

DISTRICT
DEPARTMENT
OF THE
ENVIRONMENT



STORMWATER TMDL IMPLEMENTATION PLAN

MEETING MINUTES

Meeting Date: August 26, 2013

Meeting Location: DDOE

Approval: **Final**

1 ATTENDANCE

Name	Organization	Present
Jeff Seltzer	DDOE	Y
Hamid Karimi	DDOE	Y
Jonathan Champion	DDOE	Y
Shelia Besse	DDOE	Y
Brian Van Wye	DDOE	Y
Martin Hurd	DDOE	Y
Steve Saari	DDOE	Y
Nicoline Shulterbrandt	DDOE	Y
Tim Schmitt	Limnotech	Y
Dan Herrema	Limnotech	Y
Veronica Davis	Nspiregreen	Y
Chancee` Lundy	Nspiregreen	Y
Tim Fields	Michael D. Baker	Y
Ryan Campbell	Michael D. Baker	Y
Hye Yeong Kwon	Center for Watershed Protection	Y
Laura Chamberlain	Alice Ferguson Foundation	Y
Donal Barron	DC Water	Y
Becky Hammer	NRDC	Y
Kaitlyn Bendik	EPA Region 3	Y
Mike Bolinder	Anacostia Riverkeeper	Y
Robin Broder	Potomac Riverkeeper	Y
Carmen Franks	DDOT	Y
Ross Mandel	ICPRB	Y
Jenny Molloy	EPA	Y

2 MEETING PURPOSE

Kick-off meeting with the Stakeholder Group on August 26, 2013

3 MEETING LOCATION

Building: District Department of Environment

Conference Room: 718

Conference Line: NA

Web Address: NA

4 MEETING START

Meeting Actual Start: 1:06 PM

5 AGENDA

- **Welcome**

Hamid Karimi, Deputy Director at DDOE, welcomed everyone. He thanked everyone for their participation in this process. He stated this process would be open and transparent from the beginning. He stated that members of the Stakeholder Group may not agree on every point, but an open process will lead to a better plan. He emphasized it is important to communicate, so that there is continuity throughout the project.

If there are any issues, suggestions, or thoughts between meetings, contact Jeff Seltzer or Jonathan Champion at DDOE. In addition if there are any research or best practices that should be shared with the group, please send them to the DDOE contacts as well.

- **Introductions**

Everyone stated their name, title and the organization they represent.

- **Overview of the Agenda**

Jeff Seltzer from DDOE provided an overview of the agenda. (Attachment B - Agenda)

- **Stakeholder Group Overview**

Tim Fields and Chancee' Lundy from the consultant team provided a brief overview of the goals, mission, roles of the stakeholder group, and role of DDOE in supporting the stakeholder group. A handout was provided to the members of the stakeholder group that outlines the information that Mr. Fields and Ms. Lundy presented. (Attachment C – Presentation and Attachment D – Stakeholder Group Charter)

Mr. Seltzer and Mr. Champion emphasized that the monthly meeting schedule will adjust to align with deliverables. There will not be meetings for the sake of meetings. In addition, there may be an opportunity to have meetings via teleconference.

There were no questions or comments.

- **DDOE Overview of Consolidated TMDL Implementation Plan and Revised Monitoring Framework**

Mr. Champion and Mr. Seltzer from DDOE provided an overview of the project. Mr. Seltzer explained the history of DC's TMDLs, and the data used to create them. DDOE does have an enforceable permit, which requires this work to be completed. In addition, the pollution reduction milestones that will be developed by this implementation plan will become enforceable components of the District's MS4 Permit once finalized. The plan will also establish an adaptive management process to be in place during the TMDL implementation.

Mr. Champion stressed that stakeholder engagement is vital to this TMDL process. A formal 30-day public comment process will also occur at the end of this project. Updates and additional information will be posted to a project website for the stakeholder group to review.

Mr. Seltzer emphasized that DDOE must submit the TMDL implementation plan and the revised monitoring framework to FPA by May 15, 2013. DDOE will create a project

website where all deliverables will be available to the public (Attachment C – Presentation).

