



2007 Annual Report

Table of Contents

Introduction	3
Floodplain Management Program.....	4
Floodplain Development Permit Review and Approval	5
Floodplain Modifications Studies.....	5
Floodplain Modeling Reviews	5
Citizen Floodplain Inquiries	6
Floodplain Referrals from Arapahoe County	6
Floodplain Management Special Projects - DFIRMS	6
Master Planning Program	6
Completed UDFCD Master Plans	6
On-going UDFCD Master Plans	7
Other Master Planning Activities	7
Land Development Program	7
Land Development Case Reviews	7
Transfer of Land Development Permitting Responsibilities to SEMSWA	8
Technical Review Committee Variances	8
Maintenance Program	8
Infrastructure Maintenance.....	9
Infrastructure Rehabilitation	9
Infrastructure Replacement.....	10
Detention Pond Maintenance	10
Special Maintenance Projects	10
Equipment Report.....	10
Debris and Sediment Removal Report	10
Program Manual	10
Remedial Program	11
2007 Design and Construction Projects	11
2008 Design Projects	11
Remedial Program Manual	12
CIP Program.....	12
2007 Construction and Design Projects	12
2008 Design projects	13
CIP Program Manual.....	13

Water Quality Program	14
MS4 Permit Annual Report to State	14
MS4 Permit Renewal	14
MS4 Permit Transfer	14
Education Outreach Program.....	15
Public Participation Program	16
Illicit Discharge Program	17
Construction Site Controls Program	17
Post-construction Controls Program	18
Municipal Operations Program	18
 SEMSWA Organization	 19
Office Set-up	19
Office Filing System and Project Organization	19
Office Software.....	19
 SEMSWA Procedures and Policies	 20
Organization Chart	20
Personnel Policies	21
Financial Policies.....	21
Project Policies	21
Staff Training.....	21
 SEMSWA Transition Projects	 22
Property Transfer.....	22
SEMSWA Stormwater Fee Development	22
Drainage Inventory.....	22
Program Management Plan.....	23
 Public Relations Program.....	 24
Informational Events	24
Public Meetings	24
Presentations at Conferences	25
Technical Committees	25
Press Releases	25
Articles for Publication.....	25
Awards	25
Coordination Meetings with the City.....	26
Coordination Meetings with the County.....	26
Website.....	26
 SEMSWA Financial Report	 26

Introduction

The Southeast Metro Stormwater Authority (SEMSWA) is a new independent governmental entity formed by the City of Centennial, Arapahoe County, the Arapahoe County Water and Wastewater Authority (ACWWA), the East Cherry Creek Valley Water and Sanitation District (ECCV), and the Inverness Water and Sanitation District (IWSD) after a multi-year planning effort. The Authority, envisioned as the solution to the areas stormwater challenges, was recommended for formation in 2002 by a citizen stormwater advisory committee, and was followed by an intense multi-year effort by a special steering committee of interested parties. Out of this steering committee came the framework of the Intergovernmental Agreement (IGA) that legally formed the Authority in September 2006. The Authority began billing for stormwater management in January 2007. The fees for residents and commercial properties are based on the amount of impervious surfaces that prevent stormwater from being absorbed by the ground. The stormwater that runs off the impervious surfaces must be managed for safety, protection of property and water quality.

The Authority will provide an increased level of stormwater management and oversight than seen previously in the City and County. Funding from stormwater fees will help address critical new construction needs and stepped-up remediation and maintenance efforts. Master plans and studies have identified a backlog of about \$75 million in stormwater capital projects. Authority funding will also provide for improved planning, design and monitoring of stormwater infrastructure and water quality. Examples of maintenance activities include upgrading the infrastructure with improved inlets, outfalls and drainage pipes, and removing debris and sediment for improved conveyance and water quality. These capital and remedial construction efforts, and maintenance activities will help to protect people and property from flooding.

New funding will also allow the Authority to meet Federal environmental regulations and make a difference for water quality. As stormwater flows across the landscape, it can pick up motor oils, fertilizers, pet waste, trash, and other pollutants. Environmental regulations are in place to minimize or prevent these pollutants that come from homes, businesses and industrial sites and enter stormwater runoff. These regulations are part of the National Pollutant Discharge Elimination System (NPDES) regulations, requiring mapping of the entire drainage system, investigating illegal dumping activities, ensuring that construction sites keep their sediment on site, designing and constructing facilities to improve water quality, and educating and involving the public regarding water quality issues. Funding via the Authority fee will allow for necessary water quality improvement efforts in the area.

The boundaries of the new Authority cover the City of Centennial and the developed areas of unincorporated Arapahoe County. The Authority is governed by a board appointed by the entities that are part of the Intergovernmental Agreement (IGA). Authority staff consist of water resource and other professionals who are familiar with the challenges of stormwater management.

By the IGA parties joining together to form a new entity, a more efficient, standardized, and comprehensive approach for stormwater management has been created for the SEMSWA area. Stormwater must be managed for the common good, as runoff does not follow political or subdivision boundaries. The value of property, health of the environment, and quality of life are related to how well storm drain systems are maintained. Regardless of the location, all properties have an effect on the drainage system and on downstream properties. The formation of the Authority will close the funding gap to help protect people and property from flooding, and to protect water quality.

This Annual Report is a compilation of progress to date within the SEMSWA organization and within the program areas of Floodplain Management, Master Planning, Land Development, Maintenance, Remedial, CIP, Water Quality, and Public Relations.

Floodplain Management Program

Floodplain management is a program that utilizes corrective and preventative measures to reduce flood damage to public and private properties through a variety of components, including No Adverse Impact education, floodplain regulations, flood control improvements, and emergency response procedures. SEMSWA, in cooperation with the Urban Drainage and Flood Control District (UDFCD) and other local jurisdictions, develop and update drainageway master plans that mitigate flood hazards for future development. Through SEMSWA's CIP, Remedial, Maintenance, and UDFCD Maintenance programs, SEMSWA compliments the Floodplain Management Program with construction of flood control structures, stormwater conveyance improvements, and drainageway stabilization projects, and the maintenance of these improvements.

SEMSWA advocates sensible development using floodplain management regulations and criteria. For appropriate uses of the floodplain areas, SEMSWA follows the newly updated Arapahoe County Stormwater Management Manual, adopted in early 2007. In order to evaluate the impact of development on the floodplain, SEMSWA cooperates with UDFCD, the Colorado Water Control Board, and FEMA to keep Flood Insurance Rate Maps (FIRMs) and Flood Hazard Delineation (FHAD) studies updated, and revisions reviewed and accepted. SEMSWA participates in the National Flood Insurance Program (NFIP) with the Federal Emergency Management Agency (FEMA). FEMA grants the citizens and businesses in SEMSWA's jurisdiction access to affordable flood insurance as long as SEMSWA regulates and manages the floodplains. Participating in the NFIP also allows SEMSWA access to emergency Federal funds and Federal Grant programs.

