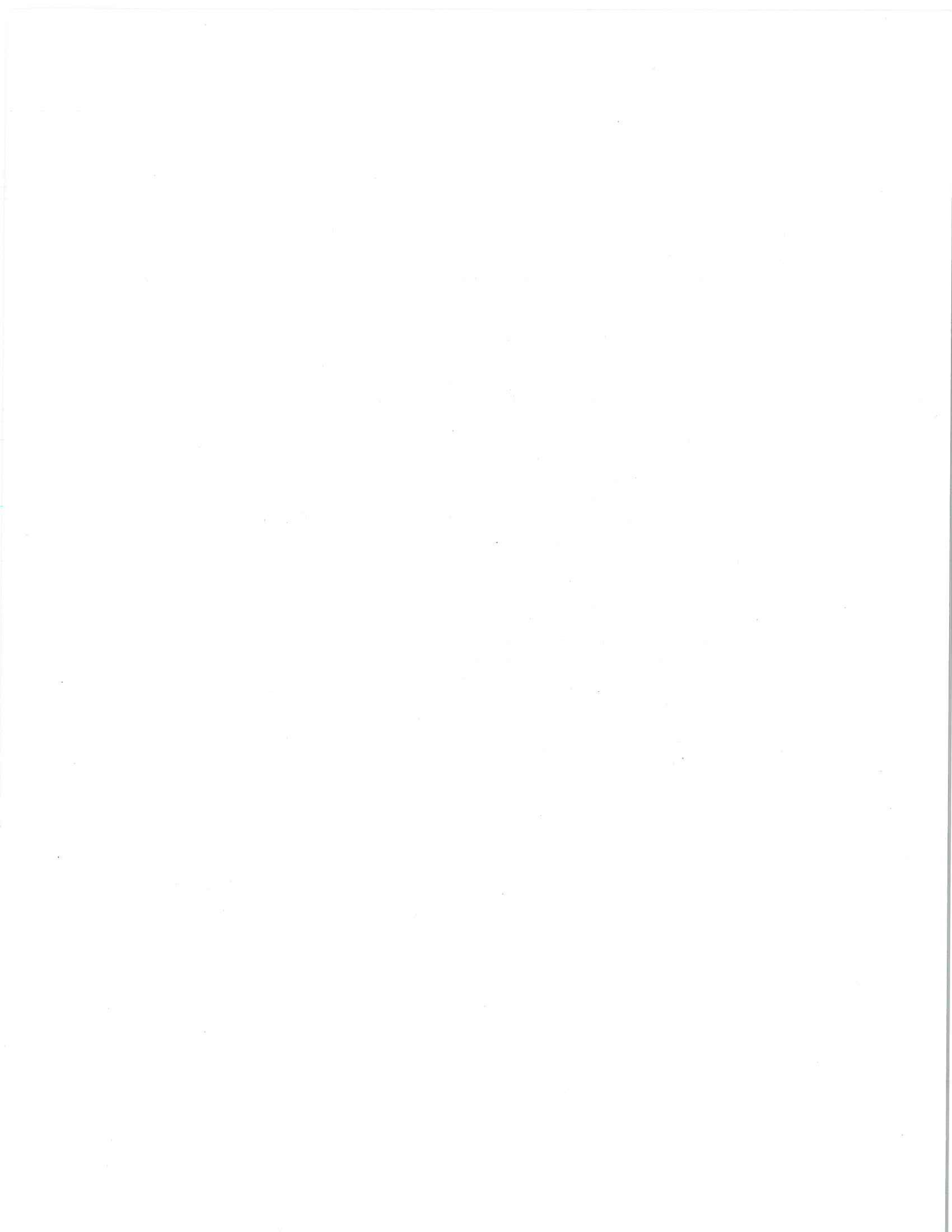


Trends and Changing Influences

The District has gone through several changes since the Watershed Management Plan was written and several more changes are expected in the near future.

