

Stormwater Management

LOB #370:

OPERATING SUPPORT PROGRAM - CAPITAL IMPROVEMENT PROGRAM

Purpose

Stormwater Services are essential to protect public safety, preserve property values and support environmental mandates such as those aimed at protecting the Chesapeake Bay and the water quality of other local jurisdictional waterways. The Operating Support Program for Capital Improvement contains the staff and leadership who provide for the overall management and implementation of capital reinvestment and capital projects for Stormwater Management. Projects include repairs to stormwater infrastructure, measures to improve water quality such as stream stabilization, rehabilitation, safety upgrades of state-regulated dams, repair and replacement of underground pipe systems, surface channels, structural flood proofing and best management practices (BMP), site retrofits and improvements. This program also supports maintenance programs related to the existing storm drainage infrastructure as it pertains to stormwater conveyance and stormwater quality improvements. In addition, the Urban Forest Management staff provides consultation and review related to tree and landscape issues for the land development process and stormwater-related projects.

Description

Capital Improvement Program

Staff is responsible for the overall management and implementation of capital stormwater projects and engineering design contracts. This includes: establishing and managing project scopes of work, schedules, and budgets; being responsible for coordinating and presenting project related status, schedules, and issues with elected officials, residents, utility companies, state and federal permitting agencies and other County public agencies; negotiating and administering engineering task orders; reviewing and evaluating proposed construction changed orders; and providing support during construction activities.

Stormwater Management Program

Staff is responsible for planning and implementing capital reinvestment for stormwater management facilities in Fairfax County's public maintenance program. This includes: performing asset management including but not limited to inventory of new facilities; planning and implementing life cycle reinvestment via routine and non-routine maintenance; identifying and prioritizing projects to re-establish or replace aging stormwater facility infrastructure; supporting the reinvestment and capital design process; procuring and managing engineering design contracts; establishing and managing project scopes of work, schedules, budgets, and issues with elected officials, residents, utility companies, state and federal permitting agencies and other County public agencies; negotiating and administering engineering task orders; reviewing and evaluating proposed construction change orders; and providing support during construction activities.

Storm Drainage/Infrastructure Reinvestment Program

Staff is responsible for the design and implementation of improvement projects to the storm drainage conveyance system. This includes: planning and implementing storm system asset renewal through repair, rehabilitation, or replacement projects; planning and implementing flood mitigation projects with grading and structure upgrades; minimizing water quality degradation through stream stabilization and restoration techniques; inspecting through surface walking and internal video of the storm conveyance systems; and identifying and prioritizing renewal projects.

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Urban Forestry Program

Staff is responsible for providing support to the planning and implementation teams for Capital Improvement. This includes: consulting on project scoping, plan review, pre-construction meetings, and construction meetings; inspecting construction sites to identify potential problems and impacts to the health and condition of existing trees, preservation potential of trees, mitigating construction impacts to trees designated for preservation, and proposed landscape planting; and providing outreach efforts to property owners impacted by proposed stormwater projects to explain the scope of work and anticipated impacts to trees as well as proposed plantings.

Administration and GIS Support Program

Staff is responsible for providing oversight and coordination of all administrative and GIS functions to support the Capital Improvement Program. This includes: supporting all contractual and purchasing execution for construction project contracts, architectural, engineering, consultant service contracts, and operating supply and equipment purchases; supporting all human resource functions to include employee relations, performance, disciplinary actions, time and payroll processing, benefits, training, organizational development, and recruitment; providing information technology support to include troubleshooting calls, PC replacements, hardware and software upgrades, maintenance, and business solutions; supporting all finance, accounting, and budget requirements; providing all clerical and communication functions; and providing all GIS functions related to asset management, inventory, and mapping.

In addition, budget oversight includes:

- Fund 30010, General Construction and Contributions
- Fund 30060, Pedestrian Walkway Improvements
- Fund 30090, Pro Rata Share Drainage Construction
- Fund 40080, Integrated Pest Management Program
- Fund 40100, Stormwater Services
- Agency 87 Transportation Programs (Fund 10001, General Fund)

This LOB is performed with 64.0 FTE to include: 51.0 FTE Project Implementation Staff, 3.5 FTE Urban Forestry Staff, 7.9 FTE Administration Support (Human Resources (HR) administration, Finance administration, Procurement/Contracting, GIS), 0.3 FTE HR Manager, 0.3 FTE Management Analyst IV who coordinates the oversight of human resources, financial, procurement, contracting management and information technology, 0.5 FTE Stormwater Planning Director who oversees all operations of the Stormwater Planning Division and 0.5 FTE Urban Forestry Director who oversees all operations of the Urban Forest Management Division.