Components of the Floodplain Management Program include:











- ✚ Floodplain Development Permit Review and Approval
- ✚ Floodplain Modifications Studies, including CLOMR and LOMR Submittal Review
- ✚ Citizen Inquiries
- ✚ Floodplain Referrals
- ✚ Special projects, including UDFCD's Digital Flood Information Rate Maps (DFIRMS)

Additionally, several projects have been undertaken during the transition of floodplain management duties to SEMSWA, including the following:

- ✚ LOMRS/CLOMR inventory for Arapahoe County, Aurora and Centennial (URS)
- ✚ SEMSWA/Arapahoe County Drainage Basin Summary Information (Ch2MHill)
- ✚ DFIRM source data table (CH2MHill)












Floodplain Development Permit Review and Approval

During 2007, Floodplain Development Permit (FDPs) approvals have been requested for 10 project sites, including:

-  Greenwood Gulch upstream of Monaco Way
-  Inverness Pipeline
-  Happy Canyon WTP
-  Goddard School
-  Big Dry Creek Crossing
-  Piney Creek Drops
-  Cherrywood Bridge
-  Sewerline Rehab. Along Little Dry Creek
-  Copperleaf
-  Broncos Parkway Feeder Line (Excel Energy)

Floodplain Modifications Studies

During 2007, several Conditional Letter of Map Revision (CLOMRs), Letters of Map Revision (LOMRs), and other floodplain modification studies have been reviewed. These include the following development projects:

-  Cornerstar
-  Broncos Parkway @ Cherry Creek
-  Goddard School
-  Vermillion Creek
-  Verona Estates
-  Little Dry Creek @ Arapahoe
-  Kiowa Creek
-  Waterstone
-  Centennial Center
-  L-1 and L-2 Ponds @ Lone Tree
-  W-4 Pond @ Windmill Creek
-  D-1 Pond @ Dove Creek
-  Trails at Strasberg
-  First Creek
-  Cherry Creek Business Center
-  Comanche Creek – Wilburn Property (LOMA)

Floodplain Modeling Reviews

During 2007, floodplain modeling reviews have been performed and include the following:

-  Cherrywood Bridge

Citizen Floodplain Inquiries

During 2007, several floodplain inquiries have been made by the public, including the following:

- ✚ 7747 S. Kittredge Ct.
- ✚ 6850 E. Appleton Cir.
- ✚ Orchard Valley (Prairie Creek) @ Orchard & Parker
- ✚ 5334 S. Prince St.
- ✚ Church on Dry Creek @ xxxx
- ✚ Horse property on Big Dry Creek @ xxxx
- ✚ 19458 E. Euclid Drive

Floodplain Referrals from Arapahoe County

There have been approximately 45 inquiries from Arapahoe County Public Works, Building Department to resolve floodplain questions during the building department permit inspection and approval process. Additionally, there were several requests from the Zoning Department to assist in determining zoning violations, including:

- ✚ TIC Property in CC Business Park
- ✚ 6071 S. Franklin St.

Floodplain Management Special Projects - DFIRMS

Draft Digital Flood Information Rate Maps (DFIRMS) have been prepared for the SEMSWA area by UDFCD. These paper maps are being reviewed by staff. Several problem areas were noted during the preliminary review stage, including Cherry Creek @ Arapahoe Road, Greenwood Gulch, and Little Dry Creek @ Arapahoe Road. These three areas will be revised and included in the final Draft DFIRMS for formal review. A schedule for Public Review of map revisions will be established some time in January 2008, and the public, as well as SEMSWA staff, will have 30 days to make comments. It is anticipated that the DFIRMS will be finalized in September 2008.

Master Planning Program

Master Plans have been prepared in conjunction with UDFCD for most of the major drainageways to ensure that appropriate facilities are constructed, as well as identifying regional solutions to watershed infrastructure needs. These plans are critical tools in ensuring an adequate urban storm drainage system within the City and County.

Completed UDFCD Master Plans

Several Master Plans have been completed during 2007, including the following:

- ✚ Dutch Creek Master Plan documents, including the Flood Hazard Delineation Study (FHAD) and Phase A of the Master Drainageway Plan;

- ✚ Murphy Creek FHAD and Master Drainageway Plan;
- ✚ Cottonwood Creek Maintenance Needs Assessment; and
- ✚ Willow Creek Maintenance Needs Assessment

On-going UDFCD Master Plans

Several master plan studies have been initiated in 2007, as follows:

- ✚ Lower Cottonwood Creek Outfall Systems Plan (IGA signed with UDFCD, consultant under contract)
- ✚ Windmill, Dove, and Lone Tree Creek Master Plan (IGA signed; Request for Proposal (RFP) out)
- ✚ Willow Creek, Little Dry Creek, and Greenwood Gulch Master Drainageway Plan (IGA signed)

Other Master Planning Activities

SEMSWA has been asked to be a referral on the Centennial Airport Master Plan, being done by the Centennial Airport Board.

Land Development Program

The purpose of the Land Development Coordination Program at SEMSWA is to provide referral input on stormwater management infrastructure that SEMSWA will ultimately maintain; to support existing Centennial and Arapahoe County land use criteria and zoning regulations as they pertain to stormwater management; to assist in obtaining UDFCD Maintenance Eligibility for public drainage improvements, and to ensure that stormwater facilities for the purpose of water quality within the MS4 permit area are planned for and installed appropriately. These functions ensure the community a well-planned, adequate, and long term stormwater infrastructure for the development in their area.

An important effort on behalf of land development activities at SEMSWA is the coordination with the water quality controls required for development construction activities, as well as the planning for adequate post-construction water quality facilities within each development. The City and County's Grading, Erosion, and Sediment Control (GESC) program is administered by SEMSWA as part of the land development coordination process during design and construction. The City and County's Post-Construction water quality program is also administered by SEMSWA as part of the land development coordination process, to ensure that all water quality requirements are met.

