separate storm sewer to obtain a separate NPDES permit for) illicit discharges and improper disposal into the storm sewer. The proposed program shall include:
- (1) A description of a program, including inspections, to implement and enforce an ordinance, orders or similar means to prevent illicit discharges to the municipal separate storm sewer system; this program description shall address all types of illicit discharges, however the following category of nonstorm water discharges or flows shall be addressed where such discharges are identified by the municipality as sources of pollutants to waters of the United States: water line flushing, landscape irrigation, diverted stream ground rising waters. uncontaminated ground water infiltration (as defined at 40 CFR 35.2005(20)) to separate storm uncontaminated pumped ground water, discharges from potable water sources, foundation drains, air conditioning condensation, irrigation water, springs, water from crawl space pumps, footing drains, lawn watering, individual residential car washing, flows from habitats and wetlands, dechlorinated swimming pool discharges, and street wash water (program descriptions shall address discharges or flows from fire fighting only where such discharges or flows are identified as significant sources of pollutants to waters of the United States);
- (2) A description of procedures to conduct on-going field screening activities during the life of the permit, including areas or locations that will be evaluated by such field screens;
- (3) A description of procedures to be followed to investigate portions of the separate storm sewer system that, based on the results of the field screen, or other appropriate information, indicate a reasonable potential of containing illicit discharges or other sources of non-storm water (such procedures may include: sampling procedures for constituents such as fecal coliform, fecal streptococcus, surfactants (MBAS), residual chlorine, fluorides and potassium; testing with

#### § 122.26

fluorometric dyes; or conducting in storm sewer inspections where safety and other considerations allow. Such description shall include the location of storm sewers that have been identified for such evaluation);

(4) A description of procedures to prevent, contain, and respond to spills that may discharge into the municipal

separate storm sewer;

(5) A description of a program to promote, publicize, and facilitate public reporting of the presence of illicit discharges or water quality impacts associated with discharges from municipal separate storm sewers;

(6) A description of educational activities, public information activities, and other appropriate activities to facilitate the proper management and disposal of used oil and toxic materials;

and

- (7) A description of controls to limit infiltration of seepage from municipal sanitary sewers to municipal separate storm sewer systems where necessary;
- (C) A description of a program to monitor and control pollutants in storm water discharges to municipal systems from municipal landfills, hazardous waste treatment, disposal and recovery facilities, industrial facilities that are subject to section 313 of title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA), and industrial facilities that the municipal permit applicant determines are contributing a substantial pollutant loading to the municipal storm sewer system. The program shall:
- (1) Identify priorities and procedures for inspections and establishing and implementing control measures for such discharges;
- (2) Describe a monitoring program for storm water discharges associated with the industrial facilities identified in paragraph (d)(2)(iv)(C) of this section, to be implemented during the term of the permit, including the submission of quantitative data on the following constituents: any pollutants guidelines limited effluent ' in subcategories, where applicable; any pollutant listed in an existing NPDES permit for a facility; oil and grease, COD, pH. BODs. TSS, total phosphorus. total Kjeldahl nitrogen, nitrate plus nitrite nitrogen, and any information on

discharges required under 40 CFR 122.21(g)(7) (iii) and (iv).

- (D) A description of a program to implement and maintain structural and non-structural best management practices to reduce pollutants in storm water runoff from construction sites to the municipal storm sewer system, which shall include:
- (1) A description of procedures for site planning which incorporate consideration of potential water quality impacts:
- (2) A description of requirements for nonstructural and structural best management practices;
- (3) A description of procedures for identifying priorities for inspecting sites and enforcing control measures which consider the nature of the construction activity, topography, and the characteristics of soils and receiving water quality; and

(4) A description of appropriate educational and training measures for con-

struction site operators.

- (v) Assessment of controls. Estimated reductions in loadings of pollutants from discharges of municipal storm sewer constituents from municipal storm sewer systems expected as the result of the municipal storm water quality management program. The assessment shall also identify known impacts of storm water controls on ground water.
- (vi) Fiscal analysis. For each fiscal year to be covered by the permit, a fiscal analysis of the necessary capital and operation and maintenance expenditures necessary to accomplish the activities of the programs under paragraphs (d)(2) (iii) and (iv) of this section. Such analysis shall include a description of the source of funds that are proposed to meet the necessary expenditures, including legal restrictions on the use of such funds.
- (vii) Where more than one legal entity submits an application, the application shall contain a description of the roles and responsibilities of each legal entity and procedures to ensure effective coordination.
- (viii) Where requirements under paragraph (d)(1)(iv)(E), (d)(2)(ii), (d)(2)(iii)(B) and (d)(2)(iv) of this section are not practicable or are not applicable, the Director may exclude any

operator of a discharge from a municipal separate storm sewer which is designated under paragraph (a)(1)(v), (b)(4)(ii) or (b)(7)(ii) of this section from such requirements. The Director shall not exclude the operator of a discharge from a municipal separate storm sewer identified in appendix F. G, H or I of part 122, from any of the permit application requirements under this paragraph except where authorized under this section.

(e) Application deadlines under paragraph (a)(1). Any operator of a point source required to obtain a permit under paragraph (a)(1) of this section that does not have an effective NPDES permit covering its storm water outfalls shall submit an application in accordance with the following deadlines:

- (1) Individual applications. (i) Except as provided in paragraph (e)(1)(ii) of this section, for any storm water discharge associated with industrial activity identified in paragraphs (b)(14) (i) through (xi) of this section, that is not part of a group application as described in paragraph (c)(2) of this section or which is not authorized by a storm water general permit, a permit application made pursuant to paragraph (C) of this section shall be submitted to the Director by October 1,
- (ii) For any storm water discharge associated with industrial activity from a facility that is owned or operated by a municipality with a population of less than 100,000 other than an airport, powerplant, or uncontrolled sanitary landfill, permit application requirements are contained in paragraph (g) of this section.

(2) For any group application submitted in accordance with paragraph (c)(2) of this section:

- (i) Part 1. (A) Except as provided in paragraph (e)(2)(i)(B) of this section, part 1 of the application shall be submitted to the Director, Office of Wastewater Enforcement and Compliance by September 30, 1991;
- (B) Any municipality with a population of less than 250,000 shall not be required to submit a part 1 application before May 18, 1992.
- (C) For any storm water discharge associated with industrial activity from a facility that is owned or oper-

ated by a municipality with a population of less than 100,000 other than an airport, powerplant, or uncontrolled sanitary landfill, permit applications requirements are reserved.

(ii) Based on information in the part 1 application, the Director will approve or deny the members in the group application within 60 days after receiving part 1 of the group application.

(iii) Part 2. (A) Except as provided in paragraph (e)(2)(iii)(B) of this section, part 2 of the application shall be submittted to the Director, Office of Wastewater Enforcement and Compliance by October 1, 1992;

(B) Any municipality with a population of less than 250,000 shall not be required to submit a part 1 application

before May 17, 1993.

(C) For any storm water discharge associated with industrial activity from a facility that is owned or operated by a municipality with a population of less than 100,000 other than an airport, powerplant, or uncontrolled sanitary landfill, permit applications requirements are reserved.

(iv) Rejected facilities. (A) Except as provided in paragraph (e)(2)(iv)(B) of this section, facilities that are rejected as members of the group shall submit an individual application (or obtain coverage under an applicable general permit) no later than 12 months after the date of receipt of the notice of reiection or October 1, 1992, whichever comes first.

(B) Facilities that are owned or operated by a municipality and that are rejected as members of part I group application shall submit an individual application no later than 180 days after the date of receipt of the notice of rejection or October 1, 1992, whichever is

(v) A facility listed under paragraph (b)(14) (i)-(xi) of this section may add on to a group application submitted in accordance with paragraph (e)(2)(i) of this section at the discretion of the Office of Water Enforcement and Permits, and only upon a showing of good cause by the facility and the group applicant; the request for the addition of the facility shall be made no later than February 18, 1992; the addition of the facility shall not cause the percentage of the facilities that are required to

submit quantitative data to be less than 10%, unless there are over 100 facilities in the group that are submitting quantitative data; approval to become part of group application must be obtained from the group or the trade association representing the individual facilities.

- (3) For any discharge from a large municipal separate storm sewer system:
- (i) Part 1 of the application shall be submitted to the Director by November 18, 1991;
- (ii) Based on information received in the part 1 application the Director will approve or deny a sampling plan under paragraph (d)(1)(iv)(E) of this section within 90 days after receiving the part 1 application;

(iii) Part 2 of the application shall be submitted to the Director by November 16, 1992.

- (4) For any discharge from a medium municipal separate storm sewer system:
- (i) Part 1 of the application shall be submitted to the Director by May 18, 1992.
- (ii) Based on information received in the part 1 application the Director will approve or deny a sampling plan under paragraph (d)(1)(iv)(E) of this section within 90 days after receiving the part 1 application.

(iii) Part 2 of the application shall be submitted to the Director by May 17, 1993.

- (5) A permit application shall be submitted to the Director within 60 days of notice, unless permission for a later date is granted by the Director (see 40 CFR 124.52(c)), for:
- (i) A storm water discharge which the Director, or in States with approved NPDES programs, either the Director or the EPA Regional Administrator, determines that the discharge contributes to a violation of a water quality standard or is a significant contributor of pollutants to waters of the United States (see paragraph (a)(1)(v) of this section);

(ii) A storm water discharge subject to paragraph (c)(1)(v) of this section.

(6) Facilities with existing NPDES permits for storm water discharges associated with industrial activity shall maintain existing permits. Facilities

with permits for storm water discharges associated with industrial activity which expire on or after May 18, 1992 shall submit a new application in accordance with the requirements of 40 CFR 122.21 and 40 CFR 122.26(c) (Form 1, Form 2F, and other applicable Forms) 180 days before the expiration of such permits.

