CITY OF ROSEVILLE CALIFORNIA

Environmental Utilities
Engineering Division
2005 Hilltop Circle
Roseville, California 95747

September 14, 2009

Kim Schwab
Central Valley Water Quality Control Board
11020 Sun Center Drive #200
Rancho Cordova, CA 95670-6114

Subject: City of Roseville FY 2008/2009 Annual Report

Dear Ms. Schwab,

In compliance with the provisions of the State General Permit for Storm Water Discharges from Small Municipal Separate Storm Sewer Systems, please find the City of Roseville's 2008-2009 Annual Progress Report. To assist with your review, we have provided a status summary table, attached, which identifies the following:

- Each best management practice (BMP) within our stormwater program.
- The annual report page number where information on that particular BMP can be found.
- The status of the BMP as either complete, in progress, or not initiated.
- Information as to whether or not the BMP is being modified in any way.

I certify under the 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 managed the system or those persons directly responsible for gathering the information, to the best of my knowledge and belief, the information submitted is 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.

If you have any questions or comments regarding this report, please feel free to contact me at (916) 774-5552.

Sincerely,

Kelye A. McKinney
Engineering Manager

STATUS SUMMARY OF SWMP COMMITMENTS FY 2008/09
Public Education and Outreach

BMP		Page No.	Status	Modified
Early Implementation Program (Start 2003/4)				
PO - 1	a	7	Complete - Ongoing	No
PO - 1	b	7	Complete - Ongoing	No
PO - 1	c	8	Complete	No
PO - 1	d	9	Complete	No
PO - 1	e	9	Complete - Ongoing	No
PO - 1	f	9	Complete - Ongoing	No
PO - 1	g	10	Complete - Ongoing	No
Strategic Outreach Program (Start 2004/5)				
PO - 2	a	14	Complete - Ongoing	No
PO - 2	b	14	Complete	No
PO - 2	c	14	Complete	No
Construction, New Development and Redevelopment Outreach (Start 2003/4)				
PO - 3	a	16	Complete - Ongoing	No
PO - 3	b	16	Complete - Ongoing	No

STATUS SUMMARY OF SWMP COMMITMENTS FY 2008/09 (cont'd)
Public Participation / Involvement

BMP		Page No.	Status	Modified
Stormwater Website (Start 2003/4)				
PI - 1	a	19	Complete - Ongoing	No
PI - 1	b	19	Complete - Ongoing	No
PI - 1	c	19	Complete	No
Watershed Management (Start 2004/5)				
PI - 2	a	21	Complete - Ongoing	No
PI - 2	b	21	Complete	No
PI - 2	c	21	Complete	No
PI - 2	d	21	Complete - Ongoing	No
Public Body Updates (Start 2003/4)				
PI - 3	a	22	Complete	No
Storm Drain Labeling (Start 2004/5)				
PI - 4	a	23	Complete - Ongoing	No
PI - 4	b	24	Complete	No

STATUS SUMMARY OF SWMP COMMITMENTS FY 2008/09 (cont'd)
Illicit Discharge Detection and Elimination

BMP		Page No.	Status	Modified
Illicit/Non-Stormwater Discharge Detection (Start 2003/4)				
IDDE - 1	a	27	Complete - Ongoing	No
IDDE - 1	b	27	Complete	No
IDDE - 1	c	28	Complete	No
IDDE - 1	d	28	Complete - Ongoing	No
IDDE - 1	e	28	Complete - Ongoing	No
IDDE - 1	f	29	Complete - Ongoing	No
Address/Eliminate Illicit Connections and Non-Stormwater Discharges (Start 2004/5)				
IDDE - 2	a	31	Complete	No
IDDE - 2	b	31	Complete	No
IDDE - 2	c	32	Complete - Ongoing	No
Storm Sewer System Map (Start 2003/4)				
IDDE - 3	a	33	Complete - Ongoing	No
Stormwater Ordinance (Start 2003/4 to 2004/5)				
IDDE - 4	a	36	Complete	No
Utilize Existing Programs (Start 2003/4)				
IDDE - 5	a	38	Complete - Ongoing	No
IDDE - 5	b	38	Complete - Ongoing	No
IDDE - 5	c	39	Complete	No
IDDE - 5	d	39	Complete	No
IDDE - 5	e	39	Complete - Ongoing	No
IDDE - 5	f	41	Complete - Ongoing	No
Long-Term Outreach (Start 2004/5)				
IDDE - 6	a	43	Complete - Ongoing	No
IDDE - 6	b	43	Complete	No
IDDE - 6	c	46	Complete	No
IDDE - 6	d	46	Complete	No
IDDE - 6	e	46	Complete - Ongoing	No

STATUS SUMMARY OF SWMP COMMITMENTS FY 2008/09 (cont'd)
Construction Site Runoff

BMP		Page No.	Status	Modified
Revised Ordinance (Start 2003/4 to 2004/5)				
CSR - 1	a	48	Complete	No
City Standards (Start 2004/5)				
CSR - 2	a	50	Complete	No
CSR - 2	b	50	Complete - Ongoing	No
Design Review Guidance for City Staff (Start 2004/5)				
CSR - 3	a	52	Complete	No
CSR - 3	b	52	Complete	No
CSR - 3	c	52	Complete - Ongoing	No
Enhanced Reporting System (Start 2005/6)				
CSR - 4	a	54	Complete	No
CSR - 4	b	54	Complete	No
CSR - 4	c	54	Complete	No
CSR - 4	d	54	Complete	No
CSR - 4	e	54	Complete	No
Inspection and Enforcement Program (Start 2003/4)				
CSR - 5	a	56	Complete - Ongoing	No
CSR - 5	b	56	Complete - Ongoing	No
CSR - 5	c	56	Complete	No
CSR - 5	d	56	Complete - Ongoing	No
CSR - 5	e	56	Complete - Ongoing	No
Outreach and Training Program (Start 2003/4)				
CSR - 6	a	59	Complete - Ongoing	No
CSR - 6	b	59	Complete - Ongoing	No
CSR - 6	c	59	Complete - Ongoing	No
CSR - 6	d	60	Complete - Ongoing	No

STATUS SUMMARY OF SWMP COMMITMENTS FY 2008/09 (cont'd)
New Development and Redevelopment

BMP		Page No.	Status	Modified
Development Review Process (Start 2005/6)				
ND - 1	a	63	Complete - Ongoing	No
ND - 1	b	63	Complete	No
ND - 1	c	63	Complete - Ongoing	No
ND - 1	d	63	Complete - Ongoing	No
Critical Criteria (Start 2004/5)				
ND - 2	a	65	Complete	No
ND - 2	b	65	Complete	No
ND - 2	c	65	Complete - Ongoing	No
Post-Construction Ordinance (Start 2005/6 to 2006/7)				
ND - 3	a	67	In Progress	Yes - continue into the following year.
Regulatory Requirements for Privately Owned Controls (2006/7 to 2007/8)				
ND - 4	a	69	In Progress	Yes - continue into the following year.
ND - 4	b	69	Complete	No
ND - 4	c	69	In Progress	Yes - continue into the following year.
ND - 4	d	69	In Progress	Yes - continue into the following year.
ND - 4	e	69	In Progress	Yes - continue into the following year.
Outreach and Technical Assistance (2004/5)				
ND - 5	a	71	Complete	No
ND - 5	b	71	Complete - Ongoing	No

STATUS SUMMARY OF SWMP COMMITMENTS FY 2008/09 (cont'd)
Municipal Operations

BMP		Page No.	Status	Modified
Inventory and Assess the Potential for Stormwater Pollution in O&M Activities at City-Owned Facilities and in City Field Operations (Start 2004/5 to 2005/6)				
MO - 1	a	74	Complete - Ongoing	No
MO - 1	b	74	Complete - Ongoing	No
MO - 1	c	74	Complete - Ongoing	No
MO - 1	d	75	Complete	No
MO - 1	e	75	Complete	No
MO - 1	f	75	Complete	No
Review and Assess the O&M Practices Identified in MO-1 as Potential Stormwater Pollution Sources for the Selection and Incorporation of BMPs to the Maximum Extent Practicable (Start 2006/7 to 2007/8)				
MO - 2	a	77	Complete	No
MO - 2	b	77	Complete	No
MO - 2	c	78	Complete - Ongoing	No
MO - 2	d	78	Complete	No
MO - 2	e	78	Complete	No
MO - 2	f	78	Complete	No
Review Construction and Development Procedures for City-Owned Facilities (Start 2005/6)				
MO - 3	a	81	Complete - Ongoing	No
MO - 3	b	81	Complete - Ongoing	No
MO - 3	c	81	Complete	No
Develop and Expand City O&M Training Programs to Include Stormwater Pollution Prevention (Start 2004/5)				
MO - 4	a	83	Complete - Ongoing	No
MO - 4	b	91	Complete - Ongoing	No

Table of Contents

Section 1: Overview and Contact Information

Date Prepared: 9/14/2009

For questions regarding this report contact:

Kelye McKinney
2005 Hilltop Circle
Roseville, CA 95747

Stormwater Program Permit Information

1. Permitting Authority:	California State Water Resources Control Board
2. Permit Number:	CAS000004
3. Permit Type:	General
4. Permit Name:	City of Roseville Stormwater Management Program
5. Date Issue:	7/6/2004
6. Date Expire:	6/30/2008

General Information for MS4 Operator

1. Operator Name:	Robert Jensen		
2. Operator Title:	Public Works Director		
3. Represented Entity:	City of Roseville, Environmental Utilities		
4. Mailing Address:	2005 Hilltop Circle		
5. Mail City, State, Zip:	Roseville, CA 95747		
6. Phone Number:	(916) 774-5349		
7. E-Mail Address:	rjensen@roseville.ca.us		
8. Population:	112,343	**Area (sq mi):**	31
9. Official Website:	www.roseville.ca.us		

General Information for Primary Contact Person

1. Name:	Kelye McKinney
2. Title:	Engineering Manager
3. Phone Number	(916) 774-5552
4. E-Mail Address:	kmckinney@roseville.ca.us

General Information for Secondary Contact Person

1. Name:	Delyn Ellison-Lloyd
2. Title:	Senior Engineer
3. Phone Number	(916) 746-1748
4. E-Mail Address:	dellison-lloyd@roseville.ca.us

General Information for Receiving Waters

Receiving Water Lists: Listed below are all the identified receiving waterbodies to which identified outfalls discharge.

Receiving Streams (creek, stream, river, etc.)	Receiving Waterbodies (lake, wetland, ocean, etc.)	Receiving Watersheds
North Branch Pleasant Grove Creek		Sacramento River Watershed
Kaseberg Creek		
South Branch Pleasant Grove Creek		
Dry Creek		
Miners Ravine		
Linda Creek		

Section 2: Implementation Schedule

Public Education and Outreach

PO-1: Early Implementation Program	7/1/2003	6/30/2008
PO-2: Strategic Outreach Program	7/1/2004	6/30/2008
PO-3: Construction, New Development, and Redevelopment Outreach	7/1/2003	6/30/2008

Public Participation/Involvement

PI-1: Stormwater Website	7/1/2003	6/30/2008
PI-2: Watershed Management	7/1/2004	6/30/2008
PI-3: Public Body Updates	7/1/2003	6/30/2008
PI-4: Storm Drain Labeling	7/1/2004	6/30/2008

Illicit Discharge Detection and Elimination

IDDE-1: Illicit/Non-Stormwater Discharge Detection	7/1/2003	6/30/2008
IDDE-2: Address/Eliminate Illicit Connections and Non-Stormwater Discharges	7/1/2004	6/30/2008
IDDE-3: Storm Sewer System Map	7/1/2003	6/30/2008
IDDE-4: Stormwater Ordinance	7/1/2004	6/30/2008
IDDE-5: Utilize Existing Programs	7/1/2003	6/30/2008
IDDE-6: Long-Term Outreach	7/1/2004	6/30/2008

Construction Site Runoff Control

CSR-1: Revised Ordinances	7/1/2003	6/30/2008
CSR-2: City Standards	7/1/2004	6/30/2008
CSR-3: Design Review Guidance for City Staff	7/1/2004	6/30/2008
CSR-4: Enhanced Reporting System	7/1/2004	6/30/2008
CSR-5: Inspection and Enforcement Program	7/1/2003	6/30/2008
CSR-6: Outreach and Training Program	7/1/2003	6/30/2008

New Development and Redevelopment

ND-1: Development Review Process	7/1/2005	6/30/2008
ND-2: Critical Criteria	7/1/2004	6/30/2008
ND-3: Post-Construction Ordinance	7/1/2005	6/30/2009
ND-4: Regulatory Requirements for Privately Owned Controls	7/1/2006	6/30/2009
ND-5: Outreach and Technical Assistance	7/1/2004	6/30/2009

Municipal Operations

MO-1: Inventory and Assess the Potential for Stormwater Pollution in O&M Activities at City-Owned Facilities and in City Field Operations	7/1/2004	6/30/2008
MO-2: Review and Assess the O&M Practices Identified in MO-1 as Potential Stormwater Pollution Sources for the Selection and Incorporation of BMPs to the Maximum Extent Practicable	7/1/2006	6/30/2008
MO-3: Review Construction and Development Procedures for City-Owned Facilities for Inclusion of Stormwater BMPs as Necessary	7/1/2005	6/30/2008
MO-4: Develop and Expand City O&M Training Programs to Include Stormwater Pollution Prevention	7/1/2004	6/30/2008

Section 3: Minimum Control Measures

Public Education and Outreach

The City of Roseville must educate the public within its jurisdiction about the importance of the stormwater program and the public's role in it. In order to elevate the public's awareness of the impacts that stormwater discharges may have on waterways, the City must develop a public education program that provides educational materials to the community within its boundaries. Based on feedback from public surveys, the City will develop a strategy for educating the public and businesses regarding the impacts of stormwater pollutants to local waterways. These educational materials will include brochures, fact sheets and alternative information outlets, which describe the proper use, storage, and disposal of materials that contribute to stormwater runoff pollution.

Non-point sources such as the residential and commercial sectors are significant sources of water quality degradation in the United States. The incremental contributions that each of these individual sources make via stormwater runoff to a receiving water body can combine to create a substantial source of water pollution.

The most effective way to elicit compliance and support from a decentralized audience such as the residential and business communities is through a targeted education and outreach program. To develop a compelling program, these dischargers should be surveyed to determine their awareness level and their preferred means of receiving stormwater pollution prevention information. The City's educational materials will be tailored to the results of an awareness survey and, therefore, the preferences of the audience will be recognized and the materials will be better received and acted upon.

Number of BMPs Associated with Control Measure: 3

Important Dates:

Earliest Start Date: 7/1/2003

End Date: 6/30/2008

PO-1: Early Implementation Program

Responsible Party: Kelye McKinney, Engineering Manager
Start Date: 7/1/2003
End Date: 6/30/2008
Permit years scheduled for initial implementation:
Year 1 **X** Year 2 Year 3 Year 4 Year 5

Has Goal Been Accomplished: YES

General Summary

The early implementation program builds on the existing outreach activities of the City of Roseville by adding stormwater messages to those efforts. The program involves adding stormwater messages to the Water Conservation, Household Hazardous Waste, Used Oil Drop-Off, Composting Program, Dog Park, Creek Week, Fire Department Inspection, and Neighborhood Services programs, utilizing their existing mediums for disseminating information. Early implementation also utilizes two grant-funded activities to address stormwater pollution: the construction of two signs at Mahany Park, a highly used regional park, and preparation of a creekside landowner's guide. The program also includes providing stormwater information on the City's website and implementing a storm drain stenciling program. The City has committed to:

a) Include Articles on Stormwater Impact and New Phase II Program in City Newsletters

The City has agreed to publish and mail directly two articles per year on stormwater impacts and the new Phase II program via the City's Roseville Reflections and Environmental Utilities Today newsletters.

b) Adding Stormwater Specific Information to Existing Education and Outreach Materials

The City has agreed to add a stormwater message to the education and outreach materials of existing programs such as Water Conservation, Household Hazardous Waste, Used Oil Drop-Off, Composting, Dog Park, Creek Week, Fire Department Inspection and Neighborhood Services. The City has agreed to amend or create three educational and outreach materials per year. Existing media will be used for the dissemination of this information.

c) Construct Two Signs at Mahany Park

The City has agreed to utilize available educational signs at Mahany Park for stormwater education.

d) Develop and Implement Creekside Landowner Education Materials

The City has agreed to develop and implement creekside landowner's educational materials through Roseville's Creeks Management Plan.

e) Expand the City Stormwater Web Page

The City has agreed to enhance and update the stormwater content on its stormwater web page on a regular basis.

f) Implement Storm Drain Labeling Program

The City has agreed to enact a storm drain labeling program through the City's construction standards for new development and citizen volunteers for existing development. All of the new storm drains will be stamped each year and 200 existing storm drains will be labeled each year.

g) Identify and Participate in Local Community Outreach Events

The City has agreed to participate in minimum of three community outreach events each year.

APPROPRIATENESS:

This BMP is an appropriate to the City's stormwater program. Public education is a critical to raising public awareness and understanding of the impacts of stormwater pollution in the community. In turn, the City's goal is to effect changes in public behavior and reduce pollutant loads on the City's local creeks. To accomplish this, the Stormwater Program employs a variety of educational avenues such as outreach events, newsletters and public service announcements.

EFFECTIVENESS:

The City performed a baseline survey to determine the current status of public awareness and behaviors in 2005. As a result, the Stormwater Program focused its outreach efforts towards the residential community and school age children. Environmental Utilities performed a follow-up survey in 2008 which included Stormwater management questions. Although the format of the two surveys differed (web based vs. telephone) and the questions were structured differently, a general trend emerged that showed more Roseville residents knew that water that enters a storm drain is not treated to remove pollution (2005-25% 2008-49%). The Stormwater Management Program will continue to survey its residents, as funding allows, to determine their knowledge of stormwater issues. This will numerically quantify the effectiveness of the activities associated with this minimum control measure.

PROPOSED MODIFICATIONS:

None.

Status of Measurable Goals

PO-1.a: Include Articles on Stormwater Impacts and New Phase II Program in City Newsletters

Ongoing:
Three stormwater articles were published in the Environmental Utilities Today newsletter. Two articles entitled *Front Yard Leaf Pick-Up Program* and *Living Green* were published in the October 2008 issue. Three more articles entitled *Creek Week 2009*, *Drought Requires Creek Awareness* and *Creek-Friendly Landscaping Events* were published in the April 2009 issue. The June 2009 edition of EU Today ran two articles pertaining to stormwater quality titled *Creating a Rain Garden* and *Creek Alert*. The "EU Today" newsletter is distributed to 35,000 Roseville residents. It is mailed out as an insert in the residential utility bill. It is also availability on most public counters in City buildings

The City's website is up-dated periodically to include new issues of the "EU Today" which contain aforementioned articles. To access these newsletters go to the City's website at *www.roseville.ca.us* under the heading of "Most Visited," go to Newsletters.

The City's Stormwater Program continues to partner with Our Water Our World (OWOW) to bring information regarding integrated pest management to the public. The City sponsors two literature racks at two retail landscape nurseries: Green Acres and Sierra Nursery and added Bushnell's Nursery as an outlet of OWOW materials. Each rack holds approximately 24 individual fact sheets relating to specific pest management problems.

See appendix for:
Copy of EU Today Articles (October 2008, April 2009, June 2009)

Date: 7/1/2003 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

PO-1.b: Add Stormwater Specific Information to Existing Education and Outreach Materials

Ongoing:
The Stormwater Management Program contributed to the newly created Environmental Utilities departmental brochure. The brochure is aptly named *Environmental Utilities*. Information pertaining to the management of non-stormwater discharges such as wastewater from car washing, and discharges from lawn and gardens. This brochure is distributed at outreach events by all of EU's divisions and is also available at EU's public counters.

The Stormwater Management Program also added copy to the City Services Guide that was mailed out to all

Environmental Utilities and Roseville Electric's residential customers. The purpose of the guide was to acquaint Roseville residents with the services available to them and give them the means to contact the City for assistance. A stormwater message and a number to report illicit discharges were included in the brochure.

The Stormwater Program also participated in the 2009 Student Art Calendar which encouraged students to create conservation messages for several of the divisions; Solid Waste, Electric, Water Conservation and Stormwater. Student artists submitted original art and messaging to the City. A winner was selected for each month of the year. The winning submittals were reproduced in the calendar.

The City Building Department also distributes the "Need to Drain Your Pool" brochure via building permits for pools. This is done on an ongoing basis. Between July 1st, 2008 and June 30th 2009, approximately 140 building permits for pools were issued.

The Stormwater Program also coordinates with the City's Water, Wastewater, Solid Waste and Electric Departments to design and construct indoor and outdoor educational displays at the Mahany Center. The new outdoor facility is in the design phase at the Mahany Complex. This facility will house a new library and the new Roseville Utility Education Center (RUEC). This center will take an integrated approach to educating the public about sustainable lifestyles and their impact to environment and consumption of resources. Currently, the target audience is 4th, 5th and 8th graders and Roseville residents. Concepts specific to the stormwater program such as the connection between discharges to the storm drains and the creeks and the relationship between runoff and infiltration will also be demonstrated at the RUEC. Stormwater staff had significant input into the indoor and outdoor exhibits, the Keepin' It Clean, water cycle lesson of the RUEC's school tours, and made the presentations for the school tours on January 7th and March 6th and the Teacher's Receptions on September 9th and 18th, 2009.

