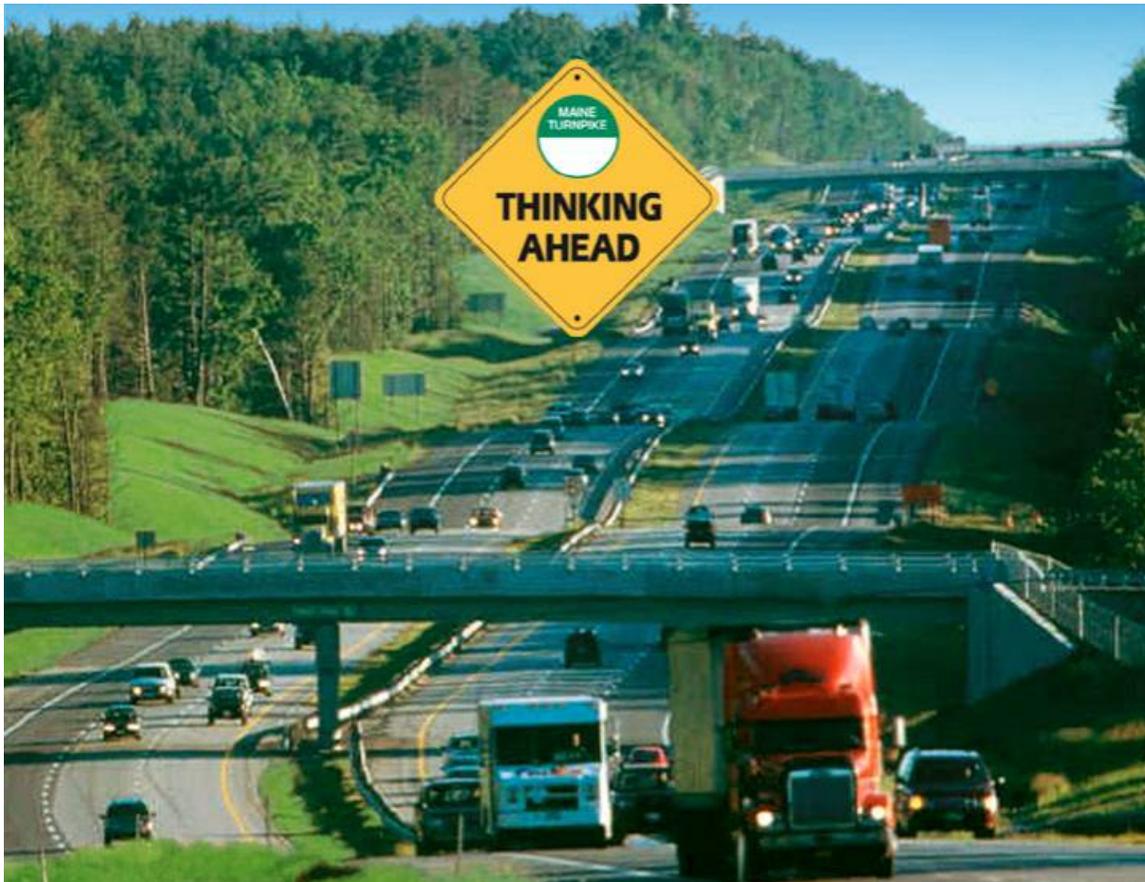


MAINE TURNPIKE AUTHORITY

2003 PROGRESS REPORT ON IMPLEMENTATION OF THE STORMWATER MEMORANDUM OF AGREEMENT



Prepared by:
John M. Branscom
Environmental Services Coordinator
Maine Turnpike Authority

MAINE TURNPIKE AUTHORITY
430 Riverside Street
Portland, Maine 04103

February 23, 2004

Mr. Donald T. Witherill
Division of Watershed Management
Maine Department of Environmental Protection
State House Station #17
Augusta, Maine 04330-0017

SUBJECT: 2003 Annual Stormwater MOA Progress Report

Dear Mr. Witherill:

The Maine Turnpike Authority (MTA) is pleased to present to you the 2003 Annual Stormwater Memorandum of Agreement (MOA) Progress Report (Attached).

I and Mr. Bob Driscoll, P.E., HNTB, Inc. will attend the meeting on behalf of MTA at the Annual Review Meeting scheduled on February 25th at 10:00 A.M. at the MDOT Headquarters.

If you have any questions, please call me at my office at telephone at 828-5824. Thank you.

Sincerely,

John M. Branscom
Environmental Services Coordinator
Maine Turnpike Authority

Attachment

CC:

Peter Merfeld, P.E.
Steve Tartre, P.E.
Bob Driscoll, P.E.
Sharon Newman, Esq.

I. INTRODUCTION

The purpose of this Progress Report is to comply with the requirements in the newly revised Stormwater Memorandum of Agreement (MOA). This report includes information and data on construction projects and activities accomplished in 2003; projects and activities anticipated in 2004; and a list of staff or designees who provided oversight with respect to erosion and sedimentation control and stormwater control.