- (7) The Director shall issue or deny permits for discharges composed entirely of storm water under this section in accordance with the following schedule:
- (i)(A) Except as provided in paragraph (e)(7)(i)(B) of this section, the Director shall issue or deny permits for storm water discharges associated with industrial activity no later than October 1, 1993, or, for new sources or existing sources which fail to submit a complete permit application by October 1, 1992, one year after receipt of a complete permit application:
- (B) For any municipality with a population of less than 250,000 which submits a timely Part I group application under paragraph (e)(2)(i)(B) of this section, the Director shall issue or deny permits for storm water discharges associated with industrial activity no later than May 17, 1994, or, for any such municipality which fails to submit a complete Part II group permit application by May 17, 1993, one year after receipt of a complete permit application;
- (ii) The Director shall issue or deny permits for large municipal separate storm sewer systems no later than November 16, 1993, or, for new sources or existing sources which fail to submit a complete permit application by November 16, 1992, one year after receipt of a complete permit application;
- (iii) The Director shall issue or deny permits for medium municipal separate storm sewer systems no later than May 17, 1994, or, for new sources or existing sources which fail to submit a complete permit application by May 17, 1993, one year after receipt of a complete permit application.
- (f) Petitions. (1) Any operator of a municipal separate storm sewer system may petition the Director to require a separate NPDES permit (or a permit issued under an approved NPDES State program) for any discharge into the

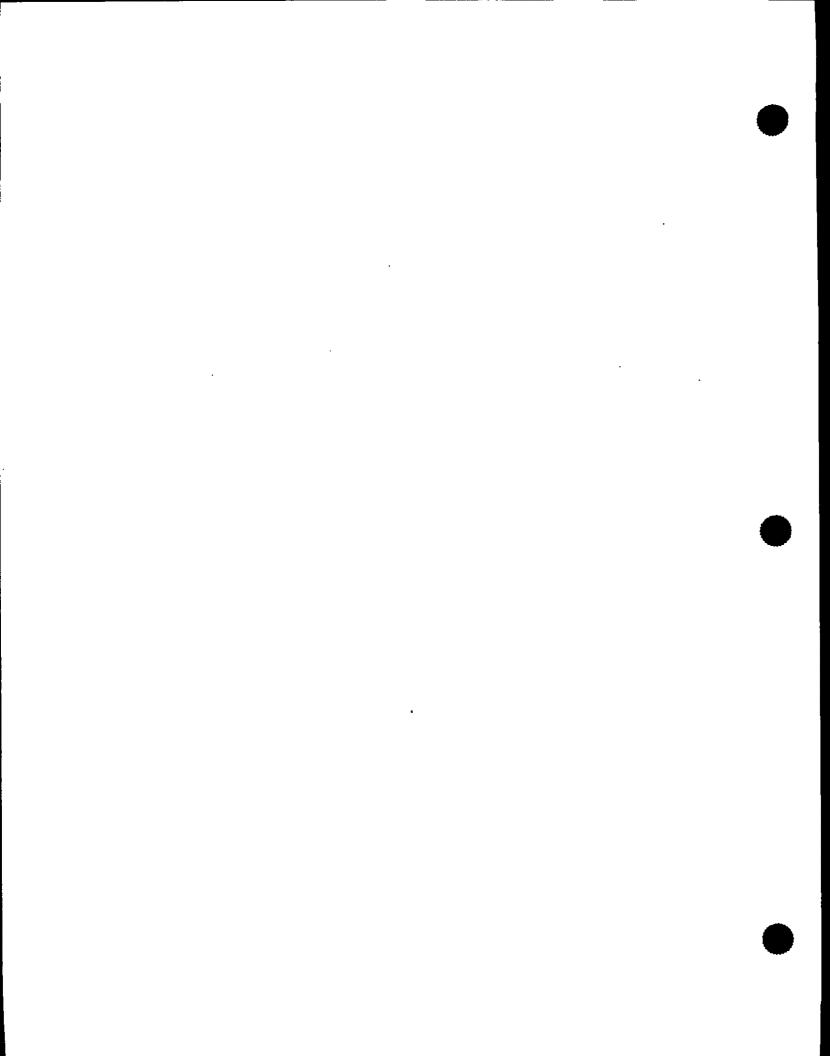
municipal separate storm sewer system.

- (2) Any person may petition the Director to require a NPDES permit for a discharge which is composed entirely of storm water which contributes to a violation of a water quality standard or is a significant contributor of pollutants to waters of the United States.
- (3) The owner or operator of a municipal separate storm sewer system may petition the Director to reduce the Census estimates of the population served by such separate system to account for storm water discharged to combined sewers as defined by 40 CFR 35.2005(b)(11) that is treated in a publicly owned treatment works. In municipalities in which combined sewers are operated, the Census estimates of population may be reduced proportional to the fraction, based on estimated lengths, of the length of combined sewers over the sum of the length of combined sewers and municipal separate storm sewers where an applicant has submitted the NPDES permit number associated with each discharge point and a map indicating areas served by combined sewers and the location of any combined sewer overflow discharge point.
- (4) Any person may petition the Director for the designation of a large or medium municipal separate storm sewer system as defined by paragraphs (b)(4)(iv) or (b)(7)(iv) of this section.
- (5) The Director shall make a final determination on any petition received under this section within 90 days after receiving the petition.
- (g) Application requirements for discharges composed entirely of storm water under Clean Water Act section 402(p)(6). Any operator of a point source required to obtain a permit under paragraph (a)(9) of this section shall submit an application in accordance with the following requirements.
- (1) Application deadlines. The operator shall submit an application in accordance with the following deadlines:
- (i) A discharger which the Director determines to contribute to a violation of a water quality standard or is a significant contributor of pollutants to waters of the United States shall apply for a permit to the Director within 180 days of receipt of notice, unless permis-

- sion for a later date is granted by the Director (see 40 CFR 124.52(c)); or
- (ii) All other dischargers shall apply to the Director no later than August 7, 2001.
- (2) Application requirements. The operator shall submit an application in accordance with the following requirements, unless otherwise modified by the Director:
- (i) Individual application for non-municipal discharges. The requirements contained in paragraph (c)(1) of this section.
- (ii) Application requirements for municipal separate storm sewer discharges. The requirements contained in paragraph (d) of this section.
- (iii) Notice of intent to be covered by a general permit issued by the Director. The requirements contained in 40 CFR 122.28(b)(2).
- [55 FR 48063. Nov. 16, 1990, as amended at 56 FR 12100, Mar. 21, 1991; 56 FR 56554, Nov. 5, 1991; 57 FR 11412, Apr. 2, 1992; 57 FR 60447, Dec. 18, 1992; 60 FR 17956, Apr. 7, 1995; 60 FR 19464, Apr. 18, 1995; 60 FR 40235, Aug. 7, 1995]

## §122.27 Silvicultural activities (applicable to State NPDES programs, see §123.25).

- (a) Permit requirement. Silvicultural point sources, as defined in this section, as point sources subject to the NPDES permit program.
- (b) Definitions. (1) Silvicultural point source means any discernible, confined and discrete conveyance related to rock crushing, gravel washing, log sorting, or log storage facilities which are operated in connection with silvicultural activities and from which pollutants are discharged into waters of the United States. The term does not include non-point source silvicultural activities such as nursery operations, site preparation, reforestation and subsequent cultural treatment, thinning, prescribed burning, pest and fire control, harvesting operations, surface drainage, or road construction and maintenance from which there is natural runoff. However, some of these activities (such as stream crossing for roads) may involve point source discharges of dredged or fill material which may require a CWA section 404 permit (See 33 CFR 209.120 and part



	40 CFR citation				OMB control No.	
•	•	•	•	•	•	•
	EPA Administe	red Permit Program	s: The National Poll	utant Discharge Elie	nination System	
* 22.26(g)	•	*	•	*	•	• 2040–021
•	•	*	•	•	•	•
		Sta	te Permit Requireme	ents		
23.35(b)	*	•	•	•	*	* 2040–021
•	•	•	*	•	•	

#### PART 122—EPA ADMINISTERED PERMIT PROGRAMS: THE NATIONAL **POLLUTANT DISCHARGE ELIMINATION SYSTEM**

1. The authority citation for part 122 continues to read as follows:

Authority: The Clean Water Act, 33 U.S.C. 1251 et seq.

2. Revise § 122.21(c)(1) to read as follows:

\*

#### § 122.21 Application for a permit (applicable to State programs, see § 123.25).

(c) Time to apply. (1) Any person proposing a new discharge, shall submit an application at least 180 days before the date on which the discharge is to commence, unless permission for a later date has been granted by the Director. Facilities proposing a new discharge of storm water associated with industrial activity shall submit an application 180 days before that facility commences industrial activity which may result in a discharge of storm water associated with that industrial activity. Facilities described under § 122.26(b)(14)(x) or (b)(15)(i) shall submit applications at least 90 days before the date on which construction is to commence. Different submittal dates may be required under the terms of applicable general permits. Persons proposing a new discharge are encouraged to submit their applications well in advance of the 90 or 180 day requirements to avoid delay. See also paragraph (k) of this section and § 122.26(c)(1)(i)(G) and (c)(1)(ii).

3. Amend § 122.26 as follows:

 a. Revise paragraphs (a)(9), (b)(4)(i), (b)(7)(i), (b)(14) introductory text, (b)(14)(x), (b)(14)(xi);

b. Redesignate paragraph (b)(15) as paragraph (b)(20) and add new paragraphs (b)(15) through (b)(19);

 c. Revise the heading for paragraph (c), the first sentence of paragraph (c)(1) introductory text, the first sentence of paragraph (c)(1)(ii) introductory text, paragraphs (e) heading and introductory text, (e)(1), (e)(5) introductory text, and (e)(5)(i);

d. Add paragraphs (e)(8) and (e)(9); and

e. Revise paragraphs (f)(4), (f)(5), and

The additions and revisions read as follows:

#### § 122.26 Storm water discharges (applicable to State NPDES programs, see § 123.25).

(9)(i) On and after October 1, 1994, for discharges composed entirely of storm water, that are not required by paragraph (a)(1) of this section to obtain a permit, operators shall be required to obtain a NPDES permit only if:
(A) The discharge is from a small MS4

required to be regulated pursuant to

(B) The discharge is a storm water discharge associated with small construction activity pursuant to paragraph (b)(15) of this section;

(C) The Director, or in States with approved NPDES programs either the Director or the EPA Regional Administrator, determines that storm water controls are needed for the discharge based on wasteload allocations that are part of "total maximum daily loads" (TMDLs) that address the pollutant(s) of concern; or

(D) The Director, or in States with approved NPDES programs either the Director or the EPA Regional Administrator, determines that the discharge, or category of discharges

within a geographic area, contributes to a violation of a water quality standard or is a significant contributor of pollutants to waters of the United

(ii) Operators of small MS4s designated pursuant to paragraphs (a)(9)(i)(A), (a)(9)(i)(C), and (a)(9)(i)(D) of this section shall seek coverage under an NPDES permit in accordance with §§ 122.33 through 122.35. Operators of non-municipal sources designated pursuant to paragraphs (a)(9)(i)(B), (a)(9)(i)(C), and (a)(9)(i)(D) of this section shall seek coverage under an NPDES permit in accordance with paragraph (c)(1) of this section.

(iii) Operators of storm water discharges designated pursuant to paragraphs (a)(9)(i)(C) and (a)(9)(i)(D) of this section shall apply to the Director for a permit within 180 days of receipt of notice, unless permission for a later date is granted by the Director (see § 124.52(c) of this chapter).