The Stormwater Program coordinated with Environmental Utilities' Public Information Division to air a general stormwater management awareness PSA at a several local movie theaters during the Thanksgiving and Christmas holidays. This timeframe was chosen due to the increase in movie attendance. The PSA established the connection between the storm drain and Roseville's local creeks. It also addressed several common household activities that generated non-stormwater discharges.

The Stormwater Program also worked with Radio Disney to create two radio public service announcements that will air on the Disney Radio Channel. The first PSA addressed the connection between the City's storm drain and the local creeks while the second PSA served to advertise the City's Charity Car Wash Kit. Each announcement was sixty seconds of scripted dialogue by professional actors.

The Stormwater Program continues to work on a stormwater model that depicts Roseville during a rain event and the contaminants associated with various land uses such as residential, commercial and construction. The City of Sacramento donated their old stormwater model to Roseville's program and the Stormwater Program is in the process of updating its internal components and its external appearance to reflect Roseville topography and morphology. Initially, this model will be placed in City buildings in areas that the public can access such as public counters in the Corporation Yard and the Civic Center as well as the City libraries.

See appendix for:
Environmental Utilities Brochure
Your Guide to City Services
Pool Brochure
2009 Student Art Calendar (Back of Appendices)
Keepin' It Clean Presentation (CD in back of Appendices)
Invitation to Educator's Reception
Movie Theater PSA (CD in back of Appendices)
Radio Disney PSA (CD in back of Appendices)

Date: 7/1/2003 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

PO-1.c: Construction of Two Signs at Mahany Park

Completed, No Change:
Two signs, incorporating the Trina Trout mascot, were installed at Mahany Park during the 2005-2006 reporting period. These signs read, "Hi! I'm Trina Trout. This is Kaseberg Creek. Roseville's creeks and fields are home to me, and all my furry and feathered friends. Please keep our home clean by tossing your trash in this can. Thank you, Stormwater Management Program." These signs are located at a creek bridge that is heavily traveled by pedestrians accessing both sides of the Park. This bridge is located behind Mahany Center and is part of the City's bike trail system.

See appendix for:
Mahany Sign pictures

Date: 7/1/2003 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

PO-1.d: Develop and Implement Creekside Landowner Educational Materials

Completed, No Change:
The "Roseville Creek Awareness Map" and the "Roseville Creek Stewardship Resource Guide" were updated to conform to City's outreach standards during the 2005-2006 reporting period. Seventeen hundred and fifty of the "Roseville Creek Awareness Map" and five hundred of the "Roseville Creek Stewardship Resource Guides" were printed. The Creek Awareness Map is designed to be a wall poster and a brochure. The Stewardship Resource Guide is designed to be a tri-fold. Both discuss the City's Stormwater Management Program and its implications to activities in the residential community.

In addition, the City's newly created Open Space Division created an Open Space brochure. This Division lies within the City's Parks Department and is responsible for managing the City's 4,000 acres of open space. Much of this land lies immediately adjacent to the City's creeks. The Open Space brochure was intended for distribution to the landowners immediately adjacent to the open space. The Stormwater Management Program contributed to this brochure with tips regarding the proper management of non-stormwater discharges.

See appendix for:
Roseville Creek Awareness Map

Date: 7/1/2003 Responsible Party: Brian Castelluccio, Open Space Manager

PO-1.e: Expand the City Stormwater Web Page

Ongoing:
The City's Stormwater website is updated periodically to provide both the residential and business communities with the most recent information on the City's Stormwater Management Program. During this permit term, the new links for volunteer information were added to the Public Involvement Opportunities section. Links to the newly developed Industrial/Commercial BMP fact sheets were added to the Essential Business Tips section during this reporting period. The Up-coming Events and Workshops section was also up-dated with the program's schedule of outreach events.

Public Work's also up-dated their stormwater webpage with information pertaining to the Construction Stormwater Runoff Program and the New Development & Redevelopment Program. The new information included the proposed Stormwater Ordinance changes for the Stormwater Quality Maintenance Program.

See appendix for:
Website Up-Dates

Date: 7/1/2003 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

PO-1.f: Implement Storm Drain Labeling Program

Ongoing:
All newly constructed storm drain inlets are required under the City's Construction Standards to have the "Do Not Dump" message stamped into the adjacent concrete sidewalk. Therefore, storm drain markers are not installed at these new drain inlets.

The Stormwater Management Program continues implement a volunteer program to install rugged metal storm drain markers on existing storm drains. Unlike the painted stencils that wore away in less than two years, these new metal markers are expected to last 30 years or longer. The City provides the volunteer with all the necessary materials. The markers are installed using a metal fastener and adhesive glue. First a hole is drilled in the concrete curb. Then, a metal sleeve is inserted in the hole. Next, adhesive is applied to the back of the marker. Finally, the marker is secured to the concrete by driving a nail through a pre-drilled hole in the marker into the metal sleeve below.

At the on-set of the program, there were approximately 5,500 publicly-held and 1,000 privately-owned storm drains in need of labeling; over 4,350 markers have been installed over the six years this permit has been in effect. Volunteers have installed approximately 3,500 of these markers. However, to provide for the safety of the City volunteers, City crews install markers at approximately 850 of the inlets located on busy streets where traffic control is required. There are approximately 1,000 unmarked drains remaining in the public right of way and a commensurate number in private subdivisions. The Stormwater Management Program will continue to solicit volunteers to label the remaining unmarked drains.

Volunteers installed more than 550 storm drain markers during this reporting period. During the first quarter, two individual Eagle Scout projects accounted for the installation of approximately 320 markers on existing unlabeled storm drain inlets in Roseville. The remaining 230 markers were installed by a single volunteer. Due to the use of power tools and the City's risk management stipulations, the number of volunteers that meet these requirements are limited.

See appendix for:
Photo of storm drain marker
Map of initial storm drain marker pilot area
Current map of installed storm drain markers

Date: 7/1/2003 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

PO-1.g: Identify and Participate in Local Community Outreach Events

Ongoing:
The City's Stormwater Management Program (SWMP) participated in twenty-eight (28) community and school outreach opportunities during this reporting period. See table below.

The Stormwater Management Program coordinates and participates in "**Creek Friendly Landscaping" events** at three local nurseries; Sierra Nursery (10/18/08 and 4/4/09), Green Acres (9/13/08 and 5/30/09) and Bushnell's (4/11/09). Currently, these events are held twice a year; fall and spring. The Stormwater Management Program funds the "Our Water Our World" (OWOW) program at these nurseries which includes literature, product identification and provides staff training. The City sponsored two nursery staff training sessions given by an OWOW consultant during this permit term. The first session was held on August 26, 2008 at Sierra Nursery and the second was given on April 10, 2009 at Bushnell's. Bushnell's Nursery was added to the City's roster this permit term. The training sessions were well received and prepared the nursery staff for the up-coming Creek Friendly Landscaping events.

The Creek Friendly events offer a message to the general public that crosses programmatic lines. The message follows the seven "River Friendly Landscaping" principles which reiterate the "Bay Friendly" guidelines. The Stormwater Management Program touts an integrated pest management message. The Water Conservation Division promotes water efficient irrigation and the use of drought tolerant native plants. The Solid Waste Division addresses green waste composting in order to reduce the volume of waste going to the landfill. The City's Exploration Center participates to advertise their environmentally-friendly landscaping classes.

The Stormwater Management Program participated in a number of **festivals** this reporting period including the Salmon Festival at the Nimbus Dam and three Roseville's Downtown Tuesday Nights. SWMP staff took the Integrated Pest Management display to the Salmon Festival on October 12, 2008. There were approximately 150 visitors to the booth where Our Water Our World flyers on ants, spider and snails were made available. The Stormwater Program booth was used on three nights (July 1, 2008, May 5, 2009 and June 9, 2009). The booth includes a "carnival" type game, which visually demonstrates the connection between a storm drain and Roseville's creeks. Participants are rewarded for making the shot into a storm drain which comes out in a model creek. Then stormwater staff member reinforces the message with saying that whatever goes into the storm drain goes out into the creek and asks the participant to repeat the phrase. Fish bubbles for children were distributed as prizes for the stormwater game. The Trina Trout hotline magnets were distributed at these events as well as dog waste clean-up bags. An average of 66 prizes was awarded at each of the event dates listed above. The City determined that an average attendance for each Downtown Tuesday Night events was 3,500.

The Stormwater Management Program also attended several elementary **school outreach** events. On October 24, 2008, SWMP took the stormwater game to Kaseberg Elementary School for their fall festival. It was a carnival type set with kids and parents going to each booth to play games and get information. Approximately seventy-five participants played the stormwater game and were awarded prizes at the festival. The Stormwater staff made four water cycle presentations on December 9 and 11, 2008 at Ridgeview

Elementary School. There were approximately 25 children at each presentation for a total of 100 attendees. The new stormwater display, the Enviroscape, was used to demonstrate the water cycle and how water moves through the urban and natural environment. The kids actively participated in spraying water on the model and discharging pollutants on the model which created a memorable learning experience.

The Stormwater Program makes presentations to the City's **Adventure Clubs** for kids. These clubs provide before and after school care as well as care for holiday vacations for the elementary-age school children the Roseville Unified School District. The City operates these childcare facilities which are located at each of the district's schools. SWMP made four presentations to Adventure Clubs this reporting period. The first was on August 21, 2008 at Cirby School with approximately 60 children in attendance. Next was Diamond Creek School on January 28, 2009 with almost 60 kids present. The Stormwater made a presentation to 30 kids at Kaseberg Adventure Club on February 25, 2009. This reporting period's final Adventure Club presentation was made to Thomas Jefferson School on March 25, 2009. The Enviroscape watershed model was used at each presentation to demonstrate the processes of the water cycle, how water moves through the urban and natural environment and the impact of non-stormwater discharges to receiving waters.

The Stormwater Program participated in the delivery of two of the watershed lessons called Keepin' It Clean, at the **Roseville Utility Exploration Center's** (RUEC) school tour program. Each lesson consists of a lecture combined with two labs. The first lab employs a small watershed model to demonstrate the movement of stormwater through the urban environment. The effects of non-stormwater discharges to receiving water are also shown by sprinkling several materials on the model and washing them down through the model. The second lab demonstrates the concept of contaminant potency by using test strips to determine the part per million concentrations of several constituents. This first lesson was given on January 7, 2009 with approximately 25 students in attendance and the second was on March 6, 2009 with a similar number of students. SWMP also participated in the RUEC's teacher receptions on September 9 and 18 to publicize the school tours to Roseville Unified School District teachers.

The Stormwater Program participated in several **Earth Day events** during month of April. The first event was the "Celebrate the Earth" festival at Roseville's Utility Exploration Center at the Mahany Sports Complex. The event was held on April 18, 2008 on the outdoor soccer field of the Mahany Complex. The Stormwater Program displayed three Creek Friendly Landscaping exhibits; the Integrated Pest Management bug, the Poop Loop Composting display and the demonstration Rain Garden. Over 325 pieces of Creek Friendly information were distributed at this event. SWMP also staffed an outreach booth at the Roseville campus of Hewlett Packard's (HP) Earth Day events on April 17th, 2007. The attendees were primarily HP employees. Over 125 pieces of Creek Friendly information which included Soil Health brochures and compost samples were distributed at this event. SWMP took the Integrated Pest Management display to the Kaiser's Earth Day event on April 24, 2009. This event was held at the Kaiser Hospital on Douglas Blvd. in Roseville. Most of the attendees were either Kaiser staff or patients. Over 110 pieces of Our Water Our World literature were distributed at this event.

The Stormwater Management Program also responds to requests for speakers from civic **clubs** in the Roseville community. SWMP delivered three stormwater presentations this reporting period in response to these requests. The first was on August 14, 2008 to the Sons in Retirement branch of the Elks approximately 75 members were present. The next presentation contained an integrated pest management message and was delivered to the Lincoln Hills Garden Club on March 11, 2009 to approximately 40 club members. The final presentation of the reporting period was made to the American Basin Council of Watershed on June 3, 2009 to approximately 25 people. Each presentation was individually tailored to the concerns and the knowledge level of the group.

As a result of the Stormwater Management Program's participation in outreach events listed above approximately 1,805 outreach materials were distributed to the public during this permit term. This includes approximately 500 soil health and rain garden brochures. As well as approximately 1,300 give-aways such as the hotline magnets, dog waste bags, general stormwater brochure and other game prizes were also given away at these events. All these items were intended to reinforce the Stormwater Program's central message of preserving the water quality Roseville's creeks through the management of stormwater runoff.

See appendix for:
Earth Day - Gold Country Media Insert
Earth Day - Sacramento Bee newspaper article
IPM Bug Display
Composting Display
"Nurture the Soil" Brochure
Raingarden Display
Raingarden Brochure
Outreach Game Display
Promotional Items
Green Acres Creek Friendly Event Ad
"The 10 Most Wanted Bugs" Brochure

Stormwater Program Outreach Events
FY 08-09

Creek Friendly Events

Fall			
8/26/2008	Training at Sierra	12	participants
9/13/2008	Green Acres	120	pieces
10/18/2008	Sierra	15	pieces
Spring			
4/4/2009	Sierra	25	pieces
4/10/2009	Training at Bushnell's	8	participants
4/11/2009	Bushnell's	30	pieces
5/30/2009	Green Acres	125	pieces

Festivals

10/12/2008	Nimbus Salmon Festival	150	participants
7/1/2008	Downtown Tuesday Nights	45	pieces
5/5/2009	Downtown Tuesday Nights	30	pieces
6/9/2009	Downtown Tuesday Nights	125	pieces

Schools

10/24/2008	Kaseberg School Fall Festival	75	pieces
12/9/2008	Ridgeview Elementary	50	kids
12/11/2008	Ridgeview Elementary	50	kids

Adventure Clubs

8/21/2008	Cirby Elementary School	60	kids
1/28/2009	Diamond Creek Elementary School	60	kids
2/25/2009	Kaseberg Elementary School	30	kids
3/25/2008	Thomas Jefferson Elementary School	30	kids

Roseville Utility Exploration Center

9/9/2008	Teacher Reception	5	participants
9/18/2008	Teacher Reception	10	participants
1/7/2009	KIC presentation	24	participants
3/6/2009	KIC presentation	26	participants

Earth Day Celebrations

4/18/2009	RUEC	325	pieces
4/21/2009	Hewlett-Packard	125	pieces
4/24/2009	Kaiser Hospital	110	pieces

Club Presentations

8/14/2008	Sons in Retirement (Elks)	75	participants
3/11/2009	Lincoln Hills Garden Club	40	participants
6/3/2009	American Basin Council of Watersheds	25	participants

Number of Impressions: **1,805**

Number of Events: **28**

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

PO-2: Strategic Outreach Program

Responsible Party: Kelye McKinney, Engineering Manager

Start Date: 7/1/2004 End Date: 6/30/2008
Permit years scheduled for initial implementation:

Year 1	Year 2 **X**	Year 3	Year 4	Year 5

Has Goal Been Accomplished: YES

General Summary

The Strategic Outreach program is meant to educate the community on the impacts of stormwater pollution and the steps people can take to reduce or eliminate pollution from reaching area waterways. The program is also intended to assess which outreach materials are most appropriate for use within the community, including residents and businesses. The City has committed to:

a) Work with Neighboring Communities to Develop Partnerships

The local stormwater program managers from Placer County (Placer Regional Stormwater Coordinating Group) conduct monthly meetings at which the group which includes the City of Roseville evaluates opportunities to partner in the education and outreach efforts.

b) Conduct a Public Stormwater Awareness Survey

The City will use a public awareness survey to evaluate the community's existing level of stormwater knowledge, determine the need for additional stormwater information, identify target audiences, and establish effective messages. In addition, the City has agreed to use the survey to gather data on how the community obtains knowledge on stormwater issues and the effectiveness and desirability of various educational media.

c) Update the SWMP Public Outreach Program to Reflect the Strategic Plan

The City will revise the Public Outreach MCM of the SWMP based on the findings of the community awareness survey and the resulting strategic outreach plan. Outreach activities that include identified key messages, targeted audiences, and preferred media will be implemented. The new education and outreach program will capitalize on already developed materials wherever possible.

APPROPRIATENESS:

The City has found that building partnerships with neighboring communities is an appropriate method of information-sharing. However, each of the municipal programs have varying the BMP implementation schedule making project coordination difficult.

EFFECTIVENESS:

The City completed a public awareness survey in 2005. This survey serves a baseline to gauge the appropriateness and the effectiveness of the City's BMPs in the Public Outreach Minimum Control Measure. The City conducted a follow-up survey in 2008 which indicated that public knowledge of stormwater issues had increased.

PROPOSED MODIFICATIONS:

None.

Status of Measurable Goals

PO-2.a: Work with Neighboring Communities to Develop Partnerships

Ongoing:
The City attends local stormwater meetings such as those of the Dry Creek Water Council (DCWC) and the Placer Regional Stormwater Coordinating Group (PRSCG) to develop partnerships with other watershed stakeholders and Phase II communities in the area. The City has determined that creating a memorandum of understanding (MOU) with PRSCG membership to provide a mechanism for funding coordinated activities infeasible at this time due to the variation in the BMP implementation schedule of each MS4.

Roseville stormwater program staff attended the PRSCG meetings on July 24, 2008 and October 16, 2008. The topics discussed included regulatory dates, construction stormwater runoff permit, and the addition of a stormwater compliance inspection program to Placer County Environmental Health's already existing food facility inspection program. Attending participants usually include representatives from the City of Rocklin, Town of Loomis, City of Lincoln, City of Auburn, Placer County, as well as the City of Roseville. These meetings provide the City with an opportunity to benefit from information sharing. The frequency of these meetings has been reduced to quarterly due to limitations in staff time of the participating agencies.

See appendix for:
Placer Regional Stormwater Coordinating Group meeting agendas and minutes

Date: 7/1/2004 Responsible Party: Kelye McKinney, Engineering Manager

PO-2.b: Conduct a Public Stormwater Awareness Survey

Completed, No Change:
Roseville's residents have previously been surveyed regarding their awareness of stormwater quality issues. The survey was developed and the results compiled by Data Cycles in April 2005. The survey was administered via Roseville's website to citizens who had previously agreed to respond to a wide variety of Roseville related topics. The survey questionnaire assessed the knowledge level of approximately 300 residents on the following subjects:

Drainage in their neighborhood
Use and disposal of building materials
Use and disposal of landscaping materials and/or pool maintenance
Use and disposal of auto maintenance materials
Sources of stormwater information
Business/government/resident responsibility

Individual comments were solicited for several survey questions. The survey demographics were also compiled through a series of general household questions.

Generally speaking, the survey results of the web-based survey indicate that the public is not knowledgeable about the specifics of the final destination of stormwater discharged from their neighbor (i.e., which creek). Most of the respondents seemed to believe that government and business should bear the responsibility of preventing stormwater pollution rather than the residential community. Most described their waste disposal practices as environmentally responsible. These results will be given the utmost consideration when formulating the program's long term public outreach strategy. This best management practice has been completed.

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

PO-2.c: Update the SWMP Public Outreach Program to Reflect the Strategic Plan

Completed, No Change:
The Stormwater Program contracted with a consultant, Lucy and Co. to develop a long-term public outreach strategy based on the public stormwater awareness survey. The long- term outreach strategy is being used to guide the efforts of the Public Education and Outreach minimum control measure of the City's Stormwater Management Plan.

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

PO-3: Construction, New Development, and Redevelopment Outreach

Responsible Party: Kelye McKinney, Engineering Manager

Start Date: 7/1/2003 End Date: 6/30/2008
Permit years scheduled for initial implementation:

Year 1 **X**	Year 2	Year 3	Year 4	Year 5

Has Goal Been Accomplished: YES

General Summary

The Construction, New Development, and Redevelopment Outreach Program each contain an outreach component directed to construction professionals and other interested parties during development of the Construction Site Runoff (CSR) and the New Development/Redevelopment (ND) programs. It also involves training construction professionals and City staff on the specifics of the two newly adopted programs. The City has committed to:

a) Conduct Workshops During Construction Stormwater Runoff and New Development/Redevelopment Programs Creation.

The City has agreed to conduct three half-day workshops to solicit public input during the creation of the Construction Stormwater Runoff and New Development/Redevelopment programs for a total of six workshops.

b) Conduct Annual Training Workshops on Construction and Improvement Standards During New Development Program Creation.

The City has agreed to conduct annual training workshops on the City's Construction Stormwater Runoff and New Development programs once they are in place.

APPROPRIATENESS:

The workshops conducted by the City are an appropriate way to educate and receive input from the construction and development community about the stormwater management program and their responsibilities to prevent stormwater pollution from construction site and new development projects.

EFFECTIVENESS:

Initial indicators tend to validate the presumed effectiveness of this BMP. Through tailgate workshops, detailed information specific to Roseville's Construction Stormwater Management program is distributed to a number of field staff in the construction industry making the financial resources committed to this BMP very effective. The public workshops also provide an excellent opportunity for the development community to have input into the City’s new stormwater quality design manual.

PROPOSED MODIFICATIONS:

None.

Status of Measurable Goals

PO-3.a: Conduct Workshops during Construction Stormwater Runoff and New Development/Redevelopment Program Creation

Ongoing:
The City's Construction Stormwater Runoff program is fairly well established. The City is currently enforces the criteria of State General Permit for Construction by requiring Stormwater Pollution Prevention Plans (SWPPP) from construction sites one acre or greater and inspecting those construction site for an effective combination of erosion and sediment control as well as best management practices for non-stormwater discharges.