The intent of the MOA is to achieve stormwater quantity and quality controls reasonably consistent with the standards set out by the Department of Environmental Protection (DEP) in Chapter 500 – Stormwater Management Rules, and the requirements of the Maine Pollutant Discharge Elimination System (MEPDES) General Permit for Construction Activity issued pursuant to 06-096 CMR 529 (2)(a)(2)(i) and Part IV (D)(6) and (7) of the General Permit for the Discharge of Storm Water from MDOT and MTA Municipal Separate Storm Sewer Systems (MS4s).

The MOA reflects the specific technical concerns associated with linear transportation projects undertaken by or under the supervision of MDOT and MTA, and specifies the stormwater quantity and quality standards which apply to those projects. In accordance with the requirements of the MOA, MDOT and MTA are not obligated to get a permit or DEP approval under Chapter 500, or file a Notice of Intent for a MEPDES General Permit for Construction Activity. A copy of the new Stormwater MOA is located in Appendix A.

II. ACTIVITIES ACCOMPLISHED

Training

MTA in-house highway maintenance supervisors and foreman, engineers, consultants, and contractors who are certified by the Maine Department of Environmental Protection's (DEP) Nonpoint Source Program (NPS) or are Professional Engineers (PEs) experienced with stormwater requirements are listed in Table 11.

MTA in 2003 placed a high priority on training and sent all Highway Maintenance Department Supervisors and Foremen to the DEP Nonpoint Source Program. MTA's long term goal is to have 100% of its Highway Maintenance Department Supervisors and Foreman MEDEP Erosion Control certified.

The Turnpike has an interest to attend MDOT training sessions and workshops in 2004 to learn and share knowledge on erosion and sediment control practices and promote multi-agency interaction.

Contracted Projects

MTA had four construction projects awarded in 2002 that remained under construction in 2003 (Table 1). A summary of the Stormwater Best Management Practices (BMPs) installed as part of the MTA 2002 Contracts that remained under construction in 2003 is shown in Table 2. A significant 2002 project on the Turnpike that carried over to 2003 was the Sabattus Interchange Embankment Preload and Mitigation.

In 2003 MTA awarded eleven major construction projects, which included widening the Turnpike from mile 23.2 to Mile 25.5, interchanges, overpasses, bridge repairs, and renovations to the Kennebunk Highway Maintenance Facility (Table 3). A summary of all permanent BMP's installed by contractors in 2003 are shown in Table 4. Table 5 shows a combined summary of all BMPs installed in 2003 from 2002 carry over construction projects and 2003 construction projects.

MTA Highway Maintenance Department Construction Projects

MTA completed a limited number of new, construction projects which incorporated temporary and/or permanent BMPs. Table 6 shows a summary of MTA Highway Maintenance Department construction projects with an inventory of permanent BMPs.

Post Construction Maintenance and Inspection

Operations & Maintenance

The most common maintenance activities accomplished in 2003 were catch basin repair; slope/right of way repair/mulching; catch basin inspection and cleaning; and sweeping the turnpike; interchanges and facility parking lots (Table 7). Approximately one-half of the catch basins contained enough sediment that required cleaning.

The Highway Maintenance crews continue to use weekly summary reports and starting in January 2004 will transfer the data on the weekly operations and maintenance (O & M) projects relating to soil and erosion control activities to a new, annual, O & M Summary Table similar to Table 7. The Environmental Services Coordinator will conduct a quarterly review of the O & M Summary Tables at each Highway Maintenance Facility to track their progress throughout the year.

Inspections

Each year HNTB Corporation is tasked with a thorough inspection of the turnpike. This inspection, generally referred to as the Annual Inspection, covers pavement, cut sections, embankments, bridges, roadway lighting, drainage structures, signs, pavement markings, toll plazas, utility buildings, service areas, maintenance areas and other facilities.

Upon completion of the inspection process HNTB submits to the Authority a report that provides advice and recommendations as to the proper maintenance, repair, and operation of the turnpike during the ensuing fiscal year.

A detailed Annual Inspection Report was transmitted to the Authority's Executive Director in August 2003. Below is a summary of information contained within the Annual Inspection Report relative to storm water quality and quantity control.

The roadway surface drainage system consisting of drainage ditches, catch basins, and cross culverts was inspected and found to be in fair to good condition. Catch basin repair is typically included as part of pavement rehabilitation projects. This practice appears to be adequate to maintain the catch basins in fair to good condition. Routine ditch and side slope repair is required for proper upkeep of the highway. Turnpike maintenance forces routinely clear debris from drainage ditches and regrade the surrounding areas, as necessary. All ditches will continue to be evaluated and recommendations for reconstruction will be made as required. Numerous rivers and streams pass under the turnpike through box culverts and pipes. Pipes 36 to 54 inches in diameter are inspected on a five-year cycle. All box culverts and all pipes 36 inches in diameter and larger, that are not within the modernization and widening project limits, were inspected in 2001 and were found to be in satisfactory condition. The next inspection is planned for 2006.