There were no questions or comments.

- **Consultant Team Project Plan**

Dan Herrema from the consultant team introduced the members of the project team and provided an overview of the project plan. (Attachment C – Presentation)

Mr. Herrema stated the draft documents would be provided about two months before the final document is completed. There may be some instances where the stakeholders may provide input on a document before the consultant team completes the draft.

He stated the consultant team expects a draft TMDL methodology in September 2013 and a final draft in November 2013. The modeling will occur through most of 2014. The revised monitoring program will start in the next quarter 2013 and will be completed a few months before the May 2015 deadline.

Mr. Herrema provided context by showing maps of the MS4 areas and Federal Lands in the city. He stated there are 381 MS4 waste load allocations in the 3 major waterbodies in DC. There are 23 different pollutant types in several major categories. The team is beginning to compile and access all of the TMDLs and WLAs.

For the TMDL implementation plan, the team will inventory all the Best Management Practices to determine what can be achieved. There are 13 categories of BMPs.

Mr. Herrema stated that the team is currently collecting data from existing TMDLs. There may be a need to collect additional data. The team looks forward to sharing the data with the Stakeholder Group as the TMDL methodology is being drafted.

- **Discussion**

Jenny Molloy from EPA Headquarters asked if the TMDL implementation plan would include an implementation schedule once the plan is approved. She stated that many of the members of the stakeholder group are going to be concerned about that schedule. Mr. Seltzer responded that the plan would include implementation milestones and commitments. In developing this schedule, the District will have to consider the balance between what is reasonable/feasible and the resources available.

Steve Saari from DDOE asked if there would be check-in points with EPA to understand what they are willing and not willing to accept. Ms. Molloy responded that one of the reasons she is part of the Stakeholder group is so that does happen. Mr. Herrema stated it is important to get feedback from EPA on the model inputs.

Brian Van Wye from DDOE asked how at the end of this will there be a tool to reassess to accommodate changes in technology and funding. Mr. Champion stated that one of the goals of the plan is to have a tool to reassess. Mr. Seltzer stated that the consultant team would develop a tool that will be housed at DDOE. DDOE staff will receive training

on how to use it. Mr. Herrema stated that the model would be adapted to new information and guidance from EPA.

Mr. Van Wye asked if there was any key stakeholder organization that was not in the room. Mr. Seltzer stated that the DC Building Industry Association is part of the Stakeholder Group, but there were unable to attend today. He stated that if people believe there is anyone missing, please let DDOE know. Mr. Champion stated that there would be outreach to a wider group of stakeholders at key points throughout the process. Ms. Sheila Besse from DDOE stated that there should be a representative from one of the universities/academic community.

- **Next Steps**

Mr. Herrema stated that to extent possible it is important to have face-to-face meetings. There may be technical meetings with a smaller subset of the Stakeholder Group. In addition, there may be an opportunity for web meetings to ensure that everyone is receiving the same information.

Dr. Karimi stated that some decisions might occur outside of the stakeholder process as the team goes through data. It is important for the consultant team to document the decisions that are made throughout the process and share that with the Stakeholder Group.

Mr. Herrema stated at the next meeting the consultant team would share the draft TMDL implementation plan methodology. This will include baseline scenarios and underlying data used. Also at this meeting, the consultant team will provide a detailed timeline with deliverables to the Stakeholder Group.

6 POST MEETING ACTION ITEMS

Action	Assigned To	Deadline
Send the meeting minutes, presentation, and list of attendees out to participants	Chancee` Lundy	September 3, 2013

7 DECISIONS MADE

- Decisions were made on topics to present at the next meeting of the stakeholder group.