The Stormwater inspection staff conducted a series of tailgate trainings in the field in lieu of one all-day workshop, the City arranged and scheduled for August 2008, a co-hosted workshop/exam for a State approved Certified Erosion, Sediment and Storm Water Inspector (CESSWI). Tailgate workshop sessions were as follows:

(1) 1.5 hour Stormwater Tailgate Workshop: (8/7/2008, Lennar Homes representing 5 Westpark subdivisions, 24 Attendees, Topic: General SWPPP/Concrete washout management)

(1) ½ hour Stormwater Tailgate Workshops: (1/7/2009), Longs, 6 attendees, Topics: Mortar/Plaster/ Paint Management

See appendix for:
CESSWI workshop/exam registration form (see in CSR-6.b appendix)
SWPPP workshop rosters (see in CSR-6.b appendix)

Date: 7/1/2003 Responsible Party: Guy Howes, Senior Engineer

b) Conduct Annual Training Workshops on Construction and Improvement Standards During New Development Program Creation.

Ongoing:
The City has provide information to those responsible for compliance--landowners, project designers, project developers, and contractors via the City's website and publications that are available at the City's Permit Center. In addition, City staff mailed out letters to existing stormwater treatment device owners, design engineers, and developers inviting them to attend one of two public outreach sessions designed to introduce the proposed Stormwater Ordinance Amendment and new maintenance requirements for owners of stormwater treatment devices. Sessions were held on August 6, 2009.

About 30 people attended the two public outreach sessions, staff also received in excess of 30 phone calls seeking further information on proposed maintenance requirement for stormwater BMP's. Once staff was able to give attendees and callers a clear background on the Clean Water Act and the City's MS4 permit, there seemed to be a willingness to comply with future maintenance requirements. The biggest concerns seemed to focus on how the whole process would work and what exactly they needed to do to be in compliance. Public Works Staff provided handouts, web addresses and phone numbers to staff that could help walk them through the process.

City stormwater representatives are always available to meet with landowners or consultants upon request. Formal trainings will be developed and scheduled for both City employees and other groups and individuals responsible for compliance in the sixth year of the permit.

Date: 7/1/2003 Responsible Party: Guy Howes, Senior Engineer

Public Participation/Involvement

The City must implement a minimum control measure (MCM) designed to engage and involve the regulated community in the development, implementation and periodic review of its stormwater management program. This MCM is intended to alleviate the legal challenges and the acceptance issues usually accompanying a newly implemented regulatory program. The Public Participation and Involvement Minimum Control Measure accomplishes this by providing the public an opportunity to play an active role in the stormwater management program, thereby creating ownership in the outcomes of the program.

The public can provide valuable input and support to a regulated small MS4's municipal stormwater management program. Therefore, inclusion of the public in the creation and stewardship of its stormwater management program is critical to the MS4. Public participation and involvement ensures broader public support since citizens who participate in the development and decision-making process are partially responsible for the success of the program and, therefore, they may be less likely to raise legal challenges to the program and more likely to take an active role in its implementation. Usually, shorter program implementation schedules are realized due to fewer obstacles in the form of public opposition and legal challenges. In addition, citizen volunteers provide increased resources to implement program components. Citizens can bring enhanced expertise and economic benefits to the program.

In addition, citizens can act as a conduit to other programs to provide important cross-connections and relationships with other community and government programs. This benefit is particularly valuable when trying to implement a stormwater program on a watershed basis, as encouraged by EPA.

Number of BMPs Associated with Control Measure: 4

Important Dates:

Earliest Start Date: 7/1/2003

End Date: 6/30/2008

PI-1: Stormwater Website

Responsible Party: Kelye McKinney, Engineering Manager
Start Date: 7/1/2003
End Date: 6/30/2008
Permit years scheduled for initial implementation:
Year 1 **X** Year 2 Year 3 Year 4 Year 5

Has Goal Been Accomplished: YES

General Summary

The City's stormwater website is an important aspect of its Public Involvement Program. The website provides an opportunity to keep the public updated on the stormwater program and offering a forum for educating the public on pollution prevention techniques. It also provides a way for the community to get involved in the program through feedback and the reporting of illicit discharges. The City has committed to:

a) Create Stormwater Content for Web Page

The City has agreed to develop stormwater pollution prevention content for the stormwater web page and post information as it becomes available.

b) Post Technical Assistance Documents

The City has agreed to post technical documents relating to the Construction Stormwater Runoff Minimum Control Measure (MCM), the New Development and Redevelopment MCM, and the Illicit Discharge Detection and Elimination MCM on the stormwater web page. To further assist the regulated community, the City has agreed to post documents relating to the City's policies and procedures pertaining to each MCM.

c) Provide for the Submittal of E-mails via the Web Page

The City has agreed to establish a link on the stormwater web page to allow the regulated community to submit comments regarding the program and to report illicit discharges and connections.

APPROPRIATENESS:

The stormwater website is an appropriate outreach mechanism for cost-effective public education. It provides an excellent conduit of information between the City and the residential and business communities.

EFFECTIVENESS:

The City has received numerous reports of illicit discharges via the website from the regulated community. The Stormwater Management Staff has responded to these reports and mitigated the non-stormwater discharge. In addition, the website provides a good mechanism to provide the public with detailed information regarding the program.

PROPOSED MODIFICATIONS:

None.

Status of Measurable Goals

PI-1.a: Create Stormwater Content for Web Page

Ongoing:
This minimum control measure has been accomplished. A web page for the stormwater program has been created and content has been posted. There are eleven pages including the stormwater home page under the Environmental Utilities Departments header. The “Meet Trina Trout” page introduces the public to the City’s stormwater mascot and includes information about Roseville’s native fish population in a fairy tale fashion. The “About Our Program” speaks to the regulatory structure and the history of the stormwater program. This page allows the public the opportunity to review the City’s Stormwater Management Program plan. The “Essential Business Tips” section provides the business community access to the stormwater ordinance and BMP fact sheets. Under the “Public Involvement Opportunities” section the community can sign up to install storm drain markers and reserve a charity car wash kit. The “Stormwater At Your Home” is aimed at the residential discharger and suggests ways to properly manage non-stormwater discharges generated by typical household activities. There is also a page for links to additional information from other stormwater programs and a page for the public to check on up-coming workshops and events. The SWMP continues to up-date the web page with new and pertinent information as necessary.

The Public Works Department also has a stormwater webpage that is up-dated regularly with information to the stormwater programs under their purview, Construction Stormwater Runoff and the New Development & Redevelopment program. To enable the public to access the post-construction best management manual, a link to Sacramento's Stormwater Quality Partnership was added to the stormwater website. The proposed revision of the City’s Stormwater Ordinance with the new post-construction BMP maintenance program requirements is also posted on the website for public review. A link to the State Water Resources Control Board's website for updates and workshops on the draft general construction permit was also added to the stormwater webpage.

Date: 7/1/2003 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

PI-1.b: Post Technical Assistance Documents

Ongoing:
Currently, there are more than a dozen "technical compliance" related documents posted on the website, either directly or by link. These resources provide public and regulated industries with information on topics such as the City policies and procedures, annual reporting, general/municipal permits, pollution prevention, stormwater compliance, required forms, BMPs, and industry specific issues.

Date: 7/1/2003 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

PI-1.c: Provide for the Submittal of E-mails Via the Web Page

Completed, No Change:
The "Contact Stormwater" page of the website provides several options for making contact with Stormwater Management staff. They are as follows:

Report a current stormwater-related incident:
Stormwater Hotline
(916) 746-1000

Contact the Stormwater Management Program
(916) 774-5751 or stormwater@roseville.ca.us"

All emails from the public were received during this reporting period were addressed by City staff.

See appendix for:
"Contact Stormwater" web page

Date: 7/1/2003 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

PI-2: Watershed Management

Responsible Party: Kelye McKinney, Engineering Manager
Start Date: 7/1/2004
End Date: 6/30/2008
Permit years scheduled for initial implementation:

Year 1	Year 2 **X**	Year 3	Year 4	Year 5

Has Goal Been Accomplished: YES

General Summary

The Watershed Management Program includes the development of several regional watershed management plans, including the Dry Creek Coordinated Resource Management Plan and the Pleasant Grove Creek Coordinated Management Plan. Although both these plans are being developed by Placer County, stakeholder coordination occurs through the Dry Creek Watershed Council (DCWC). The City has committed to:

a) Attend Dry Creek Watershed Council Meetings

The City has agreed to attend at least two DCWC meetings per year.

b) Support Efforts to Establish a Coordinated Resource Management Plan

The City has agreed to support all efforts to establish a Coordinated Resource Management Plan for the Pleasant Grove Creek watershed (PG CRMP).

c) Develop a Citywide Creek and Riparian Management and Restoration Plan

The City has agreed to develop a Citywide Creek and Riparian Management and Restoration Plan. This plan is to be directed at urban watershed issues unique to the City.

d) Support Pollution Prevention Programs

The City has agreed to actively promote water quality protection by co-sponsoring stormwater pollution prevention activities such as Creek Week cleanups and citizen monitoring programs.

APPROPRIATENESS:

The Watershed Management is a particularly appropriate best management practice in the stormwater management program. This BMP has tangible implications to the protection of the City's waterways. By supporting the City's Creek Restoration Plan and the Open Space Management Program, the Stormwater Management Program can have direct impact to the health of Roseville's creeks.

EFFECTIVENESS:

Anecdotal evidence (i.e. trash removal and fish barrier passage removal) points to a positive impact to the water quality of Roseville's creeks.

PROPOSED MODIFICATIONS:

None.

Status of Measurable Goals

PI-2.a: Attend Dry Creek Watershed Council Meetings

Ongoing:
Dry Creek Watershed Council meetings were attended on a monthly basis by the City's Parks and Recreation Department staff. Staff from other departments also attended meetings on an as needed basis depending on agenda topics.

Date: 7/1/2004 Responsible Party: Brian Castelluccio, Open Space Manager

PI-2.b: Support Efforts to Establish a Coordinated Resource Management Plan

No Change:
The City has supported efforts by Placer County to develop a Coordinated Resource Management Plan for Pleasant Grove Creek. This included attending and commenting on the Plan at Dry Creek Watershed Council meetings where the draft plan was discussed and debated. The City's Environmental Coordinator also served on the Technical Advisory Committee (TAC) for the Coordinated Resource Management Plan. This TAC provided direction on key issues during plan development.

The City continues to support the Pleasant Grove Creek Plan and other watershed planning efforts lead by the County by attending monthly meetings for the American Basin Council of Watersheds. This is a newly created watershed group with a regional emphasis and replaces the Dry Creek Watershed Council. The City's Open Space Division intends to remain engaged in these watershed processes by continuing to attend monthly American Basin Council of Watersheds meetings.

Date: 7/1/2004 Responsible Party: Brian Castelluccio, Open Space Manager

PI-2.c: Develop a Citywide Creek and Riparian Management and Restoration Plan

Completed, No Change:
The City's Creek and Riparian Management Plan was completed and approved by the City Council on June 1, 2005. This year the Plan was used as a guidance document for City programs and activities that occur within the creek zone.

Date: 7/1/2004 Responsible Party: Brian Castelluccio, Open Space Manager

PI-2.d: Support Pollution Prevention Programs

Ongoing:
Creek Week was again a focus of our support this year. The Stormwater Management Program and the Open Space Division participated in Dry Creek Conservancy's planning meetings for Creek Week, the City contributed resources to the week's restoration events and to the design and printing of the announcement flyer. The City also collected garbage and debris from the clean-up sites. The City also contributed funds through the Parks and Recreation Department to purchase t-shirts for clean-up day participants. The Stormwater Management Program also participated in the celebration event at Royer Park at the culmination of Creek Week.

We continue to collaborate with Dry Creek Conservancy (DCC) regarding water quality monitoring and restoration activities through out the year. This reporting period the City is partnering with the DCC to secure grant funding for creek awareness signs. This project will include the design and installation of signs at creek access points. Installation of the signs is scheduled for 2007.

Date: 7/1/2004 Responsible Party: Brian Castelluccio, Open Space Manager

PI-3: Public Body Updates

Responsible Party: Kelye McKinney, Engineering Manager

Start Date: 7/1/2003 End Date: 6/30/2008
Permit years scheduled for initial implementation:
Year 1 **X** Year 2 Year 3 Year 4 Year 5

Has Goal Been Accomplished: YES

General Summary

Providing updates on the stormwater program to the general public is another important step in both educating the public on the City's stormwater program and also offering a forum for public feedback. This BMP consists of providing periodic updates during Public Utilities Commission, Planning Commission, and City Council Meetings. The City has committed to:

a) Provide Public Body Updates

The City has agreed to provide two updates per year to the public regarding the activities conducted under the SWMP.

APPROPRIATENESS:

Public body updates are appropriate to the stormwater management program because they provide an opportunity for the City's governing bodies and the public in general to hear about the activities of the program and to comment on them.

EFFECTIVENESS:

This minimum control measure is an effective means of communicating to the City's decision makers. As with most Phase II program, the City's program is funding by the general fund. Therefore, the program must compete with other general fund activities such as emergency response and safety activities. It is important that the elected officials and the general electorate are acquainted with the goals and activities of the Stormwater Management Program when making funding decisions.

PROPOSED MODIFICATIONS:

None.

Status of Measurable Goals

PI-3.a: Provide Updates

No Change:
Due to the City's current economic status, City Council's and Public Utilities' agendas have been filled with urgent budgetary leaving no room for more routine up-dates such as the SWMP. Therefore, no up-dates were made this reporting period.

Date: 7/1/2003 Responsible Party: Kelye McKinney, Engineering Manager

PI-4: Storm Drain Labeling

Responsible Party: Kelye McKinney, Engineering Manager
Start Date: 7/1/2004
End Date: 6/30/2008
Permit years scheduled for initial implementation:

Year 1	Year 2 **X**	Year 3 **X**	Year 4 **X**	Year 5

Has Goal Been Accomplished: YES

General Summary

The Storm Drain Labeling program is aimed at raising the public's awareness of direct connection between the storm drain inlet and the receiving water it serves. It is presumed that once armed with this knowledge the public will be less likely to dump waste into the storm drains. The program is an effort to label all of the City's storm drains with a message alerting the public that water discharged to storm drains flows directly to creeks and streams. In addition to raising public awareness, the program provides an opportunity for local citizens and community service groups to get involved in the stormwater management plan. The City has committed to:

a) Label or Stencil Storm Drains

The City has agreed to label or stencil 200 storm drains per year in areas of existing development using community groups.

b) Evaluate Storm Drain Labeling Versus Stenciling

The City has agreed to evaluate the longevity and cost effectiveness of storm drain labeling versus storm drain stenciling that has been traditionally used in the past.

APPROPRIATENESS:

The storm drain labeling program is an appropriate way of continuously reminding the public of the connection between the storm drain inlets and the City's creek. In addition, it is important for the residential and business communities to realize the threat of non-stormwater discharges pose to the City's waterways.

EFFECTIVENESS:

The City has not performed a follow-up survey in a statistically significant manner to ascertain the effectiveness of the storm drain labeling program. Program staff often hears anecdotal accounts of the impact of the storm drain labels on prohibiting non-stormwater discharges.

PROPOSED MODIFICATIONS:

The City will continue to require that all storm drain inlets in new communities be labeled by the project proponent and will continue to solicit volunteers to assist with labeling efforts in the established communities.

Status of Measurable Goals

PI-4.a: Label or Stencil Storm Drains

Ongoing:
All newly constructed storm drain inlets are required under the City's Construction Standards to have the "Do Not Dump" message stamped into the adjacent concrete sidewalk. Therefore, storm drain markers are not installed at these new drain inlets.

The Stormwater Management Program continues implement a volunteer program to install rugged metal storm drain markers on existing storm drains. Unlike the painted stencils that wore away in less than two years, these new metal markers are expected to last 30 years or longer. The City provides the volunteer with all the necessary materials. The markers are installed using a metal fastener and adhesive glue. First a hole is drilled

in the concrete curb. Then, a metal sleeve is inserted in the hole. Next, adhesive is applied to the back of the marker. Finally, the marker is secured to the concrete by driving a nail through a pre-drilled hole in the marker into the metal sleeve below.

At the on-set of the program, there were approximately 5,500 publicly-held and 1,000 privately-owned storm drains in need of labeling; over 4,350 markers have been installed over the six years this permit has been in effect. Volunteers have installed approximately 3,500 of these markers. However, to provide for the safety of the City volunteers, City crews install markers at approximately 850 of the inlets located on busy streets where traffic control is required. There are approximately 1,000 unmarked drains remaining in the public right of way and a commensurate number in private subdivisions. The Stormwater Management Program will continue to solicit volunteers to label the remaining unmarked drains.

Volunteers installed more than 550 storm drain markers during this reporting period. During the first quarter, two individual Eagle Scout projects accounted for the installation of approximately 320 markers on existing unlabeled storm drain inlets in Roseville. The remaining 230 markers were installed by a single volunteer. Due to the use of power tools and the City's risk management stipulations, the number of volunteers that meet these requirements are limited.

See appendix for:
Storm drain marker pictures (in PO-1.f appendix)
Map of labeled storm drain inlets '08-'09
Map of labeled storm drain inlets to date (in PO-1.f appendix)

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

PI-4.b: Evaluate Storm Drain Labeling Versus Stenciling

Completed, No Change:
The Stormwater Management Program conducted an anecdotal study at the beginning of the permit term to determine the durability and effectiveness of stenciling storm drains. It was found that the painted stencil wore off in 12 to 18 months and it was presumed that the paint went down the storm drain. Therefore, it was determined that stenciling is an unacceptable method of storm drain labeling and it was replaced by a new method; stainless steel storm drain discs, which have and estimated life span of 30 years.

During the 06-07 reporting period, City staff developed a pilot study that involved the installation of 500 of these new storm drain markers. Approximately, half (220) of the markers were to be installed using adhesive only and the rest (280) were installed using a nail and the adhesive. The markers were evaluated for their overall durability and their rate of removal.

The markers were installed an Eagle Scout project by a Boy Scout volunteer. He installed a total of 500 markers. Approximately two hundred and eighty (280) of them were installed using adhesive and two hundred twenty (220) were installed using adhesive and a nail. City staff performed a spot check to verify proper installation of the markers. The Eagle Scout also provided an electronic spreadsheet delineating the location and the type of materials used to install each marker. Approximately four hundred and ninety six markers remained in place and in good condition with all the writing legible over one year after installation. The four markers that were removed were installed using adhesive only, so the Stormwater Management Program has decided use a nail and adhesive to install the markers in the future.

See appendix for:
Storm drain marker pictures (in PO-1.f appendix)
Map of initial storm drain marker pilot area (in PO-1.f appendix)

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

Illicit Discharge Detection and Elimination

The IDDE Program is intended to identify and eliminate all discharges and connections to the Small Municipal Separate Storm Sewer Systems (MS4) that are not composed entirely of stormwater, except for discharges allowed under a National Pollutant Discharge Elimination System (NPDES) permit, authorized non-stormwater discharges or emergency fire fighter flows.

IDDE-1, detecting illicit/non-stormwater discharges, and IDDE-5, utilizing existing City programs, were the focus of the program's first permit year 2003/2004. The goal of IDDE-1 is to detect illicit/non-stormwater discharges by incorporating stormwater pollution prevention in the activities of both City personnel and the public. IDDE-1 is also meant to increase public awareness. The goal of IDDE-5 is inform public employees, businesses, and the general public of environmental impacts associated with illicit discharges.

The minimum control measures, IDDE-2, address/eliminate illicit connections and non-stormwater discharges, IDDE-4, stormwater ordinance, and IDDE-6, long-term outreach were implemented in the 2004/2005-permit year. The goal of IDDE-2 is to address or eliminate illicit connections and non-stormwater discharges. This includes instituting policies and procedures for their detection, providing technical guidance for staff, enacting proper enforcement, and improving spill response and cleanup activities.

IDDE-3, storm sewer system map was not assigned a specific implementation schedule. The City already developed a storm sewer map prior to receiving its stormwater NPDES permit from the State and the implementing the Stormwater Management Program. Therefore, under IDDE-3, the City's storm sewer map will be continually updated and refined over the entire permit term.

Discharges from MS4s often contain discharges from non-stormwater sources. Significant portions of these dry-weather flows are from illicit and/or inappropriate discharges and connections to the MS4. Illicit discharges may enter the system through either a direct connection (e.g., wastewater piping either mistakenly or deliberately connected to the storm drains) or an indirect connection (e.g., infiltration into the MS4 from cracked sanitary systems, spills collected by drain outlets, or pollutants such as paint or used oil dumped directly into a drain). The result is untreated discharges that contribute high levels of pollutants, including heavy metals, toxics, oil and grease, solvents, nutrients, viruses, and bacteria to receiving water bodies. Pollutant levels from these illicit discharges have been shown in EPA studies to be high enough to significantly degrade receiving water quality and threaten aquatic, wildlife and human health.