In addition to the HNTB inspections and surveys, MTA starting in 2004 shall implement its Stormwater Management Plan (SWMP) as required by the NPDES Phase II Program. This SWMP identifies the municipalities and receiving waters to which MTA may discharge within approximately 14.5 miles of Urbanized Areas (UAs) as indicated in the 2000 Census. In support of the SWMP six minimum control measures, MTA shall implement illicit discharge detection and elimination (IDDE), which includes, but not limited to; developing a storm sewer system map of all outfalls, and conduct annual dry weather inspections and assess the contents and clean out of catch basins.

III. ACTIVITIES AND CONSTRUCTION PROJECTS PLANNED FOR 2004

Training

The Turnpike will develop and initiate a Storm Water Pollution Reduction Training Program for MTA employees. This training program complies with MTA's NPDES Phase II Stormwater Management Plan (SWMP) for two Minimum Control Measures (MCM) to include: Public Education and Outreach, and Pollution Prevention (P2)/Good House Keeping for Municipal Operations.

The Turnpike will ensure that MTA employees are educated and appropriately trained in the following areas:

- a. impacts of non-stormwater discharges;
- b. job-specific responsibilities associated with the SWMP;
- c. indicators of illicit connections or illegal dumping;
- d. notification and/or response procedures upon suspicion of illicit connection or discharge; and
- e. procedures to prevent/reduce storm water pollution from the activities specified in Part IV (D)6(a)(ii) of the Permit under the Pollution Prevention (P2)/Good Housekeeping MCM.

Contracted Projects

The Turnpike is entering its fifth and final year of the 30 mile widening project in 2004. MTA will complete the final 5.8 miles of the widening project between Exits 3 and 4, which is mostly in the town of Arundel. MTA will also begin the reconstruction of the Brighton Avenue Bridge in Portland, a major paving project between Litchfield and Augusta, the final stages of the Sabattus Interchange project, and other significant projects as listed in Table 8.

MTA Highway Maintenance Department Projects

MTA proposes to do a limited number of new, permanent BMPs along the turnpike to include; sediment traps/catch basins, permanent check dams, and aprons (Table 9).

Operations & Maintenance

The Turnpike's Highway Maintenance Department employees primary focus is to perform routine and when needed for unforeseen events, O & M Best Management Practices (BMPs). These proposed BMPs as shown in Table 10 will include a slight increase in the number of ditches, culverts, and catch basins to repair and number of miles of Turnpike to sweep.

IV. STORMWATER MOA OVERSIGHT

MTA's Stormwater MOA compliance and oversight is provided by the following individuals:

MTA Management Staff:

Peter Merfeld, P.E., Chief Operations Officer
Steve Tartre, P.E., Director of Engineering and Building Maintenance
William Franklin, Construction Project Administrator
Tom Nargon, Engineering Technician I
Richard Camden, Engineering Aide III
Scott Warchol, Widening Coordinator
Wes Jackson, Director of Highway & Equipment Maintenance
William Wells, Deputy Director of Highway & Equipment Maintenance
Roger Mathews, Highway Division Supervisor
Andy Perry, Highway Division Supervisor
John Branscom, Environmental Services Coordinator

HNTB, Inc.

Roland Lavalley, P.E.
Bob Driscoll, P.E.
Keith Wallace, P.E.
Charles Myers, P.E.
Jeff Reed, P.E.

V. CONCLUSION

MTA is determined to continue to apply the appropriate engineering design and building practices for construction projects to successfully meet the requirements of the current Stormwater MOA. MTA management is committed to post construction operations and maintenance, and increased education for employees.

Looking at 2004, MTA shall complete the final 5.8 miles of the 30 mile widening project and other additional construction projects that would have normally each required a permit under the Chapter 500 Stormwater Rules. However, MTA will carefully manage stormwater and erosion control issues to protect the environment and comply with the current MOA.

APPENDIX A – CURRENT STORMWATER MOA

MEMORANDUM OF AGREEMENT

The Maine Department of Environmental Protection (hereinafter DEP), the Maine Department of Transportation (hereinafter MDOT), and the Maine Turnpike Authority (hereinafter MTA) (collectively referred to as the Parties) agree as follows.

WHEREAS, projects involving roads, railroads and associated facilities developed by or under the supervision of the Maine Department of Transportation or the Maine Turnpike Authority must meet the storm water requirements set forth in a Memorandum of Agreement between the DEP, MDOT and MTA; and

WHEREAS, 40 CFR 122.44(s) allows the DEP to recognize qualifying state or local programs;

WHEREAS, DEP, MDOT and MTA recognize the unique characteristics, benefits and impacts of transportation facilities such as roads and railroads; and

WHEREAS, DEP, MDOT and MTA agree that the intent of this Memorandum of Agreement is to achieve stormwater quantity and quality controls reasonably consistent with the standards set out by the DEP in Chapter 500 - Stormwater Management Rules, and the requirements of the Maine Pollutant Discharge Elimination System (MEPDES) General Permit for Construction Activity issued pursuant to 06-096 CMR 529 (2)(a)(2)(i) and Part IV(D)(6) and (7) of the General Permit for the Discharge of Stormwater from MDOT and MTA Municipal Separate Storm Sewer Systems (MS4s).