(b) \* \* \*

(4) \* \* \*

(i) Located in an incorporated place with a population of 250,000 or more as determined by the 1990 Decennial Census by the Bureau of the Census (Appendix F of this part); or

(7) \* \* \*

(i) Located in an incorporated place with a population of 100,000 or more but less than 250,000, as determined by the 1990 Decennial Census by the Bureau of the Census (Appendix G of this part); or

(14) Storm water discharge associated with industrial activity means the discharge from any conveyance that is used for collecting and conveying storm

water and that is directly related to manufacturing, processing or raw materials storage areas at an industrial plant. The term does not include discharges from facilities or activities excluded from the NPDES program under this part 122. For the categories of industries identified in this section, the term includes, but is not limited to, storm water discharges from industrial plant yards; immediate access roads and rail lines used or traveled by carriers of raw materials, manufactured products, waste material, or by-products used or created by the facility; material handling sites; refuse sites; sites used for the application or disposal of process waste waters (as defined at part 401 of this chapter); sites used for the storage and maintenance of material handling equipment; sites used for residual treatment, storage, or disposal; shipping and receiving areas; manufacturing buildings; storage areas (including tank farms) for raw materials, and intermediate and final products; and areas where industrial activity has taken place in the past and significant materials remain and are exposed to storm water. For the purposes of this paragraph, material handling activities include storage, loading and unloading, transportation, or conveyance of any raw material, intermediate product, final product, by-product or waste product. The term excludes areas located on plant lands separate from the plant's industrial activities, such as office buildings and accompanying parking lots as long as the drainage from the excluded areas is not mixed with storm water drained from the above described areas. Industrial facilities (including industrial facilities that are federally, State, or municipally owned or operated that meet the description of the facilities listed in paragraphs (b)(14)(i) through (xi) of this section) include those facilities designated under the provisions of paragraph (a)(1)(v) of this section. The following categories of facilities are considered to be engaging in "industrial activity" for purposes of paragraph (b)(14):

(x) Construction activity including clearing, grading and excavation, except operations that result in the disturbance of less than five acres of total land area. Construction activity also includes the disturbance of less than five acres of total land area that is a part of a larger common plan of development or sale if the larger common plan will ultimately disturb five acres or more;

(xi) Facilities under Standard Industrial Classifications 20, 21, 22, 23, 2434, 25, 265, 267, 27, 283, 285, 30, 31 (except 311), 323, 34 (except 3441), 35, 36, 37 (except 373), 38, 39, and 4221– 25:

(15) Storm water discharge associated with small construction activity means the discharge of storm water from:

(i) Construction activities including clearing, grading, and excavating that result in land disturbance of equal to or greater than one acre and less than five acres. Small construction activity also includes the disturbance of less than one acre of total land area that is part of a larger common plan of development or sale if the larger common plan will ultimately disturb equal to or greater than one and less than five acres. Small construction activity does not include routine maintenance that is performed to maintain the original line and grade, hydraulic capacity, or original purpose of the facility. The Director may waive the otherwise applicable requirements in a general permit for a storm water discharge from construction activities that disturb less than five acres where:

(A) The value of the rainfall erosivity factor ("R" in the Revised Universal Soil Loss Equation) is less than five during the period of construction activity. The rainfall erosivity factor is determined in accordance with Chapter 2 of Agriculture Handbook Number 703, Predicting Soil Erosion by Water: A Guide to Conservation Planning With the Revised Universal Soil Loss Equation (RUSLE), pages 21-64, dated January 1997. The Director of the Federal Register approves this incorporation by reference in accordance with 5 U.S.C 552(a) and 1 CFR part 51. Copies may be obtained

from EPA's Water Resource Center, Mail Code RC4100, 401 M St. S.W., Washington, DC 20460. A copy is also available for inspection at the U.S. EPA Water Docket, 401 M Street S.W., Washington, DC. 20460, or the Office of the Federal Register, 800 N. Capitol Street N.W. Suite 700, Washington, DC. An operator must certify to the Director that the construction activity will take place during a period when the value of the rainfall erosivity factor is less than five; or

(B) Storm water controls are not needed based on a "total maximum daily load" (TMDL) approved or established by EPA that addresses the pollutant(s) of concern or, for nonimpaired waters that do not require TMDLs, an equivalent analysis that determines allocations for small construction sites for the pollutant(s) of concern or that determines that such allocations are not needed to protect water quality based on consideration of existing in-stream concentrations, expected growth in pollutant contributions from all sources, and a margin of safety. For the purpose of this paragraph, the pollutant(s) of concern include sediment or a parameter that addresses sediment (such as total suspended solids, turbidity or siltation) and any other pollutant that has been identified as a cause of impairment of any water body that will receive a discharge from the construction activity. The operator must certify to the Director that the construction activity will take place, and storm water discharges will occur, within the drainage area addressed by the TMDL or equivalent analysis.

(ii) Any other construction activity designated by the Director, or in States with approved NPDES programs either the Director or the EPA Regional Administrator, based on the potential for contribution to a violation of a water quality standard or for significant contribution of pollutants to waters of the United States.

EXHIBIT 1 TO § 122.26(B)(15).—SUMMARY OF COVERAGE OF "STORM WATER DISCHARGES ASSOCIATED WITH SMALL CONSTRUCTION ACTIVITY" UNDER THE NPDES STORM WATER PROGRAM

Automatic Designation: Required Nationwide Coverage.

Potential Designation: Optional Evaluation and Designation by the NPDES Permitting Authority or EPA Regional Administrator..

- Construction activities that result in a land disturbance of equal to or greater than one acre and less than five acres.
- Construction activities disturbing less than one acre if part of a larger common plan of development or sale with a planned disturbance of equal to or greater than one acre and less than five acres. (see § 122.26(b)(15)(i).)
- Construction activities that result in a land disturbance of less than one acre based on the
  potential for contribution to a violation of a water quality standard or for significant contribution of pollutants. (see § 122.26(b)(15)(ii).)

## EXHIBIT 1 TO § 122.26(B)(15).—SUMMARY OF COVERAGE OF "STORM WATER DISCHARGES ASSOCIATED WITH SMALL CONSTRUCTION ACTIVITY" UNDER THE NPDES STORM WATER PROGRAM—Continued

Potential Waiver: Waiver from Requirements as Determined by the NPDES Permitting Authority.. Any automatically designated construction activity where the operator certifies: (1) A rainfall erosivity factor of less than five, or (2) That the activity will occur within an area where controls are not needed based on a TMDL or, for non-impaired waters that do not require a TMDL, an equivalent analysis for the pollutant(s) of concern. (see § 122.26(b)(15)(i).)

(16) Small municipal separate storm sewer system means all separate storm sewers that are:

(i) Owned or operated by the United States, a State, city, town, borough, county, parish, district, association, or other public body (created by or pursuant to State law) having jurisdiction over disposal of sewage, industrial wastes, storm water, or other wastes, including special districts under State law such as a sewer district, flood control district or drainage district, or similar entity, or an Indian tribe or an authorized Indian tribal organization, or a designated and approved management agency under section 208 of the CWA that discharges to waters of the United States.

(ii) Not defined as "large" or "medium" municipal separate storm sewer systems pursuant to paragraphs (b)(4) and (b)(7) of this section, or designated under paragraph (a)(1)(v) of

this section.

(iii) This term includes systems similar to separate storm sewer systems in municipalities, such as systems at military bases, large hospital or prison complexes, and highways and other thoroughfares. The term does not include separate storm sewers in very discrete areas, such as individual buildings.

(17) Šmall MS4 means a small municipal separate storm sewer system.

(18) Municipal separate storm sewer system means all separate storm sewers that are defined as "large" or "medium" or "small" municipal separate storm sewer systems pursuant to paragraphs (b)(4), (b)(7), and (b)(16) of this section, or designated under paragraph (a)(1)(v) of this section.

(19) MS4 means a municipal separate

storm sewer system.

(c) Application requirements for storm water discharges associated with industrial activity and storm water discharges associated with small construction activity—(1) Individual application. Dischargers of storm water associated with industrial activity and with small construction activity are required to apply for an individual permit or seek coverage under a promulgated storm water general permit. \* \* \*

(ii) An operator of an existing or new storm water discharge that is associated with industrial activity solely under paragraph (b)(14)(x) of this section or is associated with small construction activity solely under paragraph (b)(15) of this section, is exempt from the requirements of § 122.21(g) and paragraph (c)(1)(i) of this section. \* \* \*

(e) Application deadlines. Any operator of a point source required to obtain a permit under this section that does not have an effective NPDES permit authorizing discharges from its storm water outfalls shall submit an application in accordance with the

following deadlines:

(1) Storm water discharges associated with industrial activity. (i) Except as provided in paragraph (e)(1)(ii) of this section, for any storm water discharge associated with industrial activity identified in paragraphs (b)(14)(i) through (xi) of this section, that is not part of a group application as described in paragraph (c)(2) of this section or that is not authorized by a storm water general permit, a permit application made pursuant to paragraph (c) of this section must be submitted to the Director by October 1, 1992;

(ii) For any storm water discharge associated with industrial activity from a facility that is owned or operated by a municipality with a population of less than 100,000 that is not authorized by a general or individual permit, other than an airport, powerplant, or uncontrolled sanitary landfill, the permit application must be submitted to

the Director by March 10, 2003.

(5) A permit application shall be submitted to the Director within 180 days of notice, unless permission for a later date is granted by the Director (see § 124.52(c) of this chapter), for:

(i) A storm water discharge that the Director, or in States with approved NPDES programs, either the Director or the EPA Regional Administrator, determines that the discharge contributes to a violation of a water quality standard or is a significant contributor of pollutants to waters of the United States (see paragraphs (a)(1)(v) and (b)(15)(ii) of this section);

(8) For any storm water discharge associated with small construction activity identified in paragraph (b)(15)(i) of this section, see § 122.21(c)(1). Discharges from these sources require permit authorization by March 10, 2003, unless designated for coverage before then.

(9) For any discharge from a regulated small MS4, the permit application made under § 122.33 must be submitted to the

Director by:

(i) March 10, 2003 if designated under § 122.32(a)(1) unless your MS4 serves a jurisdiction with a population under 10,000 and the NPDES permitting authority has established a phasing schedule under § 123.35(d)(3) (see § 122.33(c)(1)); or

(ii) Within 180 days of notice, unless the NPDES permitting authority grants a later date, if designated under

§ 122.32(a)(2) (see § 122.33(c)(2)).

(4) Any person may petition the Director for the designation of a large, medium, or small municipal separate storm sewer system as defined by paragraph (b)(4)(iv), (b)(7)(iv), or (b)(16)

of this section.
(5) The Director shall make a final determination on any petition received under this section within 90 days after receiving the petition with the exception of petitions to designate a small MS4 in which case the Director shall make a final determination on the petition within 180 days after its

receipt:

(g) Conditional exclusion for "no exposure" of industrial activities and materials to storm water. Discharges composed entirely of storm water are not storm water discharges associated with industrial activity if there is "no exposure" of industrial materials and activities to rain, snow, snowmelt and/ or runoff, and the discharger satisfies the conditions in paragraphs (g)(1) through (g)(4) of this section. "No exposure" means that all industrial materials and activities are protected by a storm resistant shelter to prevent exposure to rain, snow, snowmelt, and/ or runoff. Industrial materials or activities include, but are not limited to. material handling equipment or activities, industrial machinery, raw materials, intermediate products, byproducts, final products, or waste

products. Material handling activities include the storage, loading and unloading, transportation, or conveyance of any raw material, intermediate product, final product or waste product.