Land Development Case Reviews

Land development cases are referred to SEMSWA by Arapahoe County, Douglas County, and the City of Centennial, as well as outside of SEMSWA boundaries in Aurora and in the eastern developed areas of Arapahoe County. The land development review process encompasses several phases of review and action items including:

- ✚ Pre-submittal meetings to lay out in advance SEMSWA stormwater requirements

- ✚ Initial or Preliminary Plan Review
- ✚ Site Plan Review and Approval
- ✚ Phase III Drainage Report review
- ✚ Construction Drawing Review and Approval
- ✚ Engineer's Cost Estimate Review
- ✚ Utility Plan Review and Approval
- ✚ GESC Plan Review and Approval
- ✚ Operation and Maintenance Manual Review and Approval
- ✚ Variance Recommendation and Approval

During the 2nd half of 2007, the following referrals for land development and MS4 Permit requirements were conducted by SEMSWA Land Development Program staff:

- ✚ 50 Arapahoe County referrals
- ✚ 40 Centennial referrals
- ✚ 1 Douglas County referral
- ✚ 10 referrals from outside SEMSWA boundaries

During the 2nd half of 2007, the following referrals for capital improvement projects were conducted by SEMSWA Land Development Program staff:

- ✚ 4 Centennial CIP projects
- ✚ 2 Arapahoe County CIP projects
- ✚ 3 SEMSWA CIP projects

Transfer of Land Development Permitting Responsibilities to SEMSWA

Activities completed include the development of Standard Operating Procedures for coordination of land use projects; development of land use referral, review and approval processes; coordination of review and inspection fees; the transfer of stormwater review, inspection and permitting for active development projects from the City and County to SEMSWA ...(Ashley to provide additional details)

Technical Review Committee Variances

SEMSWA's Technical Review Committee (TRC) meets each week to review projects and to approve or reject variances for land development site plans and for CIP projects. The following variances were granted in 2007: (Ashley to provide #s)

Maintenance Program

The routine portion of the SEMSWA Maintenance Program addresses the maintenance of SEMSWA-owned drainageways with a contracted scheduled mowing, trash and debris removal program. Additionally, an important part of the maintenance program work consists of unscheduled, complaint-instigated trash and debris removal on major and minor drainageways in response to citizen concerns of

debris after a storm event. After a letter or call is received at SEMSWA by a citizen, the information is entered into a database, the maintenance group is alerted, and the maintenance personnel inspect the problem in the field. Based on the information gathered, the maintenance crew schedules a cleanup. Citizen concerns also form the basis drainageway restoration work by the Maintenance Program. Based on the information gathered from the citizen, a solution to the problem is determined, as well as the time and cost to correct the problem. If the problem is within the scope of a typical Maintenance Program restoration work project, it is scheduled for construction. If it is outside the Maintenance Program project scope it is transferred to SEMSWA's Remedial or CIP programs.

Maintenance projects consist of a variety of small-scale repairs in response to a citizen concern or a staff-alerted problem, either in a collector system, a neighborhood or along a street. Typical restoration maintenance program projects include:

- ✓ Remove/replace deteriorating cross pan or inlet (Infrastructure Replacement)
- ✓ Upsize inlet to account for increased flows (Infrastructure Replacement)
- ✓ Maintaining detention ponds, including cleaning outlets, installing trash racks or constructing trickle channels (Detention Pond Maintenance)
- ✓ Cleaning and inspecting stormwater conveyance features, and thinning vegetation from a minor drainageway (Infrastructure Maintenance)
- ✓ Removing sediment deposits from culverts, channels, pipes, vaults, and detention ponds (Infrastructure Maintenance)
- ✓ Constructing rundowns or creating low flow channels or swales to facilitate conveyance (Infrastructure Rehabilitation)
- ✓ Localized erosion problems in a minor drainageway or collector system, or at a conveyance structure, involving earthwork, riprap or concrete (Special Maintenance Projects)

Infrastructure Maintenance

Infrastructure maintenance activities include storm grate, storm pipe, manhole, and vault cleaning, as well as inspection of storm sewer systems within the SEMSWA service area. During 2007, the following maintenance accomplishments were reported:

- ✚ 900 storm grates cleaned
- ✚ 90 manholes cleaned
- ✚ 120 vaults cleaned
- ✚ Over 1000 linear feet of pipe cleaned
- ✚ Over 15,000 linear feet of storm sewer lines inspected

Infrastructure Rehabilitation

Infrastructure maintenance activities also include open channel (ditches and swales) sediment removal efforts. During inspection and maintenance activities, problems with any open channels are noted and placed on the Work Program for rehabilitation projects. During 2007, over 8,000 linear feet of open channel conveyance infrastructure were rehabbed, consisting of sediment removal and final grading.

Infrastructure Replacement



During inspection and maintenance activities, problems with the infrastructure are noted and placed on the Work Program for replacement. During 2007, 10 linear feet of storm sewer pipe were replaced. No manhole, vault or grates needed to be replaced in 2007.

Detention Pond Maintenance

Maintenance activities associated with detention ponds include mowing, debris and trash removal, sediment removal, erosion control on embankments, and at the inflow and outflow points, reinforcement of embankments and rundowns, and cleaning of trickle channels and trash racks. During 2007, 12 detention ponds were maintained by the crews.

Special Maintenance Projects

The Maintenance crews occasionally are able to schedule a large enough time block in between scheduled maintenance activities to assist the Remedial Program with special field projects. These projects are designed in-house within the Remedial Program and are of a size to accommodate the level of experience and type of equipment available to the Maintenance Crews. During 2007, the following projects were constructed by the Maintenance Program:

-  Orchard Valley - Pond, outlet and pipe maintenance
-  Willow Creek U/S Rosemary - Debris removal, riprap placement, bank repair

Equipment Report

Equipment maintenance includes regular scheduled mechanical maintenance of trucks, skid loader and mini-excavator that can be done in-house, as well as scheduled repair shop maintenance of the Vactor Truck. Over 200 hours of Maintenance Crew time was used in 2007 for equipment maintenance.

Debris and Sediment Removal Report

A useful measurement for maintenance activities is the tonnage of removed trash, debris and sediment. During 2007, 140 tons of trash and debris, and over 1,000 tons of sediment, were removed from the stormwater infrastructure during maintenance activities, and taken to the landfill for disposal.

Program Manual

A Program Manual that outlines all roles, responsibilities, forms and processes for Maintenance Projects is in development as part of the Program Management Manual transition project. This manual will have budget and financial controls outline, a schedule showing proposed completion dates and key milestones for Maintenance Program activities, QA/QC procedures related to any design of maintenance projects, and the construction of projects, technical construction specifications to be used during the performance of maintenance projects, and the public relations components necessary for working in the public arena and how to distribute information about planned projects, projects beginning construction and completed projects, including website updates.

Remedial Program

Urban areas may require repair and replacement of aging and under-sized conveyance systems. Drainage projects to correct these problems are constructed by SEMSWA's Remedial Program to ensure safe, and efficient control of runoff in the streets during a storm event. The Remedial Program handles drainage issues primarily in the smaller conveyance systems, like tributaries and other collector systems, that convey stormwater runoff to a creek outfall.

Remedial Program projects solve the smaller-scale drainage problems with varying design details required to complete the work. Quite a bit of the design for these projects will be done in-house, and then either bid among a small group of remedial contractors or, if timing is right, completed by the Maintenance Crew as a Special Maintenance Project. Typical Remedial Program projects include:

- ❖ addressing local erosion problems on a drainageway or at a grade control structure,
- ❖ repairing or reconstructing deteriorated or inadequate drainage structures
- ❖ improvements to existing drainage facilities to enhance stability and maintainability
- ❖ restoring channel slopes and banks to enhance or increase conveyance capabilities

All remedial work is coordinated with the SEMSWA CIP Program, so that projects of all sizes and scopes are handled in a similar manner.