WHEREAS, those objectives will be achieved by a comprehensive erosion and sedimentation control program that applies to projects which would have required a stormwater permit otherwise but for the exemption in 38 M.R.S.A. §420-D(7)(G), and that would have required the filing of NOIs and associated materials with the DEP but for recognition as qualifying programs, and that applies to all other MDOT and MTA projects located in the organized territory which would not have required a storm water permit; and

WHEREAS, the application of the standards to MDOT and MTA projects in the organized territory will result in substantial environmental benefits for all watersheds and in particular those watersheds which are most at risk from development or threatened and sensitive; and

WHEREAS, the Parties have reviewed and agreed upon the MDOT's Best Management Practices for Erosion and Sedimentation control as the most feasible measures to control storm water for transportation projects;

NOW, THEREFORE, the Parties will adopt the following requirements for stormwater,

1. Applicability

This Memorandum of Agreement reflects the specific technical concerns associated with linear transportation projects undertaken by or under the supervision of MDOT and MTA, and specifies the storm water quantity and quality standards which will apply to those projects, MDOT, MTA and DEP have agreed to adopt the standards set out in the current version of MDOT's Best Management Practices for Erosion and Sedimentation Control (hereinafter the MDOT BMP Manual), MDOT and MTA have agreed to apply the MDOT BMP Manual standards to all projects which would have required a stormwater permit but for the exemption in 38 M.R.S.A, §420-D(7)(G), and to all other projects located in the organized territory. DEP, MDOT and MTA have concluded that the application of the MDOT BMP Manual standards to all other projects which would not otherwise require review will result in substantial environmental benefits in the watersheds most at risk from development, the threatened and sensitive watersheds and all the other watersheds in the organized territory.

In addition, this Memorandum of Agreement addresses the standards and practices that MDOT and MTA utilize to comply with the requirements of the General Permit for Construction Activity in areas of the State of Maine for which DEP has jurisdiction under the NPDES program.

All MDOT and MTA roads, railroads and associated facilities constructed pursuant to the requirements of this Memorandum of Agreement shall not be required to get a permit or DEP approval pursuant to DEP's Chapter 500, or file a Notice of Intent for a NPDES General Permit for Construction Activity.

2. Definitions

A. Roads means all roads, highways, bridges, bike paths, interchanges and intersections.

B. Associated facilities means facilities directly associated with roads and railroads such as weigh stations, toll plazas, picnic areas, scenic turnouts, rest areas, park and rides, piers, tourist information centers and intermodal facilities. Associated facilities do not include airports, office buildings, maintenance lots, ferry terminals, service plazas, train stations and bus stations.

C. Construction site operator means the contractor's designated on-site supervisor or MDOT's or MTA's designated on-site supervisor if there is no outside contractor.

3. Standards

A. Stormwater Quality

i. All MDOT and MTA road and railroad transportation projects shall comply with the requirements for Stormwater Management Plan and Erosion and Sedimentation Control Plan as set out in Sections II C and D respectively of the MDOT, BMP Manual. Part C requires construction site operators to implement appropriate erosion and sediment control best management practices; part D requires construction site operators to develop and implement a storm water pollution prevention plan. In addition, all MDOT and MTA projects will have design plans that incorporate consideration of potential water quality impacts that are reviewed by MDOT and MTA staff or their designee who are knowledgeable on the design and implementation of Best Management Practices. MDOT and MTA shall require construction site operators to control waste that may cause adverse impacts to water quality. Projects located in the watersheds of sensitive waterbodies, in addition, shall comply with the Guidelines for Sensitive Water Bodies as set out in Section II B of the MDOT, BMP Manual. The MDOT, BMP Manual is incorporated herein by reference.

ii. All MDOT and MTA associated facilities shall comply with the requirements for Erosion and Sedimentation Control Plan and Stormwater Management Plan as set out in Sections II D and C respectively of the MDOT, BMP Manual. Construction site operators

shall be certified by DEP's NPS Training Center or shall have equivalent training and shall follow plans that are reviewed and approved by MDOT or MTA as specified in paragraph i above. Projects located in the watersheds of sensitive waterbodies, including those waterbodies listed as "most at risk" or "sensitive or threatened" under DEP's Stormwater Rules, Chapter 502, or listed on the Impaired (C) list under the MEPDES Construction General Permit, in addition, shall comply with the Guidelines for Sensitive Water Bodies as set out in Section II B of the MDOT, BMP Manual. The MDOT, BMP Manual is incorporated herein by reference. Practicable project locations shall be evaluated and the file shall demonstrate the basis for site selection. Stormwater shall be one of the criteria addressed in the site selection process.

iii. MDOT ferry service piers shall comply with the applicable provisions of 33 CFR Part 156 (Oil and Hazardous Material Transfer), as amended, and DEP oil spill contingency plans.

iv. Bridge surfaces are subject only to MDOT's bridge maintenance best management practice standards.

