

**Municipality/Organization:** Town of Boylston

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**EPA NPDES Permit Number:** MAR041095

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**MassDEP Transmittal Number:** W-049574

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**Annual Report Number**

**& Reporting Period:**

April 1, 2006 – March 31, 2007

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**NPDES PII Small MS4 General Permit  
Annual Report  
(Due: May 1, 2007)**

**Part I. General Information**

**Contact Person:** Ms. Suzanne Olsen

**Title:** Town Administrator

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Certification:

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

**Signature:**

*Suzanne C. Olsen*

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**Printed Name:** Suzanne Olsen

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**Title:** Town Administrator

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**Date:** April 27, 2007

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## **Part II. Self-Assessment**

The Town of Boylston has completed the required self-assessment and has determined that our municipality is in compliance with all permit conditions for Permit Year 4.

### Part III. Summary of Minimum Control Measures

#### 1. Public Education and Outreach

BMP ID #	BMP Description	Responsible Dept./Person Name	Measurable Goal(s)	Progress on Goal(s) – Permit Year 4 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Permit Year 5
Revised	PE-1	Partner with Local Organization	Stormwater Committee/Town Admin.	Continued relationship with DCR on all aspects of stormwater within the Wachusett Watershed. Assisted DCR with the initial design and cost estimate for a bio swale to be installed at an outfall near the reservoir.	Continue working with DCR and look for other ways to partner. Assist DCR with Watershed Education Teacher Workshops by contacting and encouraging Boylston teachers to participate in program.
Revised	PE-2	Stormwater brochure	Town Admin.	Distributed <i>Stormwater Management and Low Impact Development in Boylston</i> brochure to help describe the Stormwater Management by-law.	Make existing brochures available to residents at Town Hall. Expolre preparing brochure on Illicit Discharge Detection and Elimination.
Revised	PE-3	Provide stormwater information at Town buildings	Town Admin.	Provide current stormwater brochure at Town Hall Post and maintain pet waste signage.	Continue providing brochures to public.
Revised	PE-4	Pet Waste	Town Admin.	Pet waste signs were installed at the Manor and at Town fields near Town Offices at Hillside	Continued maintenance on signs and replacement as necessary
Revised	PE-5	Feature SW info on town public access cable station	Town Admin.	Broadcasted <i>After the Storm</i> and <i>Reining in the Storm</i> approximately 40 times between 4/25/06 and 8/29/06	Continue to run videos on public access. Identify other stormwater videos, if any, that could run on public access.
Revised	PE-6	Stormwater presentations at schools	Stormwater Committee and DCR	Present stormwater issues at public schools once per year.	In May 2006 DCR presented the <b>Wachusett Watershed Education Project</b> to three 4th grade classes from Boylston Elementary School.

**1a. Additions**


## 2. Public Involvement and Participation

BMP ID #	BMP Description	Responsible Dept./Person Name	Measurable Goal(s)	Progress on Goal(s) – Permit Year 4 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Permit Year 5
PP-1	Partner with local organization	Stormwater Committee/Town Administrator	Identify group to partner with (DCR)	Assisted DCR with the initial design and cost estimate for a bio swale to be installed at an outfall near the reservoir.	Continue working with DCR and look for other ways to partner. Assist DCR with Watershed Education Teacher Workshops by contacting and encouraging Boylston teachers to participate in program.
Revised				DCR reviewed and provided comments on draft Stormwater Control By-law.  DCR staff presented workshop for Envirothon Teams in Worcester area, including Tahanto Regional High School. Workshop included water quality, watersheds, and non-point sources of pollution.	
PP-3	Incorporate SW into public meetings	Town Admin.	Discuss SWMP at Spring Town meeting	The stormwater Control By-law was published in the Town Meeting Warrant and discussed and approved at the Special Town Meeting held on October 16, 2006.	Stormwater issues will be discussed at periodic Stormwater Committee meetings, Conservation Commission meetings, and Special or Annual Town Meetings which are open to the public.
Revised					
PP-4	Poster Contest	Town Admin.	Develop concept and approach local scouting troops.	See below	See below
Revised					
PP-5	Stormwater Committee	Town Admin.	Review SWMP each year and coordinate efforts of all Town offices.	Met as needed and with the Conservation Commission during the period. Stormwater will fall under the Conservation Commission in Y5.	Stormwater will fall under the Conservation Commission in Y5. Stormwater Committee will meet as needed.
Revised					

**2a. Additions**

PP-4	Poster Contest	Town Admin.	Develop concept	Contacted local scout troop, however no response to poster session idea.	Continue relationship with DCR and work with them on outreach to local school age children.