(1) Qualification. To qualify for this exclusion, the operator of the discharge

must:

(i) Provide a storm resistant shelter to protect industrial materials and activities from exposure to rain, snow, snow melt, and runoff;

(ii) Complete and sign (according to § 122.22) a certification that there are no discharges of storm water contaminated by exposure to industrial materials and activities from the entire facility, except as provided in paragraph (g)(2) of this section;

(iii) Submit the signed certification to the NPDES permitting authority once every five years;

(iv) Allow the Director to inspect the facility to determine compliance with the "no exposure" conditions;

(v) Allow the Director to make any "no exposure" inspection reports available to the public upon request;

(vi) For facilities that discharge through an MS4, upon request, submit a copy of the certification of "no exposure" to the MS4 operator, as well as allow inspection and public reporting by the MS4 operator.

(2) Industrial materials and activities not requiring storm resistant shelter. To qualify for this exclusion, storm resistant shelter is not required for:

(i) Drums, barrels, tanks, and similar containers that are tightly sealed, provided those containers are not deteriorated and do not leak ("Sealed" means banded or otherwise secured and without operational taps or valves);

(ii) Adequately maintained vehicles used in material handling; and

(iii) Final products, other than products that would be mobilized in storm water discharge (e.g., rock salt).

(3) Limitations. (i) Storm water discharges from construction activities identified in paragraphs (b)(14)(x) and (b)(15) are not eligible for this conditional exclusion.

(ii) This conditional exclusion from the requirement for an NPDES permit is available on a facility-wide basis only, not for individual outfalls. If a facility has some discharges of storm water that would otherwise be "no exposure" discharges, individual permit requirements should be adjusted accordingly.

(iii) If circumstances change and industrial materials or activities become exposed to rain, snow, snow melt, and/ or runoff, the conditions for this exclusion no longer apply. In such cases, the discharge becomes subject to enforcement for un-permitted discharge. Any conditionally exempt discharger who anticipates changes in circumstances should apply for and obtain permit authorization prior to the change of circumstances.

(iv) Notwithstanding the provisions of this paragraph, the NPDES permitting authority retains the authority to require permit authorization (and deny this exclusion) upon making a determination that the discharge causes, has a reasonable potential to cause, or contributes to an instream excursion above an applicable water quality standard, including designated uses.

(4) Certification. The no exposure certification must require the submission of the following information, at a minimum, to aid the NPDES permitting authority in determining if the facility qualifies for the no exposure exclusion:

(i) The legal name, address and phone number of the discharger (see § 122.21(b));

(ii) The facility name and address, the county name and the latitude and longitude where the facility is located;

(iii) The certification must indicate that none of the following materials or activities are, or will be in the foreseeable future, exposed to precipitation:

(A) Using, storing or cleaning industrial machinery or equipment, and areas where residuals from using, storing or cleaning industrial machinery or equipment remain and are exposed to storm water;

(B) Materials or residuals on the ground or in storm water inlets from spills/leaks;

(C) Materials or products from past industrial activity;

(D) Material handling equipment (except adequately maintained vehicles);

(E) Materials or products during loading/unloading or transporting activities;

(F) Materials or products stored outdoors (except final products intended for outside use, e.g., new cars, where exposure to storm water does not result in the discharge of pollutants);

(G) Materials contained in open, deteriorated or leaking storage drums, barrels, tanks, and similar containers;

(H) Materials or products handled/ stored on roads or railways owned or maintained by the discharger;

(I) Waste material (except waste in covered, non-leaking containers, e.g., dumpsters);

(J) Application or disposal of process wastewater (unless otherwise permitted); and

(K) Particulate matter or visible deposits of residuals from roof stacks/ vents not otherwise regulated, i.e., under an air quality control permit, and evident in the storm water outflow;

(iv) All "no exposure" certifications must include the following certification statement, and be signed in accordance with the signatory requirements of § 122.22: "I certify under penalty of law that I have read and understand the eligibility requirements for claiming a condition of "no exposure" and obtaining an exclusion from NPDES storm water permitting; and that there are no discharges of storm water contaminated by exposure to industrial activities or materials from the industrial facility identified in this document (except as allowed under paragraph (g)(2)) of this section. I understand that I am obligated to submit a no exposure certification form once every five years to the NPDES permitting authority and, if requested, to the operator of the local MS4 into which this facility discharges (where applicable). I understand that I must allow the NPDES permitting authority. or MS4 operator where the discharge is into the local MS4, to perform inspections to confirm the condition of no exposure and to make such inspection reports publicly available upon request. I understand that I must obtain coverage under an NPDES permit prior to any point source discharge of storm water from the facility. I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gathered and evaluated the information submitted. Based upon my inquiry of the person or persons who manage the system, or those persons directly involved in gathering the information, the information submitted is to the best of my knowledge and belief true, accurate and complete. I am aware there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations."

4. Revise § 122.28(b)(2)(v) to read as follows:

§ 122.28 General permits (applicable to State NPDES programs, see § 123.25).

(b) \* \* \* (2) \* \* \*

(v) Discharges other than discharges from publicly owned treatment works, combined sewer overflows, municipal

separate storm sewer systems, primary industrial facilities, and storm water discharges associated with industrial activity, may, at the discretion of the Director, be authorized to discharge under a general permit without submitting a notice of intent where the Director finds that a notice of intent requirement would be inappropriate. In making such a finding, the Director shall consider: the type of discharge; the expected nature of the discharge; the potential for toxic and conventional pollutants in the discharges; the expected volume of the discharges; other means of identifying discharges covered by the permit; and the estimated number of discharges to be covered by the permit. The Director shall provide in the public notice of the general permit the reasons for not requiring a notice of intent.

5. Add §§ 122.30 through 122.37 to subpart B to read as follows:

\*

### § 122.30 What are the objectives of the storm water regulations for small MS4s?

(a) Sections 122.30 through 122.37 are written in a "readable regulation" format that includes both rule requirements and EPA guidance that is not legally binding. EPA has clearly distinguished its recommended guidance from the rule requirements by putting the guidance in a separate paragraph headed by the word "guidance".

(b) Under the statutory mandate in section 402(p)(6) of the Clean Water Act, the purpose of this portion of the storm water program is to designate additional sources that need to be regulated to protect water quality and to establish a comprehensive storm water program to regulate these sources. (Because the storm water program is part of the National Pollutant Discharge Elimination System (NPDES) Program, you should also refer to § 122.1 which addresses the broader purpose of the

NPDES program.)

(c) Storm water runoff continues to harm the nation's waters. Runoff from lands modified by human activities can harm surface water resources in several ways including by changing natural hydrologic patterns and by elevating pollutant concentrations and loadings. Storm water runoff may contain or mobilize high levels of contaminants, such as sediment, suspended solids, nutrients, heavy metals, pathogens, toxins, oxygen-demanding substances, and floatables.

(d) EPA strongly encourages partnerships and the watershed approach as the management framework for efficiently, effectively, and

consistently protecting and restoring aquatic ecosystems and protecting public health.

## § 122.31 As a Tribe, what is my role under the NPDES storm water program?

As a Tribe you may:

(a) Be authorized to operate the NPDES program including the storm water program, after EPA determines that you are eligible for treatment in the same manner as a State under §§ 123.31 through 123.34 of this chapter. (If you do not have an authorized NPDES program, EPA implements the program for discharges on your reservation as well as other Indian country, generally.);

(b) Be classified as an owner of a regulated small MS4, as defined in § 122.32. (Designation of your Tribe as an owner of a small MS4 for purposes of this part is an approach that is consistent with EPA's 1984 Indian Policy of operating on a government-togovernment basis with EPA looking to Tribes as the lead governmental authorities to address environmental issues on their reservations as appropriate. If you operate a separate storm sewer system that meets the definition of a regulated small MS4, you are subject to the requirements under §§ 122.33 through 122.35. If you are not designated as a regulated small MS4, you may ask EPA to designate you as such for the purposes of this part.); or

(c) Be a discharger of storm water associated with industrial activity or small construction activity under §§ 122.26(b)(14) or (b)(15), in which case you must meet the applicable requirements. Within Indian country, the NPDES permitting authority is generally EPA, unless you are authorized to administer the NPDES

program.

#### § 122.32 As an operator of a small MS4, am I regulated under the NPDES storm water program?

(a) Unless you qualify for a waiver under paragraph (c) of this section, you are regulated if you operate a small MS4, including but not limited to systems operated by federal, State, Tribal, and local governments, including State departments of transportation; and:

(1) Your small MS4 is located in an urbanized area as determined by the latest Decennial Census by the Bureau of the Census. (If your small MS4 is not located entirely within an urbanized area, only the portion that is within the urbanized area is regulated); or

(2) You are designated by the NPDES permitting authority, including where the designation is pursuant to §§ 123.35(b)(3) and (b)(4) of this chapter,

or is based upon a petition under § 122.26(f).

(b) You may be the subject of a petition to the NPDES permitting authority to require an NPDES permit for your discharge of storm water. If the NPDES permitting authority determines that you need a permit, you are required to comply with §§ 122.33 through 122.35.

(c) The NPDES permitting authority may waive the requirements otherwise applicable to you if you meet the criteria of paragraph (d) or (e) of this section. If you receive a waiver under this section, you may subsequently be required to seek coverage under an NPDES permit in accordance with § 122.33(a) if circumstances change. (See also § 123.35(b) of this chapter.)

(d) The NPDES permitting authority may waive permit coverage if your MS4 serves a population of less than 1,000 within the urbanized area and you meet

the following criteria:

(1) Your system is not contributing substantially to the pollutant loadings of a physically interconnected MS4 that is regulated by the NPDES storm water program (see § 123.35(b)(4) of this

chapter); and

(2) If you discharge any pollutant(s) that have been identified as a cause of impairment of any water body to which you discharge, storm water controls are not needed based on wasteload allocations that are part of an EPA approved or established "total maximum daily load" (TMDL) that addresses the pollutant(s) of concern.