2007 Design and Construction Projects

During 2007, several Remedial Program projects were constructed, including:

- ✚ Christensen Lane Pond and Pipe Retrofit
- ✚ Littles Creek Phase I Survey & Evaluation of Storm Sewer System
- ✚ Windmill Creek Preventative Maintenance Pilot Project (UDFCD Maintenance Project)
- ✚ Greenwood Gulch Conveyance U/S Monaco Way (UDFCD Maintenance Project)
- ✚ Big Dry @ Cherry Knolls Park ((UDFCD Maintenance Project)

Several Remedial Program projects have been in the design process during 2007 and are scheduled for construction in the 1st quarter 2008, including:

- ✚ Prairie Creek Conveyance (in-house design & probable Maintenance Program Special Project)
- ✚ Cottonwood Creek Drop Repair and Trail (UDFCD Maintenance Project)
- ✚ Heritage Place 1 and 2 (in-house design & probable Maintenance Program Special Project)
- ✚ Willow Creek #3 – East Tributary D/S Willow Way (UDFCD Maintenance Project)

2008 Design Projects

Several Remedial Program projects are being scoped in 2007 for design in 2008, including:

- ✚ Easter/Verbena Conveyance
- ✚ Arapahoe Plaza (in-house design/build project)
- ✚ Greenfield Channel WQ Retrofit (probable Maintenance Program Special Pproject)
- ✚ Lake Point Estates WQ Pond Retrofit
- ✚ Willow Creek #1 Collector System at Rosemary (in-house design/build project)
- ✚ Willow Creek #2 Collector System (in-house design/build project)

- ✚ Homestead Storm Sewer
- ✚ Panama Storm Sewer
- ✚ Forest Park #1 Outfall and Flared-end Section rehab (in-house design/build project)
- ✚ Forest Park #2 Stream Stabilization

Remedial Program Manual

A Program Manual that outlines all roles, responsibilities, forms and processes for Remedial Projects is in development as part of the Program Management Manual transition project. This manual will have budget and financial controls outline, a schedule showing proposed completion dates and key milestones for Remedial Program activities, QA/QC procedures related to design and construction of Remedial projects, technical construction specifications to be used during the performance of Remedial projects, and the public relations components necessary for working in the public arena and how to distribute information about planned projects, projects beginning construction and completed projects, including website updates.

CIP Program

SEMSWA administers a Capital Improvement Project (CIP) Program with a 5-Year planning horizon to handle major drainageway projects. Major drainageway projects include retrofitting and/or replacement of existing stormwater systems, as well as the construction of new systems to ensure safe and efficient control of runoff in the drainageways to minimize property damage, and to maximize water quality. While the Remedial Program handles the smaller-scale drainage problems, the CIP Program handles the larger infrastructure construction projects. The CIP Program works closely with the Remedial and Maintenance programs to maximize resources among the three programs and to make sure projects of all sizes and scopes are handled in a similar manner.

2007 Construction and Design Projects

During 2007, several CIP Program projects were constructed, including:

- ✚ Holly Hills Detention Ponds 1 and 2
- ✚ Cherry Creek Drops 20 and 21 Stream Stabilization
- ✚ Goldsmith Gulch Flood-proofing Phase I Alternatives Evaluation

Several CIP Program projects have been in the design process during 2007 and are scheduled for construction in the 1st quarter 2008, including:

- ✚ Big Dry Creek - Southwood Outfall (UDFCD CIP Project)
- ✚ Piney Creek @ Caley Replacement Bridge (UDFCD CIP Project)
- ✚ Cottonwood Creek @ Easter (UDFCD CIP Project)

Several CIP Program projects have begun design in 2007 and are anticipated to be constructed within the 2008 timeframe, including:

- ✚ Little Creek System Evaluation – Clarkson & Geddes
- ✚ Big Dry Creek @ Cherrywood Outfall (UDFCD CIP Project)
- ✚ Dove Creek Water Quality Pond D-1
- ✚ Windmill Creek Water Quality Pond W-4
- ✚ Cherry Crest West Phase III Conveyance (UDFCD CIP Project)
- ✚ Dove Hill Estates Conveyance System

Several CIP Program projects to improve the storm sewer system in tandem with new development or re-development are either designed or being designed by the property developer. Projects will be constructed when the developer requests it, but construction is anticipated sometime in 2008. These projects include the following:

- ✚ Dayton Street Storm Sewer (Dayton Townhome development)
- ✚ Antelope Creek Conveyance Improvements at Arapahoe Road (Arapahoe Road Widening Project)
- ✚ Piney Creek – Estancia Outfall (Arapahoe Road Widening Project)

2008 Design projects

Several CIP Program projects are being scoped in 2007 for design in 2008, including:

- ✚ Piney Creek – Buckley to Liverpool Stream Stabilization (UDFCD CIP Project)
- ✚ Little Dry Creek Reach 6
- ✚ Big Dry Creek @ University Conveyance Improvements
- ✚ Big Dry Creek @ Arapahoe Road Conveyance Improvements
- ✚ High Line Canal Improvements – Littles Creek Detention
- ✚ Cherry Crest East Conveyance Improvements

CIP Program Manual

A Program Manual that outlines all roles, responsibilities, forms and processes for CIP Projects is in development as part of the Program Management Manual transition project. This manual will have budget and financial controls outline, a schedule showing proposed completion dates and key milestones for CIP Program activities, QA/QC procedures related to design and construction of CIP projects, technical construction specifications to be used during the performance of CIP projects, and the public relations components necessary for working in the public arena and how to distribute information about planned projects, projects beginning construction and completed projects, including website updates.

Water Quality Program

The goal of SEMSWA's Water Quality Program for stormwater discharges is to reduce the amount of pollutants entering streams, lakes and rivers resulting from runoff from residential, commercial, and industrial areas. The City, County, ACWWA, ECCV, and IWSD, as owners and operators of Municipal Separate Storm Sewer Systems (MS4), were issued a Phase II NPDES stormwater permit in March of 2003. As per the regulation, they are required to develop and implement stormwater management programs, or minimum control measures to include evaluation and assessment, record keeping, and reporting tasks, in six program areas. These six measures, when implemented together, are expected to reduce pollutant discharges into receiving water bodies to the maximum extent possible. SEMSWA as defined in the IGA, will be the holder of the MS4 Permit for the IGA parties for the 2nd permit term, 2008 through 2012.

MS4 Permit Annual Report to State

The MS4 Permit is a 5-Year term, each year ending December 31st, with 2007 being the 5th year of the first permit term. An Annual Report is due to the Colorado Department of Public Health and the Environment (State) each year on March 10th. The report ending December 31, 2007 will be the final Annual Report for the first permit term for each of the IGA parties. It is anticipated that the IGA parties will prepare the Annual Report for Year 5 of the 1st permit term in order to complete their permit requirements. SEMSWA will be responsible to complete Year 1 of the 2nd permit term, due in March 2009.