8 NEXT MEETING

Next Meeting: AS NEEDED

9 MEETING END

Meeting End: 2:25 PM

10 ATTACHMENTS

- A – Agenda
- B – Presentation
- C – Stakeholder Contact Sheet
- D – Stakeholder Group Charter



Consolidated TMDL Implementation Plan and Revised Monitoring Framework Stakeholder Group

Meeting Agenda

**August 26, 2013
1:00 PM – 3:00 PM
DDOE, Room 719**

- | | |
|------------------|---|
| 1:00 P.M. | Welcome <ul style="list-style-type: none">• Introductions• Overview of Meeting Agenda |
| 1:15 P.M. | Stakeholder Group Overview <ul style="list-style-type: none">• Mission and Goals• Members' Roles• DDOE's Roles• Stakeholder Meeting Schedule |
| 1:45 P.M. | DDOE Overview of Consolidated TMDL Implementation Plan and Revised Monitoring Framework <ul style="list-style-type: none">• Requirements<ul style="list-style-type: none">○ Consolidated TMDL Implementation Plan○ Revised Monitoring Framework• Challenges• Stakeholder/Public Involvement |
| 2:00 P.M. | Consultant Team Project Plan <ul style="list-style-type: none">• Roles & Responsibilities• Overall Project Scope<ul style="list-style-type: none">○ Consolidated TMDL Implementation Plan○ Revised Monitoring Framework• Project Schedule• Project Context (primer slides) |
| 2:30 P.M. | Discussion <ul style="list-style-type: none">• Questions and Suggestions• Follow-Up Action Items |
| 3:00 P.M. | Adjournment |

District Consolidated TMDL Implementation Plan and Monitoring Program

Stakeholder Kick-Off Meeting
August 26, 2013

AGENDA

- Introductions
- Stakeholder Group Overview
- Project Overview
- Consultant Team Project Plan
- Discussion
- Adjournment and Next Steps

STAKEHOLDER GROUP OVERVIEW

- Mission/Goals
- Members' Role
- DDOE Role
- Schedule

STAKEHOLDER GROUP OVERVIEW 1

- **Mission**

- Obtain stakeholder input and understanding of the process, methodology, and deliverables related to the DDOE Consolidated TMDL Implementation Plan and revised monitoring framework.

- **Goals**

- Create a mechanism for communicating with key stakeholders on major topics and issues.

GOALS (CONT'D) 2

- Provide a mechanism for discussing coordination and schedule issues with key stakeholders.
- Provide an avenue for key stakeholders to present their observations, questions, and concerns.
- Provide a mechanism for discussion of diverse stakeholder perspectives among the Stakeholder Group.
- Ensure adequate time and opportunity for the Stakeholder Group to provide input.

MEMBER ROLES 3

- Serve in a voluntary capacity, and attend all regularly scheduled meetings.
- Select one alternate member.
- Arrive at each meeting prepared to discuss the issues on the agenda.
- Represent the views of his/her constituents as well as his/her own individual views.

DDOE ROLES 4

- Conduct meetings in an orderly and expedient manner.
- Designate a facilitator to manage the discussion as needed.
- Participate in and conduct educational briefings related to project activities.
- Involve key DDOE project team and technical staff in meetings as required.

DDOE ROLES (CONT'D) 5

- Provide good faith answers to members' questions.
- Consider in good faith the input of the members and provide responses to that input.
- Compile agenda items for each meeting.
- Provide written notifications of upcoming meetings.
- Arrange for distribution of meeting notes.

STAKEHOLDER GROUP MEETING SCHEDULE

6

- Group will meet approximately once each month at DDOE.
- DDOE may request other special meetings as needed.

PROJECT OVERVIEW: CONSOLIDATED TMDL IMPLEMENTATION PLAN

- Required by Section 4.10.3 of District's MS4 Permit
- Consolidated TMDL Implementation Plan for all TMDLs with WLAs assigned to District MS4 discharges, to include:
 - Schedule for attainment and, where applicable, interim milestones and numeric benchmarks
 - Demonstration of how each applicable WLA will be attained
 - Narrative for the schedules and controls
- Must be made available to public for review and comment and submitted to EPA for approval by **May 2015**

REVISED MONITORING PROGRAM

- Required by Section 5.1 of District's MS4 Permit
- Revise District's monitoring program to:
 - Make wet weather loading estimates.
 - Evaluate the health of the receiving waters.
 - Include any additional necessary monitoring
- Must be made available for public review and comment and submitted to EPA for approval by May 2015