1. Water quality has generally stabilized or improved in water resources across the District (and State)
 - a. Regulatory efforts have been effective at various levels
 - b. Changing development pressures
2. SWWD nearing full build-out
 - a. Opportunities for implementation shift from
 - i. Development to re-development and retrofitting
 - ii. Large scale/regional to small scale/site specific
 - iii. Increased importance of in-lake management (legacy pollutants/undesirable communities)
 - b. Maintenance needs increasing
 - i. More BMPs to maintain
 - ii. Some BMPs are nearing the end of their effective lifetimes
 - iii. Contaminants of emerging concern (coal tar sealants)
3. Changing climate
 - a. More frequent, higher intensity storms than storm systems were built to handle
4. Increased collaboration/partnerships
 - a. One watershed/One Plan
 - b. Trading/Banking across jurisdictions
 - c. Increase grant funding (in and out)
 - i. Increased administrative costs
5. Changing regulatory pressures
 - a. New MS4 permit
 - b. New NPDES permit
 - c. TMDLs



The South Washington Watershed District Current Status and Future Planning- January 2013

The SWWD was established in 1993 and received watershed plan (Plan) approval from the State for its first Plan in 1997. The Plan was amended in 2002 to include Central Draw Storage Facility Phase I. The 2002 amendment was intended to extend the length of the plan to 2007 when the SWWD would complete a full update of the Plan. Included in the amendment was needed infrastructure that would convey stormwater and efficiently use available storage acquired by the SWWD in CD-P86. A total of seven improvements were identified in the 2002 Engineers Report and amended into the Capital Improvements Program of the Plan. One of the improvements has since been eliminated two of the remaining six improvements were constructed in 2003 and 2004. Two additional improvements have been preliminarily designed and in 2013 two improvements will be constructed with the CSAH 19-20-22 project.

In 2005 the SWWD Board undertook a total updated of the 1997 Plan. The Plan included updated design information for the CDSF Overflow and Phase I improvements to the CDSF. Between 1993 and 2005 the SWWD had accumulated significant data and completed several studies that establish a basis for the Plan update. In addition to data and studies the Plan was reorganized to create a living document that provides the Board clear guidance for managing the watershed. In 2003 at the request of Washington County, the SWWD was consolidated with the East Mississippi Watershed Management Organization. Approval of the updated Plan in 2007 fully incorporated this sub-watershed into the Plan.

The Plan was amended again in 2009 to include 3 projects for the East Mississippi sub-watershed, Grey Cloud Island Backwater, Clear Channel Pond and the Newport Ravine. Each project includes multi-jurisdictional issues the Cities requested be addressed by the SWWD. Each project has begun and is in various phases from feasibility to completed construction. The Plan was amended in 2011 to include the consolidation of the SWWD and the Lower St. Croix Watershed Management Organization. The SWWD boundary was expanded in 2010 at the request of Washington County. The Lower St. Croix watershed plan had been recently updated by the former organization. The SWWD has incorporated that plan into the SWWD Plan and adopted the Lower St. Croix plan as a guidance document. This has provided a seamless transition for the SWWD to take on management of this sub-watershed.

In 2007 the Plan was designed to serve the SWWD as a reiterative document that allows the SWWD on a routine basis to update the implementation plan. The SWWD is systematically assessing each sub-watershed for water quality purposes. Sub-watershed assessments results in identification of sub-watershed loading sources, a load reduction goal, and a list of potential projects and retrofits to accomplish the goal. This approach allows the SWWD to implement water quality projects in cooperation with Cities, the County or as independent projects as SWWD Capital Improvements. As the SWWD moves forward continued focus on water quality improvement will gain more priority. As the CDSF Overflow project begins construction in 2013 the workload for staff will shift to more water quality implementation.

The South Washington Watershed District Current Status and Future Planning- January 2013

As the SWWD move forward the next 5 years priorities will shift significantly from planning to implementation. Overflow construction will be phased between 2013 and 2018. Completion of subsequent phases will provide the staff time to shift their priority to more resource management/water quality projects. Two elements of SWWD operation will shift as well. The SWWD will need to balance new development and application of SWWD standards with re-development and retrofit projects to improve water quality. The second operational element will shift stormwater utility fees from the overflow project to SWWD projects. This will result in a reduction of the 75% fee and an increase in the 25% or SWWD management area fee. A utility rate of between \$40 and \$50 annually for all three management units is a likely end point. Many of the tools the SWWD will use in the future for implementation are already in place. The SWWD regulatory program is up to date, Cities have approved local plans, the monitoring network will be used to demonstrate improve water quality and that programs and project are meeting standards. Project implementation will use the SWWD Capital Improvement Program and the Coordinated Capital Improvement Program. The implementation approach is three pronged: 1) Regulatory Standards; 2) Water Quality Cost Share; and, 3) Capital Improvements. Implemented projects will mature and create the need to evaluate effectiveness of Best Management Practices both form design efficiency and maintenance requirements. The SWWD will work with other organizations conduct stormwater research.