Number of BMPs Associated with Control Measure: 6

Important Dates:

Earliest Start Date: 7/1/2003

End Date: 6/30/2008

IDDE-1: Illicit/Non-Stormwater Discharge Detection

Responsible Party: Kelye McKinney, Engineering Manager
Start Date: 7/1/2003
End Date: 6/30/2008
Permit years scheduled for initial implementation:
Year 1 **X** Year 2 Year 3 Year 4 Year 5

Has Goal Been Accomplished: YES

General Summary

The Illicit/Non-Stormwater Discharge Detection program involves inspection of discharge sources throughout the City that may contribute pollutants to the City's creeks such as businesses and outfalls. This BMP is targeted towards commercial and industrial facilities, businesses, residential neighborhoods, construction sites, and municipal facilities. The program also includes a means of responding to these illicit discharges and a means of enabling citizens to report illicit discharges. The City has committed to:

a) Perform Inspections

The City has agreed to incorporate a stormwater component into the Fire Department's existing hazardous materials/waste inspection program. While on-site, fire inspection staff reviews operating procedures at businesses throughout the City with the intent of locating and curtailing illicit discharges. The City committed to a minimum of 250 inspections per year.

b) Create Spill Response Procedure

The City has agreed to create a procedure to respond to illicit discharges that coordinates the City's response programs with the stormwater program to report location, frequency, and number of spills.

c) Create a Means of Enabling Citizen Reporting

The City has agreed to expand the City's website and create a hotline to provide for citizen reports of observed illicit stormwater discharges.

d) Review Site and Building Plans for Possible Illicit Connections

The City has agreed to review all site and building plans to detect and mitigate illicit connections and places where illicit discharges are most likely to occur.

e) Provide Annual Training to Appropriate City Departments and Staff

The City has agreed to provide annual training to the Streets, Water, Wastewater, Parks, Fire, and Police Departments as well as to Utility Meter Readers and other appropriate personnel to observe and report illicit discharges and connections while performing their normal field duties.

f) Assess Dry Weather Flows

The City has agreed to commit two full-time equivalent staff from EU and/or Public Works to perform visual or chemical monitoring one day per month during the dry weather season (May-October).

EFFECTIVENESS:

By performing inspections at commercial and industrial facilities and responding to illicit discharge complaints, the City's Stormwater Management Program is able to reduce the number of non-stormwater discharges that reach the local creeks. In addition, both of these activities provide opportunities to educate the residential and business communities about the impacts of non-stormwater discharges to local waterways. Overall, this minimum control measure's effectiveness outcome is at a level 4 reducing loads from sources.

PROPOSED MODIFICATIONS:

None.

Status of Measurable Goals

IDDE-1.a: Perform Inspections

Ongoing:
The City's Fire Department inspected a total of 335 businesses for illicit stormwater discharges. These inspections are conducted as a component to the Fire Department's Unified Program for hazardous materials storage and hazardous waste generators. As a result of these inspections, ten (10) unauthorized discharges from businesses were mitigated and three (3) discharges emanating from residential properties were abated. These discharges were addressed by the Fire Department via a written warning on their inspection report and follow-up work. BMPs were recommended at 3 business sites. The Fire Department refers stormwater dischargers requiring in-depth assistance with BMP implementation to the Stormwater Management Program (SMP) for follow-up.

The Stormwater Management Program (SMP) has developed an enforcement policy and procedures to allow for the issuance of penalties for non-stormwater discharges. Under the City's stormwater ordinance, a city representative may issue an infraction citation or a compliance order for violations. An infraction citation is issued for one-time discharges while a compliance order is for on-going discharges. The enforcement policy specifies the steps SMP staff must take to issue an enforcement action. Upon finding a violation of the stormwater ordinance, SMP staff will require the discharger to cease the discharge and issue a Notice of Non-Compliance in cases of on-going discharges. In addition, the discharger will be required to submit an Action Plan that delineates BMPs that the dischargers will implement to mitigate the discharge in the future and the timeframe of their implementation. SMP staff will review and comment on the proposed BMPs and forward the plan on to other affected City departments for their comment as well if necessary. SMP staff will also inspect the facility after the proposed BMP implementation date to verify installation and BMP effectiveness. If the BMP is deficient in either of these areas, then SMP will issue a Compliance Order. This Order reiterates the requirements of the Notice of Non-Compliance with new compliance dates. A city issued Compliance Order carries a monetary penalty of $50 to $500 a day retroactive to the day of issuance for non-compliance. The average compliance term is thirty days in length. If the dischargers fails to implement effective BMP as delineated in the action plan within the timeframes specified by the Compliance Order monetary penalties may be assessed. In addition, the discharger may request a hearing before the City's hearing panel if the requirements and penalties of the Compliance Order are contested.

Effectiveness
Performing inspections at business facilities has shown a level 4, reducing loads from sources, during this reporting period.

Date: 7/1/2003 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

IDDE-1.b: Create Spill Response Procedure

Completed, No Change:
During the '05-'06 reporting period, a spill response procedure was created for all incidents reported via 911, the city's stormwater hotline, the Stormwater Management Program (SMP) office number, and the Stormwater website email. A flow chart of the response procedure indicates the appropriate responder for each of the following categories: known substances with no personal protective equipment (PPE), hazardous materials or unknowns, and wastewater. The Environmental Utilities Department will respond to service requests that involve known substances or sanitary sewer overflows. The Fire Department will respond to incidents that involve hazardous materials or unknowns. Public Works Department will respond to service requests that involve construction sites. The City's Streets Division will provide mutual aid to all City departments in the event

clean up of the stormwater conveyance system is necessary.

The Stormwater Management Program created a more detailed Incident Response Procedure for City responders during the 06-07 reporting period. This procedure defines responsibilities and appropriate notifications once SMP receives notification of an incident. It describes the steps that SMP will follow when City Fire refers a discharger to SMP for enforcement or compliance assistance. It also defines the steps to determine the type of spill (hazardous vs. non-hazardous) and which department with clean-up oversight responsibility. SMP budgeted a modest amount to pay for the clean up of both types spills when a responsible party cannot be identified. Provisions have also been made for cost recovery from the discharger where appropriate.

The Stormwater Program developed an incident report form to document the details of the discharge and the enforcement actions taken by EU staff at each event. Each incident is then logged into the Hansen and GIS databases for tracking, trending and reporting purposes.

SMP worked with staff from the City's Wastewater and Streets Departments during the '07-'08 reporting period to identify possible disposal options for waste streams generated as a result of a spill on public property.

Effectiveness
Creating spill response procedures has shown a level 4, reducing loads from sources, during this reporting period.

Date: 7/1/2003 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

IDDE-1.c: Create Means of Enabling Citizen Reporting

Completed, No Change:
As of April 2005, Roseville citizens have been able to report illicit discharges to the City's Stormwater Hotline (916-746-1000). The hotline number has been posted on the website for widespread reference. Additionally, it is promoted in print through the distribution of public outreach materials such as the Trina Trout magnets.

The stormwater hotline is located at the City's emergency dispatch center. This allows for a central intake of calls 24 hours a day 7 days a week. Additionally, this set up provides for the dispatch of emergency personnel in the event of a hazardous materials spill.

Roseville residents may also report illicit discharges and request information about the program through the contact us link on the stormwater webpage.

Effectiveness
Creating a means of enabling citizen reports of illicit discharges has shown a level 1, documenting activities, during this reporting period.

Date: 7/1/2003 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

IDDE-1.d: Review Site and Building Plans for Possible Illicit Connections

Ongoing:
The plan check staff of the City's Public Works and Environmental Utilities Engineering Divisions review building site plans for potential illicit connections to the stormwater conveyance system such as decorative fountains and swimming pool connections. The Public Works Engineering and Building Division plan to work together to review civil site plans and building plans to eliminate the occurrences of illicit connections. The Stormwater Management Program also coordinates with Environmental Utilities' plan check staff to identify potential illicit connections and possible illicit discharge points.

Effectiveness
Reviewing site and building plans for illicit connections has shown a level 4, reducing loads from sources, during this reporting period.

Date: 7/1/2003 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

IDDE-1.e: Provide Annual Training for Appropriate City Departments and Staff

Ongoing:

Per the specifications of the Municipal Operations Minimum Control Measure (BMP MO-4), City staff is trained on the specifics of the Stormwater Management Program including the definition of an illicit discharge and how to report a discharge to the proper authorities. Staff from the Wastewater and Water Department was given a refresher course (2/12/09 and 2/11/09 respectively). These trainings were also tailored to each group's specific activities and include specific BMPs to prevent prohibited discharges to the storm drain system.

An increase in prohibited stormwater discharge reports from City employees indicates the trainings have raised the awareness of City employees.

See Appendix:
Power Point Presentation for Water Division (In MO-4.a appendix)
Power Point Presentation for Wastewater Division (in MO-4.a appendix)

Effectiveness
Providing annual training for appropriate City departments has shown a level 2, raising awareness, during this reporting period. The Stormwater Program receives the majority of illicit discharge notifications from City staff that are routinely in the field. This is a direct result of the increase awareness of staff of the nature of an illicit discharge.

Date: 7/1/2003 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

IDDE-1.f: Assess Dry Weather Flows

Ongoing:
During the 2008 dry season weekly outfall evaluations were performed. Two stormwater program staff members spent a full day each evaluating stormwater outfalls for discharges to the receiving waters. During the month of May 2008, no outfalls were evaluated due to equipment failure. Beginning in June 2008, dry weather outfall evaluations were scheduled once per month due to staffing limitations. In order to make up the lost time, the stormwater outfalls were evaluated twice during the month of July 2008. This will be reflected in the 08/09 Annual Report. Evaluation dates and number of outfalls observed were as follows:

Evaluation Date	Number of outfalls
7/30/2008	7
7/31/2008	9
8/27/2008	15
8/28/2008	4
9/26/2008	8
9/30/2008	19
6/23/2009	15
6/25/2009	16
6/30/2009	8
Total	101

The data collected include condition of outfall and surrounding area, equipment accessibility, illicit discharges, digital photograph and GPS location.

Effectiveness
Assessing dry weather flows for illicit discharges has shown a level 4, reducing loads from sources, during this reporting period.

See appendix for:
Map of outfalls evaluated

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

IDDE-2: Address/Eliminate Illicit Connections and Non-Stormwater Discharges

Responsible Party: Kelye McKinney, Engineering Manager

End Date: 6/30/2008

Start Date: 7/1/2004

Permit years scheduled for initial implementation:

Year 1 Year 2 **X** Year 3 Year 4 Year 5

Has Goal Been Accomplished: YES

General Summary

This program is intended to address or eliminate illicit connections and non-stormwater discharges detected in IDDE-1. The program includes two general activities, investigation and enforcement. The City has committed to:

a) Create New Investigation Procedures

The City has agreed to create new investigation procedures to address and track illicit discharges and connections.

b) Create Enforcement Procedures

The City has agreed to conduct annual training for enforcement staff to help eliminate illicit discharges. The City has also agreed to develop and implement different levels of enforcement actions such as: a warning citation, Notice of Violation (NOV), Cease & Desist, administrative fines, and possible referral to the District Attorney.

c) Enhance existing spill response activities to include the cessation and remediation of illicit/non-stormwater discharges,

The City has agreed to enact through local ordinance the means to improve stormwater discharge response by including the means to cease and remediate non-stormwater discharges.

EFFECTIVENESS:

Addressing illicit connections and non-stormwater discharges is an effective way to improve water quality in the City's creeks. By mitigating the discharge points of various non-stormwater discharges the pollutant load on local waterways is reduced thereby rendering a level 4 effectiveness outcome, reducing loads from sources.

PROPOSED MODIFICATIONS:

None.

Status of Measurable Goals

IDDE-2.a: Develop Policy to Address Illicit/Non-Stormwater Discharges and Connections

Completed:
On July 7, 2006, the Roseville Municipal was amended to include Chapter 14.20 of Title 14, the "Urban Stormwater Quality Management and Discharge Control Ordinance" The development of new policy pertaining to illicit/non-stormwater discharges and connections has been tied to the adoption of new Roseville Stormwater Ordinance.

The Stormwater Management Program (SMP) also developed an enforcement policy that allows for the issuance of penalties for non-stormwater discharges. Under the City's newly adopted stormwater ordinance, a city representative may issue an infraction citation or a compliance order for violations. The Stormwater Management Program may issue an infraction citation for one-time discharges or a compliance order for on-going discharges. This enforcement policy specifies the steps required to issue an enforcement action. Upon finding a violation of the stormwater ordinance, SMP staff will require the discharger to cease the discharge and issue a Notice of Non-Compliance in cases of on-going discharges. In addition, the discharger will be required to submit an Action Plan that delineates BMPs that the dischargers will implement to mitigate the discharge and the timeframe of their implementation. SMP staff reviews and comments on the proposed BMPs and distributes the plan to other affected City departments for their comment. SMP staff also inspects the facility after the proposed BMP implementation date to verify BMP installation and effectiveness. If the BMP is deficient in either of these parameters, then SMP will issue a Compliance Order. This Order reiterates the requirements of the Notice of Non-Compliance with new compliance dates. A city issued Compliance Order carries a monetary penalty of $50 to $500 a day retroactive to the day of issuance for non-compliance. The average compliance term is thirty days in length. If the dischargers fails to implement effective BMP as delineated in the action plan within the timeframes specified by the Compliance Order monetary penalties may be assessed. In addition, the discharger may request a hearing before the City's hearing panel if the requirements and penalties of the Compliance Order are contested.

Effectiveness
Developing policy to address illicit discharges and connection has shown a level 1, documenting activities, during this reporting period.

Date: 7/1/2003 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

IDDE-2.b: Develop Monitoring Guidelines for Inspection Staff

Completed:
Outfall monitoring criteria for the detection and elimination of illicit discharges has been developed in conjunction with the City's weekly dry weather monitoring. An "Illicit Discharge & Detection Elimination" form was created to document and report findings. Staff performs See IDDE-1.f for dates and other information regarding outfall monitoring.

Effectiveness
Developing monitoring guidelines for inspection staff has shown a level 1, documenting activities, during this reporting period.

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

IDDE-2.c: Enhance Existing Spill Response Activities to Include the Cessation and Remediation of Illicit/Non-stormwater Discharges

Ongoing:
In order to effectively apply the mandates of the stormwater ordinance, the City has developed incident response and tracking procedures. Incidents coming into the Environmental Utilities Department via the website, hotline, or City staff are routed via an incident report form to a staff member for immediate response. Staff then travels to the discharge location. Once on site, the discharger is direct to stop the discharge and, based on the nature of the discharge, the discharger is given information on alternative disposal methods and BMP implementation. If necessary, a follow-up visit is made to the site to verify compliance.

Hard copy documentation is maintained on each incident. Pertinent information for each incident such as location and discharge type is also logged electronically in a Hansen database along with a narrative. Incidents are also entered into a GIS database. This allows for incident tracking and categorization to detect trending in discharge types and location. Associated enforcement actions are also tracked in this database.

During this reporting period, July 1, 2008 through June 30, 2009, the Environmental Utilities Department responded to a total of one hundred and seven (107) discharge incidents during this reporting period. These discharges are broken into the following discharge types:

Incident Response 08/09

Discharge Type	Number
Chemical	0
Concrete	10
Dirt/Sediment	17
Food Waste	3
Landscape Debris	4
Miscellaneous	13
Paint	1
Pesticide / Fertilizer	0
Pet Waste	3
Pool Discharge	22
Trash	1
Wash Water	18
Waste Oil/Petroleum Hydrocarbons	15
Total	**107**

This incident data aids in the development of outreach and education programs for the residential and business communities. This will assist the Stormwater Management Program in formulating a long-term outreach program.

The Stormwater Management Program has created a permitting program to regulate the discharge of non-chlorinated residential swimming pool water to the stormwater conveyance system. Residential swimming pool water that contain contaminates or is not dechlorinated is discharged to the sanitary sewer and a volume-based treatment fee is assessed. All swimming pool water from non-residential sources is also discharged to the sanitary sewer. A specialist from the program responds to each request to discharge residential pool water and tested the water to verify that chlorine is not detected.

Effectiveness
Enhancing existing spill response activities to include the cessation and remediation of illicit discharges has shown a level 4, reducing loads from sources, during this reporting period.

See appendix for:
Incident map
Incident log
Pool permit map and table

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

IDDE-3: Storm Sewer System Map

Responsible Party: Kelye McKinney, Engineering Manager
Start Date: 7/1/2003
End Date: 6/30/2008
Permit years scheduled for initial implementation:
Year 1 **X** Year 2 Year 3 Year 4 Year 5

Has Goal Been Accomplished: YES

General Summary

Mapping the storm sewer system is important to stormwater management because it provides the locations of all the outfalls that drain into the City's creeks and the name of the U.S. receiving water each outfall discharges into. Mapping the storm sewer system and the outfalls can be beneficial in helping the City to maintain the outfalls and search for any illicit discharges entering the creeks. The City has committed to:

a) Update the City's Storm Sewer Map

The City has agreed to update the storm sewer map, including the location of all outfalls and the name and location of the waters of the U.S. that receive discharges from the outfalls.

EFFECTIVENESS:

The updated City Storm Sewer map is an effective tool for the Stormwater Management Program. It aids in tracing the path an illicit discharge may take as it makes its way to the receiving water. Staff uses the map to track and abate illicit discharges. However, this activity has a level 1, documenting activities, outcome in that this minimum control measure merely documents where the stormwater conveyance infrastructure is located and is only a tool to prevent stormwater discharges.

PROPOSED MODIFICATIONS:

None.

Status of Measurable Goals

IDDE-3.a: Update City's Storm Sewer Map

Ongoing:
The City continues to up-date its storm sewer map using a Global Positioning System device to refine the accuracy of the mapped outfalls and to add unmapped outfalls and infrastructure to the map. This update of the stormwater map is performed in conjunction with the City's dry weather outfall monitoring program.

Dates and number of outfalls observed and mapped during the dry season were as follows:

Evaluation Date	Number of outfalls
7/30/2008	7
7/31/2008	9
8/27/2008	15
8/28/2008	4
9/26/2008	8
9/30/2008	19
6/23/2009	15
6/25/2009	16
6/30/2009	8
Total	101

The data collected include condition of outfall and surrounding area, equipment accessibility, illicit discharges, digital photograph and GPS location. This information is forwarded on to the Environmental Utilities Mapping Section which maintains the City's comprehensive stormwater conveyance system map.

Appendix:
CD of new stormwater outfalls (in back of appendices)

Date: 7/1/2003 Responsible Party: Roy VanNess, Mapping Manager

IDDE-4: Stormwater Ordinance

Responsible Party: Kelye McKinney, Engineering Manager
Start Date: 7/1/2004
End Date: 6/30/2008
Permit years scheduled for initial implementation:

Year 1	Year 2 **X**	Year 3	Year 4	Year 5

Has Goal Been Accomplished: YES

General Summary

Roseville Municipal Code Section 14.12.025, Storm Drains, states that it is unlawful to discharge any illicit waste, discharge, or garbage into any storm drain. Using this existing ordinance as a basis, the City plans to create a separate stormwater ordinance. Creating a stormwater ordinance is important to the stormwater management program because it provides guidelines for inspection of facilities that may discharge to the storm sewer system and enforcement of any discharge violations. The City has committed to:

a) Create a Stormwater Ordinance

The City has agreed to create a comprehensive stormwater ordinance that addresses the following:

1) Prohibition of discharges to the storm drains other than stormwater or authorized non-stormwater discharges, or a cross-reference to an existing discharge prohibition ordinance.

2) Prohibition of unauthorized connections to the storm drain system, with a requirement to eliminate or secure approval for any non-stormwater connection.

3) Right of access for inspections and monitoring of facilities suspected of illicit discharges and connections.

4) Cross-reference to the State's General Permit for industrial and construction stormwater discharges.

5) Requirements and procedures for notification of spill and emergency response

6) Enforcement procedures, e.g., NOV, public nuisance, and public hearing

7) Remedies, e.g., recovering the cost of abatement, monetary penalties, and suspension of storm drain service

EFFECTIVENESS:

The Stormwater Management Program has used the criteria specified by the City's stormwater ordinance to effectively curtail stormwater discharges from businesses and residential properties thereby lessen the pollutant load on the City's receiving waters. However, this minimum control measure is just a tool to prevent illicit stormwater discharges. Therefore, it has a level one, documenting activities, outcome of its adoption and periodic updates.

PROPOSED MODIFICATIONS:

None.

Status of Measurable Goals

IDDE-4.a: Create Stormwater Ordinance

Completed:
On July 7, 2006, the Roseville Municipal Code was amended to include Chapter 14.20 of Title 14, the "Urban Stormwater Quality Management and Discharge Control Ordinance." This best management practice has been accomplished.

However, the Stormwater Ordinance is currently under revision with provisions to provide for the permitting and maintenance requirements of post-construction best management practices as required by Attachment 4 of the General MS4 Permit.

See appendix for:
Draft Revisions of Chapter 14.20 of Title 14 Roseville Municipal Code, Urban Stormwater Quality Management and Discharge Control Ordinance

Effectiveness
Creating a stormwater ordinance has shown a level 1, documenting activities, during this reporting period.