B. Stormwater Quantity

MDOT and MTA will calculate the peak flow from the site of a project if the project: 1) combines two or more subwatershed areas, and 2) includes 20,000 sq. ft. or more of new impervious area or five acres or more of disturbed area in the direct watershed of a waterbody most at risk from new development (as defined in DEP's Chapters 500 and 502), or one acre or more of new impervious area or five acres or more of disturbed area elsewhere. MDOT and MTA will design project ditches, culverts and outlet areas to be stable and will minimize any increase in peak flow from the project site. In those instances in which a peak flow increase will result, MDOT and MTA shall take engineering measures to avoid adverse impacts to offsite property as a result of drainage increases resulting from the project.

4. Consistency with Standards Set Out by DEP in Chapter 500

The MDOT Report on Statewide and Watershed Specific Stormwater Mitigation and Pollutant Exports dated November 4, 1997 incorporated herein, demonstrates that application

of the water quality standards in paragraph 3, Standards of this Memorandum of Agreement to all MDOT and MTA projects in the organized area of the State removes as much or more phosphorus and total suspended solids (TSS) as would be removed by application of Chapter 500. This result occurs because the cumulative effects of all MDOT projects in a watershed exceeds the phosphorous or TSS removal from any single project in a watershed which must apply either the phosphorous, 80% TSS or sliding scale TSS standard set out in Chapter 500, and because of the size of MTA 's right-of-way, the Chapter 500 methodology for calculating impervious area, and the Turnpike's location, the stormwater quality standards applicable to the Turnpike under Chapter 500 are less than or equal to those required in paragraph 3 of the Memorandum of Agreement.

5. Compliance with Standards in the MEPDES General Permit for Construction Activity

DEP is satisfied that the requirements of the MDOT BMP Manual meet or exceed the standards set out in the MEPDES General Permit for Construction Activity and that the plans are reviewed by MDOT, MTA or their designees who have been certified through DEP's NPS Training Center, or equivalent training or are Maine licensed professional engineers experienced with stormwater requirements. Therefore, it is not necessary for DEP to review each plan or receive a NOI for each MDOT or MTA project. MDOT and MTA will keep copies of all plans required by the BMP Manual and this MOA at their offices and as part of the annual Interagency Review will provide DEP with a list of all projects started in the 12 months since the last Interagency Review meeting and a list of projects anticipated for the next 12 months.

6. Maintenance and Compliance with Post-Construction Minimum Control Measure in the MEPDES General Permit for MDOT and MTA Municipal Separate Storm Sewer Systems (MS4s)

MDOT and MTA agree to carry out inspections of BMPs that may require maintenance. BMPs located within regulated MS4s will be inspected by MDOT and MTA pursuant to their respective Stormwater Program Management Plan. Long-term sedimentation control measures shall be maintained as required by the MDOT BMP Manual.

7. Interagency Review

The DEP, MDOT and MTA shall hold interagency meetings to identify, discuss and resolve any issues which may have arisen regarding interpretation and implementation of the Memorandum of Agreement. Meetings shall be held as necessary to identify, discuss and resolve any issues which

may arise regarding interpretation, implementation of and compliance with the Memorandum of Agreement. These meetings shall be held at least annually. MDOT and MTA each shall keep records of their projects that would otherwise trigger the stormwater rules or the MEPDES Construction General Permit, including the project location, as well as a description of other work done in the watershed and a list of staff or designees who provided oversight with respect to erosion and sedimentation control and stormwater control. As part of this annual review MDOT and MTA shall provide DEP with a report on maintenance surveys and activities.

Maine Department of Environmental Protection

Dated: May 19, 2003

By: *Dawn Gallagher*
Dawn Gallagher, Commissioner

Maine Department of Transportation

Dated: May 21, 2003

By: *David Cole*
David Cole, Commissioner

Maine Turnpike Authority

Dated: 5/30/03

By: *Samuel M. Zaitlin*
Samuel M. Zaitlin, Chairman

APPENDIX B
TABLES 1 – 11

TABLE 6

Maine Turnpike Authority
Inventory of Permanent BMP's

2003 Summary of MTA Highway Maintenance Department Construction/Installation Projects

Project ID.	Location (Mile Marker #)	Sediment Traps/ Catch basins (Qty #)	Rip Rap Down spout (Qty#)	Culvert Inlet Protection (stone) (Qty#)	Slope Stabilization (x1000SF)	Veg. Buffer (x1000SF)	Perm. Check Dam (Qty#)	Apron (Qty.#)
Gray Maint. Facility Backyard	MM63.1					2		
Guard Rail Modification	MM44-52							17