(e) The NPDES permitting authority may waive permit coverage if your MS4 serves a population under 10,000 and you meet the following criteria:

(1) The permitting authority has evaluated all waters of the U.S., including small streams, tributaries, lakes, and ponds, that receive a discharge from your MS4;

(2) For all such waters, the permitting authority has determined that storm water controls are not needed based on wasteload allocations that are part of an EPA approved or established TMDL that addresses the pollutant(s) of concern or, if a TMDL has not been developed or approved, an equivalent analysis that determines sources and allocations for the pollutant(s) of concern;

(3) For the purpose of this paragraph (e), the pollutant(s) of concern include biochemical oxygen demand (BOD), sediment or a parameter that addresses sediment (such as total suspended solids, turbidity or siltation), pathogens, oil and grease, and any pollutant that has been identified as a cause of impairment of any water body that will receive a discharge from your MS4; and

(4) The permitting authority has determined that future discharges from your MS4 do not have the potential to result in exceedances of water quality standards, including impairment of designated uses, or other significant water quality impacts, including habitat and biological impacts.

#### § 122.33 If I am an operator of a regulated small MS4, how do I apply for an NPDES permit and when do I have to apply?

(a) If you operate a regulated small MS4 under § 122.32, you must seek coverage under a NPDES permit issued by your NPDES permitting authority. If you are located in an NPDES authorized State, Tribe, or Territory, then that State, Tribe, or Territory is your NPDES permitting authority. Otherwise, your NPDES permitting authority is the EPA Regional Office.

(b) You must seek authorization to discharge under a general or individual

NPDES permit, as follows:
(1) If your NPDES permitting authority has issued a general permit applicable to your discharge and you are seeking coverage under the general permit, you must submit a Notice of Intent (NOI) that includes the information on your best management practices and measurable goals required by § 122.34(d). You may file your own NOI, or you and other municipalities or governmental entities may jointly submit an NOI. If you want to share responsibilities for meeting the minimum measures with other municipalities or governmental entities, you must submit an NOI that describes which minimum measures you will implement and identify the entities that will implement the other minimum measures within the area served by your MS4. The general permit will explain any other steps necessary to obtain permit authorization.

(2)(i) If you are seeking authorization to discharge under an individual permit and wish to implement a program under § 122.34, you must submit an application to your NPDES permitting authority that includes the information required under §§ 122.21(f) and 122.34(d), an estimate of square mileage served by your small MS4, and any additional information that your NPDES permitting authority requests. A storm sewer map that satisfies the requirement of § 122.34(b)(3)(i) will satisfy the map requirement in § 122.21(f)(7).

(ii) If you are seeking authorization to discharge under an individual permit and wish to implement a program that is different from the program under § 122.34, you will need to comply with the permit application requirements of § 122.26(d). You must submit both Parts

of the application requirements in §§ 122.26(d)(1) and (2) by March 10, 2003. You do not need to submit the information required by §§ 122.26(d)(1)(ii) and (d)(2) regarding your legal authority, unless you intend for the permit writer to take such information into account when developing your other permit conditions.

(iii) If allowed by your NPDES permitting authority, you and another regulated entity may jointly apply under either paragraph (b)(2)(i) or (b)(2)(ii) of this section to be co-permittees under an

individual permit.

(3) If your small MS4 is in the same urbanized area as a medium or large MS4 with an NPDES storm water permit and that other MS4 is willing to have you participate in its storm water program, you and the other MS4 may jointly seek a modification of the other MS4 permit to include you as a limited co-permittee. As a limited co-permittee, you will be responsible for compliance with the permit's conditions applicable to your jurisdiction. If you choose this option you will need to comply with the permit application requirements of § 122.26, rather than the requirements of § 122.34. You do not need to comply with the specific application requirements of § 122.26(d)(1)(iii) and (iv) and (d)(2)(iii) (discharge characterization). You may satisfy the requirements in § 122.26 (d)(1)(v) and (d)(2)(iv) (identification of a management program) by referring to the other MS4's storm water management program.

(4) Guidance: In referencing an MS4's storm water management program, you should briefly describe how the existing plan will address discharges from your small MS4 or would need to be supplemented in order to adequately address your discharges. You should also explain your role in coordinating storm water pollutant control activities in your MS4, and detail the resources available to you to accomplish the plan.

(c) If you operate a regulated small

MS4:

(1) Designated under § 122.32(a)(1), you must apply for coverage under an NPDES permit, or apply for a modification of an existing NPDES permit under paragraph (b)(3) of this section by March 10, 2003, unless your MS4 serves a jurisdiction with a population under 10,000 and the NPDES permitting authority has established a phasing schedule under § 123.35(d)(3) of this chapter.

(2) Designated under § 122.32(a)(2), you must apply for coverage under an NPDES permit, or apply for a modification of an existing NPDES

permit under paragraph (b)(3) of this section, within 180 days of notice, unless the NPDES permitting authority grants a later date.

#### § 122.34 As an operator of a regulated small MS4, what will my NPDES MS4 storm water permit require?

(a) Your NPDES MS4 permit will require at a minimum that you develop. implement, and enforce a storm water management program designed to reduce the discharge of pollutants from your MS4 to the maximum extent practicable (MEP), to protect water quality, and to satisfy the appropriate water quality requirements of the Clean Water Act. Your storm water management program must include the minimum control measures described in paragraph (b) of this section unless you apply for a permit under § 122.26(d). For purposes of this section, narrative effluent limitations requiring implementation of best management practices (BMPs) are generally the most appropriate form of effluent limitations when designed to satisfy technology requirements (including reductions of pollutants to the maximum extent practicable) and to protect water quality. Implementation of best management practices consistent with the provisions of the storm water management program required pursuant to this section and the provisions of the permit required pursuant to § 122.33 constitutes compliance with the standard of reducing pollutants to the "maximum extent practicable." Your NPDES permitting authority will specify a time period of up to 5 years from the date of permit issuance for you to develop and implement your program.

(b) Minimum control measures—(1) Public education and outreach on storm water impacts. (i) You must implement a public education program to distribute educational materials to the community 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 storm water runoff.

(ii) Guidance: You may use storm water educational materials provided by your State, Tribe, EPA, environmental, public interest or trade organizations, or other MS4s. The public education program should inform individuals and households about the steps they can take to reduce storm water pollution, such as ensuring proper septic system maintenance, ensuring the proper use and disposal of landscape and garden chemicals including fertilizers and pesticides, protecting and restoring riparian vegetation, and properly disposing of used motor oil or

household hazardous wastes. EPA recommends that the program inform individuals and groups how to become nvolved in local stream and beach restoration activities as well as activities that are coordinated by youth service and conservation corps or other citizen groups. EPA recommends that the public education program be tailored, using a mix of locally appropriate strategies, to target specific audiences and communities. Examples of strategies include distributing brochures or fact sheets, sponsoring speaking engagements before community groups, providing public service announcements, implementing educational programs targeted at school age children, and conducting community-based projects such as storm drain stenciling, and watershed and beach cleanups. In addition, EPA recommends that some of the materials or outreach programs be directed toward targeted groups of commercial, industrial, and institutional entities likely to have significant storm water impacts. For example, providing information to restaurants on the impact of grease clogging storm drains and to garages on the impact of oil discharges. You are encouraged to tailor your outreach program to address the viewpoints and concerns of all communities, particularly minority and disadvantaged communities, as well as any special concerns relating to children.

(2) Public involvement/participation.
(i) You must, at a minimum, comply with State, Tribal and local public notice requirements when implementing a public involvement/participation program.

(ii) Guidance: EPA recommends that the public be included in developing, implementing, and reviewing your storm water management program and that the public participation process should make efforts to reach out and engage all economic and ethnic groups. Opportunities for members of the public to participate in program development and implementation include serving as citizen representatives on a local storm water management panel, attending public hearings, working as citizen volunteers to educate other individuals about the program, assisting in program coordination with other pre-existing programs, or participating in volunteer monitoring efforts. (Citizens should obtain approval where necessary for lawful access to monitoring sites.) (3) Illicit discharge detection and

elimination. (i) You must develop,

implement and enforce a program to

detect and eliminate illicit discharges

(as defined at § 122.26(b)(2)) into your small MS4.

(ii) You must:

(A) Develop, if not already completed, a storm sewer system map, showing the location of all outfalls and the names and location of all waters of the United States that receive discharges from those outfalls;

(B) To the extent allowable under State, Tribal or local law, effectively prohibit, through ordinance, or other regulatory mechanism, non-storm water discharges into your storm sewer system and implement appropriate enforcement procedures and actions;

(C) Develop and implement a plan to detect and address non-storm water discharges, including illegal dumping,

to your system; and

(D) Inform public employees, businesses, and the general public of hazards associated with illegal discharges and improper disposal of waste.

(iii) You need address the following categories of non-storm water discharges or flows (i.e., illicit discharges) only if you identify them as significant contributors of pollutants to your small MS4: water line flushing, landscape irrigation, diverted stream flows, rising ground waters, uncontaminated ground water infiltration (as defined at 40 CFR 35.2005(20)), uncontaminated pumped ground water, discharges from potable water sources, foundation drains, air conditioning condensation, irrigation water, springs, water from crawl space pumps, footing drains, lawn watering, individual residential car washing, flows from riparian habitats and wetlands, dechlorinated swimming pool discharges, and street wash water (discharges or flows from fire fighting activities are excluded from the effective prohibition against non-storm water and need only be addressed where they are identified as significant sources of pollutants to waters of the United States).

(iv) Guidance: EPA recommends that the plan to detect and address illicit discharges include the following four components: procedures for locating priority areas likely to have illicit discharges; procedures for tracing the source of an illicit discharge; procedures for removing the source of the discharge; and procedures for program evaluation and assessment. EPA recommends visually screening outfalls during dry weather and conducting field tests of selected pollutants as part of the procedures for locating priority areas. Illicit discharge education actions may include storm drain stenciling, a program to promote, publicize, and facilitate public reporting of illicit

connections or discharges, and distribution of outreach materials.

(4) Construction site storm water runoff control. (i) You must develop, implement, and enforce a program to reduce pollutants in any storm water runoff to your small MS4 from construction activities that result in a land disturbance of greater than or equal to one acre. Reduction of storm water discharges from construction activity disturbing less than one acre must be included in your program if that construction activity is part of a larger common plan of development or sale that would disturb one acre or more. If the NPDES permitting authority waives requirements for storm water discharges associated with small construction activity in accordance with § 122.26(b)(15)(i), you are not required to develop, implement, and/or enforce a program to reduce pollutant discharges from such sites.

(ii) Your program must include the development and implementation of, at

a minimum:

(A) An ordinance or other regulatory mechanism to require erosion and sediment controls, as well as sanctions to ensure compliance, to the extent allowable under State, Tribal, or local law:

(B) Requirements for construction site operators to implement appropriate erosion and sediment control best

management practices;

(C) Requirements for construction site operators to control waste such as discarded building materials, concrete truck washout, chemicals, litter, and sanitary waste at the construction site that may cause adverse impacts to water quality;

(D) Procedures for site plan review which incorporate consideration of potential water quality impacts;

(E) Procedures for receipt and consideration of information submitted by the public, and

(F) Procedures for site inspection and enforcement of control measures.