MS4 Permit Renewal

The first 5-Year Permit term is up on December 31, 2007. The State has issued its guidance for the next 5-year permit term, and will be putting out the document for Public Comment in early 2008. SEMSWA will be renewing the permit for both the City and the County under SEMSWA affiliation, and the special districts will no longer be permit holders.

MS4 Permit Transfer

The Permit Transfer project consists of coordination with the five IGA parties, the current stormwater permit holders, as well as coordination with the Colorado Department of Public Health and the Environment (the State), to put procedures in place to ensure that the permit requirements can be met by SEMSWA.

One of the primary reasons that SEMSWA was formed was to take over the 5 permit holders NPDES MS4 permitting responsibilities. SEMSWA Staff have been meeting bi-weekly since May of 2007 to coordinate the transition of stormwater functions from these five entities to SEMSWA. Activities completed include the development of Standard Operating Procedures for coordination of land use projects; development of land use referral, review and approval processes; coordination of review and inspection fees; the transfer of stormwater review, inspection and permitting of active development projects from the County and City to SEMSWA; coordination of the County and City's municipal operations activities with regard to MS4 regulations, and transitioning activities associated with the MS4 permit and other stormwater management functions.

In order for the permit holders to transfer its MS4 permit to SEMSWA, and for SEMSWA to assume the responsibility for the implementation of other stormwater programs, an agreement is necessary to provide for the delegation of each entity's authority and police powers to SEMSWA. The State requires that an intergovernmental agreement be executed between the five entities and SEMSWA and submitted as a requirement of SEMSWA's permit application to transfer the MS4 permit to SEMSWA. An Implementation Intergovernmental Agreement (IIGA) was prepared for each of the five permit holders. The IIGA provides for the Implementation of the Original IGA that formed SEMSWA, and further defines the roles and responsibilities for the permit holders and SEMSWA with regard to Stormwater management. Highlights of the IIGAs include:

- Delegation of the City and County authority and police powers to SEMSWA to enable SEMSWA to administer and enforce the Illicit Discharge regulations;
- Delegation of the City and County authority and police powers to SEMSWA to enable SEMSWA to administer and enforce the Grading, Erosion and Sediment Control Ordinance and Manual;
- Delegation of the City and County authority and police powers to SEMSWA to enable SEMSWA to administer and enforce the Stormwater Management Manual and certain chapters in the Land Development Code of the City's Municipal Code, and the County's Zoning Regulations within the Land Development Code.
- Provisions associated with stormwater fees, including SEMSWA's reimbursement of MS4 permitting fees to the City and County, and the transfer of drainage basin fees from the City and County to SEMSWA;
- Coordination of specific activities with ACWWA, ECCV, IWSD, City and County in each of the MS4 program areas; including Public Education and Outreach; Public Participation and Involvement; Illicit Discharge Detection and Elimination; Construction Runoff Control; Post-construction Stormwater Management and Pollution Prevention/Good Housekeeping;
- Transfer of MS4 permit responsibility and liability to SEMSWA

IIGA's have been executed with each of the five permit holders. The following was the schedule for approval of these specific IGAs:

- ✚ City of Centennial, December 3, 2007
- ✚ Arapahoe County, December 18, 2007
- ✚ East Cherry Creek Valley Water & Sanitation District, December 3, 2007
- ✚ Inverness Water and Sanitation District, December 7, 2007
- ✚ Arapahoe County Water and Wastewater Authority, December 12, 2007

Education Outreach Program

During this 5th year of the MS4 permits in the City, County, and special districts (2007), SEMSWA has continued to accomplish the following education and outreach activities in order to provide for an

effective program that will make the public a willing partner in efforts to minimize discharge of pollutants from the MS4:

- *Utilize existing partnerships with other groups that have educational goals and existing programs and strengthen new partnerships:* SEMSWA has participated this year in UDFCD MS4 Quarterly meetings, Stormwater Council meetings, Arapahoe County Co-op SPLASH group meetings and activities (like the Western Welcome Week booth, World Monitoring Day booth), Cherry Creek Stewardship Partners activities (like volunteer plantings with the Southcreek HOA at Cherry Creek @ 17-Mile House Park project), and other various public meetings and informational events (see Public Relations section)
- *Develop additional brochures over the term of the permit to address topics of interest and value:* SEMSWA prepared the last brochure required under the permit, a compilation of the four previous utility bill-stuffers completed in years 1 through 4 on tips for homeowners and business owners to prevent pollution
- *Facilitate the public's ability to communicate with the MS4:* SEMSWA facilitated water quality signage at 2 CIP projects, Cherry Creek Drops and Piney Creek Drops, and authored a postcard sent to Centennial and Arapahoe County residents about stormwater management and the formation of SEMSWA with a customer service line to call for more information on stormwater management in the community
- *Continue to be active in participatory events that target new and existing audiences:* SEMSWA staff developed the agenda and coordinated the 9th Annual Cherry Creek Stewardship Partners Watershed Conference (135 in attendance), and were the planning staff for the 3rd Annual Cherry Creek Watershed Run (150 participants)
- *Update IGAs with other stormwater jurisdictions to define NPDES roles and responsibilities:* this will be accomplished with the Permit Transition (see SEMSWA Organization section)

Public Participation Program

During this 5th year of the MS4 permits in the City, County, and special districts (2007), SEMSWA has continued to accomplish the following activities in order to provide for an effective program that will actively engage the public as a participating partner in efforts to minimize discharge of pollutants from the MS4:

- *Maximize opportunities for public to interact to discuss implications of permit implementation:* SEMSWA facilitated water quality signage at 2 CIP projects, Cherry Creek Drops and Piney Creek Drops, and authored a postcard sent to Centennial and Arapahoe County residents about stormwater management and the formation of SEMSWA with a customer service line to call for more information on stormwater management in the community
- *Provide opportunities for the public to understand the 'watershed they live in' and their part in its protection:* SEMSWA prepared the last brochure required under the permit, a compilation of the four previous utility bill-stuffers completed in years 1 through 4 on tips for homeowners and business owners to prevent pollution that has been distributed at several public events, including Western Welcome Week, SEMSWA Open House, World Monitoring Day, and Cherry Creek Conference

- *Participate with the public in activities that promote prevention of pollutants from entering the system:* SEMSWA participated in the Cherry Creek Stewardship Partners outreach activities, including volunteer plantings with the Southcreek HOA at Cherry Creek @ 17-Mile House Park project, Lake Appreciation Day volunteer clean-up efforts, and Biology Teachers Workshop at Cherry Creek at 17-Mile House Park project.
- *Maximize opportunities for the public to provide input into funding mechanisms for water quality projects and programs:* SEMSWA has formed the Stormwater Fee Task Force, and has invited the public to participate in the formation of stormwater management fees in the SEMSWA service area.
- *Update IGAs with other stormwater jurisdictions to define NPDES roles and responsibilities:* this will be accomplished with the Permit Transition (see SEMSWA Organization section)