TABLE 7
Maine Turnpike Authority

2003 – Summary of MTA Highway Maintenance Department Operations and Maintenance

Project ID	Location (Mile Marker #)	Repair/Redo Ditching (#Miles Linear Total)	Culvert Repair (Qty. #)	Catch Basin Repair (Qty.#)	Remove Sand from Guard Rails (#Linear Miles)	Slope /Right of way Repair/Mulching (#Miles total)	Inspect Catch Basins, Sediment Traps And Veg. Swales and detention ponds (Qotal # inspected)	Catch Basins/Sediment Traps; and Detention Ponds cleaned out (Qty.#)	Street Sweeping (# linear Miles)	Sweep Park Lots; Interchanges, Service Plazas; MISC. (# Times Sweep/Year)
Mainline NB & SB; and Cross Overs	2.2 - 108.8								201	
As Needed & Planned	2.2 – 108.8	7.3	4	71	7.4	9.8	1223	746		2-3

Maine Turnpike Authority

TABLE 9

Summary of Proposed MTA Highway Maintenance Department Construction/Installation Projects for 2004

Project ID	Location or (Mile Marker #)	Sediment Traps/ Catch basins (Qty #)	RipRap Downspout (Qty#)	Culvert Inlet Protection (stone)(Qty#)	Slope Stabilization (x1000SF)	Veg. Buffer (x1000SF)	Perm. Check Dam (Qty#)	Apron (Qty. #)
Median	99.2						1	
Main Line NB & SB	0-20	7						
Main Line NB & SB	0-38							6

Maine Turnpike Authority

TABLE 10

2004 – Summary of Proposed MTA Highway Maintenance Department Operations and Maintenance

Project ID	Location (Mile Marker #)	Repair/Redo Ditching (#Miles Linear Total)	Culvert Repair (Qty. #)	Catch Basins to be Repaired (Qty.#)	Remove Sand from Guard Rails (#Linear Miles)	Slope /Right of way Repair/Mulching (#Miles total)	Inspect Catch Basins, Sediment Traps And Veg. Swales and detention ponds (Total # to be inspected)	Catch Basins/Sediment Traps; and Detention Ponds to be cleaned out (Qty.#)	Street Sweeping (# linear Miles)	Sweep Park Lots; Interchanges, Service Plazas; MISC. (# Times Sweep/Year)
Mainline NB & SB; and Cross- Overs	2.2 - 108.8								223.	
As Needed & Planned	2.2- 108.8	13.6	11	103	21	2.7	1223	750		2 -3

TABLE 1

Maine Turnpike Authority

Summary construction contracts and solicitations awarded in 2002 that remained under construction in 2003.

Contract Number	Approximate Location	Description
2002.18	Crosby Maintenance Facility	Construction of Salt Storage Building, Mile 45.3 SB
2002.21	Central Inventory Building	Construction of Central Inventory Building, Mile 58.3 NB
2002.25	Sabattus Interchange	Route 9 Roadway and Bridge Reconstruction, Mile 86.1
2002.26	Sabattus Interchange	Sabattus Interchange Embankment Preload and Mitigation, Mile 86.1

TABLE 2**Maine Turnpike Authority**

Inventory of Permanent BMP's

2002 Contracts & Solicitations¹ - Listed by Project**Summary of BMP's installed as part of MTA 2002 Contracts & Solicitions**

Contract Number	Year of Installation	Sediment Trap	Rip Rap Downspout	Culvert Inlet Protection (Stone)	Culvert Outlet Protection (Stone)	Slope Stabiliz. (x1000SF)	Vegetated Buffer (x1000 SF)	Stone Ditch Protection (x1000SF)	Permanent Stone Check Dam	Catch Basin or Holding Tank	Other
2002.18	2003							1.5			
2002.21	2003							0.8			
2002.25	2003		1	2	4	1.0		1.2		3	
2002.26	2003			10	12	9.7	984	11.9		4	
All Projects Total:		0	1	12	16	10.7	984	15.4	0	7	0

¹ Summary includes 2002 contracts and solicitations that remained under construction in 2003. Projects completed by Dec. 31st 2002 have not been included in this inventory.

TABLE 3**Maine Turnpike Authority**

Summary construction contracts and solicitations awarded in 2003

Contract Number	Approximate Location	Description
2003.01	Mile 23.2 to 25.5	Mainline Reconstruction Mile 23.2 to Mile 25.5
2003.02	Biddeford	Mainline Construction Mile 31.3 to 33.0 Biddeford Interchange Reconstruction Biddeford Interchange Underpass Reconstruction
2003.03	Kennebunk & Arundel	Kennebunk River Overpass Widening Mile 27.2 Old Alfred Road Underpass Reconstruction Mile 30.3
2003.06	York to Augusta	E-Z Pass Modifications & Miscellaneous Signing
2003.07	Falmouth to Auburn	Pavement Rehabilitation
2003.09	York	York River Bridge Repairs
2003.10	Falmouth to Gray	Bridge Substructure Repairs
2003.11	Kennebunk	Kennebunk Garage and Salt Storage Building
2003.12	Kennebunk	Kennebunk Offices and Maintenance Garage
2003.14	York to Augusta	ETC Migration Project, Installation of Toll Collection System Equipment