CHALLENGES

- Scope of Overall Effort
- Possibility to Consolidate similar TMDLs
- History of TMDL development
- Monitoring and compliance tracking
- Not just an exercise/study – leads to an enforceable document
- Need for Practical Decision-making and Adaptive Management

STAKEHOLDER AND PUBLIC OUTREACH AND ENGAGEMENT

- Critical element to success of effort
- Stakeholder Group convened to participate and actively assist in development of TMDL and Monitoring plans
- Still a formal public notice and comment period at end of process, as well

CONSULTANT TEAM AND PROJECT PLAN

LimnoTech

- Project management; subcontractor management; overall technical direction and QA/QC; lead technical tasks
 - Dan Herrema, Project Manager
 - Mike Sullivan, Technical Advisor
 - Tim Schmitt, Task Manager
 - Anouk Savineau, Task Manager
 - Heather Bourne, Task Manager
 - Brian Busiek, Senior Technical Support

CONSULTANT TEAM AND ROLES

➤ Peer Consultants P.C.

- Planning and technical support

➤ Nspiregreen

- Stakeholder/public participation, development of growth scenarios, technical support

➤ Michael D. Baker, Inc.

- Stakeholder involvement, facilitation, strategic communication

CONSULTANT TEAM AND ROLES

(CONTINUED)

- Low Impact Development Center
 - Evaluation and planning for potential green infrastructure and other BMP technologies
- Apex Companies, LLC
 - Review and update of monitoring plan, technical support
- Stratus
 - Environmental benefits of TMDL implementation plan and BMP strategies
- Dr. Tom Grizzard (Advisor)
 - Technical Advisor, monitoring and BMPs

OVERALL PROJECT SCOPE

- Consolidated TMDL Implementation Plan
 - TMDL Implementation Plan Methodology
 - TMDL Implementation Plan Model
 - Consolidated TMDL Implementation Plan
- Revised Monitoring Framework
 - Review of needs/requirements
 - Review existing programs/components
 - Cross-walk Comparison
 - Revised Monitoring Framework
- Supporting Components
 - Public Participation (Stakeholders, technical group, managing comments/input)
 - Project Coordination

IMPLEMENTATION PLAN

Consolidated TMDL Implementation Plan is a strategic planning effort for achieving CWA goals for the District's waters

The Plan will include:

- Summary and history of TMDLs in DC
- Evaluation of applicable TMDLs/MS4 WLAs
- Summary of implementation to date
 - Structural and non-structural BMPs
- Modeling of current and future (growth/development) scenarios
- Plan to close gaps in implementation
- Schedule for compliance with each TMDL with benchmarks
- Discussion of stakeholder and public involvement
- Integration with other plans/programs
- Potential sources for funding

REVISED MONITORING PROGRAM

- Revised Monitoring Program Goals
 - Address existing and future needs to make wet weather pollutant loading estimates
 - Track progress towards TMDL WLAs
 - Evaluate overall health of receiving waters, including via biological and physical indicators
- Revised Monitoring Program will include:
 - Evaluation/summary of current program
 - Evaluation/summary of current requirements
 - Evaluation/summary of future needs (source identification, WLA tracking, etc.)
 - Recommendations for revising monitoring program to meet current regulatory and anticipated future TMDL tracking and MS4 reporting needs

SCHEDULE

	2013									2014									2015					
Task Name	3rd Quarter			4th Quarter			1st Quarter			2nd Quarter			3rd Quarter			4th Quarter			1st Quarter			2nd Quarter		
	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun
Consolidated TMDL Implementation Plan																								
Implementation Methodology																								
Modeling																								
Consolidated TMDL IP																								
Revised Monitoring Program																								
Review Monitoring Needs and Requirements																								
Review Existing Monitoring Programs																								
Crosswalk Comparison																								
Revised Monitoring Framework																								

DC's Municipal Separate Storm Sewer System (MS4)