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

IDDE-5: Utilize Existing Programs

Responsible Party: Kelye McKinney, Engineering Manager
Start Date: 7/1/2003
End Date: 6/30/2008
Permit years scheduled for initial implementation:
Year 1 **X** Year 2 Year 3 Year 4 Year 5

Has Goal Been Accomplished: YES

General Summary

This program is meant to inform employees, businesses, and the general public of hazards to water quality associated with illicit discharges by including stormwater information in appropriate existing outreach programs. The City has committed to:

a) Publish Stormwater Articles

The City has agreed to include articles addressing stormwater impacts and the new Phase II program in the Roseville Reflections and Environmental Utilities Today newsletters.

b) Add Stormwater Information to Inspection Programs

The City has agreed to add stormwater specific information to the Water Conservation, Fire Department inspection and Neighborhood Services programs and utilize their existing media for disseminating information. In addition, the City will add stormwater specific information to the education and outreach materials of the City's existing programs that do not involve inspections such as Household Hazardous Waste, Used Oil Drop-Off, Compost Bin, Dog Park, and Creek Week activities.

c) Utilize Educational Signs

The City has agreed to install two stormwater information education signs at Mahany Park.

d) Develop and Implement Creekside Land Owner Education

The City has agreed to educate creekside landowners through the Citywide Creek and Riparian Management and Restoration plans.

e) Expand City Stormwater Web Page

The City has agreed to expand the City's Stormwater Web Page to include information on illicit discharges and other stormwater issues.

f) Implement Storm Drain Stenciling

The City has agreed to implement storm drain labeling through the requirements for concrete stamping in the City's Construction Standards for new development and storm drain stenciling by citizen volunteers for existing development.

EFFECTIVENESS:

It is an effective use of City resources to disseminate information regarding the City’s Stormwater Management Program using existing City programs. The cost to the City of those outreach programs would be the same whether a stormwater message was included or not.

PROPOSED MODIFICATIONS:

None.

Status of Measurable Goals

IDDE-5.a: Publish Stormwater Articles

Ongoing:
Three stormwater articles were published in the Environmental Utilities Today newsletter. Two articles entitled *Front Yard Leaf Pick-Up Program* and *Living Green* were published in the October 2008 issue. Three more articles entitled *Creek Week 2009*, *Drought Requires Creek Awareness* and *Creek-Friendly Landscaping Events* were published in the April 2009 issue. The June 2009 edition of EU Today ran two article pertaining to stormwater quality titled *Creating a Rain Garden* and *Creek Alert*. The "EU Today" newsletter is distributed to 35,000 Roseville residents. It is mailed out as an insert in the residential utility bill. It is also availability on most public counters in City buildings. Due to budgetary constraints, the City no longer produces the Roseville Reflections newsletter.

The City's website is up-dated periodically to include new issues of the "EU Today" and Roseville Reflections newsletters which contain aforementioned articles. To access these newsletters go to the City's website at www.roseville.ca.us under the heading of "Most Visited," go to Newsletters.

The City's Stormwater Program continues to partner with Our Water Our World to bring information regarding integrated pest management to the public. The City has sponsored two literature racks at two retail landscape nurseries: Green Acres and Sierra Nursery. A new nursery, Bushnell's on Douglas Blvd, was added to the list during this permit term. Each rack holds approximately 24 individual fact sheets relating to specific pest management problems.

Effectiveness:
Including articles on stormwater impacts has shown a level 2, Raising Awareness, outcome during this reporting period.

See appendix for:
Copy of EU Today Articles (in PO-1.a appendix)

Date: 7/1/2003 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

IDDE-5.b: Add Stormwater Information to Inspection Programs

Ongoing:
The City's Fire Department continues to inspect businesses for illicit stormwater discharges. These inspections were conducted as a component to the Fire Department's hazardous materials business plan and hazardous waste generator inspections. As a result of these inspections, a total of ten (10) unauthorized discharges from residential and business sources were observed and BMPs were recommended at three (3) business sites The Fire Department refers stormwater dischargers requiring significant assistance with BMP implementation to the Stormwater Management Program (SMP) for follow-up and further site review.

The Stormwater Program has created a series of Best Management Practices (BMP) fact sheets tailored to industrial/commercial dischargers. All together, there are nine fact sheets for nine specific industries; auto body repair, auto repair, landscapers, painting contractors, pool contractors, power washers, ready mix concrete suppliers, rental yards and the food service industry. These business categories were selected due to the fact that they generally represent the most prevalent discharge types encountered in the illicit discharge detection and elimination program. When combined, these fact sheets will serve as the City's Industrial/Commercial BMP Manual as referenced by the City's Stormwater Ordinance. These fact sheets will be distributed during inspections or at discharge incidents as necessary.

Effectiveness:
Adding stormwater information to existing inspection programs has shown a level 3, Changing Behavior, outcome during this reporting period. By distributing information to the business community on the impacts to receiving waters of illicit stormwater discharges and BMP implementation, the City has seen industrial/commercial businesses change the way they handle their wastes.

See appendix for:
BMP Fact Sheets
- Auto Body Repair
- Auto Repair
- Landscaping
- Painting
- Pool Contractors
- Power Washing
- Ready Mix Concrete Suppliers
- Rental Yards
- Food Service

Date: 7/1/2003 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

IDDE-5.c: Utilize Educational Signs

Completed, No Change:
Two signs, incorporating the Trina Trout mascot, were installed at Mahany Park during the 2005-2006 reporting period. These signs read, "Hi! I'm Trina Trout. This is Kaseberg Creek. Roseville's creeks and fields are home to me, and all my furry and feathered friends. Please keep our home clean by tossing your trash in this can. Thank you, Stormwater Management Program." These signs are located at a creek bridge that is heavily traveled by pedestrians accessing both sides of the Park. This bridge is located behind Mahany Center and is part of the City's bike trail system.

Effectiveness:
Utilizing educations signs has shown a level 2, Raising Awareness, outcome during this reporting period. There have been anecdotal comments made to the staff of Mahany Park facilities regarding the Trina Trout signs.

Date: 7/1/2003 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

IDDE-5.d: Develop and Implement Creekside Land Owner Education

Completed, No Change:
The "Roseville Creek Awareness Map" and the "Roseville Creek Stewardship Resource Guide" were updated to conform to City's outreach standards during the 2005-2006 reporting period. Seventeen hundred and fifty of the "Roseville Creek Awareness Map" and five hundred of the "Roseville Creek Stewardship Resource Guides" were printed. The Creek Awareness Map is designed to be a wall poster and a brochure. The Stewardship Resource Guide is designed to be a tri-fold. Both discuss the City's Stormwater Management Program and its implications to activities in the residential community.

In addition, the City's newly created Open Space Division created an Open Space brochure during the 07-08 reporting period. This Division lies within the City's Parks Department and is responsible for managing the City's 4,000 acres of open space. Much of this land lies immediately adjacent to the City's creeks. The Open Space brochure was intended for distribution to the landowners immediately adjacent to the open space. The Stormwater Management Program contributed to this brochure with tips regarding the proper management of non-stormwater discharges.

Effectiveness:
Develop and implement creekside land owner education has shown a level 2, Raising Awareness, outcome during this reporting period.

Date: 7/1/2004 Responsible Party: Brian Castellucio, Open Space Manager

IDDE-5.e: Expand City Stormwater Web Page

Ongoing:
The City's Stormwater website is updated periodically to provide both the residential and business communities with the most recent information on the City's Stormwater Management Program. During this permit term, the new links for volunteer information were added to the Public Involvement Opportunities section. Links to the newly developed Industrial/Commercial BMP fact sheets were added to the Essential Business Tips section

during this reporting period. The Up-coming Events and Workshops section was also up-dated with the program's schedule of outreach events.

Public Work's also up-dated their stormwater webpage with information pertaining to the Construction Stormwater Runoff Program and the New Development & Redevelopment Program. The new information included the proposed Stormwater Ordinance changes for the Stormwater Quality Maintenance Program.

Effectiveness:
Expanding the City's Stormwater web page has shown a level 2, Raising Awareness, outcome during this reporting period.

See appendix for:
Website up-dates (in PO-1.e appendix)

Date: 7/1/2003 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

IDDE-5.f: Implement Storm Drain Stenciling

Ongoing:
Over the course of the permit term, the City has ceased to use storm drain stenciling to label existing storm drains instead the city uses stainless steel markers. These markers stating "No Dumping Flows to Creek" to the concrete immediately adjacent to the storm drain inlet. These markers have a 30-year life span and are a viable replacement for painted stencils, which tend to wear off within a year or two. The markers are fastened directly to the concrete using adhesive and a nail. This increases the resistance of the marker to wear and tear and vandalism. It is a highly effective method of marking existing storm drains.

The Stormwater Management Program continues implement a volunteer program to install rugged metal storm drain markers on existing storm drains. Unlike the painted stencils that wore away in less than two years, these new metal markers are expected to last 30 years or longer. The City provides the volunteer with all the necessary materials. The markers are installed using a metal fastener and adhesive glue. First a hole is drilled in the concrete curb. Then, a metal sleeve is inserted in the hole. Next, adhesive is applied to the back of the marker. Finally, the marker is secured to the concrete by driving a nail through a pre-drilled hole in the marker into the metal sleeve below.

At the on-set of the program, there were approximately 5,500 publicly-held and 1,000 privately-owned storm drains in need of labeling; over 4,350 markers have been installed over the six years this permit has been in effect. Volunteers have installed approximately 3,500 of these markers. However, to provide for the safety of the City volunteers, City crews install markers at approximately 850 of the inlets located on busy streets where traffic control is required. There are approximately 1,000 unmarked drains remaining in the public right of way and a commensurate number in private subdivisions. The Stormwater Management Program will continue to solicit volunteers to label the remaining unmarked drains.

All newly constructed storm drain inlets are required under the City's Construction Standards to have the "Do Not Dump" message stamped directly into the adjacent concrete sidewalk. Therefore, a storm drain marker will not be installed at these new drain inlets.

Effectiveness:
Implementation of a storm drain labeling program at a minimum has been at level 1, Documenting Activities, outcome during this reporting period.

See appendix for:
Current map of installed storm drain markers (In PO-1.f appendix)

Date: 7/1/2003 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

IDDE-6: Long-Term Outreach

Responsible Party: Kelye McKinney, Engineering Manager
Start Date: 7/1/2004
End Date: 6/30/2008
Permit years scheduled for initial implementation:
Year 1 Year 2 **X** Year 3 Year 4 Year 5

Has Goal Been Accomplished: YES

General Summary

The Long-Term Outreach Program is intended to develop a focused, strategic program to educate the community on the impacts of stormwater and the steps people can take to reduce pollutants in stormwater. This BMP addresses activities that develop a variety of educational products, media outreach campaigns, and business outreach. The City has committed to:

a) Work to Develop Partnerships

The City has agreed to work to develop partnerships with neighboring communities.

b) Evaluate the Level of Stormwater Knowledge

The City has agreed to conduct a survey to evaluate the level of stormwater knowledge in the community and find out how the public gets their stormwater knowledge.

c) Identify Needs for Stormwater Information

The City has agreed to identify the needs for general stormwater information in the community.

d) Identify Target Audiences

The City has agreed to identify the target audiences, e.g., industry, businesses, and minority communities, and determine the specific messages and appropriate media to reach those audiences.

e) Update the SWMP Public Outreach Program

The City has agreed to use the survey and demographic information identified in items c and d above to update the Stormwater Public Outreach Program.

EFFECTIVENESS:

A long-term outreach strategy will increase the effectiveness of the Stormwater Management Program's outreach program. By defining target audiences and their associated stormwater knowledge level, SMP can more effectively deliver a stormwater pollution prevention message.

The City has completed a baseline public awareness survey as well as a follow-up. Both surveys measured the residential community's knowledge of fate of stormwater runoff. The results of the surveys showed an increase from 25% to 49% in the number of respondents who knew Stormwater is not treated to remove contaminants prior to release. This tends to indicate that the Stormwater Program's Public Outreach minimum control measure has had a level 2, Raising Awareness, outcome during this reporting period.

PROPOSED MODIFICATIONS:

None.

Status of Measurable Goals

IDDE-6.a: Work to Develop Partnerships

Ongoing:
The City attends local stormwater meetings such as those of the Dry Creek Water Council (DCWC) and the Placer Regional Stormwater Coordinating Group (PRSCG) in an attempt to develop partnerships with other watershed stakeholders and Phase II communities in the area. The City has determined that creating a memorandum of understanding (MOU) with PRSCG membership to provide a mechanism for funding coordinated activities infeasible due to the variation in the implementation schedule for the BMPs of each MS4.

Roseville stormwater program staff attended the PRSCG meetings on July 24, 2008 and October 16, 2008. The topics discussed included regulatory dates, and the draft construction stormwater runoff permit. Attending participants usually included representatives from the City of Rocklin, Town of Loomis, City of Lincoln, City of Auburn, Placer County, as well as the City of Roseville. These meetings provide the City with an opportunity to benefit from information sharing.

Effectiveness level:
Working with neighboring communities has shown a level 2, Raising Awareness, outcome during this reporting period in that the participating agencies are kept informed of the activities of adjacent municipalities.

See appendix for:

PRSCG Agendas and Minutes (in PO-2.a appendix)

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

IDDE-6.b: Evaluate Level of Stormwater Knowledge

No Change:
Roseville's residents were surveyed regarding their awareness of stormwater quality issues during the 2003-2004 reporting period. The results of the survey were tabulated by Data Cycles in April 2005. The survey was administered via Roseville's website to citizens who had previously agreed to respond to a wide variety of Roseville related topics. The survey questionnaire assessed the knowledge level of approximately 300 residents on the following subjects:

Drainage in their neighborhood
Use and disposal of building materials
Use and disposal of landscaping materials and/or pool maintenance
Use and disposal of auto maintenance materials
Sources of stormwater information
Business/government/resident responsibility

Individual comments were solicited for several survey questions. The survey demographics were also compiled through a series of general household questions.

Generally speaking, the survey results of the web-based survey indicate that the majority of the public (75%) is not knowledgeable about the specifics of the final destination of stormwater discharged from their neighbor (i.e., which creek). Most of the respondents seemed to believe that government and business should bear the responsibility of preventing stormwater pollution rather than the residential community. Most described their waste disposal practices as environmentally responsible.

The Environmental Utilities Department in conjunction with the Stormwater Program conducted a survey in 2008 that served as a follow-up to the stormwater program 2004 survey. This survey measured residential customer program awareness and satisfaction for the entire Environmental Utilities Department, which houses the Water, Wastewater, Solid Waste and Stormwater Divisions. To manage the length of the survey, the number of questions that directly applied to each division was limited. An independent contractor conducted the survey by phone. A statistically significant number of responses were obtained and the survey results validated.

The questions and responses relating to the Stormwater Program were as follows:

a. Roseville Environmental Utilities provides a number of different programs and services, some of which you may not be as familiar with as others. I'm going to read you a list of services. Please rate each one, using the scale poor, fair, good, or excellent. If you are not familiar with a service, just say so and we'll move on. First, how would you rate Environmental Utilities in terms of its Stormwater management services

	AMONG THOSE RESPONDING
1) Poor	1.3
2) Fair	11.5
3) Good	36.5
4) Excellent	15.0
5) Unfamiliar with service	29.8
8) Undecided/Don't know	6.0

b. How would you rate Environmental Utilities in terms of its Integrated pest management program

	AMONG THOSE RESPONDING
1) Poor	2.0
2) Fair	6.5
3) Good	13.3
4) Excellent	5.0
5) Unfamiliar with service	68.3
8) Undecided/Don't know	5.0

c. Do you agree or disagree with the following statement: Everything that enters storm drains is treated and filtered to remove pollution.

	AMONG THOSE RESPONDING
1) Strongly disagree	27.6
2) Somewhat disagree	21.4
3) Somewhat agree	20.4
4) Strongly agree	12.6
8) Undecided/Don't know	18.1

The following statement was read to the participants after the question above was asked. "Stormwater consists of rainwater and runoff from other sources. As it flows from neighborhoods and places of business to storm drains, it collects a variety of pollutants. Unlike water that goes down household sewer pipes that lead to a sewage treatment plant, stormwater currently ends up in our creeks and rivers untreated."

d. How willing would you be to pay a fee of $5 per month above and beyond what you pay now to help protect the water quality of our local creeks from stormwater pollution by funding such things as rehabilitating the storm drain system, public education and outreach activities, and improved methods for detecting illegal discharges?

	AMONG THOSE RESPONDING
1) Willing at $5	45.9
2) Willing at $3	9.3
3) Willing at $2	7.3
4) Not willing at any amount asked	29.6
8) Not sure	8.0

e. EU Today, a newsletter, is published and mailed, to customers every other month with the utility bill. Of the 6 newsletters that were sent to your home in the past 12 months, about how many did you read?

	AMONG THOSE RESPONDING
0) Recalled receiving, but read none	31.2
1) One	7.5
2) Two	11.8
3) Three	12.3
4) Four	4.5
5) Five	2.5
6) All six EU Today newsletters	27.9
7) Doesn't recall receiving any	1.0

8) Recalls receiving, but not specific number	1.3

f. In addition to its newsletter, Environmental Utilities can communicate with you in a variety of other ways. What is the main way you would prefer to receive information about programs and services?

	AMONG THOSE RESPONDING
1) On TV	3.8
2) In the newspaper	3.5
3) In an e-mail	21.6
4) In the regular mail separate from the bill	14.3
5) As a message on the bill	5.3
6) As an insert with the bill	33.1
7) In the EU Today newsletter	12.5
8) By telephone	1.8
9) Other	1.0
10) Undecided/Don't know	3.3

g. Please tell me, yes or no, if you watch, read, or access any of the following:

a. City of Roseville-TV, the local government cable channel

	AMONG THOSE RESPONDING
1) No	68.8
2) Yes	29.3
3) Undecided/Don't know	2.0

b. Reflections newsletter

	AMONG THOSE RESPONDING
1) No	39.8
2) Yes	52.3
3) Undecided/Don't know	8.0

c. Parks and Recreation Guides

	AMONG THOSE RESPONDING
1) No	35.0
2) Yes	61.8
3) Undecided/Don't know	3.3

d. City of Roseville's website

	AMONG THOSE RESPONDING
1) No	52.3
2) Yes	45.5
3) Undecided/Don't know	2.3

Several comparisons can be drawn from the 2004 and 2008 surveys although the methods of data collection varied. The number of respondents familiar with the fact that stormwater is not treated prior to release to a waterway has increased from 25% to in 2004 to 49% in the 2008 when the strongly disagree and somewhat disagree categories are combined. Furthermore, the number of respondents that were unsure decreased from 68% in 2004 to 18% in 2008. Although, respondents believing stormwater is treated did increase slightly from 25% in 2004 to 28% in 2008, the general trend appears show that more of Roseville's resident are aware that stormwater is not treated prior to release to a creek.

There are several differences in question phrasing between the two surveys. In the 2004 survey, respondents were not asked about their awareness regarding the stormwater or integrated pest management programs. However, these questions were posed in the 2008 survey. This survey indicates that more than 60% of respondents were aware of the stormwater management program and they consider its services to be helpful (combining the excellent, good and fair categories). However, most respondents (68%) were not aware of the integrated pest management program. This can be explained due to the relative newness of the program.

Both surveys asked questions pertaining to the how respondents preferred to receive programmatic information, however the questions were phrased slightly different. Respondents were asked if they had tried to

find information regarding waste disposal in utility's bill insert or on the City's website. Other methods of disseminating information were listed as well, but bill inserts (47%) and the City's website (46%) were most favored. Respondents were allow to select all the information sources helpful to them, therefore the cumulative total were greater than 100% for this question. This question was also asked in the 2008 survey with bill inserts again being the preferred method of receiving information (34%). The City's website was not on the list of choices for these questions, but respondents were asked in a later question if they accessed the City's website and 47% responded positively. Other City information resources were listed as well with Parks and Recreation Guides (64%) and Roseville Reflections, the City's general newsletter, (64%) being the most popular. Environmental Utilities Today, which is delivered to Roseville residents as a bill insert, was not considered as a bill insert by the 2008 survey. However, only 13% of survey respondents preferred the EU newsletter. This information will be very useful when choosing the most effective methods of disseminating stormwater management information.

Effectiveness level:
Evaluate level of stormwater awareness has shown a level 2, Raising Awareness, outcome during this reporting period.

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

IDDE-6.c: Identify Needs for Stormwater information

No Change:
The 2008 Environmental Utilities customer service survey indicates slightly more than half of Roseville's residents are not aware of the final destination of stormwater discharged from their neighborhoods In general, a trend appears show that more of Roseville's residents are aware that stormwater is not treated prior to release to a creek. These results are given the up-most consideration when formulating the program's outreach activities.

Effectiveness level:
Identifying needs for stormwater information has shown a level 2, Raising Awareness, outcome during this reporting period.

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

IDDE-6.d: Identify Target Audiences

No Change:
Target audiences for long-term public outreach efforts were identified based on the discharge types noted as a result of the City's incident response as shown in IDDE-2.c. It appears that pool discharges (11%), sediment discharges (16%) and wash water discharges (18%) were observed most frequently by the City's incident response program during this permit term. Therefore, these waste streams will receive the greatest focus for public outreach efforts during the next reporting period.

Effectiveness level:
Identifying target audiences has shown a level 2, Raising Awareness, outcome during this reporting period.

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

IDDE-6.e: Update the SWMP Public Outreach Program

Ongoing:
The Stormwater Program contracted with a consultant to develop a long-term public outreach strategy based on the 2004 public stormwater awareness survey. The long- term outreach strategy along with information garnered from the Environmental Utilities' customer service phone survey conducted last reporting period continue to guide the efforts of the Public Education and Outreach minimum control measure of the City's Stormwater Management Plan.

Effectiveness level:
Updating the Stormwater Management Program's Public Outreach Program to reflect the strategic plan has shown a level 1 outcome, Documenting Activities, during this reporting period.