Illicit Discharge Program

During this 5th year of the MS4 permits in the City, County, and special districts (2007), SEMSWA has continued to accomplish the following activities in order to provide for an effective program that will trace, investigate and eliminate illicit discharges to the MS4:

- *Review the County's existing regulatory mechanisms for adequacy in carrying out the Illicit Discharge, Detection and Elimination (IDDE) program, and develop new regulations, if necessary:* SEMSWA has investigated the new legislative power to allow a County to develop its own ordinances for IDDE, and has found that the County will not be able to develop such an enforcement tool without keeping the permit at the County; SEMSWA will continue to enforce the IDDE program in the County with the Litter Law on the books presently, and in the City with its Illicit Discharge Ordinance.
- *Complete the mapping effort of stormwater resources in the urbanized portions of unincorporated Arapahoe County and the City:* SEMSWA has completed the mapping
- *Educate and train County staff to identify potential problem areas and problem outfalls, investigate the problem, and eliminate the discharge:* SEMSWA Maintenance and Inspection staff have investigated xx incidents; SEMSWA staff conducted IDDE training for maintenance crew and inspection staff, 11/26
- *Utilize a Visual Observation Program (VOP) to identify potential illicit discharge points:* the VOP is in place at SEMSWA and staff are being trained in the use of the VOP
- *Educate the public and County and City staff about their watershed and what they can do to be a part of protecting it:* see Education and Outreach and Public Participation sections above
- *Update IGAs with other stormwater jurisdictions to define NPDES roles and responsibilities:* this will be accomplished with the Permit Transition (see SEMSWA Organization section)

Construction Site Controls Program

During this 5th year of the MS4 permits in the City, County, and special districts (2007), SEMSWA has continued to accomplish the following activities in order to provide for an effective program that will reduce pollutants in any stormwater runoff from construction activities:

- *Update the County's Criteria Manual to reflect the requirements for construction BMPs, including those contained in the Cherry Creek Reservoir Control Regulation, and including guidance on site review procedures:* This was accomplished by SEMSWA staff in 2006

- *Develop a more formalized Inspection Program for Construction BMPs, including enforcement procedures:* This was implemented in 2006, and continues in 2007 (Cindy will give me #'s of inspections)
- *Identify an education and training program for County and City staff that can be made available to developers, contractors and landscapers:* This was accomplished in 2006 and continues to be implemented in 2007
- *Develop a database for tracking inspections and enforcement actions that can assist us in improving the Construction BMP program during the term of the permit:* this was accomplished during the period 2005 to 2006 and continues in 2007
- *Update IGAs with other stormwater jurisdictions to define NPDES roles and responsibilities:* this will be accomplished with the Permit Transition (see SEMSWA Organization section)
- *Establish citizen complaint number and publicize. Track and address citizen complaints:* this was accomplished in 2006 and the SEMSWA Maintenance staff continues to get referrals from the hotline that was established for the City and County citizen concerns. SEMSWA will be publishing its 303-858-8844 number as an additional hotline number for citizen concerns.
- *Update IGAs with other stormwater jurisdictions to define NPDES roles and responsibilities:* this will be accomplished with the Permit Transition (see SEMSWA Organization section)

Post-construction Controls Program

During this 5th year of the MS4 permits in the City, County, and special districts (2007), SEMSWA has continued to accomplish the following activities in order to provide for an effective program that will reduce pollutants in any stormwater runoff from post-construction activities:

- *Update the County's Criteria Manual to reflect the requirements for permanent BMPs contained in the Cherry Creek Reservoir Control Regulation, including guidance on plan review procedures:* This was accomplished by SEMSWA staff in 2006
- *Develop a more formalized Inspection Program for permanent BMPs, including enforcement procedures, including enforcement procedures:* This was implemented in 2006, and continues in 2007 (Cindy will give me #'s of inspections, etc)
- *Develop an Education and Training program for County staff that will be made available to developers, contractors and landscapers:* This was accomplished in 2006 and continues to be implemented in 2007
- *Develop a database for tracking inspections and enforcement actions that can assist us in improving the Post-Construction BMP program during the term of the permit:* this was accomplished during the period 2005 to 2006 and continues in 2007
- *Update IGAs with other stormwater jurisdictions to define NPDES specific roles and responsibilities:* this will be accomplished with the Permit Transition (see SEMSWA Organization section)

Municipal Operations Program

During this 5th year of the MS4 permits in the City, County, and special districts (2007), SEMSWA has continued to accomplish the following activities in order to provide for an effective program that will reduce pollutants in any stormwater runoff from municipal operation activities:

- *Evaluate City and County operations to determine compliance to Pollution Prevention and Good Housekeeping goals:* this was accomplished during the 2004 permit year
- *Prepare runoff control plans for those City and County facilities identified as posing a risk for potential stormwater impacts:* this was done in 2006 and updates continue as needed in 2007
- *Review and/or develop standard operating procedures (SOP) for repetitive City and County operations:* this was done in 2006 and updates continue as needed in 2007
- *Conduct training and education for City and County employees on Pollution Prevention and Good Housekeeping practices:* this was done in 2006 and continues in 2007
- *Update IGAs with other stormwater jurisdictions to define NPDES roles and responsibilities:* this will be accomplished with the Permit Transition (see SEMSWA Organization section)

SEMSWA Organization

Office Set-up

The new SEMSWA office at 76 Inverness Drive East, Suite A, opened on June 21st. The office layout includes 13 individual offices, one Maintenance Crew bullpen, and 10 office cubicles. All the offices and cubicles are equipped with full desk, computer, and phone set-ups, with the exception of the Maintenance Crew bullpen, which contains two desks with computer and phone set-ups, and one small conference table to service 8 staff. Twelve of the offices and 6 of the cubicles are occupied. The file room has two of the expected 4 shelving units at build-out, and the work layout area has 2 of the 5 shelving units anticipated, but they are meeting filing space requirements satisfactorily. The 2008 budget include the addition of 5 staff to complete the office build-out.

Office Filing System and Project Organization

A filing system evaluation for project files was performed by staff in May and June. A filing system was established that would assign unique numbers to projects, yet would have valuable information contained within the number that would assist in rapid identification of the program area, project type and startup of a project. The filing shelves have been arranged to maximize the use of the filing room, and have been labeled for easy reference. Additional filing room shelving will be ordered as soon as a need is identified. A table and chair available for rapid review of a file within the filing room will be ordered in 2008 to minimize the need to take files out of the room when a quick review will suffice.