(iii) Guidance: Examples of sanctions to ensure compliance include nonmonetary penalties, fines, bonding requirements and/or permit denials for non-compliance. EPA recommends that procedures for site plan review include the review of individual preconstruction site plans to ensure consistency with local sediment and erosion control requirements. Procedures for site inspections and enforcement of control measures could include steps to identify priority sites for inspection and enforcement based on the nature of the construction activity, topography, and the characteristics of soils and receiving

water quality. You are encouraged to provide appropriate educational and training measures for construction site operators. You may wish to require a storm water pollution prevention plan for construction sites within your jurisdiction that discharge into your system. See § 122.44(s) (NPDES permitting authorities' option to incorporate qualifying State, Tribal and local erosion and sediment control programs into NPDES permits for storm water discharges from construction sites). Also see § 122.35(b) (The NPDES permitting authority may recognize that another government entity, including the permitting authority, may be responsible for implementing one or more of the minimum measures on your behalf.)

(5) Post-construction storm water management in new development and

redevelopment.

(i) You must develop, implement, and enforce a program to address storm water runoff from new development and redevelopment projects that disturb greater than or equal to one acre, including projects less than one acre that are part of a larger common plan of development or sale, that discharge into your small MS4. Your program must ensure that controls are in place that would prevent or minimize water quality impacts.

(ii) You must:

(A) Develop and implement strategies which include a combination of structural and/or non-structural best management practices (BMPs) appropriate for your community;

(B) Use an ordinance or other regulatory mechanism to address postconstruction runoff from new development and redevelopment projects to the extent allowable under State, Tribal or local law; and

(C) Ensure adequate long-term operation and maintenance of BMPs.

(iii) Guidance: If water quality impacts are considered from the beginning stages of a project, new development and potentially redevelopment provide more opportunities for water quality protection. EPA recommends that the BMPs chosen: be appropriate for the local community; minimize water quality impacts; and attempt to maintain pre-development runoff conditions. In choosing appropriate BMPs, EPA encourages you to participate in locally-based watershed planning efforts which attempt to involve a diverse group of stakeholders including interested citizens. When developing a program that is consistent with this measure's intent, EPA recommends that you adopt a planning

process that identifies the municipality's program goals (e.g., minimize water quality impacts resulting from post-construction runoff from new development and redevelopment), implementation strategies (e.g., adopt a combination of structural and/or non-structural BMPs), operation and maintenance policies and procedures, and enforcement procedures. In developing your program, you should consider assessing existing ordinances, policies, programs and studies that address storm water runoff quality. In addition to assessing these existing documents and programs, you should provide opportunities to the public to participate in the development of the program. Non-structural BMPs are preventative actions that involve management and source controls such as: policies and ordinances that provide requirements and standards to direct growth to identified areas, protect sensitive areas such as wetlands and riparian areas, maintain and/or increase open space (including a dedicated funding source for open space acquisition), provide buffers along sensitive water bodies, minimize impervious surfaces, and minimize disturbance of soils and vegetation; policies or ordinances that encourage infill development in higher density urban areas, and areas with existing infrastructure; education programs for developers and the public about project designs that minimize water quality impacts; and measures such as minimization of percent impervious area after development and minimization of directly connected impervious areas. Structural BMPs include: storage practices such as wet ponds and extended-detention outlet structures: filtration practices such as grassed swales, sand filters and filter strips; and infiltration practices such as infiltration basins and infiltration trenches. EPA recommends that you ensure the appropriate implementation of the structural BMPs by considering some or all of the following: preconstruction review of BMP designs; inspections during construction to verify BMPs are built as designed; postconstruction inspection and maintenance of BMPs; and penalty provisions for the noncompliance with design, construction or operation and maintenance. Storm water technologies are constantly being improved, and EPA recommends that your requirements be responsive to these changes, developments or improvements in control technologies.

(6) Pollution prevention/good housekeeping for municipal operations.

(i) You must 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. Using training materials that are available from EPA, your State, Tribe, or other organizations, your program must include employee training to prevent and reduce storm water pollution from activities such as park and open space maintenance, fleet and building maintenance, new construction and land disturbances, and storm water system maintenance.

(ii) Guidance: EPA recommends that, at a minimum, you consider the following in developing your program: maintenance activities, maintenance schedules, and long-term inspection procedures for structural and nonstructural storm water controls to reduce floatables and other pollutants discharged from your separate storm sewers; controls for reducing or eliminating the discharge of pollutants from streets, roads, highways, municipal parking lots, maintenance and storage yards, fleet or maintenance shops with outdoor storage areas, salt/sand storage locations and snow disposal areas operated by you, and waste transfer stations; procedures for properly disposing of waste removed from the separate storm sewers and areas listed above (such as dredge spoil, accumulated sediments, floatables, and other debris); and ways to ensure that new flood management projects assess the impacts on water quality and examine existing projects for incorporating additional water quality protection devices or practices. Operation and maintenance should be an integral component of all storm water management programs. This measure is intended to improve the efficiency of these programs and require new programs where necessary. Properly developed and implemented operation and maintenance programs reduce the risk of water quality problems.

(c) If an existing qualifying local program requires you to implement one or more of the minimum control measures of paragraph (b) of this section, the NPDES permitting authority may include conditions in your NPDES permit that direct you to follow that qualifying program's requirements rather than the requirements of paragraph (b) of this section. A qualifying local program is a local, State or Tribal municipal storm water management program that imposes, at a minimum, the relevant requirements of

paragraph (b) of this section. (d)(1) In your permit application

(either a notice of intent for coverage

under a general permit or an individual permit application), you must identify and submit to your NPDES permitting authority the following information:

(i) The best management practices (BMPs) that you or another entity will implement for each of the storm water minimum control measures at paragraphs (b)(1) through (b)(6) of this section;

(ii) The measurable goals for each of the BMPs including, as appropriate, the months and years in which you will undertake required actions, including interim milestones and the frequency of the action; and

(iii) The person or persons responsible for implementing or coordinating your storm water management program.

(2) If you obtain coverage under a general permit, you are not required to meet any measurable goal(s) identified in your notice of intent in order to demonstrate compliance with the minimum control measures in paragraphs (b)(3) through (b)(6) of this section unless, prior to submitting your NOI, EPA or your State or Tribe has provided or issued a menu of BMPs that addresses each such minimum measure. Even if no regulatory authority issues the menu of BMPs, however, you still must comply with other requirements of the general permit, including good faith implementation of BMPs designed to comply with the minimum measures.

(3) Guidance: Either EPA or your State or Tribal permitting authority will provide a menu of BMPs. You may choose BMPs from the menu or select others that satisfy the minimum control measures.

(e)(1) You must comply with any more stringent effluent limitations in your permit, including permit requirements that modify, or are in addition to, the minimum control measures based on an approved total maximum daily load (TMDL) or equivalent analysis. The permitting authority may include such more stringent limitations based on a TMDL or equivalent analysis that determines such limitations are needed to protect water quality.

(2) Guidance: EPA strongly recommends that until the evaluation of the storm water program in § 122.37, no additional requirements beyond the minimum control measures be imposed on regulated small MS4s without the agreement of the operator of the affected small MS4, except where an approved TMDL or equivalent analysis provides adequate information to develop more specific measures to protect water quality.

- (f) You must comply with other applicable NPDES permit requirements, standards and conditions established in the individual or general permit, developed consistent with the provisions of §§ 122.41 through 122.49, as appropriate.
- (g) Evaluation and assessment—(1) Evaluation. You must evaluate program compliance, the appropriateness of your identified best management practices, and progress towards achieving your identified measurable goals.

Note to Paragraph (g)(1): The NPDES permitting authority may determine monitoring requirements for you in accordance with State/Tribal monitoring plans appropriate to your watershed. Participation in a group monitoring program is encouraged.

- (2) Recordkeeping. You must keep records required by the NPDES permit for at least 3 years. You must submit your records to the NPDES permitting authority only when specifically asked to do so. You must make your records, including a description of your storm water management program, available to the public at reasonable times during regular business hours (see § 122.7 for confidentiality provision). (You may assess a reasonable charge for copying. You may require a member of the public to provide advance notice.)
- (3) Reporting. Unless you are relying on another entity to satisfy your NPDES permit obligations under § 122.35(a), you must submit annual reports to the NPDES permitting authority for your first permit term. For subsequent permit terms, you must submit reports in year two and four unless the NPDES permitting authority requires more frequent reports. Your report must include:
- (i) The status of compliance with permit conditions, an assessment of the appropriateness of your identified best management practices and progress towards achieving your identified measurable goals for each of the minimum control measures;
- (ii) Results of information collected and analyzed, including monitoring data, if any, during the reporting period;
- (iii) A summary of the storm water activities you plan to undertake during the next reporting cycle;
- (iv) A change in any identified best management practices or measurable goals for any of the minimum control measures; and
- (v) Notice that you are relying on another governmental entity to satisfy some of your permit obligations (if applicable).

- § 122.35 As an operator of a regulated small MS4, may I share the responsibility to implement the minimum control measures with other entities?
- (a) You may rely on another entity to satisfy your NPDES permit obligations to implement a minimum control measure if:
- (1) The other entity, in fact, implements the control measure;
- (2) The particular control measure, or component thereof, is at least as stringent as the corresponding NPDES permit requirement; and
- (3) The other entity agrees to implement the control measure on your behalf. In the reports you must submit under § 122.34(g)(3), you must also specify that you rely on another entity to satisfy some of your permit obligations. If you are relying on another governmental entity regulated under section 122 to satisfy all of your permit obligations, including your obligation to file periodic reports required by § 122.34(g)(3), you must note that fact in your NOI, but you are not required to file the periodic reports. You remain responsible for compliance with your permit obligations if the other entity fails to implement the control measure (or component thereof). Therefore, EPA encourages you to enter into a legally binding agreement with that entity if you want to minimize any uncertainty about compliance with your permit.
- (b) In some cases, the NPDES permitting authority may recognize, either in your individual NPDES permit or in an NPDES general permit, that another governmental entity is responsible under an NPDES permit for implementing one or more of the minimum control measures for your small MS4 or that the permitting authority itself is responsible. Where the permitting authority does so, you are not required to include such minimum control measure(s) in your storm water management program. (For example, if a State or Tribe is subject to an NPDES permit that requires it to administer a program to control construction site runoff at the State or Tribal level and that program satisfies all of the requirements of § 122.34(b)(4), you could avoid responsibility for the construction measure, but would be responsible for the remaining minimum control measures.) Your permit may be reopened and modified to include the requirement to implement a minimum control measure if the entity fails to implement it.

§ 122.36 As an operator of a regulated small MS4, what happens if I don't comply with the application or permit requirements in §§ 122.33 through 122.35?