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

Construction Site Runoff Control

The Construction Site Runoff Control element of the Stormwater Program is intended to reduce pollutants in stormwater runoff due to construction activities. This Minimum Control Measure (MCM) includes development of a new Stormwater Ordinance, revision to existing City standards, as well as the guidance, outreach, and training to implement the revised standards. In addition, the program will improve the complaints reporting system and modify the inspection and enforcement program. The construction site runoff program will also determine appropriate best management practices (BMPs) for construction site related activities and create sanctions to ensure their implementation. The program will establish measures for inspecting and enforcing the use of BMPs on construction sites and for imposing proper erosion and sediment controls.

Polluted stormwater runoff from construction sites often flows directly to the storm drains and into our waterways impacting aquatic life. In fact, the amount of sediment that flows into the creeks from construction sites can contribute more silt than naturally accumulates over many decades. Excessive amounts of sediment in the water can destroy the aquatic habitat. In addition, the non-stormwater discharges from construction sites are not naturally occurring, e.g., concrete washout, fertilizers and pesticides, and can cause serious harm to City waterways.

The use of BMPs on construction sites can greatly reduce the amount of sediment and other pollutants that enter the stream through stormwater runoff, better preserving the aquatic habitat for wildlife in and around creeks and streams.

Number of BMPs Associated with Control Measure: 6

Important Dates:

Earliest Start Date: 7/1/2003

End Date: 6/30/2008

CSR-1: Revised Ordinances

Responsible Party: Kelye McKinney, Engineering Manager
Start Date: 7/1/2003
End Date: 6/30/2008
Permit years scheduled for initial implementation:
Year 1 **X** Year 2 **X** Year 3 **X** Year 4 Year 5

Has Goal Been Accomplished: YES

General Summary

The goal of stormwater ordinance development is the development of regulatory requirements for the management of construction sites to reduce the runoff of sediments and various pollutants from construction activities. The City has committed to:

a) Develop and Adopt a Stormwater Ordinance

The City has agreed to develop and adopt a stormwater ordinance that:

1) Sets performance standards for construction site runoff

2) Covers grading, land clearing, or other disturbances of greater than or equal to one acre

3) Requires BMPs for erosion, sediment control, construction materials and wastes

4) Requires financial guarantees for compliance and site stabilization

5) Refers to technical guidance, e.g., Construction Standards

6) References enforcement mechanisms

APPROPRIATENESS:

Revising current ordinances and writing a new Stormwater Ordinance provide an appropriate first step in preventing polluted stormwater runoff from entering the City's waterways.

EFFECTIVENESS:

The City is currently in the initial stages of its newly adopted Stormwater Ordinance management program, yet has observed positive indicators associated with better effectiveness, less State Regional Board involvement, and quicker response from the development community in terms of BMP compliance.

PROPOSED MODIFICATIONS:

None.

Status of Measurable Goals

CSR-1.a: Develop and Adopt a Stormwater Ordinance

Completed:
The City's Stormwater Ordinance was adopted by the Roseville City Council. For more information, please see IDDE-4.

Date: 7/1/2003 Responsible Party: Guy Howes, Senior Engineer

CSR-2: City Standards

Responsible Party: Chris Kraft, Engineering Manager
Start Date: 7/1/2004
End Date: 6/30/2008
Permit years scheduled for initial implementation:

Year 1	Year 2 **X**	Year 3 **X**	Year 4 **X**	Year 5

Has Goal Been Accomplished: YES

General Summary

The City Standards BMP is intended to provide technical and regulatory guidance to City staff and project applicants on City requirements for construction site runoff control. This BMP includes reviewing existing technical guidance for construction site BMPs, analyzing its current suite of BMPs and adopting changes to the standards. The City has committed to:

a) Update Existing CSR Control Measures in City Standards

The City has agreed to update its Design/Construction Standards to include provisions for construction site runoff control measures, including submittal requirements, erosion and sediment control BMPs, and materials. Additionally, the City created a Stormwater Quality BMP Guidance Manual for Construction.

b) Implement CSR Control Measures

The City has agreed to implement these construction site runoff control measures through City development review process.

APPROPRIATENESS:

It is appropriate to establish construction standards to provide technical and regulatory guidance to City staff and the development community for compliance with construction site runoff control requirements.

EFFECTIVENESS:

The City has generated documents providing necessary direction to the development community for minimum BMP guidelines and Stormwater requirements.

PROPOSED MODIFICATIONS:

Presently, the City is “cleaning up” the design/construction standards and plans to amend the latest version to include four years of amendments, spelling and grammatical errors and technical necessities. The new document is scheduled for distribution in January, 2010.

Status of Measurable Goals

CSR-2.a: Update Existing CSR Control Measures in City Standards

Completed:
The City has revised its Design/Construction Standards to include provisions for construction site runoff control measures, including submittal requirements, erosion and sediment control BMPs, and materials. Additionally, the City created a Stormwater Quality BMP Guidance Manual for Construction. Both documents were completed in March, 2007, and made available on the City's website.

Date: 7/1/2004 Responsible Party: Guy Howes, Senior Engineer

CSR-2.b: Implement CSR Control Measures

Ongoing:
The City implemented a Stormwater Quality BMP Guidance Manual for Construction and the revised Design/Construction Standards. Both documents were completed in March, 2007, and made available on the City's website. The Stormwater Quality BMP Guidance Manual for Construction was amended to include policy and procedures for "Abandoned / Inactive Construction Sites.

See appendix for:

Pages 10 & 11 from the amended Stormwater Quality BMP Guidance Manual for Construction

Date: 7/1/2004 January, 2009 Responsible Party: Guy Howes, Senior Engineer

CSR-3: Design Review Guidance for City Staff

Responsible Party: Kelye McKinney, Engineering Manager
Start Date: 7/1/2004
End Date: 6/30/2008
Permit years scheduled for initial implementation:

Year 1	Year 2 **X**	Year 3	Year 4	Year 5

Has Goal Been Accomplished: YES

General Summary

This BMP is intended to develop guidance for City staff to implement the revised ordinance and standards. The program is also intended to assist the City Planning and Public Works staffs in implementing construction site runoff control during development review. The City has committed to:

a) Create Submittal Requirements Checklist

The City has agreed to create a submittal requirements checklist.

b) Create Plan Review Checklist

The City revised the SWPPP review documents/policy to include more definitive requirements of the current General Permit.

c) Provide Staff Training

The City has agreed to provide training to staff on the use of guidance documents.

APPROPRIATENESS:

The development of design review guidance materials is an appropriate means to assist City Planning and Plan Review staff in evaluating projects and implementing construction site runoff control measures at those projects.

EFFECTIVENESS:

The City has not yet gathered enough data to gauge the effectiveness of its programs.

PROPOSED MODIFICATIONS:

Yes. With the revised procedures and processes, continuing education of staff will be implemented.

Status of Measurable Goals

CSR-3.a: Create Submittal Requirements Checklist

Completed:
The City initially developed a seven item Stormwater Pollution Prevention Plan (SWPPP) review checklist during the last permit reporting year. This checklist was initially derived from Regional Board staff guidance. The checklist review document and policy were revised to include more definitive requirements of the current General Permit. The City requires SWPPPs be submitted in a three ring binder concurrent with improvement plan submittal for projects with disturbance of one acre or more. A City acknowledgement sheet and inspection form binder tab is added to each reviewed SWPPP. SWPPPs are logged in as received.

Review of SWPPPs has been transferred from Stormwater Inspection staff to the City's Public Works Engineering Land Development staff. The Development staff now reviews submittal requirements for new developments over one acre.

Date: 7/1/2004 Responsible Party: Guy Howes, Senior Engineer

CSR-3.b: Create Plan Review Checklist

Completed:
The Public Works Engineering Land Development staff has assumed responsibility for enforcing submittal requirements of development SWPPPs. This transition was made since they are knowledgeable of drainage patterns and familiar with the entire development under review including the projects' drainage characteristics. Staff utilized the SWPPP review checklist update revised this permit year.

Date: 7/1/2004 Responsible Party: Guy Howes, Senior Engineer

CSR-3.c: Provide Staff Training

Ongoing:
Stormwater Inspection staff currently trains new staff in inspecting and enforcing stormwater quality compliance. This ongoing procedure will continue to be expanded to include training of staff from other City departments such as Parks and Recreation, as well as staff managing Capital Improvement Projects and hired consulting firms with the goal of providing continuity and consistency within the City.

Date: 7/1/2004 Responsible Party: Guy Howes, Senior Engineer

CSR-4: Enhanced Reporting System

Responsible Party: Kelye McKinney, Engineering Manager
Start Date: 7/1/2004
End Date: 6/30/2008
Permit years scheduled for initial implementation:
Year 1 Year 2 Year 3 **X** Year 4 Year 5

Has Goal Been Accomplished: YES

General Summary

The goal of this BMP is to provide ways for the public to report suspected violations of the City's regulatory stormwater programs, including the construction site runoff control program. The City has committed to:

a) Establish Telephone Line

The City has agreed to establish a telephone line answered by City staff where citizens can report suspected violations at construction sites.

b) Establish an E-Mail Link

The City has agreed to establish an e-mail link on the stormwater webpage where citizens can e-mail suspected violations at construction sites.

c) Provide Procedures for Referral to Public Works

The City has agreed to provide procedures for referral to Public Works for the investigation of construction site violations.

d) Track Reports and Follow-Up Actions

The City has agreed to track reports and follow-up actions for construction site violations.

e) Advertise Telephone Line and E-Mail Address

The City has agreed to advertise its reporting telephone line and e-mail address so citizens will know how to report suspected construction site violations.

APPROPRIATENESS:

A reporting system is an effective means for the public to report suspected violations of the City's stormwater program, including the construction site runoff control element.

EFFECTIVENESS:

The City has not yet gathered enough data to gauge the effectiveness of its programs.

PROPOSED MODIFICATIONS:

None.

Status of Measurable Goals

CSR-4.a: Establish Telephone Line

Completed, No Change:
The City has created a stormwater incident complaint hotline in the City's police dispatch. It is a non-emergency line that is staffed 24 hours per day 7 days per week. Based on the type of the discharge, the appropriate City staff will be dispatched. The Public Works Department has been identified as the first responder for stormwater discharges that originate from a construction site and/or construction related activities. The Public Works Stormwater Inspection staff met with the committee to develop incident response procedures with regards to the hotline.

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

CSR-4.b: Establish E-Mail Link

Completed, No Change:
The City's Stormwater webpage includes a link to a stormwater e-mail address where citizens can comment on the stormwater program and report illicit discharges to the storm sewer system.

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

CSR-4.c: Provide Procedure for Referral to Public Works

Completed, No Change:
The City has developed policies and procedures for the intake of stormwater complaints from City residents through a non-emergency hotline number located in City police dispatch. There are also procedures in place that delineate the referral of complaints to the appropriate City department based on discharge type. Public Works is listed as the department responsible for responding to construction site related stormwater discharges.

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

CSR-4.d: Track Reports and Follow-Up Actions

Ongoing, No Change:
The City responds to all reports of illicit stormwater discharges to the stormwater hotline. Those requests for service received by the Environmental Utilities Department are tracked in a Hansen database. Staff findings and enforcement actions are logged on hardcopy incident forms and input in the database when the incident is concluded.

To date, the City Public Works Department does not have a specific mechanism of tracking incidents which are responded to from the hotline or otherwise. However, Public Works does track SWPPP required projects through stormwater inspection reports. When inspection staff determines two consecutive non-compliant stormwater events at a construction site, he/she will then initiate standard enforcement procedures, i.e. citations or Roseville notices of violation (RNOV). If compliance is still not met, City Stormwater staff then contacts the SWRCB for assistance.

Date: 7/1/2005 Responsible Party: Guy Howes, Senior Engineer

CSR-4.e: Advertise Telephone Line and E-Mail Address

No Change:
The City advertises the stormwater hotline through its public outreach materials. The City promotes the stormwater hotline and the stormwater email on the program general outreach brochure. This outreach brochure is distributed at all of the outreach events attended by Stormwater Management staff. It is also given to dischargers at incidents where Environmental Utilities staff responds. Another outreach tool created to advertise the telephone hotline is a magnet urging residents to report non-stormwater discharges to the City via the new hotline number. Several articles published in the Environmental Utilities Department EU Today newsletter also featured the hotline number and the stormwater program's email address.

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

CSR-5: Inspection and Enforcement Program

Responsible Party: Kelye McKinney, Engineering Manager
Start Date: 7/1/2003
End Date: 6/30/2008
Permit years scheduled for initial implementation:
Year 1 **X** Year 2 Year 3 Year 4 Year 5

Has Goal Been Accomplished: YES

General Summary

The City's Inspection and Enforcement BMP is intended to ensure that construction sites are operated in accordance with the City ordinances, Design/Construction Standards, Stormwater Quality BMP Guidance Manual for Construction, and the State General Permit for Stormwater Discharges from Construction Related Activities. This BMP involves implementing a stormwater inspection and enforcement agenda for construction sites. The City has committed to:

a) Establish Inspection Policy and Frequency

The City has agreed to set inspection policy setting frequencies for inspections based on a set criteria.

b) Establish Inspection Procedures

The City has agreed to set inspection procedures, including contractor self-inspection and a government inspector checklist.

c) Set up a Enforcement Actions

The City has agreed to setup a tiered system of enforcement actions.

d) Set up Tracking System

The City has agreed to set up a tracking system for violations including those reported by the public.

e) Train Inspection and Enforcement Staff

The City has agreed to train inspection and enforcement staff to address stormwater issues and implement new procedures.

APPROPRIATENESS:

The Construction Stormwater Runoff Inspection and Enforcement Program is an appropriate means of enforcement for the new and revised stormwater ordinances. Inspection and Enforcement ensures that the stormwater ordinances are followed and non-stormwater discharges are minimized.

EFFECTIVENESS:

The City has consistently increased it’s effectiveness in terms of meeting its 90% inspection goal. By increasing the number of SWPPP inspections, we have decreased the number and severity of Stormwater violations. Additionally, we have collectively worked together with the development community to educate and implement sound Stormwater education and outreach.

PROPOSED MODIFICATIONS:

None.

Status of Measurable Goals

CSR-5.a: Establish Inspection Policy Setting Frequency

Ongoing:
The City's construction stormwater runoff enforcement program continues to improve in efforts of meeting the permit's goal of 90% inspection rate for the high priority projects on a weekly basis. The City's policy for Construction Site Stormwater Runoff is in effect and has been the basis for reporting over this past year. Roseville enforced compliance on (80) active NPDES permits, (24) of those gaining Notices of Termination during the 07/08 season. The City continues (66) active permitted projects into the new season year. The City performed (3,332) Stormwater inspections, resulting in a (91.5%) inspection record, a (10%) effective increase, thus, resulting in an improvement from the previous year. The City continues to refine their procedures and program structure for improvement.

Date: 7/1/2003 Responsible Party: Guy Howes, Senior Engineer

CSR-5.b: Establish Inspection Procedures

Ongoing:
Currently, staff's administrative policies were revised as mentioned above. The City implemented a more effective SWPPP inspection form to work in conjunction with our now on-line electronic documentation system.

The City has implemented a Stormwater Evaluation for SWPPP Inspection Frequency Determination policy due to a decrease in construction activity for particular sites. Staff has developed an evaluation worksheet. The worksheet uses a numbering system to determine activity level and whether inspection frequency should be lowered to monthly inspections, or deactivated until construction activity increases.

See appendix for:
Stormwater Worksheet Evaluation for SWPPP Inspection Frequency Determination form.

Date: 7/1/2003 Responsible Party: Guy Howes, Senior Engineer

CSR-5.c: Set Enforcement Actions

Completed:
As supported by the City's Stormwater Ordinance, we have developed and fully implemented enforcement procedures, including defining violations and penalties, creating an enforcement flow chart, and creating a Roseville Notice of Violation (RNOV). The result: (3) Citations ($100.00 fine) were issued to a developer or contractor for Stormwater Ordinance violations; (1) Roseville Notice of Violation (RNOV) letter sent to developers/owners for compliance issues. In those cases, compliance was gained and no further enforcement action was necessary; (0) State Notice of Violations received for development projects this reporting period.

Date: 7/1/2003 Responsible Party: Guy Howes, Senior Engineer

CSR-5.d: Set Up Tracking System

Completed, and ongoing:
In keeping up-to-date, the City's IT Department has developed new database software which tracks all WDID's issued by the State. In terms of data retrieval, report generation, and depth of information, this software is more effective and accurate than previous versions. This is an ongoing effort to better track and substantiate our enforcement. This year the City's consultant refined the software further, and corrected a reoccurring issue related to recording projects.

Date: 7/1/2003 Responsible Party: Guy Howes, Senior Engineer

CSR-5.e: Train Inspection and Enforcement Staff

Ongoing:
Due to a significant stormwater staff reduction, the City has one full-time Construction Inspector that performs SWPPP inspections exclusively. This eliminated the need for bi-yearly in-house Stormwater meetings as the Stormwater Inspection team now meets daily/weekly to discuss Stormwater matters. August 2008, the City co-hosted a workshop/exam for a State approved Certified Erosion, Sediment and Storm Water Inspector

(CESSWI). (3) City Construction Inspectors attended the training session and sat for the exam.

Date: 7/1/2003 Responsible Party: Guy Howes, Senior Engineer

CSR-6: Outreach and Training Program

Responsible Party: Kelye McKinney, Engineering Manager
Start Date: 7/1/2003
End Date: 6/30/2008
Permit years scheduled for initial implementation:
Year 1 **X** Year 2 Year 3 Year 4 Year 5

Has Goal Been Accomplished: YES

General Summary

The Outreach and Training Program is meant to train construction professionals and City staff on construction-specific stormwater issues. By training concerned parties on how to prevent stormwater runoff, this program offers a cost-effective solution to construction stormwater runoff. The City has committed to:

a) Conduct Workshops

The City has agreed to conduct three half-day workshops during CSR program development and post draft documents and workshop information on the website.

b) Conduct Annual Training Workshops

The City has agreed to conduct annual training workshops for construction industry professionals and City staff on the adopted ordinances and on the updated Construction and Improvement Standards.

c) Train City Staff

The City has agreed to train City staff on the new Design Review Guidance.

d) Update Website to Include Technical Assistance Materials

The City has agreed to provide technical assistance materials to the regulated community on the City's website.

APPROPRIATENESS:

The Outreach and Training Program is an appropriate method of preventing illicit discharges from construction sites by training construction professionals and City staff on the environmental concerns of stormwater runoff and various BMPs that can be used to prevent polluted discharge from entering local waterways.

EFFECTIVENESS:

As previously proposed refinement to annual training includes a series of tailgate trainings in the field in lieu of one all-day workshop. It is intended to reach more field personnel who are actually responsible for the installation and maintenance of SWPPP best management practices. This provides for more effectiveness.

PROPOSED MODIFICATIONS:

In its conceptual stage, Stormwater inspection staff, along with Environmental Utilities Engineering staff, will work together to develop handout informational material to be distributed at tailgate workshop sessions.

Status of Measurable Goals

CSR-6.a: Conduct Workshops

Ongoing:
The City hosted several informal tailgate training sessions for contractors working in the area. Discussions included proper BMP installation, assessment of necessary BMP's, and enforcement procedures. The City also conducted multiple pre-job SWPPP information presentations for the development community. Expanded comments were developed to enhance and provide awareness of the City's expectations of compliance. In addition to tailgate workshops, and as part of the City's outreach program, Public Works Staff mailed out it's own "Rainy Season Reminder" letter which was distributed in September to property owners with active projects, (33) letters were sent. City inspection staff also hand delivered Rainy Season Reminder letters to project superintendents on their job sites reminding them to prepare for the rainy season; the goal being to generate discussion and awareness of compliance responsibilities.

See appendix for:
"Rainy Season Reminder" letter

Date: 7/1/2003 Responsible Party: Guy Howes, Senior Engineer

CSR-6.b: Conduct Annual Training Workshops

Ongoing:
Although Stormwater inspection staff conducted a series of tailgate trainings in the field in lieu of one all-day workshop, the City arranged and scheduled for August 2008, a co-hosted workshop/exam for a State approved Certified Erosion, Sediment and Storm Water Inspector (CESSWI). Tailgate workshop sessions were as follows:

(1) 1.5 hour Stormwater Tailgate Workshop: (8/7/2008, Lennar Homes representing 5 Westpark subdivisions, 24 Attendees, Topic: General SWPPP/Concrete washout management)

(1) ½ hour Stormwater Tailgate Workshops: (1/7/2009), Longs, 6 attendees, Topics: Mortar/Plaster/ Paint Management

See appendix for:
CESSWI workshop/exam registration
SWPPP workshop rosters

Date: 7/1/2003 Responsible Party: Guy Howes, Senior Engineer

CSR-6.c: Train City Staff

Ongoing:

Management and Stormwater staff participated on a CASQA subcommittee to develop comments to the proposed Draft General Construction Permit that were submitted by CASQA. In addition, staff also submitted comments on behalf of the City to the SWRCB for the proposed Draft General Construction Permit as well. City staff also attended the GCP comment workshop held in Sacramento, CA, as well as the public hearing that followed. Other training was as follows:

<u>Assistant Engineer completed the following training/education:</u>

6/19/2009, Renewed the Certified Inspector of Sediment and Erosion Control (CISEC, #0185)

10/30/2008, Stormwater Quality Training, Placer County, 4 hrs

1/14/2009, CSUS/OWP Stormwater BMP Course, Municipal, 2 Continuing Education Units

<u>(2) Construction Inspectors completed the following training/education:</u>

10/30/2008, Stormwater Quality Training, Placer County, 4 hrs

<u>(1) Construction Inspector completed the following certification:</u>

1/27/2009, Successfully completed “Inspector in Training” exam requirements for CESSWI certification.