District of Columbia Source Areas

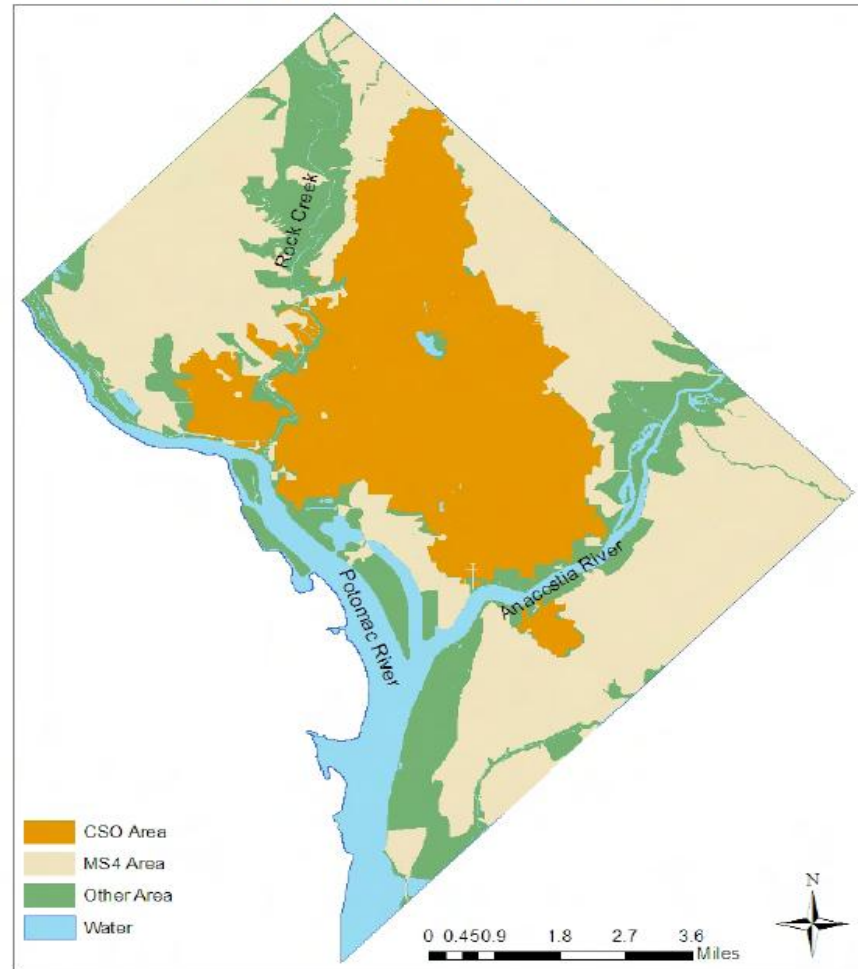
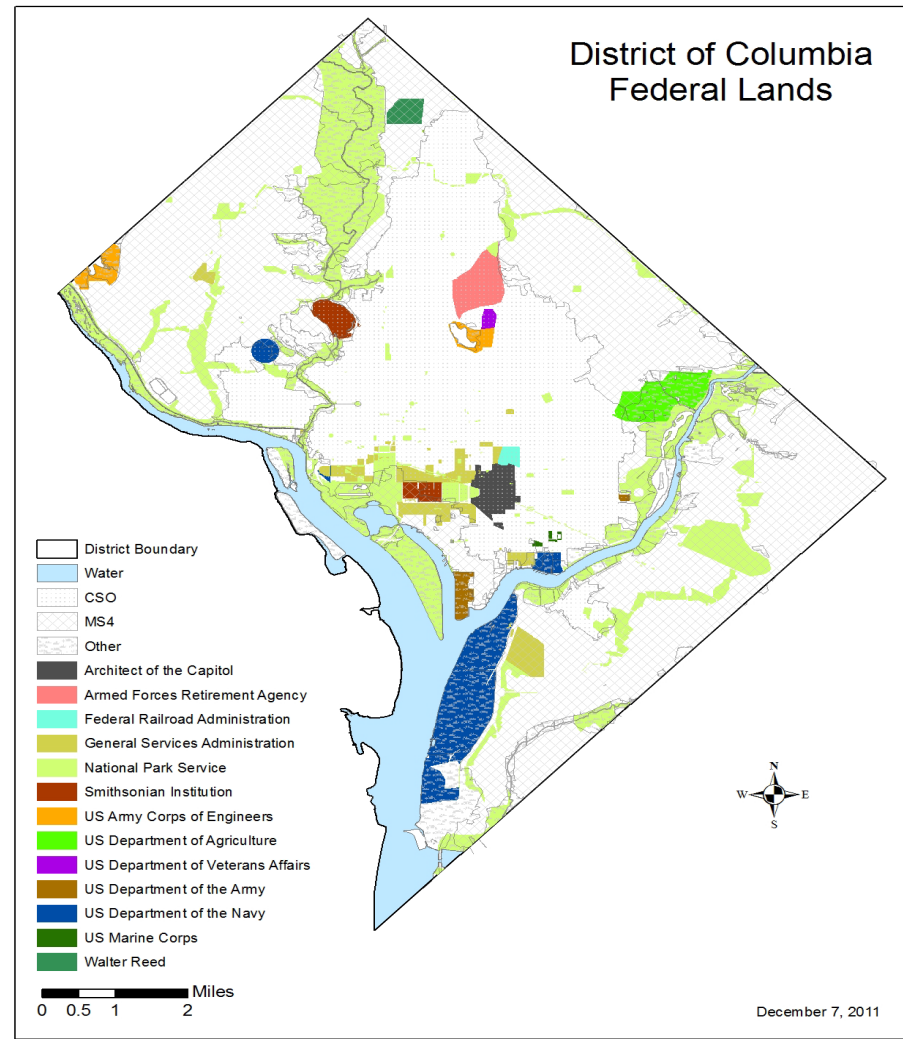