NPDES permits are federally enforceable. Violators may be subject to the enforcement actions and penalties described in Clean Water Act sections 309 (b), (c), and (g) and 505, or under applicable State, Tribal, or local law. Compliance with a permit issued pursuant to section 402 of the Clean Water Act is deemed compliance, for purposes of sections 309 and 505, with sections 301, 302, 306, 307, and 403, except any standard imposed under section 307 for toxic pollutants injurious to human health. If you are covered as a co-permittee under an individual permit or under a general permit by means of a joint Notice of Intent you remain subject to the enforcement actions and penalties for the failure to comply with the terms of the permit in your jurisdiction except as set forth in § 122.35(b).

# § 122.37 Will the small MS4 storm water program regulations at §§ 122.32 through 122.36 and § 123.35 of this chapter change in the future?

EPA will evaluate the small MS4 regulations at §§ 122.32 through 122.36 and § 123.35 of this chapter after December 10, 2012 and make any necessary revisions. (EPA intends to conduct an enhanced research effort and compile a comprehensive evaluation of the NPDES MS4 storm water program. EPA will re-evaluate the regulations based on data from the NPDES MS4 storm water program, from research on receiving water impacts from storm water, and the effectiveness of best management practices (BMPs), as well as other relevant information sources.)

6. In § 122.44, redesignate paragraphs (k)(2) and (k)(3) as paragraphs (k)(3) and (k)(4), remove the comma at the end of newly redesignated paragraph (k)(3) and add a semicolon in its place, and add new paragraphs (k)(2) and (s) to read as follows:

# § 122.44 Establishing limitations, standards, and other permit conditions (applicable to State NPDES programs, see § 123.25).

(k) \* \* \*

- (2) Authorized under section 402(p) of CWA for the control of storm water discharges;
- (s) Qualifying State, Tribal, or local programs. (1) For storm water discharges associated with small construction activity identified in § 122.26(b)(15), the Director may include permit conditions that

incorporate qualifying State, Tribal, or local erosion and sediment control program requirements by reference. Where a qualifying State, Tribal, or local program does not include one or more of the elements in this paragraph (s)(1), then the Director must include those elements as conditions in the permit. A qualifying State, Tribal, or local erosion and sediment control program is one that includes:

(i) Requirements for construction site operators to implement appropriate erosion and sediment control best

management practices;

(ii) Requirements for construction site operators to control waste such as discarded building materials, concrete truck washout, chemicals, litter, and sanitary waste at the construction site that may cause adverse impacts to water quality;

(iii) Requirements for construction site operators to develop and implement a storm water pollution prevention plan. (A storm water pollution prevention plan includes site descriptions, descriptions of appropriate control measures, copies of approved State, Tribal or local requirements, maintenance procedures, inspection procedures, and identification of non-storm water discharges); and

(iv) Requirements to submit a site plan for review that incorporates consideration of potential water quality

impacts.

(2) For storm water discharges from construction activity identified in § 122.26(b)(14)(x), the Director may include permit conditions that incorporate qualifying State, Tribal, or local erosion and sediment control program requirements by reference. A qualifying State, Tribal or local erosion and sediment control program is one that includes the elements listed in paragraph (s)(1) of this section and any additional requirements necessary to achieve the applicable technology-based standards of "best available technology" and "best conventional technology" based on the best professional judgment of the permit writer.

7. Add § 122.62(a)(14) to read as follows:

§ 122.62 Modification or revocation and reissuance of permits (applicable to State programs, see § 123.25).

\* (a) \* \* \*

(14) For a small MS4, to include an effluent limitation requiring implementation of a minimum control measure or measures as specified in § 122.34(b) when:

(i) The permit does not include such measure(s) based upon the

determination that another entity was responsible for implementation of the requirement(s); and

(ii) The other entity fails to implement measure(s) that satisfy the requirement(s).

requirement(s).

8. Revise Appendices F, G, H, and I to Part 122 to read as follows:

APPENDIX F TO PART 122.—INCOR-PORATED PLACES WITH POPU-LATIONS GREATER THAN 250,000 ACCORDING TO THE 1990 DECEN-NIAL CENSUS BY THE BUREAU OF THE CENSUS

State	Incorporated Place
Alabama	Birmingham.
Arizona	Phoenix.
	Tucson.
California	Long Beach.
	Los Angeles.
	Oakland.
	Sacramento.
	San Diego.
	San Francisco.
	San Jose.
Colorado	Denver.
District of Columbia	
Florida	Jacksonville.
	Miami.
	Tampa.
Georgia	Atlanta.
Illinois	Chicago.
Indiana	Indianapolis.
Kansas	Wichita.
Kentucky	Louisville.
Louisiana	New Orleans.
Maryland	Baltimore.
Massachusetts	Boston.
Michigan	Detroit.
Minnesota	Minneapolis.
Minnousi	St. Paul.
Missouri	Kansas City. St. Louis.
Nebraska	Omaha.
New Jersey	Newark.
New Mexico	Albuquerque.
New York	Buffalo.
	Bronx Borough.
	Brooklyn Borough.
	Manhattan Borough.
	Queens Borough.
	Staten Island Bor-
	ough.
North Carolina	Charlotte.
Ohio	Cincinnati.
	Cleveland.
	Columbus.
	Toledo.
Oklahoma	Oklahoma City.
	Tulsa.
Oregon	Portland.
Pennsylvania	Philadelphia.
T	Pittsburgh.
Tennessee	Memphis.
Tavas	Nashville/Davidson.
Texas	Austin. Dallas.
	El Paso.
•	Fort Worth.
	Houston.

APPENDIX F TO PART 122.-INCOR- APPENDIX G TO PART 122.-INCOR- APPENDIX G TO PART 122.-INCOR-PORATED PLACES WITH POPU-LATIONS GREATER THAN 250,000 ACCORDING TO THE 1990 DECEN-NIAL CENSUS BY THE BUREAU OF THE CENSUS--Continued

PORATED PLACES WITH POPU-LATIONS GREATER THAN 100,000 BUT LESS THAN 250,000 ACCORD-ING TO THE 1990 DECENNIAL CEN-SUS BY THE BUREAU OF THE CEN-SUS—Continued

Incorporated place

Colorado Springs.

Lakewood.

Bridgeport.

Hartford.

Pueblo.

State

Connecticut .....

PORATED PLACES WITH POPU-LATIONS GREATER THAN 100,000 BUT LESS THAN 250,000 ACCORD-ING TO THE 1990 DECENNIAL CEN-SUS BY THE BUREAU OF THE CENsus-Continued

Incorporated place

Elizabeth.

Paterson.

Rochester.

Albany.

Jersey City.

State

New Jersey .....

New York .....

State	Incorporated Place	
Virginia	Virginia Beach.	
APPENDIX G TO F		

APPENDIX G TO PART 122.—INCORPORATED PLACES WITH POPULATIONS GREATER THAN 100,000 BUT LESS THAN 250,000 ACCORDING TO THE 1990 DECENNIAL CENSUS BY THE BUREAU OF THE CENSUS		Florida	New Haven. Stamford. Waterbury. Fort Lauderdale. Hialeah. Hollywood. Orlando. St. Petersburg. Tallahassee. Columbus.	North Carolina	Rochester. Syracuse. Yonkers. Durham. Greensboro. Raleigh. Winston-Salem. Akron. Dayton. Youngstown.
State	Incorporated place	Georgia	Macon. Savannah.	Oregon Pennsylvania	Eugene. Allentown.
Alabama	Huntsville. Mobile. Montgomery. Anchorage.	IdahoIllinois	Boise City. Peoria. Rockford. Evansville. Fort Wayne.	Rhode Island South Carolina Tennessee	Erie. Providence. Columbia. Chattanooga. Knoxville.
Arkansas California	Mesa. Tempe. Little Rock. Anaheim. Bakersfield.	lowa	Gary. South Bend. Cedar Rapids. Davenport. Des Moines.	Texas	Abilene. Amarillo. Arlington. Beaumont. Corous Christi.
•	Berkeley. Chula Vista. Concord. El Monte.	Kansas	Kansas City. Topeka. Lexington-Fayette.		Garland. Irving. Laredo.
	Escondido. Fremont.	Louisiana Massachusetts	Baton Rouge. Shreveport.		Lubbock. Mesquite.
	Fresno. Fullerton.	Michigan	Springfield. Worcester. Ann Arbor.		Pasadena. Plano. Waco.
	Garden Grove. Glendale. Hayward. Huntington Beach. Inglewood. Irvine. Modesto.	Mississippi	Flint. Grand Rapids. Lansing. Livonia. Sterling Heights. Warren. Jackson.	UtahVirginia	Salt Lake City. Alexandria. Chesapeake. Hampton. Newport News. Portsmouth.
	Moreno Valley. Oceanside. Ontario. Orange.	Missouri  Nebraska  Nevada	Independence. Springfield. Lincoln. Las Vegas.	Washington	Richmond. Roanoke. Spokane. Tacoma. Madison.
Colorado	Aurora.		Reno.		

APPENDIX H TO PART 122.—COUNTIES WITH UNINCORPORATED URBANIZED AREAS WITH A POPULATION OF 250,000 OR MORE ACCORDING TO THE 1990 DECENNIAL CENSUS BY THE BUREAU OF THE CENSUS

State	County	Unincorporated ur- banized popu- lation
California	Los Angeles	886,780
·	Sacramento	594,889
	San Diego	250,414
Delaware	New Castle	296,996
Florida	Dade	1,014,504
Georgia	DeKalb	448.686
Hawaii	Honolulu 1	114,506
Maryland	Anne Arundel	344,654
	Baltimore	627,593
	Montgomery	599,028

## APPENDIX H TO PART 122.—COUNTIES WITH UNINCORPORATED URBANIZED AREAS WITH A POPULATION OF 250,000 OR MORE ACCORDING TO THE 1990 DECENNIAL CENSUS BY THE BUREAU OF THE CENSUS—Continued

State	County	Unincorporated un- banized popu- lation
Texas	Prince George's	494,369 729,206
Utah	Salt Lake	270,989
Virginia	Fairfax King	760,730 520,468

<sup>&</sup>lt;sup>1</sup> County was previously listed in this appendix; however, population dropped to below 250,000 in the 1990 Census.

#### APPENDIX I TO PART 122.—Counties With Unincorporated Urbanized Areas Greater Than 100,000 But Less Than 250,000 According to the 1990 Decennial Census by the Bureau of the Census

State	County	Unincorporated ur- banized popu- lation
Alabama	Jefferson	78,608
Arizona	Pima	162,202
California		115,082
	Contra Costa	131,082
The state of the s	Kern	128,503
2. Acr	Orange	
2	Riverside	1
	San Bernardino	
Colorado		,
Florida	1 = 11	
,	Escambia	
	Hillsborough	,
•	Lee	
	Manatee	123,828
	Orange	
	Palm Beach	1
	Pasco	148,907
	Pinellas	1
	Polk	
	Sarasota	1
	Seminole	
Conraia		. ,
Georgia	Cobb	
• 7	Fulton	
r-	Gwinnett	237,305
	Richmond	126,476
Kentucky		
Louisiana		
LOUISIANA	Parish	
	Jefferson Parish	1
una filida intera vaga pasagaina ili ili ili. Mandandi		
Maryland		
North Carolina		4
Nevada		1
Oregon		
South Carolina		
South Carolina	Richland	1
Virginia ·		,
virgina '		
	Chesterfield	
	Henrico	
184- aluta mas m	Prince William	
Washington		,
•	Snohomish	157,218

<sup>&</sup>lt;sup>1</sup> County was previously listed in this appendix; however, population dropped to below 100,000 in the 1990 Census.