Additionally, the Cartegraph softwarefile and project management system has been chosen to assist in file management with appropriate cross-referencing capabilities. The software has been purchased and installed, and training classes have been on-going.

Office Software

The Cartegraph Project Management system has been made available to all office staff to track, review, and analyze project information relating to a project, land development case, or to a program area.

GIS mapping capabilities have been added to all staff computers for use in data analysis, meeting preparations and for outside presentations. SEMSWA has moved from a CAD-based mapping and information retrieval system to a GIS-based system. Consultants have assisted in GIS customization for the SEMSWA data with programming to help streamline GIS-related tasks, such as querying data, creating GIS reports, and map and figure preparation.

Additionally, a GIS Map “Easy Button” has been created to allow SEMSWA staff, especially those with little to no knowledge of GIS, to create GIS maps using ESRI’s Arc View program. This easy button allows staff to configure map content, select preformatted templates for display, save the map configuration for later use, load a previous map configuration, and export to either a jpg format for use in common programs, or to Adobe Acrobat’s pdf format for printing to hardcopy.

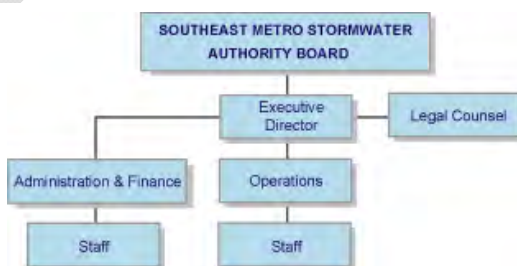
SEMSWA Procedures and Policies

Organization Chart

An Organization Chart has been prepared and distributed to employees. A meeting was held with employees to review the organizational structure and reporting hierarchy. The organization shows responsibilities divided into a series of Program Areas, with a Program Manager in charge of that areas functions and staff. Program Areas include:

- ✚ Floodplain Management, Master Planning and Land Development;
- ✚ Maintenance;
- ✚ Remedial Projects;
- ✚ Capital Improvement Projects;
- ✚ Water Quality; and
- ✚ Special Projects/Public Relations

SEMSWA management includes the Executive Director, the Director of Operations, and the Finance Director, as well as associated Legal Counsel. Administrative functions include the Office Manager, the Receptionist, and the Special Assistant to the Board. The SEMSWA Board is comprised of six members and two alternates from the IGA parties. The Board member appointed by the special districts is a non-voting position on the Board.



Personnel Policies

An Employee Manual has been prepared and distributed to employees, covering topics ranging from leave time to email policies. A Training Class has been held for all employees to highlight priority policy areas.

A Performance Evaluation Form has been developed and made available to supervisory staff. A Training Class has been given to Supervisors on the Performance Evaluation form.

Financial Policies

A Fiscal Policy Manual has been prepared and distributed to employees.

Project Policies

Policies to govern project management functions for CIP, Remedial and Maintenance projects have been prioritized, and the top priority policies have been prepared.

Staff Training

Several staff have attended outside training to gain additional experience in program areas, including:

- ✚ American Society of Floodplain Managers (ASFPM), “Floodplain Management” (Monica Bortolini), June 2007
- ✚ Colorado Association of Stormwater and Floodplain Managers (CASFM). “Stormwater and Floodplain Management” (Ashley Byerley, Dan Olsen, Cindy Edwards, Monica Bortolini, Quang Nuygen, Steve Gardner, Lanae Raymond), September 2007
- ✚ Federal Emergency Management Agency (FEMA), “NFIP Program – Insurance” (Monica Bortolini), August 2007
- ✚ FEMA, “Benefit Cost Analysis Workshop” (Monica Bortolini), September 2007
- ✚ Urban Drainage and Flood Control District (UDFCD), “Waterway Protection During Construction” (Dan Olsen and Amber Law), November 2007
- ✚

All staff have had the opportunity to attend the following internal training sessions:

- ✚ GIS Software and “Easy Button – GIS”
- ✚ Cartegraph File and Project Management System
- ✚ Illicit Discharge Detection and Elimination (IDDE) “Visual Observation”
- ✚ Grading, Sediment and Erosion Control (GESC) for SEMSWA construction projects
- ✚ City and County Stormwater Management Manual
- ✚

SEMSWA Transition Projects

Property Transfer

As part of the MS4 Permit Transfer process (see Water Quality Program), drainageway and stormwater infrastructure property associated with the MS4 permit will be transferred to SEMSWA from the IGA parties. This process requires a detailed legal description, ownership evidence, associated reports, inspections, and other documentation, and written disclosure of any known environmental conditions for the land interest and/or the stormwater infrastructure improvement. SEMSWA will accept all the responsibility, obligation, liability and duty with respect to the transferred property or improvements associated with the MS4 Permit.

Property within the ACWWA service area is in the process of being transferred and will be completed by March 2008. Properties within the ECCV service area will be completed during the first quarter 2008. No properties within the IWSD service area will be transferred to SEMSWA, but will be designated as easements for SEMSWA use. City and County public use easements will be transferred to SEMSWA during the first quarter of 2008.

SEMSWA Stormwater Fee Development

A consultant was hired to assist SEMSWA staff in the development of Basin Development Fees, Permit Fees, and Review Fees. Highlights of the services provided include:

- ✚ Comparative analysis of how other entities set up their fee structure
- ✚ Development of options for charging fees, including basin fees proportional to cost of new facilities, system buy-in, or a hybrid of all of the above
- ✚ Recommendation for fees
- ✚ Modeling of recommended fee to determine revenue generated
- ✚ Facilitation of a task force of stakeholders to assist in the final formation of SEMSWA fees

The initial task force meeting was held xx, 2007, with over 15 stakeholders in attendance...

Drainage Inventory

A Drainage Inventory has been created for the SEMSWA service area using the best available information, including past field survey efforts, drainage system maps, as-built drawings, and data from ACWWA, ECCV, IWSD, the City, and the County. An initial data collection and incorporation effort was required to develop an understanding of the level of detail, quality, and sources of best available data for each section of the SEMSWA service area. Some highlights of the Drainage Inventory effort include:

- ✚ Drainage system maps were geo-referenced in order to accurately display them in the GIS database as a background layer.
- ✚ Field data previously collected by Arapahoe County were incorporated into the GIS system.
- ✚ As-built drawings previously collected by Arapahoe County were inventoried and scanned.
- ✚ Data from ACCWA, IWSD, and ECCV were incorporated as-is and merged into the GIS database.