See appendix for:
County of Placer Erosion and Pollution Control Workshop Roster

Date: 7/1/2003 Responsible Party: Guy Howes, Senior Engineer

CSR-6.d: Update Website to Include Technical Assistance Documents

Ongoing:
The City continues to update the information on the website pertaining to its construction site runoff element. Specifically, new user friendly pull down menus were utilized and links to the State's 2005 Wet Season Reminder and Monitoring Requirements for Advanced Treatment System documents were included.

Date: 7/1/2003 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

New Development and Redevelopment

The New Development program is intended to prevent runoff from new development and redevelopment projects. The City will develop structural and non-structural control standards. The City will also monitor the long-term operation and maintenance of these runoff controls, creating maintenance and inspection schedules for all sites that disturb more than one acre.

Non-structural controls are policies and procedures developed to modify human activities in order to lessen the impact of urban development and redevelopment activities. The City will educate review staff, developers and owners to successfully implement these controls.

Areas undergoing new development or redevelopment offer the perfect opportunity for the implementation of cost-effective methods to prevent harmful pollutants from entering local waterways. Contaminated stormwater runoff from developed areas can be harmful to wildlife in and around our creeks and streams. Developed areas can facilitate the collection of harmful pollutants such as oil, heavy metals, and excess sediment in the runoff, which travels directly to the creeks when unmitigated.

Developed areas turn porous land, which can absorb toxins from the runoff before it enters the creeks, into impervious land like asphalt and concrete, which transports the water straight to the storm drain. By implementing structural controls, such as porous landscaped areas for water to penetrate, we can prevent harmful stormwater runoff before it reaches a receiving waterway, protecting the environment and saving money in the long run.

Number of BMPs Associated with Control Measure: 5

Important Dates:

Earliest Start Date: 7/1/2004

End Date: 6/30/2008

ND-1: Development Review Process

Responsible Party: Chris Kraft, Engineering Manager
Start Date: 7/1/2005
End Date: 6/30/2008
Permit years scheduled for initial implementation:

Year 1	Year 2	Year 3 **X**	Year 4 **X**	Year 5

Has Goal Been Accomplished: YES

General Summary

All development and redevelopment plans are reviewed by the City's Community Development Department. The City plans to evaluate its review policies and procedures in an attempt to improve the review process to include stormwater quality issues. This BMP is dependent upon completion of ND-2 and ND-3. The City has committed to:

a) Assess Development Plan Review

The City has agreed to evaluate development review procedures with Public Works Engineering, Community Development, and Planning for post-construction runoff control as well as develop amendments to policies and procedures for plan review.

b) Integrate Technical Criteria

The City has agreed to integrate technical criteria developed under ND-2 into its regulatory process.

c) Provide Design Review Guidance and Training

The City has agreed to provide design review guidance and training to City staff for flood control facilities, detention designs, infiltration facilities and other structural or non-structural controls in conjunction with revision of Improvement and Construction Standards, and adoption of a new Stormwater Ordinance (ND-3) and technical guidance (ND-2).

d) Develop System for Feedback

The City has agreed to develop a system for continual feedback from department staff to further refinement of post-construction best management practices and increase program effectiveness.

EFFECTIVENESS:

The City is currently in the initial stages of its stormwater management program, and has not yet gathered enough data to gauge the effectiveness of this best management practice.

This being said, the City's Public Works Department has been requiring stormwater management plans with Planning Dept. applications for new development since the City's Stormwater Quality Design Manual was adopted in August 2007. A complete stormwater management plan designed to meet the "maximum extent practicable" guidelines of the design manual is approved at the entitlement phase of the project. Addressing stormwater at the initial phase of a project, has helped the City embrace Low Impact Development (LID) concepts more freely and has allowed for multiple BMP's to be implemented on project sites. The City has entitled over 25 projects to implement stormwater quality BMP's to the "maximum extent practicable" since the adoption of the Design Manual.

PROPOSED MODIFICATIONS:

BMP completed. No proposed modifications.

Status of Measurable Goals

ND-1.a: Assess Development Plan Review

Ongoing:
A Stormwater Quality Design Manual was adopted by City Council August 1, 2007. The new Design Manual requires all projects coming to the City for approval to adhere to the stormwater quality design standards described within this document. New procedures and submittal requirements for the City's Planning Department and Engineering Department were established the same week the Manual was adopted. New submittal requirements include a "Preliminary Stormwater Quality Compliance Form" that must be completed as part of the Planning Department application process. Also, a "checklist" detailing information needed for evaluation has been created for engineers and owners submitting Improvement Plans to the City. These new documents were included as attachments to last years Annual Report.

Over this past reporting period, ten projects have submitted a Preliminary Stormwater Quality Compliance Form during the City's development application process. City staff is satisfied with how the form is working in helping address stormwater quality issues during the early development portion of a project. A copy of a completed form is included as an appendix to this report by way of an example of its use.

See appendix for:
Secret Ravine Skilled Nursing and Assisted Living Facility Stormwater Quality Narrative

Date: 8/14/2009 Responsible Party: Chris Kraft, Engineering Manager

ND-1.b: Integrate Technical Criteria

No Change:
During the development of the Stormwater Quality Design Manual technical criteria was evaluated to scope, size and locate BMPs to meet the permit objectives. Fact sheets have been developed to relate the technical findings to practical design.

Date: 8/8/2007 Responsible Party: Chris Kraft, Engineering Manager

ND-1.c: Provide Design Review Guidance and Training

Ongoing:
Stormwater quality design review training continued throughout the permit year, and is continuing in development staff meetings for the improvement plan reviewers. Staff attended workshops on topics such as Hydro-modification, Low Impact Development, and Stormwater Devices. May 2009, staff attended a two day training event titled Hydromodification 101 Also, staff sat in on six conference calls for the CASQA Phase II Subcommittee, one each in June 2009, May 2009, April 2009, March 2009, Feb. 2009, and Nov. 2008. Finally, in June 2009, staff met with the Placer Stormwater Coordination Group to discuss permit requirement status.

Date: 8/14/2009 Responsible Party: Chris Kraft, Engineering Manager

ND-1.d: Develop System for Feedback

Ongoing:
Feedback from the City's plan reviewers occurs in the development section staff meetings. Plan reviewers make themselves available to the development community to meet and go over City expectations for stormwater management plans. Often after the initial Planning Department application meeting, Pubic Works staff will schedule time to sit down with the applicant to fully explain what the City's expectations are and how best to meet the intent of the City's Stormwater Quality Design Manual.

Date: 8/8/2007 Responsible Party: Chris Kraft, Engineering Manager

ND-2: Critical Criteria

Responsible Party: Chris Kraft, Engineering Manager
Start Date: 7/1/2004
End Date: 6/30/2008
Permit years scheduled for initial implementation:

Year 1	Year 2	Year 3 **X**	Year 4 **X**	Year 5

Has Goal Been Accomplished: YES

General Summary

This BMP involves the development and implementation of structural and non-structural control strategies through improvement and construction standards. Structural controls are manmade facilities constructed for the storage, detention, infiltration, or treatment of stormwater runoff. They may include detention ponds, vegetative areas, or runoff pretreatment. Non-structural controls are policies and procedures that lessen the impacts of development on water quality. They may include alternative construction, site design, or zoning. By using control strategies, the City can effectively lessen the impacts of stormwater runoff. The City has committed to:

a) Review Technical Guidance Programs

The City has agreed to review existing technical guidance programs such as the CASQA BMP Handbook for Post-Construction Control, the Sacramento Guidance Manual for Onsite Stormwater Quality Control Measures, and the EPA's National Menu of Best Management Practices for Stormwater Phase II for controls to be included into the stormwater plan and City Standards.

b) Develop Technical Criteria

The City has agreed to develop technical criteria for structural and non-structural controls specific to the City of Roseville, including siting, design, and maintenance considerations.

c) Amend City Improvement and Construction Standards

The City has agreed to amend the City's Improvement and Construction Standards.

EFFECTIVENESS:

The City is currently in the initial stages of its stormwater management program and has not yet gathered enough data to gauge the effectiveness of this best management practice.

Again, with this being said the Public Works Department is seeing the design of stormwater management plans progressing more and more towards the LID principles outlined in the City's Stormwater Quality Design Manual. By requiring stormwater quality to be addressed much earlier in the process, it has allowed for LID principles to be incorporated into the over all design of the project, including the project's proposed landscaping. By getting the developers entire design team (architects, engineers, landscape architects, etc.) involved, the City is able to propose Best Management Practices that include runoff reduction such as swales and infiltration measures. Instead of just using end of pipe treatment, the projects are now able to implement stormwater quality measures like grassy swales and bioretention planters into the over all design of the project.

PROPOSED MODIFICATIONS:

BMP completed. No proposed modifications.

Status of Measurable Goals

ND-2.a: Review Technical Guidance Programs

No Change:
Post-construction stormwater design standards from other communities and organizations have been reviewed, and information has been evaluated and included, where appropriate, in the City's Stormwater Quality Design Manual.

Date: 8/8/07 Responsible Party: Chris Kraft, Engineering Manager

ND-2.b: Develop Technical Criteria

No Change:
The City of Roseville worked with the Sacramento Stormwater Management Partnership to develop a regionally consistent design manual to aid with the selection, sizing, operation and long-term maintenance of stormwater quality control measures (BMPs). The partnership design manual was finalized in May 2007, and was adopted by all of the agencies involved (City and County of Sacramento, City of Folsom, City of Elk Grove, City of Citrus Heights, City of Rancho Cordova, City of Galt and the City of Roseville) shortly thereafter. The manual addresses source control, runoff reduction control and treatment control measures, and includes Fact Sheets for each post-construction BMP. The City is utilizing the Sacramento Stormwater Management Partnership's Stormwater Quality Design Manual as its "functionally equivalent program" to address design standards required by this NPDES Permit.

Date: 8/8/07 Responsible Party: Chris Kraft, Engineering Manager

ND-2.c: Amend City Improvement and Construction Standards

Ongoing:
In March 2007, the City updated and published new Engineering Design & Construction Standards. In addition to other updates that were made, a reference to the new Stormwater Quality Design Manual was added to the Grading Sections and the Drainage Sections in both the Design Standards and the Construction Standards. All stormwater quality design criteria and standards that the City has adopted can be found in this manual.

Presently, the City is updating the design/construction standards and plans to amend the latest version to include four years of amendments, spelling and grammatical errors and technical necessities. The new document is scheduled for distribution in January, 2010.

Date: 8/14/09 Responsible Party: Chris Kraft, Engineering Manager

ND-3: Post-Construction Ordinance

Responsible Party: Chris Kraft, Engineering Manager
Start Date: 7/1/05
End Date: 6/30/2008
Permit years scheduled for initial implementation:

Year 1	Year 2	Year 3 **X**	Year 4 **X**	Year 5

Has Goal Been Accomplished: YES

General Summary

The City's Stormwater Ordinance is in part intended to include provisions addressing post-construction runoff from new development and redevelopment and requirements for long-term maintenance of structural controls. The ordinance will allow the City to require post-construction controls on new development and will provide the authority to inspect and require maintenance on privately owned controls approved by the City. The City has agreed to:

a) Develop Stormwater Ordinance

The City has agreed to develop a Stormwater Ordinance with requirements for post-construction controls that include:

1) Authority to require post-construction controls for new development and redevelopment

2) Reference to a technical standard such as Improvement and Construction Standards to guide design and installation

3) Requirements for perpetual maintenance of structural controls

4) The right of program staff to enter private property and inspect controls

5) The authority to require maintenance and repairs to structural controls

6) Enforcement remedies for non-compliant control maintenance

EFFECTIVENESS:

The City has not yet gathered enough data to gauge the effectiveness of this BMP.

PROPOSED MODIFICATIONS:

No modifications proposed.

Status of Measurable Goals

ND-3.a: Develop Stormwater Ordinance

Ongoing:
The City adopted a Stormwater Ordinance on July 7th, 2006. This initial ordinance discusses the development of a new design manual that will cover stormwater quality designs for post-construction control measures.

The City has continued to work amending the current Stormwater Ordinance to include recognition of the new Stormwater Quality Design Manual. The amendment will also address post-construction engineering submittals, maintenance agreements, an annual stormwater management permit, inspection procedures and BMP access requirements. The amendment is currently in draft form and posted on the City's website for public review. The post-construction stormwater quality amendment is scheduled to go before City Council in the fall of 2009. Adoption of the amendment is anticipated by the end of the year 2009.

Date: 8/14/09 Responsible Party: Chris Kraft, Engineering Manager

ND-4: Regulatory Requirements for Privately Owned Controls

Responsible Party: Chris Kraft, Engineering Manager
Start Date: 7/1/2006
End Date: 6/30/2008
Permit years scheduled for initial implementation:

Year 1	Year 2	Year 3	Year 4 **X**	Year 5 **X**

Has Goal Been Accomplished: NO

General Summary

When stormwater facilities are neglected or improperly maintained after construction, it can lead to a dramatic decrease in treatment efficiency. Therefore, it is necessary to establish regulatory requirements for privately owned controls, including project approval conditions, O&M guidance for control owners, and a tracking and enforcement program. This BMP is intended to utilize development review, database tracking, and enforcement to ensure the maintenance of privately owned controls. The City has committed to:

a) Include Maintenance Requirements in Project Approval

The City has agreed to include maintenance requirements in project approval of privately owned structural controls.

b) Provide Maintenance Guidance

The City has agreed to provide maintenance guidance for owners of approved structural controls through specifications in Improvement and Construction Standards.

c) Include Structural Controls in Database

The City has agreed to include structural controls in its database, e.g., GIS, to facilitate tracking and ownership and to enforce proper operations and maintenance.

d) Utilize Self-Certification Program

The City has agreed to utilize a self-certification program for structural control maintenance with required annual reporting and spot inspections.

e) Include Structural Control Inspections

The City has agreed to include structural control inspections in the Fire Department's business inspections.

EFFECTIVENESS:

The City has not yet gathered enough data to gauge the effectiveness of this best management practice.

PROPOSED MODIFICATIONS:

ND 4.e is proposed to be modified. Specifically staff within the City's Public Works Department will be responsible for inspection of structural controls rather then Fire Department staff.

Status of Measurable Goals

ND-4.a: Include Maintenance Requirements in Project Approval

Pending:
Will be initiated upon Council adoption of revised Stormwater Ordinance. See ND-3.a.

Date: 8/14/09 Responsible Party: Chris Kraft, Associate Engineer

ND-4.b: Provide Maintenance Guidance

No Change:
This work was completed in year four. As part of the new Stormwater Quality Design Manual, maintenance of stormwater post-construction BMPs is addressed within the various Fact Sheets of the manual. New engineering submittal requirements include that a separate "Maintenance Plan" be submitted with all improvement plan sets. This document shall detail long-term maintenance requirement for each BMP proposed for the project.

Date: 8/8/07 Responsible Party: Chris Kraft, Engineering Manager

ND-4.c: Include Structural Controls in Database

Pending:
During the last reporting period, time was spent in investigating a number of database options for tracking post-construction structural and non-structural BMPs. Working closely with the City's IT Department, it has been decided, to utilize software that the City has already in-house. To track the stormwater management permits and BMP inspections the City will use Permits Plus. This software is currently being used by the Fire Department to track inspections and permits. Many other departments including Engineering and Planning also use it. In addition to Permits Plus, the City will also utilize its GIS software to track the location of BMPs that are privately owned. This information has already been entered into the GIS program. During this reporting period, staff time has been focused on issues associated with amending the stormwater ordinance to include maintenance requirements.

During the next year (FY 09/10), information on new and existing stormwater quality structures will be entered into the City's Permits Plus program and GIS. Long-term, as budget resources become available, the City plans to purchase asset management software to track all of the City's assets. At that time, both the information in Permits Plus and the information in GIS on post-construction BMPs will be migrated to the new asset management software.

Date 8/14/09 Responsible Party: Chris Kraft, Engineering Manager

ND-4.d: Utilize Self-Certification Program

Pending:
The City continues in the development of an annual permitting program for post-construction BMPs. This program will require property owners that have runoff reduction control measures and/or treatment control measures on their property to inspect, clean, and repair them as needed. Renewal of this annual permit will require that a self-certification be completed and signed by the property owner before renewal is approved. The City's Annual Stormwater Management Permit program will be initiated pending Council adoption of the revised Stormwater Ordinance. See ND-3.a.

Date: 8/14/09 Responsible Party: Chris Kraft, Engineering Manager

ND-4.e: Include Structural Control Inspections

Pending:
The City is working to amend the current Stormwater Ordinance to address privately owned structure controls. This includes policy pertaining to City inspections, enforcement and BMP access requirements. The post-construction stormwater quality amendment will be adopted by City Council by end of 2009. Once adopted City staff will develop comprehensive procedures as part of the overall structural control permitting program.

Date: 8/14/09 Responsible Party: Chris Kraft, Engineering Manager

ND-5: Outreach and Technical Assistance

Responsible Party: Chris Kraft, Engineering Manager
Start Date: 7/1/2004
End Date: 6/30/2008
Permit years scheduled for initial implementation:

Year 1	Year 2	Year 3 **X**	Year 4 **X**	Year 5

Has Goal Been Accomplished: YES

General Summary

In order for post-construction runoff control to be successful, the City will provide information to those responsible for compliance--landowners, project designers, project developers, and contractors. These concerned parties must be educated on the importance of the stormwater program, its requirements, and the sanctions for non-compliance. This BMP includes information posting ordinances, Construction Standards, and various construction workshops on the City's website. As the program develops, other potential media will be explored. The City has committed to:

a) Include Interested Parties in Program Development

The City has agreed to incorporate project designers and developers and other interested parties in program development, including workshops and outreach on the City's website, to develop controls consistent with community goals.

b) Conduct Annual Training

The City has agreed to conduct annual training for project designers and developers on adopted ordinance and revised standards.

EFFECTIVENESS:

The City has not yet gathered enough data to gauge the effectiveness of this best management practice.

PROPOSED MODIFICATIONS:

No modifications are proposed.

Status of Measurable Goals

ND-5.a: Include Interested Parties in Program Development

No Change:
In the past permit year (2006/2007), City staff had participated with the Sacramento Stormwater Management Partnership in two focus groups with stakeholders from the development community. The City also participated in two half-day Public Workshops on the new Stormwater Quality Design Manual. In addition to these four events, City staff participated with the partnership in several meetings with the Building Industry Association (BIA) to discuss the new standards and concerns with implementation. The BIA meetings are planned to continue quarterly.

Date: 8/8/09 Responsible Party: Chris Kraft, Engineering Manager

ND-5.b: Conduct Annual Training

Ongoing:
The City has provide information to those responsible for compliance--landowners, project designers, project developers, and contractors via the City's website and publications that are available at the City's Permit Center. In addition, City staff mailed out letters to existing stormwater treatment device owners, design engineers, and developers inviting them to attend one of two public outreach sessions designed to introduce the proposed Stormwater Ordinance Amendment and new maintenance requirements for owners of stormwater treatment devices. Sessions were held on August 6, 2009.

About 30 people attended the two public outreach sessions, staff also received in excess of 30 phone calls seeking further information on proposed maintenance requirement for stormwater BMP's. Once staff was able to give attendees and callers a clear background on the Clean Water Act and the City's MS4 permit, there seemed to be a willingness to comply with future maintenance requirements. The biggest concerns seemed to focus on how the whole process would work and what exactly they needed to do to be in compliance. Public Works Staff provided handouts, web addresses and phone numbers to staff that could help walk them through the process.

City stormwater representatives are always available to meet with landowners or consultants upon request. Formal trainings will be developed and scheduled for both City employees and other groups and individuals responsible for compliance in the sixth year of the permit.

Date: 8/14/09 Responsible Party: Chris Kraft, Engineering Manager

Municipal Operations

The Municipal Operations Minimum Control Measure (MCM) requires that the City implement and maintain an operations and maintenance program to prevent or reduce polluted stormwater runoff from municipal operations. Not only does this MCM identify best management practices (BMPs) appropriate to City O&M operations, it also ensures the training of City employees on pollution prevention so they can better assess and manage stormwater related issues.

Preventing harmful stormwater runoff from reaching waterways is the responsibility of the local municipalities as well as the residential and business communities. One of the most important aspects of water pollution prevention is the review of municipal operations. The municipal operations MCM addresses both maintenance of the storm sewer system and stormwater pollution prevention at City maintained sites, i.e., streets, parking lots, parks, and City-owned pools and buildings. Pollution prevention at these City-owned properties can reduce the amount of polluted runoff that enters our waterways. Also, educating City staff and maintaining the storm sewer system and stormwater BMPs can be a cost-effective method of preventing pollution in the City's creeks and streams.