Staff has prepared the table below illustrating tasks listed in the 2007 Plan. Major tasks identified in the Plan have been evaluated based on completion using the definitions listed above. Staff is asking the Board to review the table and have a discussion about the future direction of the SWWD. What does the Board want the SWWD to look like in 5 years? During the discussion the focus will be on Emerging and Future-Edge categories to ensure we are planning for and working towards priority issues for the SWWD. Completed, On-Going, and Disappearing categories should be reviewed to ensure we have covered major issues and that issues are not being eliminated that shouldn't. Once we have identified upcoming priority issues we will transfer the information from the planning session into actions for the Plan. Staff will prepare a Plan amendment with updated Goals, Policies and Actions with an updated Long Range Work Plan for Board consideration.

The South Washington Watershed District Current Status and Future Planning- January 2013

Definitions:

Completed: Issues in the plan that have been successfully addressed by the SWWD and will remain in the plan, however will receive low priority, low funding and take only intermittent staff time.

On-Going: Issues in the plan that are being addressed through the development of an internal program and will continue indefinitely, the issues are neutral in priority but require periodic staff attention.

Disappearing: Issues in the plan that continue to receive priority for the SWWD, however they will receive less funding and staff time through the life cycle of the plan. These issues may be completed by the end of the planning cycle.

Emerging: Issues in the plan that receive priority for the SWWD and received annual funding in the budget but not fully funded. Staff time dedicated to the issue will increase over the life cycle of the plan. Typically these issues are known and understood, however these issues may be known but not fully understood at this time. In these instances the issue may receive greater priority and funding in the next plan.

Future-Edge: Issues do not currently receive priority for the SWWD or may not be included in the plan. These issues are unfamiliar therefore more work is necessary by the SWWD to determine a future management plan.

(1) Floodplain Mgmt	Completed	On-Going	Disappearing	Emerging	Future-Edge
Projects	<ul style="list-style-type: none"> Established specific floodplain elevations at ultimate development conditions, and seek agreement from involved parties. 			<ul style="list-style-type: none"> LSC & EMW Floodplains 	
Programs	<ul style="list-style-type: none"> Hydrologic Modeling 	<ul style="list-style-type: none"> FEMA Maps Implementation 		<ul style="list-style-type: none"> Floodplain and park/trail use greenway and openspace 	
Administration					
Governance					

(2) Stormwater Runoff						
Completed	On-Going	Disappearing	Emerging	Future-Edge		
Projects <ul style="list-style-type: none"> Maintain 2, 10, and 100 year peak rate of run off for the critical precipitation event Identify the overflow direction and maximum elevations on all development plans for 100-year event Identify and preserve critical areas necessary for temporary storage Newport Ravine Stabilization 	<ul style="list-style-type: none"> Flood Storage Conveyance Design and construct a stormwater storage facility to relieve overflow of Clear Channel pond Design and construction of overflow through the East Ravine subwatershed. Grey Cloud Slough 		<ul style="list-style-type: none"> TP 40 update to evaluate future Regional assessment point and criteria for LSC & EMW 	<ul style="list-style-type: none"> Climate change 		
Programs <ul style="list-style-type: none"> Initiate hydrologic and hydraulic modeling to identify flood prone areas 	<ul style="list-style-type: none"> Emergency Response Plans with Cities 		<ul style="list-style-type: none"> Initiate hydrologic and hydraulic modeling to LSC & EMW Develop tools and performance measures for Design Standards 			
Administration <ul style="list-style-type: none"> Provide assistance for addressing deteriorating emergency flood control structures 						
Governance						

(3) Water Quality					
	Completed	On-Going	Disappearing	Emerging	Future-Edge
Projects	<ul style="list-style-type: none"> • Deicing Equipment • Salt Storage Facility 	<ul style="list-style-type: none"> • Assist and improve snow and ice control 			
Programs	<ul style="list-style-type: none"> • Lake Standards • Numeric lake water quality goals • BMP Program • Stormwater Utility Credits 	<ul style="list-style-type: none"> • Prepare an implement lake specific management plans • Implementation of sub-watershed projects • Agriculture BMP program • Retrofit Assessments • CCIP • BMP Program • Agriculture BMP Program • Stormwater Utility Credits 		<ul style="list-style-type: none"> • Water Quality Education Programs • 4B/TMDL Alternatives • State Stormwater Manual • Street Sweeping • Develop tools to identify projects on the landscape 	
Administration					<ul style="list-style-type: none"> • Hire staff to administer the BMP program
Governance					