Figure 8. Drainage boundaries for the CSO, MS4 and direct drainage [Other].



DC Federal Lands



DC TRIBUTARIES OF THE ANACOSTIA RIVER

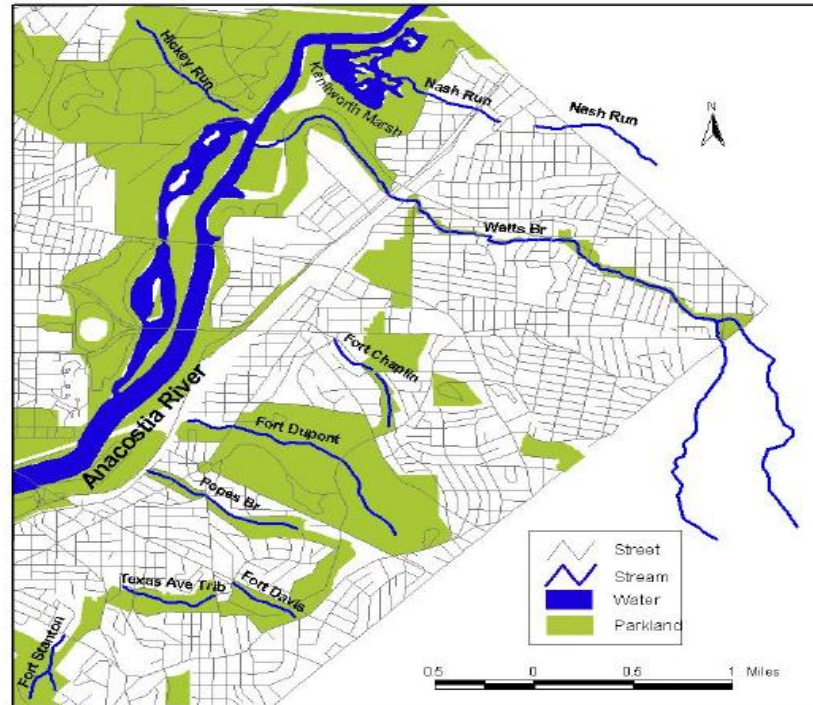
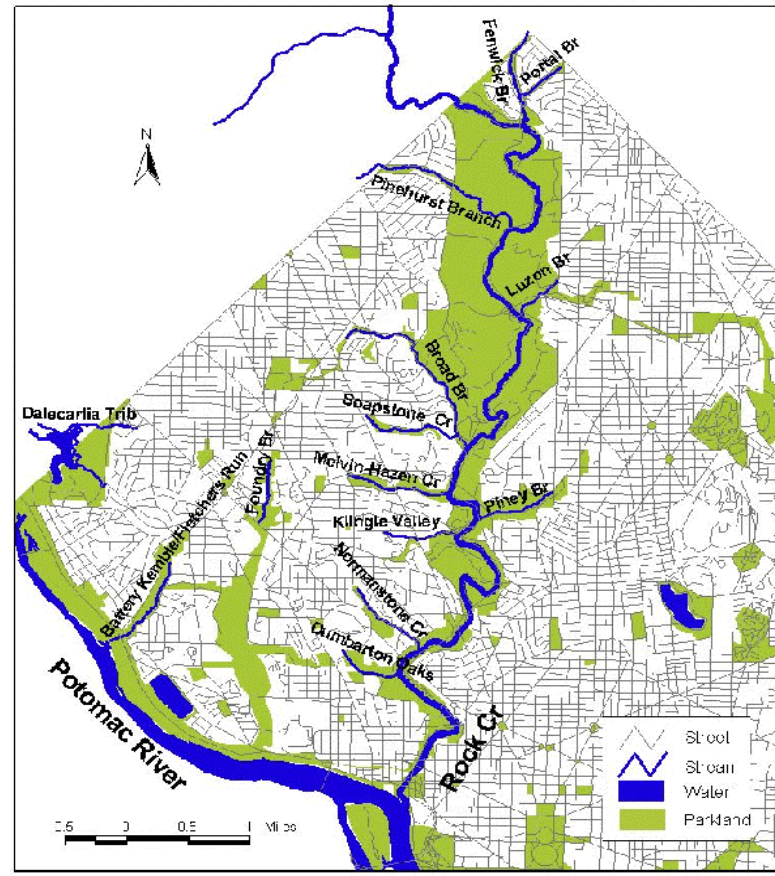