Solicitation Number	Approximate Location	Description
2003.54	South Portland, Gray & Litchfield	Floor Drain Modificaitons and Holding Tanks Crosby - Gray - Litchfield Maintenance Yards
2003.55	Kennebunk	AS/SVE Remediation Construction MM 25.5
2003.56	Sanford	Sanford Wetland Mitigation Project
2003.57	Sabattus	Route 9 Sabattus Interchange Maxwell Brook Stabilization and Restoration
2003.58	Arundel to Biddeford	Removal of Snaps, Mile 25.76 to 27.15 and Mile 30.44 to 31.24

TABLE 4**Maine Turnpike Authority**

Inventory of Permanent BMP's

2003 Contracts & Solicitations¹ - Listed by Project**Summary of BMP's installed as part of MTA 2003 Contracts & Solicitions**

Contract Number	Year of Installation	Sediment Trap	Rip Rap Downspout	Culvert Inlet Protection (Stone)	Culvert Outlet Protection (Stone)	Slope Stabiliz. (x1000SF)	Vegetated Buffer (x1000 SF)	Stone Ditch Protection (x1000SF)	Permanent Stone Check Dam	Catch Basin or Holding Tank	Other
2003.01	2003	1	4	8	22	7.0		36.0	23	2	
2003.02	2003		4	9	25	2.0		13.2		15	
2003.03	2003		6	5	6					2	
2003.07	2003					4.2					
2003.11	2003							3.6		1	
S2003.54	2003									6	
S2003.57	2003						61.0				
All Projects Total:		1	14	22	53	13.2	61.0	52.8	23	26	0

¹ Contracts 2003.06, 2003.09, 2003.10, 2003.12 & 2003.14, Solicitations 2003.55, 2003.56, & 2003.58 did not include installation of permanent BMP's.

TABLE 5**Maine Turnpike Authority**

Inventory of Permanent BMP's

2002 and 2003 Contracts & Solicitations¹ - Listed by Project**Summary of All BMP's installed by the MTA in 2003.**

Contract Number	Year of Installation	Sediment Trap	Rip Rap Downspout	Culvert Inlet Protection (Stone)	Culvert Outlet Protection (Stone)	Slope Stabiliz. (x1000SF)	Vegetated Buffer (x1000 SF)	Stone Ditch Protection (x1000SF)	Permanent Stone Check Dam	Catch Basin or Holding Tank	Other
2002.18	2003							1.5			
2002.21	2003							0.8			
2002.25	2003		1	2	4	1.0		1.2		3	
2002.26	2003			10	12	9.7	984.0	11.9		4	
2003.01	2003	1	4	8	22	7.0		36.0	23	2	
2003.02	2003		4	9	25	2.0		13.2		15	
2003.03	2003		6	5	6					2	
2003.07	2003					4.2					
2003.11	2003							3.6		1	
S2003.54	2003									6	
S2003.57	2003						61.0				
All Projects Total:		1	15	34	69	23.9	1045	68	23	33	0

¹ Summary includes 2002 contracts and solicitations that remained under construction in 2003. Projects completed by Dec. 31st 2002 have not been included in this inventory.

TABLE 8**Maine Turnpike Authority**

Summary of anticipated construction contracts and solicitations to be issued in 2004

Contract Number	Approximate Location	Description
2004.01	Kennebunk to Biddeford	Widening - Mainline Mile 25.5 to 31.3
2004.02	Portland	Brighton Avenue Reconstruction
2004.03	Sabattus	Sabattus Final Interchange Construction Contract
2004.04	Litchfield to Augusta	2004 Pavement Resurfacing Mile 98 to 103 and Mile 103 to 109
2004.05	Falmouth, Final upgrade locations TBD	2004 Bridge Repairs - Bald Hill and Route 196 & MCRR Overpasses 2004 Guardrail Upgrades 2004 North End Clear Zone Upgrades
2004.06	Ogunquit to Saco	Widening - Median Guardrail Upgrades Mile 14 to 20 and Mile 36 to 44 Widening - Median Guardrail Upgrades Mile 20 to 36
2004.07	Sanford	Widening - Sanford Mitigation Grading & Planting

Solicitation Number	Approximate Location	Description
TBD	Kennebunk to Biddeford	Widening - SNAP Installation
TBD	Locations TBD	2004 Slab and Tunnel Repairs

Other or TBD	Approximate Location	Description
MTA Forces	York to Augusta	Guide Sign Modifications - Interstate Redesignation and Exit Renumbering
TBD	Locations TBD	2004 Pavement Crack Sealing
TBD	Locations TBD	2004 Slope Repairs