## PART 123—STATE PROGRAM REQUIREMENTS

1. The authority citation for part 123 continues to read as follows:

Authority: The Clean Water Act, 33 U.S.C. 1251 et seq.

2. Amend § 123.25 by removing the word "and" at the end of paragraph (a)(37), by removing the period at the end of paragraph (a)(38) and adding a

semicolon in its place, and by adding paragraphs (a)(39) through (a)(45) to read as follows:

§ 123.25 Requirements for permitting.

(a) \* \* \*

(39) § 122.30 (What are the objectives of the storm water regulations for small MS4s?);

(40) § 122.31 (For Indian Tribes only) (As a Tribe, what is my role under the NPDES storm water program?);

(41) § 122.32 (As an operator of a small MS4, am I regulated under the NPDES storm water program?);

(42) § 122.33 (If I am an operator of a regulated small MS4, how do I apply for an NPDES permit? When do I have to apply?);

(43) § 122.34 (As an operator of a regulated small MS4, what will my NPDES MS4 storm water permit

require?);

(44) § 122.35 (As an operator of a regulated small MS4, may I share the responsibility to implement the minimum control measures with other entities?); and

(45) § 122.36 (As an operator of a regulated small MS4, what happens if I don't comply with the application or permit requirements in §§ 122.33 through 122.35?).

3. Add § 123.35 to subpart B to read as follows:

## § 123.35 As the NPDES Permitting Authority for regulated small MS4s, what is my role?

(a) You must comply with the requirements for all NPDES permitting authorities under Parts 122, 123, 124, and 125 of this chapter. (This section is meant only to supplement those requirements and discuss specific issues related to the small MS4 storm water

program.)

(b) You must develop a process, as well as criteria, to designate small MS4s other than those described in § 122.32(a)(1) of this chapter, as regulated small MS4s to be covered under the NPDES storm water discharge control program. This process must include the authority to designate a small MS4 waived under paragraph (d) of this section if circumstances change. EPA may make designations under this section if a State or Tribe fails to comply with the requirements listed in this paragraph. In making designations of small MS4s, you must:

(1)(i) Develop criteria to evaluate whether a storm water discharge results in or has the potential to result in exceedances of water quality standards, including impairment of designated uses, or other significant water quality impacts, including habitat and

biological impacts.

(ii) Guidance: For determining other significant water quality impacts, EPA recommends a balanced consideration of the following designation criteria on a watershed or other local basis: discharge to sensitive waters, high growth or growth potential, high population density, contiguity to an urbanized area, significant contributor of pollutants to waters of the United States, and ineffective protection of water quality by other programs;

(2) Apply such criteria, at a minimum, to any small MS4 located outside of an urbanized area serving a jurisdiction with a population density of at least 1,000 people per square mile and a population of at least 10,000;

(3) Designate any small MS4 that meets your criteria by December 9, 2002. You may wait until December 8, 2004 to apply the designation criteria on a watershed basis if you have developed a comprehensive watershed plan. You may apply these criteria to make additional designations at any time, as appropriate; and

(4) Designate any small MS4 that contributes substantially to the pollutant loadings of a physically interconnected municipal separate storm sewer that is regulated by the NPDES storm water program.

(c) You must make a final determination within 180 days from receipt of a petition under § 122.26(f) of this chapter (or analogous State or Tribal law). If you do not do so within that time period, EPA may make a determination on the petition.

(d) You must issue permits consistent with §§ 122.32 through 122.35 of this chapter to all regulated small MS4s. You may waive or phase in the requirements otherwise applicable to regulated small MS4s, as defined in § 122.32(a)(1) of this chapter, under the following circumstances:

(1) You may waive permit coverage for each small MS4s in jurisdictions with a population under 1,000 within the urbanized area where all of the following criteria have been met:

(i) Its discharges are not contributing substantially to the pollutant loadings of a physically interconnected regulated MS4 (see paragraph (b)(4) of this

section); and

(ii) If the small MS4 discharges any pollutant(s) that have been identified as a cause of impairment of any water body to which it discharges, storm water controls are not needed based on wasteload allocations that are part of an EPA approved or established "total maximum daily load" (TMDL) that address the pollutant(s) of concern.

(2) You may waive permit coverage for each small MS4 in jurisdictions with a population under 10,000 where all of the following criteria have been met:

(i) You have evaluated all waters of the U.S., including small streams, tributaries, lakes, and ponds, that receive a discharge from the MS4 eligible for such a waiver.

(ii) For all such waters, you have determined that storm water controls are not needed based on wasteload allocations that are part of an EPA approved or established TMDL that addresses the pollutant(s) of concern or, if a TMDL has not been developed or approved, an equivalent analysis that determines sources and allocations for the pollutant(s) of concern.

(iii) For the purpose of paragraph (d)(2)(ii) of this section, the pollutant(s) of concern include biochemical oxygen demand (BOD), sediment or a parameter that addresses sediment (such as total suspended solids, turbidity or siltation), pathogens, oil and grease, and any pollutant that has been identified as a cause of impairment of any water body that will receive a discharge from the MS4.

(iv) You have determined that current and future discharges from the MS4 do not have the potential to result in exceedances of water quality standards, including impairment of designated uses, or other significant water quality impacts, including habitat and

biological impacts.

(v) Guidance: To help determine other significant water quality impacts, EPA recommends a balanced consideration of the following criteria on a watershed or other local basis: discharge to sensitive waters, high growth or growth potential, high population or commercial density, significant contributor of pollutants to waters of the United States, and ineffective protection of water quality by other programs.

(3) You may phase in permit coverage for small MS4s serving jurisdictions with a population under 10,000 on a schedule consistent with a State watershed permitting approach. Under this approach, you must develop and implement a schedule to phase in permit coverage for approximately 20 percent annually of all small MS4s that qualify for such phased-in coverage. Under this option, all regulated small MS4s are required to have coverage under an NPDES permit by no later than March 8, 2007. Your schedule for phasing in permit coverage for small MS4s must be approved by the Regional Administrator no later than December 10, 2001.

(4) If you choose to phase in permit coverage for small MS4s in jurisdictions with a population under 10,000, in accordance with paragraph (d)(3) of this section, you may also provide waivers in accordance with paragraphs (d)(1) and (d)(2) of this section pursuant to

your approved schedule.

(5) If you do not have an approved schedule for phasing in permit coverage, you must make a determination whether to issue an NPDES permit or allow a waiver in accordance with paragraph (d)(1) or (d)(2) of this section, for each eligible MS4 by December 9, 2002.

(6) You must periodically review any waivers granted in accordance with paragraph (d)(2) of this section to determine whether any of the information required for granting the waiver has changed. At a minimum, you must conduct such a review once every five years. In addition, you must consider any petition to review any waiver when the petitioner provides evidence that the information required for granting the waiver has substantially changed.

(e) You must specify a time period of up to 5 years from the date of permit issuance for operators of regulated small MS4s to fully develop and implement

their storm water program.

(f) You must include the requirements in §§ 122.33 through 122.35 of this chapter in any permit issued for regulated small MS4s or develop permit limits based on a permit application submitted by a regulated small MS4. (You may include conditions in a regulated small MS4 NPDES permit that direct the MS4 to follow an existing qualifying local program's requirements, as a way of complying with some or all of the requirements in § 122.34(b) of this chapter. See § 122.34(c) of this chapter. Qualifying local, State or Tribal program requirements must impose, at a minimum, the relevant requirements of § 122.34(b) of this chapter.)

(g) If you issue a general permit to authorize storm water discharges from small MS4s, you must make available a menu of BMPs to assist regulated small MS4s in the design and implementation of municipal storm water management programs to implement the minimum

measures specified in § 122.34(b) of this chapter. EPA plans to develop a menu of BMPs that will apply in each State or Tribe that has not developed its own menu. Regardless of whether a menu of BMPs has been developed by EPA, EPA encourages State and Tribal permitting authorities to develop a menu of BMPs that is appropriate for local conditions. EPA also intends to provide guidance on developing BMPs and measurable goals and modify, update, and supplement such guidance based on the assessments of the NPDES MS4 storm water program and research to be conducted over the next thirteen years.

(h)(1) You must incorporate any additional measures necessary to ensure effective implementation of your State or Tribal storm water program for regulated small MS4s.

- (2) Guidance: EPA recommends consideration of the following:
- (i) You are encouraged to use a general permit for regulated small MS4s;
- (ii) To the extent that your State or Tribe administers a dedicated funding source, you should play an active role in providing financial assistance to operators of regulated small MS4s;
- (iii) You should support local programs by providing technical and programmatic assistance, conducting research projects, performing watershed monitoring, and providing adequate legal authority at the local level;
- (iv) You are encouraged to coordinate and utilize the data collected under several programs including water quality management programs, TMDL programs, and water quality monitoring programs;
- (v) Where appropriate, you may recognize existing responsibilities among governmental entities for the control measures in an NPDES small MS4 permit (see § 122.35(b) of this chapter); and

(vi) You are encouraged to provide a brief (e.g., two page) reporting format to facilitate compiling and analyzing data from submitted reports under § 122.34(g)(3) of this chapter. EPA intends to develop a model form for this purpose.

## PART 124—PROCEDURES FOR DECISIONMAKING

1. The authority citation for part 124 continues to read as follows:

Authority: Resource Conservation and Recovery Act, 42 U.S.C. 6901 et seq.; Safe Drinking Water Act, 42 U.S.C. 300(f) et seq.; Clean Water Act, 33 U.S.C. 1251 et seq.; Clean Air Act, 42 U.S.C. 7401 et seq.

2. Revise § 124.52(c) to read as follows:

#### § 124.52 Permits required on a case-bycase basis.

(c) Prior to a case-by-case determination that an individual permit is required for a storm water discharge under this section (see  $\S 122.26(a)(1)(v)$ , (c)(1)(v), and (a)(9)(iii) of this chapter), the Regional Administrator may require the discharger to submit a permit application or other information regarding the discharge under section 308 of the CWA. In requiring such information, the Regional Administrator shall notify the discharger in writing and shall send an application form with the notice. The discharger must apply for a permit within 180 days of notice, unless permission for a later date is granted by the Regional Administrator. The question whether the initial designation was proper will remain open for consideration during the public comment period under § 124.11 or § 124.118 and in any subsequent

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