Figure 1a. Small Tributaries of the Anacostia River

DC TRIBUTARIES OF ROCK CREEK AND POTOMAC RIVER



Summary of TMDLs and MS4 WLAs

381 MS4 WLAs in 3 major waterbodies and 45 specific waterbody segments

Major Waterbody	# MS4 WLAs
Anacostia and Tributaries	200
Potomac and Tributaries	57
Rock Creek and Tributaries	124
Total	381

TMDL Pollutants

23 different pollutant types in several major categories

- Bacteria
- Nutrients
- Sediment
- Metals
- Organics
- Pesticides
- PCBs
- Other (Oil & Grease, BOD, Trash)

EXAMPLE STORMWATER MS4 WASTELOAD ALLOCATIONS (WLAs)

Water Body	Pollutant	Baseline MS4 Load	MS4 WLA	Units	% Reduction
Upper Anacostia	Arsenic	12.2	2.1	lbs/year	83%
Upper Anacostia	BOD	167,668	81,083	lbs/year	52%
Upper Anacostia	DDT	0.344	0.034	lbs/year	90%

WITH AND WITHOUT BMP



TYPES OF BMPs USED IN DC

There are 13 categories of BMPs discussed in DC's *Stormwater Management Guidebook*:

- BMP Group 1 Green Roofs
- BMP Group 2 Rainwater Harvesting
- BMP Group 3 Impervious Surface Disconnection
- BMP Group 4 Permeable Pavement Systems
- BMP Group 5 Bioretention
- BMP Group 6 Filtering Systems
- BMP Group 7 Infiltration
- BMP Group 8 Open Channel Systems
- BMP Group 9 Ponds
- BMP Group 10 Wetlands
- BMP Group 11 Storage Practices
- BMP Group 12 Proprietary Practices
- BMP Group 13 Tree Planting and Preservation

WHAT DO WE NEED FROM STAKEHOLDERS AND HOW CAN YOU HELP?