(4) Wetlands Projects	Completed	On-Going	Disappearing	Emerging	Future-Edge
<p>Programs</p> <ul style="list-style-type: none"> • Established a method for defining values and classification • Inventoried the wetland resources • Developed a weighting system for managing wetlands • 	<ul style="list-style-type: none"> • LGU for Wetland Conservation Act 			<ul style="list-style-type: none"> • Inventory wetlands in LSC & EMW • Identify methods and processes for protecting high priority wetlands in LSC & EMW • Wetland Credits 	
Administration					
Governance					

(5) Natural Resources	Completed	On-Going	Disappearing	Emerging	Future-Edge
Projects	<ul style="list-style-type: none"> • Greenway Plan • Natural Area ID 	<ul style="list-style-type: none"> • CD-P86 Restoration 		<ul style="list-style-type: none"> • Long Term Maintenance • Development Implementation • CD-P86 Trailhead/Education Center • In-Lake and Stream Habitat and Communities • Aquatic Invasive Species 	<ul style="list-style-type: none"> • Grey Cloud Corridor • St. Croix Bluffs Corridor
Programs					
Administration					
Governance					

(6) Groundwater	Completed	On-Going	Disappearing	Emerging	Future-Edge
Projects	<ul style="list-style-type: none"> • Identified Surface Water Resources • Developed Performance Specifications • Turf Irrigation • Snow and Ice Control 	<ul style="list-style-type: none"> • Regional infiltration impacts • Infiltration for recharge • Snow and Ice Control • Data Collection on Groundwater Levels 		<ul style="list-style-type: none"> • Aquifer management 	
Programs	Karst	<ul style="list-style-type: none"> • Monitoring • Conservation • Aquifer management • Karst 			
Administration					
Governance					

(7) Erosion	Completed	On-Going	Disappearing	Emerging	Future-Edge
Projects	<ul style="list-style-type: none"> • Provide technical and financial support to WCD for erosion control practices • Establish erosion and sediment plans with Cities w/ the NDPES permit process 	<ul style="list-style-type: none"> • Channel Stabilization 		<ul style="list-style-type: none"> • Collaborative oversite w/ Cities and PCA 	
Programs	<ul style="list-style-type: none"> • Create a SWPPP Template 			<ul style="list-style-type: none"> • MS4 Permit 	
Administration	<ul style="list-style-type: none"> • Inspection • Tools • Forms • Assistance 		<ul style="list-style-type: none"> • Inspection • Tools • Forms • Assistance 		
Governance					

(8) Education	Completed	On-Going	Disappearing	Emerging	Future-Edge
Projects	<ul style="list-style-type: none"> • SWWD Website Development 	<ul style="list-style-type: none"> • Website Databases 		<ul style="list-style-type: none"> • Website Tools 	
Programs	<ul style="list-style-type: none"> • EMWREP • MS4 	<ul style="list-style-type: none"> • EMWREP • Public and Private Partnerships to Implement Education Programs • Develop an Education Plan • Outreach 		<ul style="list-style-type: none"> • CAC • Development • Regional Efforts • EMWREP 	
Administration					
Governance					

(9) LRWP					
Projects	Completed	On-Going	Disappearing	Emerging	Future-Edge
Programs	<ul style="list-style-type: none"> • CCIP • Stormwater Utility • Work Plan 	<ul style="list-style-type: none"> • CCIP • Planning • Rules • Design Standards 		<ul style="list-style-type: none"> • Stormwater Utility Fees • Levy • Grant/Contract Management and Enforcement 	
Administration	<ul style="list-style-type: none"> • Developed Accounting Funds • Utility Update 			<ul style="list-style-type: none"> • Staffing • Office Space • Inspections 	<ul style="list-style-type: none"> • Watershed Consolidation
Governance					

(10) Data Mgmt	Completed	On-Going	Disappearing	Emerging	Future-Edge
Projects	<ul style="list-style-type: none"> • Electronic Data on Website 	<ul style="list-style-type: none"> • Electronic Posting of Data on Website 		<ul style="list-style-type: none"> • Cost of Data and Maintenance 	
Programs	<ul style="list-style-type: none"> • Established Modeling Specs • Modeling Protocols • FEMA 	<ul style="list-style-type: none"> • Enforce Modeling Specs 			<ul style="list-style-type: none"> • New Data and Information
Administration		<ul style="list-style-type: none"> • Electronic Catalog of Reports • Monitoring Network 			
Governance					

(1) General	Completed	On-Going	Disappearing	Emerging	Future-Edge
Projects					
Programs					
Administration	<ul style="list-style-type: none"> • Accounting Services and Procedures 	<ul style="list-style-type: none"> • Staff Training 			<ul style="list-style-type: none"> • Staff • Office Space • District Vehicle
Governance					