This LOB supports projects, appropriations, and staff in the Stormwater Allocations to Towns LOB, Stream and Water Quality Improvement Projects LOB, Emergency and Flood Response Projects LOB, Dam Safety and Facility Rehabilitation Projects LOB, Conveyance System Rehabilitation Projects LOB, and Flood Prevention –Huntington Area Bond Projects LOB. All staff working for the LOB is designated as emergency personnel, and as such, is required to be available for service 24 hours per day, seven days per week.

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Benefits

The Operating Support Program for Capital Improvement is key to maintaining the mission of Stormwater Management to plan, design, construct, operate, maintain and inspect the infrastructure, and perform environmental assessments through coordinated stormwater and maintenance programs in compliance with all government regulations utilizing innovative techniques, customer feedback and program review, and to be responsive and sensitive to the needs of the residents, customers and public partners. Benefits include:

- Providing essential services for capital project implementation of County capital improvements, project planning and implementation of the CIP
- Performing leadership and administration that promote programs that improve the quality of life for its residents
- Supporting and guiding initiatives and manages resources that support financially cost-effective stormwater infrastructure in a safe, timely and environmentally-sound manner countywide.
- Supporting and guiding initiatives and manages resources that support the health of the County's Tree Canopy
- Providing critical support to allow the organization to meet many Board of Supervisors and County vision elements, which would not be possible without capital improvement staff and leadership.
- Providing Capital Improvement staff and leadership to assure effective management of resources, efficiency and effectiveness
- Assuring accuracy and compliance with internal and external financial requirements.

Mandates

Although the Operating Support Program for Capital Improvement is not mandated, this LOB is critical in ensuring compliance with:

- Federal Grants, Federal Pass Through Grants, State Grants
- Federal Debarment rules, Davis Bacon Act
- Ensuring compliance with contractual agreements with vendors
- External Financial Guidelines, GASB requirements
- Internal budget/financial/human resource/IT policies and procedures for Fairfax County
- Adopted Five Year Capital Improvement Plan; Planning and implementation of the County CIP
- Fiscal requirements
- Contractual execution and oversight
- Chesapeake Bay Act and MS4 Permit

Trends and Challenges

The major challenges and trends associated with this LOB include:

- As development continues in Fairfax County, the length of storm drain pipes and stormwater management facilities increases, leading to greater inventory.
- As the older infrastructure within the County ages, the resources in this LOB are challenged to rehabilitate, repair or replace infrastructure using the latest, most cost-effective technology.

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- Rapidly expanding program requirements due to the growth of inventory and the increased regulatory compliance requirements, as well as increasing performance expectations are placing extreme challenges on limited in-house resources and staff.
- Financial complexity and reporting leading to increased budget and financial oversight
- Greater demands and keeping pace with industry for information technology solutions.

Resources

Category	FY 2014 Actual	FY 2015 Actual	FY 2016 Adopted
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FUNDING			
Expenditures:			
Compensation	\$3,911,223	\$4,021,264	\$4,551,861
Benefits	1,670,962	1,697,759	2,109,605
Operating Expenses	747,312	874,201	863,998
Total Expenditures	\$6,329,497	\$6,593,224	\$7,525,464
Total Revenue	\$0	\$0	\$0
POSITIONS			
Authorized Positions/Full-Time Equivalents (FTEs)			
Positions:			
Regular	60 / 60	64 / 64	64 / 64
Total Positions	60 / 60	64 / 64	64 / 64

Metrics

Metric Indicator	FY 2013 Actual	FY 2014 Actual	FY 2015 Actual	FY 2016 Estimate	FY 2017 Estimate
Total Project Appropriations	\$62,980,278	\$60,803,667	\$63,870,351	\$66,065,415	\$72,743,928
Number of FTE	58	60	64	64	64
Total Project Appropriations per FTE	\$1,085,867	\$1,013,395	\$997,974	\$1,032,272	\$1,136,624

These metrics depict the growth in budget appropriations as well as the efficiency of the dollar value managed per FTE. As funding increases, the number of projects established and managed increases. These projects are actively managed through the planning, design, and construction phases. The increase in projects and project types also requires increased oversight of contractual obligations, financial funding, resources, budget management, accounting of transactions, and information technology needs. This metric gauges staff workload levels and staff efficiency.