Number of BMPs Associated with Control Measure: 4

Important Dates:

Earliest Start Date: 7/1/2004

End Date: 6/30/2008

MO-1: Inventory and Assess the Potential for Stormwater Pollution in O&M Activities at City-Owned Facilities and in City Field Operations

Responsible Party: Kelye McKinney, Engineer Manager

Start Date: 7/1/2004 End Date: 6/30/2008
Permit years scheduled for initial implementation:

Year 1	Year 2 **X**	Year 3 **X**	Year 4	Year 5

Has Goal Been Accomplished: YES

General Summary

This BMP is intended to develop an inventory of municipal facilities and field operations that may contribute to stormwater pollution. This program includes creating a database of City operated facilities. This database contains fundamental stormwater quality management information on each City facility. This program also consists of reviewing operations and maintenance (O&M) activities at each catalogued facility, assessing these practices for pollutant discharge potential, and selecting appropriate BMPs to mitigate stormwater pollution. The City has committed to the following activities.

a) Maintain Stormwater Pollution Prevention Plans (SWPPPs)

The Stormwater Management Program maintains and submits annual reports for the SWPPPs at the City's Dry Creek Wastewater Treatment Plant, Pleasant Grove Wastewater Treatment Plant, and the City's Corporation Yard. During the 07-08 rainy season, the Stormwater Management Program assumed responsibility for conducting runoff and visual monitoring as required by the General Industrial Permit.

b) Continue Pollution Prevention BMPs

The City is continuing the practice of discharging chlorinated water from City-owned swimming pools to the wastewater conveyance system.

c) Include Other Facilities in SWPPP Program

The City evaluates new City-owned facilities as they are brought on-line to determine need for inclusion in the State's NPDES General Industrial Permit program. Both the Pleasant Grove Wastewater Treatment Plant and the Roseville Energy Park have filed Notice of Intents (NOIs) for the SWPPP during this 2007-2008 reporting period.

d) Identify City-owned Properties and City Field Operations with Stormwater Pollution Potential

The City has identified, prioritized and inspected City-owned properties to evaluate facility and field operations for stormwater pollution potential.

e) Review O&M Policies and Procedures at City Sites with Identified Pollution Generating Activities

The City has evaluated the operations and maintenance policies and procedures at City facilities identified in item (d) above and identified opportunities for incorporation of stormwater BMPs in these City activities.

EFFECTIVENESS:

This BMP had an overall effectiveness level of 2, Raising Awareness. In meeting with the City's divisions and departments to discuss and document daily activities, their awareness of the effects of daily activities' impacts on stormwater quality was increased.

Many of identified City departments have implemented stormwater pollution prevention best management practices. Parks Department changed the location of their vehicle washing activities to reduce the possible impacts to stormwater runoff. The Water Division implemented a new dewatering BMP to reduce the amount of sediment and limit the turbidity contributed to the creeks. The Water, Streets and Parks Departments collaborated together for the rental fees and use of a concrete washout system located at the City's Corporation Yard. These actions resulted in an individual effectiveness level of 4 by reducing the pollutants contributed to the storm drain system from these activities.

The actions taken by the City have proven to be highly effective. Through conducting facility inspections the stormwater awareness of City employees has increased drastically. This is evidenced by an increased number of stormwater complaints originating from City staff, as well as an increased number of requests from other City departments for additional stormwater compliance assistance.

PROPOSED MODIFICATIONS:

None.

Status of Measurable Goals

MO-1.a: Maintain SWPPP at Dry Creek Wastewater Treatment Plant

Ongoing:
The Stormwater Management Program maintains the General Industrial Permit SWPPP at the Dry Creek Wastewater Treatment Plant.

Effectiveness
Staff continues to perform inspections and visual monitoring at the Dry Creek Wastewater Treatment Plant. Past inspections have resulted in the reduction of non-stormwater discharges at this General Industrial permitted site. These inspections and subsequent changes have resulted in is a level 3, Changing Behavior, effectiveness outcome.

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

MO-1.b: Maintain SWPPP at Roseville Corporation Yard

Ongoing:
The Stormwater Management Program maintains the General Industrial Permit SWPPP at the Roseville Corporation Yard.

Effectiveness
Staff continues to perform inspections and visual monitoring at the Roseville Corporation yard. Past inspections have resulted in the reduction of non-stormwater discharges at this General Industrial permitted site. These Inspections and subsequent changes have resulted in a level 3, Changing Behavior, effectiveness outcome.

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

MO-1.c: Continue Pollution Prevention BMPs

Ongoing:
All water from City-owned pools is discharged to the sanitary sewer. The Water Division has implemented a dewatering BMP for water line tie-ins. This BMP is targeted at reducing the turbidity and sediment load. The Electric Department has developed a utility vault dewatering program that has resulted in the reduction of

contaminants discharging to the storm drain system.

Effectiveness
By reducing their contributions of pollutants, chlorinated pool water, to stormwater runoff, Parks Department has reached a level 4 effectiveness. The Water Division and Electric Department also reduced their contributions of pollutants from their dewatering operations and documented their activities.

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

MO-1.d: Include Other Facilities in SWPPP Program

No Change:
During past reporting periods, the City obtained an NPDES permit for the Pleasant Grove Wastewater Treatment Plant and the Roseville Energy Park. Staff continues to perform inspections and visual monitoring at these City General Industrial permitted sites there were no new facilities identified as qualifying for General Industrial Permit coverage in FY 08/09.

Effectiveness
Including these facilities in the SWPPP program has resulted in a level 2, Raising Awareness, effectiveness outcome. The implementation of the SWPPPs and subsequent inspections of these facilities has raised the awareness of the plant personnel of the possible adverse effects of their plant's activities on stormwater quality.

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

MO-1.e: Identify City-owned Properties and City Field Operations with Stormwater Pollution Potential

Completed, No Change:
SWMP staff has prepared an inventory of all City-owned facilities and properties. The inventory uses a GIS relational database which includes maps showing the locations for each City facility. The maps help to prioritize facility inspections by determining which facilities are proximate to environmentally sensitive areas. The Stormwater Management Program has developed Arc GIS database that will track facility inspections and document potential stormwater issues that may be identified.

Activity forms were completed during interviews with the City's departments and divisions including: Parks and Recreation, Streets, Electric, Facilities Management, Solid Waste, Water, and Wastewater. Each activity form was entered into a Microsoft Excel database that was used to prioritize training needs and determine each division's or department's stormwater pollution potential.

Effectiveness:
This BMP has shown an effectiveness level 2, Raising Awareness, during this reporting period. Employees are informed of the potential adverse effects of their activities on the storm drain system, and offered ideas on how to better contain the pollutants of concern during the inspections conducted under this BMP.

See appendix for:
Facilities and Operations Map
Location inventory list
Activity database

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

MO-1.f: Review O & M Policies and Procedures at City Sites with Identified Pollution Generating Activities

No Change:
The Stormwater Management Program met with representatives from Water, Streets, Facilities Management and Parks and Recreation to assist in the identification of specific BMPs for the activities described in the database.

Effectiveness
This BMP has resulted in a level 1, Documenting Activities, effectiveness outcome during this reporting period. Activities that are noteworthy are addressed and further analyzed during BMP implementation of MO-2.

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

MO-2: Review and Assess the O&M Practices Identified in MO-1 as Potential Stormwater Pollution Sources for the Selection and Incorporation of BMPs to the Maximum Extent Practicable

Responsible Party: Kelye McKinney, Engineering Manager

Start Date: 7/1/2006 End Date: 6/30/2008
Permit years scheduled for initial implementation:

Year 1	Year 2	Year 3	Year 4 **X**	Year 5 **X**

Has Goal Been Accomplished: YES

General Summary

This program is intended to finalize and document the inclusion of stormwater BMPs for O&M procedures based on the findings in MO-1. BMPs selected for O&M programs may include stormwater pollution prevention alternatives such as source controls, treatment controls, and materials management procedures. Among these, treatment controls rank the lowest and will only be implemented as a last resort. This program is meant to assess the effectiveness of BMPs currently in place, and identify and select any additional BMPs necessary to protect water quality.

The City committed to:

a) Assess BMPs for Street Cleaning and Repair

The City's Streets Division has implemented an aggressive street sweeping program. Every commercial street is swept twice per month, and every residential street is swept once per month. The Streets Division is expecting the addition of two more street sweeping units to hopefully allow residential streets to be swept once every three weeks. The street sweepers are cleaned at the Dry Creek Wastewater Treatment Plant in an area that drains to the plant's head works.

b) Assess BMPs for Stormwater System Maintenance

The City's Streets Division has assessed and implemented BMPs during storm drain system maintenance. The Parks and Recreation Department performs maintenance to the creeks and streams to prevent flooding due to beaver dams and vegetation overgrowth. Their activities are assessed and entered into the activity database along with the prescribed BMPs.

c) Assess BMPs for Parks and City-Maintained Properties

The City's Parks and Recreation Department has agreed to assess and implement BMPs for landscaping, fertilizing, and pest control at parks and other City maintained properties. The Stormwater Management Program has also advised the Parks and Recreation Department on the placement and maintenance of portable toilets and equipment wash areas.

d) Assess BMPs for Storing Cleaning and Maintenance Materials

The City stores all facility cleaning and maintenance materials indoors away from any drain inlet.

e) Assess BMPs for Trenching, Service Repairs, and Emergency Work

The Stormwater Management Program along with the Water Division has developed a response plan to address water main breaks and the associated BMPs that will be applied to all dewatering activities. The Electric and Water field crews have been trained on what qualifies as an emergency situation and what conditions take precedence over the implementation of stormwater BMPs.

f) Assess BMPs for Pet Waste Management

The City has agreed to assess and implement BMPs for pet waste management and the enforcement of City Ordinances 7.14.010 and 8.02.240 to avoid contaminated runoff to the stormwater system.

EFFECTIVENESS:

The City's approach to stormwater pollution prevention from municipal operations is effective because it has identified and addressed many activities that have a high potential to contribute pollution to the stormwater conveyance system. By addressing activities such as stormwater system maintenance, street sweeping, and providing pet waste bags at the dog parks, the City has changed its behavior in an attempt to reduce the amount of pollution entering the storm drain system. This minimum control measure has shown a level 3 outcome, Changing Behavior, during this reporting period.

PROPOSED MODIFICATIONS:

None.

Status of Measurable Goals

MO-2.a: Assess BMPs for Street Cleaning and Repair

Completed, No Change:
The Stormwater Management Program has interviewed the Streets Division in regards to the BMPs implemented while conducting street cleaning and repair. The Streets Division currently sweeps all arterial roads two times monthly, and sweeps residential streets once per month. Ninety percent of the time, Streets was able to sweep residential streets once every three weeks. The Streets Division purchased two new street sweepers for $199,884.00 each during FY 08/09.

Pollutants generated during street repair and maintenance are controlled to the MEP. BMPs implemented include increased sweeping of areas being repaired as well as the installation of drain inlet protection where applicable. Implementing an aggressive sweeping program usually negates the need for drain inlet protection. The implementation of BMPs for each project is determined on a case-by-case basis by the Streets Division.

The Stormwater program has inspected street repairs performed by contractors to identify additional sources of pollution and require the implementation of the respective BMPs. Major issues addressed included equipment washing practices and the containment of asphalt grindings during removal. The City has also started to jet flush the impacted drain lines after major resurfacing work.

From a municipal operations standpoint, this goal has been accomplished, but the method for repairing and maintaining streets is an ever-evolving process. BMPs will be prescribed and implemented as new repair and maintenance methods are identified

Effectiveness
This BMP removes sediment and other pollutants that would otherwise end up in the storm drain system. As such, it has shown a level 4 outcome, Reducing Loads from Sources, during this reporting period.

See appendix for:
Streets activity sheets

Date: 7/1/2006 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

MO-2.b: Assess BMPs for Stormwater System Maintenance

Completed, No Change:
Stormwater Management Program staff has interviewed and trained the personnel in the Streets Division who perform the storm drain cleaning and maintenance. Effluent from storm drain flushing activities is collected to the maximum extent practicable and disposed of at the Dry Creek Wastewater Treatment Plant. The Parks and Recreation Department performs maintenance in the creeks and streams to prevent flooding due to beaver dams and vegetation overgrowth. Their activities have been documented and entered into the activity spreadsheet identified in MO-1.e. Ninety percent of the time, Streets was able to sweep residential streets every three weeks.

Effectiveness
This BMP removes pollutants from the storm drain system before they reach the waterways of the US and has shown a level 4 outcome, Reducing Loads from Sources, during this reporting period.

Date: 7/1/2006 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

MO-2.c: Assess BMPs for Parks and City-Maintained Properties

Ongoing:
During past reporting periods, the Stormwater Management Program has interviewed the Parks and Recreation Department to identify activities with the potential to discharge pollution to the storm drain system. The activities were entered into the spreadsheet identified in MO-1.e. Equipment washing activities and the location of portable toilets have been addressed and the BMPs identified are currently being implemented on a case-by-case basis. During FY 08/09, the Stormwater Management Program observed the City's Parks and Recreation maintenance procedures regarding port-a-potty location and prescribed BMPs for the activities.

Effectiveness
The information provided to the Parks and Recreation Department has allowed them to change their behavior without impacting their day-to-day operations. This BMP has reached a level 3 outcome, Changing Behavior, during this reporting period.

See appendix for:

Parks activity sheets

Date: 7/1/2006 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

MO-2.d: Assess BMPs for Storing Cleaning and Maintenance Materials

Completed, No Change:
The City currently stores all cleaning and building maintenance materials indoors preventing contact with stormwater and away from drain inlets.

Effectiveness
The City is changing the way in which it handles any cleaning and maintenance materials to prevent their contact with stormwater and to reduce the potential for an accidental discharge to the storm drain system. This BMP has reached a level 3 outcome, Changing Behavior, during this reporting period.

Date: 7/1/2006 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

MO-2.e: Assess BMPs for Trenching, Service Repairs, and Emergency Work

No Change: During past reporting periods, the Stormwater Management Program has interviewed the Electric Department and Water Division to determine the potential for their activities to result in a discharge of pollutants to the storm drain system. The activities have been logged into the spreadsheet mentioned in MO-1.e. BMPs that address the pollutants of concern have been developed and implemented this reporting period. Refer to MO-4.a for the training that was provided to the field employees regarding this activity.

Effectiveness
The training of the field crew staff has set precedence to respond to and act on an emergency situation before addressing any stormwater issues. When the emergency has been abated or is no longer an emergency, any applicable stormwater BMPs will be implemented. This BMP has an effectiveness level 3, Changing Behavior, during this reporting period.

Date: 7/1/2006 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

MO-2.f: Assess BMPs for Pet Waste Management

No Change:
Dogs are prohibited at every City park that isn't explicitly designed for the use of dogs and their owners. There are 3 dog parks in the City and all three are equipped with doggy bag stations that provide dog owners with bags to pick up their pet's waste. By outlawing dogs at City parks the chance of a pet waste discharge from a

City facility is greatly reduced.

Effectiveness
The availability of the dog bags encourages the owners to change their behavior and clean up after their pet. This BMP has an effectiveness level 3, Changing Behavior, during this reporting period.

Date: 7/1/2006 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

MO-3: Review Construction and Development Procedures for City-Owned Facilities for Inclusion of Stormwater BMPs as Necessary

Responsible Party: Kelye McKinney, Engineering Manager
Start Date: 7/1/2005
End Date: 6/30/2008
Permit years scheduled for initial implementation:
Year 1 Year 2 Year 3 **X** Year 4 Year 5X

Has Goal Been Accomplished: YES

General Summary

This program is intended to monitor City construction and redevelopment to ensure that these projects conform to City Standards, and that stormwater controls are included and not overlooked during City project development. This program also involves including stormwater quality provisions in City contract documents and requiring that all contractors hired by the City comply with established BMP controls. The program also includes a formalized structure for stormwater BMP inspection at municipal construction and redevelopment projects.

The City has committed to:

a) Monitor City Projects and Verify BMP Implementation

The City has agreed to monitor City construction and redevelopment projects for conformance with the State General Construction Permit.

b) Require SWPPP and Require Contractors to Comply with BMP Requirements

The City has agreed to include language in City contract documents that requires the submission of a Stormwater Pollution Prevention Plan prior to the beginning of any construction activities. The City has also agreed to require that all contractors hired by the City must comply with the stormwater BMP requirements of the General Construction Permit.

c) Develop Procedure for Inspections

The Construction Management element will develop a procedure for the City's SWPPP inspectors to conduct stormwater BMP inspections at all City projects. The City has also agreed to document the inspection of City construction sites.

EFFECTIVENESS:

This is an effective approach to achieving stormwater compliance at City owned projects as the City's contractors are responsible for ensuring stormwater compliance at City projects, in the past this resulted in many compliance issues being noted by City inspectors. During FY 07/08, enhanced cooperation between the City's inspectors and contractors has greatly decreased the likelihood of a violation at City projects. The exclusion of the draft contract language has put the City's inspectors and contractors on equal ground and provided a good environment for collaboration toward a common goal of stormwater compliance. This paradigm shift is changing the behavior of contractors and City staff alike with regard to non-stormwater discharges at City owned projects and has shown a level 3 outcome, Changing Behavior, during this reporting period.

PROPOSED MODIFICATIONS:

None.

Status of Measurable Goals

MO-3.a: Monitor City Projects and Verify BMP Implementation

Ongoing, No Change:
The City's policy for maintaining stormwater compliance at City construction sites is currently updated to provide the City SWPPP inspectors jurisdiction over City construction projects. This policy closely parallels the City's procedures for private construction projects with the development of a construction site SWPPP and inspection of the implemented BMPs. The Construction Stormwater Runoff element of the Stormwater program has developed contract language and an internal policy to give the City's SWPPP inspectors increased responsibility regarding City construction projects. The inspectors will be responsible for verifying that stormwater BMPs are implemented and maintained at each construction site. This language will be implemented pending the approval of the State's General Construction Permit. If the language satisfies the requirements in the General Construction Permit it will be implemented at the earliest convenience.

Effectiveness
The need for this BMP has been noted, but it has not been fully implemented yet. Currently, it is at a level 1, Documenting Activities, outcome.

Date: 7/1/2005 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

MO-3.b: Require SWPPP and Require Contractors to Comply with BMP Requirements

Ongoing, No Change:
The construction element is developing a policy that would require the project manager to ensure that a SWPPP is developed prior to construction. The contractual language will also require compliance with the State's General Construction Permit and local stormwater regulations.

Effectiveness
Through the development of the draft contract language, the awareness of the City's Capital Improvement Division among other divisions was raised, demonstrating a level 2 outcome, Raising Awareness.

Date: 7/1/2005 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

MO-3.c: Develop Procedures for Inspections

Complete, No Change:
By having the City inspectors work closely with the construction manager, we have greatly reduced the probability of a violation without having to resort to restrictive contract language. This approach allows the contractor the flexibility to comply with stormwater regulations in the most cost efficient manner at each individual project.

Effectiveness
By working with the construction site manager the Stormwater Management Program has assisted in changing the behavior of the City's contractors and reduced the possibility of a prohibited discharge to the storm drain system. This BMP has an effectiveness outcome of level 3, Changing Behavior.

Date: 7/1/2005 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

MO-4: Develop and Expand City O&M Training Programs to Include Stormwater Pollution Prevention

Responsible Party: Kelye McKinney, Engineering Manager

Start Date: 7/1/2004 End Date: 6/30/2008
Permit years scheduled for initial implementation:

Year 1	Year 2 **X**	Year 3	Year 4	Year 5

Has Goal Been Accomplished: YES

General Summary

This program is intended to develop an employee training program to inform staff and maintenance personnel of issues related to stormwater management, including spill prevention, source control, treatment control, materials management, and the concepts of BMP implementation and preventative maintenance. The program involves adding more in-depth training program to those previously offered to personnel in City Fire, Public Works, and Environmental Utilities Departments.

The City has committed to:

a) Train City Staff on SWPPP

The City has agreed to distribute existing SWPPP manuals to facility managers, provide additional copies to facility staff on an as-needed basis, and provide training to familiarize facility staff with the BMPs of the existing SWPPP.

b) Enhance City Training Programs

The City has agreed to enhance existing City training programs for staff by including updated policies and procedures that include stormwater BMPs. The City has also agreed to partner with other jurisdictions and the public or private sector on training in an attempt to minimize costs.

EFFECTIVENESS:

The effectiveness of the trainings is evident in the increased amount of stormwater complaints that are received by the Stormwater Management Program from City employees. Currently, a majority of the City's stormwater complaints are received from City employees. Overall, training City staff on the specifics of the stormwater program and the effects of non-stormwater discharges on receiving waters has caused a level 3, Changing Behavior, outcome.

PROPOSED MODIFICATIONS:

None.

Status of Measurable Goals

MO-4.a: Train City Staff on SWPPP

Ongoing:
SWMP staff continues to train fellow City employees on the specifics of the Stormwater Management Program including the definition of an illicit discharge and how to report a discharge to the proper authorities. During FY 08/09, staff from the Wastewater and Water Department were given a refresher course (2/12/09 and 2/11/09 respectively). These trainings were also tailored to each group's specific activities and include specific BMPs to prevent prohibited discharges to the storm drain system.

Effectiveness
The staff training has resulted in the identification of potential violations by field personnel before they cause a prohibited discharge to the storm drain system. This is a level 3, Changing Behavior, effectiveness outcome.

See appendix for:
Power Point presentation for Water
Power Point presentation for Wastewater Division and rosters

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer

MO-4.b: Enhance City Training Programs

Ongoing:
The Stormwater awareness training will be provided to City employees on a routine basis. The training will be improved and updated through meetings with each division's management personnel. The City maintains a computer database of required trainings for City staff. Stormwater pollution prevention training is included in this list of trainings.

Effectiveness
The Stormwater Management Program has provided training to a number of City departments. In addition, Stormwater staff has attended many different training seminars and has included aspects as necessary into the current training module. This BMP has shown a level 2, Raising Awareness, effectiveness outcome.

Date: 7/1/2004 Responsible Party: Delyn Ellison-Lloyd, Senior Engineer