

**Update to Structural Stormwater
Control Program**

**2010-2014 Surface Water Capital
Improvement Program Summary**

Attachment B4

Surface Water 2010-2014 Capital Improvement Projects

*Highlighted cells indicate Structural Stormwater Control projects

Item	Priority	Project Description and Comments	Proposed Construction	Estimated Pollutant Load Reduction	Flow Control Outcome	Other Environmental Benefits	AKARTIMEP	Monitoring
Flood Control Projects								
Boroughs and Stadium (N4th SBoroughs)	High	This project will upgrade existing storm sewer pipe to remedy localized flooding at various locations within the project limits. This work will consist of the replacement of approximately 2,125 linear feet of existing pipe of various diameters with larger diameter pipe. This work will include a new/replaced storm main to be constructed using horizontal direction drill technologies to the bottom of Canfield Gulch (to be constructed in 2009). This work will go out under a cooperative project with a Tacoma Public Water Department project.	2008/2009/2010	NA	NA	Sediment/Pollutant removal associated with pipe cleaning. Removal of point sources for contaminated groundwater inflow and infiltration.	NA	NA
Vasco Road Improvements	High	Ongoing flooding problem in NE Tacoma exacerbated by Public Works Slayden Road project. One resident has water through his backyard and occasional flooding of his basement. This project will relieve localized flooding on private property and provide relief to undrained drainage ditches currently collecting stormwater.	2010					
Leach Creek High Bin Improvements	High	Work on the holding basin includes construction of a bypass ditch, excavation of forebay and sediment trap areas and some mitigation plus some work on pumps and old force main line.	2011					
Rehabilitation/Replacement Projects								
Stormwater Pipe Retrofit Project - Foos Waterstar includes Strimmon Ecology grant	High	This project has a \$1 million Ecology grant associated with it. The City will rehabilitate deteriorated stormwater pipe in the downtown area with cured-in-place pipe(CIPP) technology. Retrofitting the aged system with CIPP will reduce inflow and infiltration which is a suspected source of contamination/recontamination of the Foos Waterway.	2010	NA	NA	Sediment/Pollutant removal associated with pipe cleaning. Removal of point sources for contaminated groundwater inflow and infiltration.	Project is AKARTIMEP by achieving 100% removal of contamination from inflow and infiltration into the pipes.	NA
56th and Cushman	High	Located north of Wapato Lake. During due diligence work to locate cross-connections these pipes were identified as decayed and failing. There are also capacity issues in this area, which may be remedied by repairing pipe to eliminate groundwater inflow.	2010					
Ongoing Investigation and Rehab	High	Old stormwater WPA lines, are being evaluated for potential sources of recontamination for Teia Foos Waterway. This area is of the highest priority in the stormwater collection system critically analysis due to age and location. Project consists of cleaning and inspecting (internal CCTV) existing stormwater mains.	Ongoing	NA	NA	Sediment/Pollutant removal associated with pipe cleaning. Removal of point sources for contaminated groundwater inflow and infiltration.	NA	NA
Unanticipated/Emergency Projects	High	As our system ages, we are encountering more of these projects each year. Some are emergencies and some must be completed within the construction season.	Ongoing					
Treatment and Low Impact Projects								
Regional WQ Treatment Projects	High	Initial group of projects focusing on known problem areas. Intention is to build one regional treatment facility per watershed then bank treatment for City projects. This would avoid the need for many small treatment units all over the City.	2010					
S. 23rd and Ferry Street Regional Treatment Facility	High	This project proposes to construct a filter cartridge treatment facility which will treat a drainage area of 165 acres. The project has obtained funding under a loan through the Federal American Recovery and Reinvestment Act of 2009.	2010	TSS Removal 69% - 83% Nitrogen Removal 52% - 60% Heavy Metal Removal 42% - 45% Predicted Oil & Grease > 85%	NA	NA	Project is AKARTIMEP by using a CONTECH Storm Filter, by design which has a General Use Level Designation for basic treatment using a zeolite-perlite-granulated carbon media from the Department of Ecology.	NA
Cleveland Way Pump Station - Sediment removal	High	Sediment is a problem in the Pump station. Need to develop the system to remove sediment removal and install pretreatment. Per operations, previously this station needed a small pump added to run during the summer months to save on wear and tear.	2010/2011					
Snake Lake WQ project	High	Sediment is collecting at the North end of Snake Lake. This project would construct a sediment removal device on the storm line in 18th to remove a large percentage of sediment and slow the filling of the north end of the lake.	2010/2011	Pretreatment TSS Removal - 80% coarse/50% fine	NA	NA	Project will be designed to achieve 80% removal of coarse solids, 50% removal of fine and 85% removal of coarse total suspended solids, as identified by the Department of Ecology TAPE protocol, to the maximum extent practicable (MEP) considering the cost associated to low BOD5 and TSS.	NA

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Ongoing LI/Extension Projects								
Ongoing arterial extensions program	High	Various future projects that are unidentified. As budgeted year is closer, budgeted amount decreases due to identification of specific projects and assignment of funds.	ongoing					
Alaska Street Improvements	High	Projects of street improvements on Alaska Street from S. 46th to S. 72nd Street improvements shall include the construction of stormwater treatment facilities, as required per the City of Tacoma Surface Water Management Manual.	2011	To Be Determined	To Be Determined	To Be Determined	To Be Determined	To Be Determined
Ongoing Local Improvement District (LID) program	High		ongoing					
LID 8644	High	5-segment alley paving project; Alley improvements shall include construction of 4, 2-canister Storm Filter catch basins at various locations	2010	TSS Removal 80% - 87%	NA	NA	Projects will be designed to provide stormwater treatment using facilities meeting the design and performance requirements in the Department of Ecology/Stormwater Management Manual for Western Washington or devices approved through the TAPE process.	NA