TABLE 11				
Employees Providing Stormwater and Sedimentation Control Oversight on Projects				
Listing of employees who are NPS certified or are PE's experienced with stormwater requirements				
Name (Last, First)	Company	Maine P.E. with stormwater experience	DEP Erosion Control Certified	Other Training
Andy Perry	MTA	N	N	Basic & Adv. NPS
Richard Dionne	MTA	N	Y	SPCCP/Stormwater
Larry Proctor	MTA	N	N	Basic & Adv. NPS
Gary Montague	MTA	N	N	Basic & Adv. NPS
William Thompson	MTA	N	N	Basic & Adv. NPS
Allen Wildes	MTA	N	N	Basic & Adv. NPS
Roger Mathews	MTA	N	N	Basic & Adv. NPS
Roger Cabanna	MTA	N	N	Basic & Adv. NPS
John Branscom	MTA	N	N	Basic & Adv. NPS
Scott Warchol	MTA	N	Y	Soil Mechanics-MDOT
Tom Nargon	MTA	N	Y	
William Franklin	MTA	N	Y	Soil Mechanics-MDOT; and Stormwater Workshop-ME. Local Roads Center
Richard Camden	MTA	N	Y	
Steve Tartre	MTA	Y	Y	
Peter Merfeld	MTA	Y	N	
Scott Lachance	MTA	N	Y	
Wes Jackson	MTA	N	N	Basic & Adv. NPS
William Wells	MTA	N	N	Basic & Adv. NPS
Jim Sotir	MTA	N	N	Basic & Adv. NPS
Affonso, Ron	HNTB		Y	
Driscoll, Bob	HNTB	Y		
Driscoll, Lori	HNTB	Y		
Hoak, Clayton	HNTB	Y		
Lavallee, Roland	HNTB	Y		
Myers, Charles	HNTB	Y		
Read, Jeff	HNTB	Y	Y	
Wallace, Keith	HNTB	Y		
Wallace, Keith	HNTB		Y	

APPENDIX C

PHOTOGRAPH SUMMARY OF PERMANENT BMPs INSTALLED IN 2003

DAY BROOK (WEST SIDE) MILE 23.6
Sta. 1113+73 - 78" RCP EXTENSION



Contract 2003.01

Day Brook (West Side)
Mile 23.6

Photo Date: October 2, 2003

Rip-rap culvert apron and slope stabilization.

NORTH TRIBUTARY TO DAY BROOK (EAST SIDE) MILE 24.5
Sta. 1157+92 - 54" RCP EXTENSION



Contract 2003.01

North Tributary to Day Brook
(East Side) Mile 24.5

Photo Date: October 2, 2003

Rip-rap used to protect and stabilize bank above and around culvert outlet.

NORTH TRIBUTARY TO DAY BROOK (WEST SIDE) MILE 24.5
Sta. 1157+92 - 54" RCP EXTENSION



Contract 2003.01

North Tributary to Day Brook
(West Side) Mile 24.5

Photo Date: March 27, 2003

Rip-rap used to protect and stabilize bank above and around culvert inlet.

NORTH TRIBUTARY TO THATCHER BROOK (WEST SIDE) MILE 31.84
Sta. 1548+40 - 36" RCP EXTENSION



Contract 2003.01

*North Tributary to Thatcher Brook
(West Side) Mile 31.84*

Photo Date: October 3, 2003

**Apron and stone ditch protection
used to stabilize banks at culvert
outlet.**

NORTH TRIBUTARY TO THATCHER BROOK (EAST SIDE) MILE 31.95
Sta. 1544+40 - 36" RCP EXTENSION



Contract 2003.01

*North Tributary to Day Brook
(East Side) Mile 31.95*

Photo Date: March 28, 2003

**Stabilized pipe end treatment and
stone ditch protection**

SECOND SOUTH TRIBUTARY TO SACO RIVER (WEST SIDE) MILE 32.54
Sta. 1585+50 - 54" RCP EXTENSION



Contract 2003.01

*Second South Tributary to Saco
River (West Side) Mile 32.54*

Photo Date: April 23, 2003

**Stabilized pipe end treatment and
stone ditch protection**

SABATTUS INT., MAXWELL BROOK RELOCATION, MILE 86.1
Sta. 4383+50 - STONE DITCH PROTECTION FOR BROOK RELOCATION



Contract 2002.26

*Maxwell Brook relocation,
Sabattus Interchange, Southwest
Quadrant, Mile 86.1*

Photo Date: June 2003

**Stone ditch protection placed on
new stream embankment as part
of Maxwell Brook relocation.**

SABATTUS INT., MAXWELL BROOK CROSSING AT ROUTE 9, MILE 86.1
Route 9 Sta. 506+50 – BOX CULVERT OUTLET PROTECTION



Contract 2002.26

*Sabattus Interchange - Maxwell
Brook Crossing at Route 9, West of
Mainline.*

Photo Date: May 2003

**Rip Rap slope protection at new
box culvert installation.**