Once the initial data collection and incorporation effort was completed, a summary of the data was documented in a Technical Memorandum that summarized the data, source, coordinate system, quality and level of detail, as well as the framework of the GIS database in terms of file structure, component summary, attribute information. The scope for the next phase of the Drainageway Inventory is as follows:

- ✚ Locate and incorporate as-built drawings from the drainage system east of I-25, which has been primarily developed after the last update to the drainage system maps in Arapahoe County, including conversion of as-builts to electronic files, geo-referencing the as-builts, and creating a map of the data gap areas;
- ✚ Develop the GIS nodes, lines, and attributes for the database, including building the background layers of aerial imagery, roads, parcels, boundaries, and drainageways using existing field data and any as-built drawings;
- ✚ Develop an asset inventory and valuation to estimate the asset value of the stormwater components in the drainage inventory, including estimating stormwater components in the data gap areas, determining the quantity of assets, estimate the unit costs, convert the cost data at the time of installation, and determining a depreciation approach.

The final report will outline the process taken to develop the drainage system inventory, and will lay out needs for the next phase of the inventory, including an asset valuation for the drainageways, updating GIS components, create a process and specification Standard Operating Procedure for outside agencies to use when providing data to SEMSWA, develop standards for survey and GPS collection by SEMSWA staff, and incorporate additional query, reporting and other features to the GIS database to streamline the efforts.

Program Management Plan

SEMSWA has contracted for services to provide a Program Management Plan (PMP) for the next 20 years for the CIP, Remedial and Maintenance programs. The goal of the Program Management Plan is to establish and document program objectives, processes, schedule, budget, and execution strategies. During the planning process, Program goals and objectives, project identification, project ranking and priorities, technical issues, coordination opportunities, construction administration processes, and quality control will be identified. Policies, procedures and standards related to the CIP/Remedial/Maintenance programs, specifically in the areas of procurement and contracting strategies, document control processes, and project implementation, will be developed. In addition, key performance indicators will be developed to be used as criteria for measuring the each program's success. Finally, the PMP developed for the CIP/Remedial./Maintenance programs will be used as a template to formulate a PMP for all the other SEMSWA program areas.

Public Relations Program

The SEMSWA Public Relations program consists of optimizing opportunities to disseminate information pertinent to stormwater management in the SEMSWA service area. Public Relations components include:

- ✚ Informational Events
- ✚ Public Meetings
- ✚ Presentations at Conferences
- ✚ Technical Committees
- ✚ Press Releases
- ✚ Articles for Publication
- ✚ Coordination Meetings with the City
- ✚ Coordination meetings with the County
- ✚ Websites

Informational Events

Several events were utilized to communicate and distribute informational materials about the new SEMSWA organization in 2007, including:

- ✚ SEMSWA Open House, August 8, 2007
- ✚ Western Welcome Week Festival Day booth, August 18, 2007
- ✚ Cherry Creek "Run for the Watershed" Aid Station, September 29, 2007
- ✚ World Monitoring Day @ Littleton/Englewood Wastewater Treatment Plant, October 18, 2007
- ✚ Cherry Creek Stewardship Partners 9th Annual Conference, November 2, 2007

Public Meetings

The following meetings with the public, including agency representatives and interested parties, have been held by SEMSWA to disseminate stormwater information and include:

- ✚ Southwood Oufall, CIP Project: Public Input Meeting
- ✚ Valley Country Club HOA, Floodplain Review: affected property owners
- ✚ Little Dry Creek @ Arapahoe Road, CIP Project: Public Input Meeting with Sturbridge HOA
- ✚ Willow Creek HOA Board Tour of HOA properties, Maintenance Project: review of easements
- ✚ CornerStar Development, Floodplain Review: affected property owners from Cherry Creek Business Park
- ✚ Village @ Centennial HOA, Floodplain Review: affected property owners

SEMSWA staff also routinely prepare backup material for SEMSWA Board Public Meetings held the 4th Wednesday each month, and open to the public. Updates on program area progress are presented on a regular monthly basis (CIP and Remedial Programs), or on a regular quarterly basis (Maintenance Program), or whenever a special project within a program area requires a status report. These reports to the Board are accompanied by a PowerPoint presentation and associated discussion.

Presentations at Conferences

Several SEMSWA staff have given presentations at regional and national conferences, including:

- ✚ American Society of Floodplain Managers, June 2007 (“Losses Avoided”: Monica Bortolini)
- ✚ Colorado Association of Floodplain Managers, September 2007 (Establishing a Stormwater Utility”: Steve Gardner)
- ✚ Colorado Association of Floodplain Managers, September 2007 (“CASFM Grand Award Finalist presentation for the Cherry Creek Stabilization and Crossing @ 17-Mile House project”: Lanae Raymond)

Technical Committees

SEMSWA staff participate in several Technical Committees within the stormwater management community and watershed resource groups, including:

- ✚ Colorado Stormwater Council, Technical Committee (Cindy Edwards)
- ✚ UDFCD MS4 Committee (Cindy Edwards, Lanae Raymond)
- ✚ Cherry Creek Basin Water Quality Authority Technical Advisory Committee (Lanae Raymond)
- ✚ Arapahoe County Open Space Technical Committee (Lanae Raymond)
- ✚ UDFCD Waterway Protection Task Force (Cindy Edwards)
- ✚ UDFCD Whole Life-Cost of Permanent Proprietary BMP Task Force (Cindy Edwards, Lanae Raymond)
- ✚ Cherry Creek Trail Providers Group (Lanae Raymond)
- ✚ Cherry Creek Stewardship Partners Executive Committee (Lanae Raymond)

Press Releases

Press Releases have been distributed for the following events:

- ✚ Open House, August 8, 2007
- ✚ Formation of Stormwater Fee Task Force, October 2007

Articles for Publication

Articles have been written for various publications, including:

- ✚ SEMSWA Web Site
- ✚ Colorado Water Conservation Board newsletter “Floodstage”

Awards

SEMSWA staff were the recipient of a Colorado Association of Stormwater and Floodplain Managers (CASFM) Grand Award for Engineering Excellence for the Cherry Creek Stream Stabilization and Crossing @ 17-Mile House Park project in September 2007.

Coordination Meetings with the City

Coordination efforts have been on-going with the City during several established meeting opportunities, including

- ✚ Weekly Design Review Committee (DRC) Meetings
- ✚ Weekly Pre-Submittal Meetings
- ✚ Weekly Ms4 Permit Transfer Meetings

Coordination Meetings with the County

Coordination efforts have been on-going with the City during several established meeting opportunities, including

- ✚ Weekly Technical Review Committee (TRC) Meetings
- ✚ Weekly Pre-Submittal Meetings
- ✚ Weekly MS4 Permit Transfer Meetings

Website

The SEMSWA website is utilized for information sharing purposes, including

- ✚ SEMSWA Board posting
- ✚ CIP, Remedial and Maintenance Project Updates
- ✚ Fee calculation information
- ✚ Press releases
- ✚ Recycling Resources
- ✚ Illicit Discharge Hotline number for citizen reporting

All information posed on the web is reviewed to ensure that the content is consistent.

SEMSWA Financial Report

To be provided by Dave Agee after the end of the year compilations are completed....