- Need stakeholder input and support to meet project goals
 - Develop feasible TMDL IP
 - Meet regulatory requirements
 - Improve the environment
 - Implement adaptive management approach
- Need assistance/feedback to help meeting tight timeline
- Please plan to participate in regular stakeholder meetings
 - Chance for stakeholders to weigh in on decision points

DISCUSSION AND NEXT STEPS



Mission and Goals for Stakeholder Group

(TMDL Implementation Plan and Revised Monitoring Framework)

A. Mission

- Obtain stakeholder input and understanding of the process, methodology, and deliverables related to the DDOE TMDL Implementation Plan and revised monitoring framework.

B. Goals

- Create a mechanism for communicating with key stakeholders on topics and issues relating to the TMDL implementation plan, and the revised monitoring framework.
- Provide a mechanism for discussing coordination and schedule issues with key stakeholders during implementation of the project.
- Provide an avenue for key stakeholders to present their observations, questions, and concerns to DDOE.
- Provide a mechanism for discussion of diverse stakeholder perspectives among the Stakeholder Group and DDOE on topics of mutual interest.
- Ensure adequate time and opportunity for the Stakeholder Group to provide input during project development and implementation.

Stakeholder Group - Member Responsibilities

- Serve in a voluntary capacity.
- Attend all regularly scheduled meetings.
- Select one alternate member in case the primary member cannot attend one or more meetings. This alternate will receive all membership correspondence.
- Arrive at each meeting prepared to discuss the issues on the agenda. Preparation may include reviewing meeting summaries, agendas and materials distributed prior to each meeting.
- Represent the views of his/her constituents (e.g., organizations or businesses) as well as his/her own individual views or receive information as provided in the meeting.
- Make a conscious effort to compile questions and information from the organization they represent.

Stakeholder Group - DDOE Responsibilities

- Conduct meetings in an orderly and expedient manner, ensuring meetings begin and adjourn on-time.
- Designate a facilitator to manage the discussion as needed.
- Participate in and conduct educational briefings related to project activities to ensure a shared knowledge of key issues.
- Involve key DDOE project team and technical staff in meetings as required to adequately educate the Stakeholder Group and communicate key aspects of planning and implementation process.
- Provide good faith answers to members' questions, and provide answers or update at each meeting on unresolved questions and issues from prior meetings.
- Consider in good faith the input of the members and provide responses to that input.
- Compile agenda items for each meeting. Members may submit agenda items to a representative designated two weeks prior to the meeting.
- Provide written notification (mail or e-mail) to all members of the upcoming meeting, its agenda and any supporting documents at least one week prior to the scheduled meeting.
- Arrange for distribution of meeting notes, including a list of attendees. Meeting notes should be distributed prior to the next meeting.

DDOE STORMWATER TMDL IMPLEMENTATION PLAN – STAKEHOLDER CONTACT ROSTER

Representative	Organization	Email	Phone
Mike Bolinder	Anacostia Riverkeeper	riverkeeper@anacostiariverkeeper.org	202-863-0158
Ross Mandel	ICPRB	rmandel@icprb.org	301-984-1908 (ext 118)
TBD	Alice Ferguson Foundation	TBD	301-292-5665
Hye Yeong Kwon	Center for Watershed Protection	hyk@cwpr.org	410-461-8323 (ext 212)
Dan Duke	DC Building Industry Association	dduke@bohlereng.com	301-809-4500
Mohsin Siddique	DC Water	mohsin.siddique@dcwater.com	202- 787-2634
Donal Barron	DC Water (alternate)	donal.barron@dcwater.com	
Meredith Upchurch	DDOT	meredith.upchurch@dc.gov	202-671-4663
Carmen Franks	DDOT (alternate)	carmen.franks@dc.gov	
Jenny Molloy	EPA	molloy.jennifer@epa.gov	215-837-8011
Kaitlyn Bendik	EPA	bendik.kaitlyn@epa.gov	215-814-5735
Rebecca Hammer	NRDC	rhammer@nrdc.org	202 513 6254
Robin Broder	Potomac Riverkeeper	robin@potomacriverkeeper.org	202-222-0706