### 3. Illicit Discharge Detection and Elimination

BMP ID #	BMP Description	Responsible Dept./Person Name	Measurable Goal(s)	Progress on Goal(s) – Permit Year 4 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Permit Year 5
ID-1 Revised	Drainage Mapping	Stormwater Committee	Update map with outfalls in priority areas	Obtained updated base map from DCR. DCR identified additional catch basins and outfalls within the urbanized area and added them to the base map.	Work with DCR early in 2007 to finish locating catch basins and outfalls in urbanized area and transfer locations to base map.
ID-2 Revised	Eliminate Illicit Discharges	DPW	Implement Plan	DCR investigated illicit pipe discharge from 26 W. Temple St. and reported to Town. Other potential illicit discharges identified during catch basin cleaning and reported to Board of Health.	Work in Y5 to eliminate illicit discharges and develop an Illicit Discharge By-law.
ID-3 Revised	Develop and implement an illicit discharge by-law	Stormwater Committee	Develop draft by-law	Guidance and draft illicit discharge by-laws were reviewed during Y4, however a by-law was not drafted.	Work in Y5 to eliminate illicit discharges and develop an Illicit Discharge By-law.

#### 3a. Additions


**4. Construction Site Stormwater Runoff Control**

<b>BMP ID #</b>	<b>BMP Description</b>	<b>Responsible Dept./Person Name</b>	<b>Measurable Goal(s)</b>	<b>Progress on Goal(s) – Permit Year 4 (Reliance on non-municipal partners indicated, if any)</b>	<b>Planned Activities – Permit Year 5</b>
CS-1	Develop and implement Construction Site Runoff Control Program	Stormwater Committee	Implement Construction Site Runoff Control Program	The Stormwater Control By-Law was adopted at the Special Town Meeting on October 16, 2006.	Work with Conservation Commission to develop regulations to enforce new by-law.
Revised					
CS-2	Develop and implement Erosion and Sediment Control By-law	Con. Com	Modify existing regulations and/or develop by-law  Present by-law at Town Meeting and finalize	The Stormwater Control By-Law was adopted at the Special Town Meeting on October 16, 2006.	Work with Conservation Commission to develop regulations to enforce new by-law.
Revised					

**4a. Additions**


**5. Post-Construction Stormwater Management in New Development and Redevelopment**

BMP ID #	BMP Description	Responsible Dept./Person Name	Measurable Goal(s)	Progress on Goal(s) – Permit Year 4 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Permit Year 5
PC-1	Develop and implement Post-Construction Runoff Control Program	Planning Board & Building Inspector	Implement Construction Site Runoff Control Program	The Stormwater Control By-Law was adopted at the Special Town Meeting on October 16, 2006.	Work with Conservation Commission to develop regulations to enforce new by-law.
Revised					
PC-2	Develop and implement post-construction runoff regulations	Planning Board & Con. Com.	Modify existing regulations and/or develop by-law  Present by-law at Town Meeting and finalize	The Stormwater Control By-Law was adopted at the Special Town Meeting on October 16, 2006.	Work with Conservation Commission to develop regulations to enforce new by-law.
Revised					
PC-2	Develop and implement post-construction runoff regulations	Planning Board & Con. Com.	Modify existing regulations and/or develop by-law  Present by-law at Town Meeting and finalize	The Stormwater Control By-Law was adopted at the Special Town Meeting on October 16, 2006.	Work with Conservation Commission to develop regulations to enforce new by-law.
Revised					

**5a. Additions**


## 6. Pollution Prevention and Good Housekeeping in Municipal Operations

BMP ID #	BMP Description	Responsible Dept./Person Name	Measurable Goal(s)	Progress on Goal(s) – Permit Year 4 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Permit Year 5
GH-1 Revised	Employee training program	Highway Dept.	Highway dept. will hold one good housekeeping workshop per year.	During daily meetings with personnel, good housekeeping measures are discussed as they relate to stormwater practices.	Continue with meetings and develop a formal training program moving forward that will train staff as needed regarding Phase 2 best management practices.  Show DPW staff the <i>After the Storm</i> video from EPA.  Work with DCR to identify other training opportunities for training that is related to stormwater.
GH-2 Revised	Catch basin cleaning	Highway Dept.	Highway Dept. will clean each catch basin in the urbanized area of Town once per year.	The Highway Dept. cleaned catch basins twice per year and as needed. Don Parker recorded streets names, # CBs, and recorded total amount of sediment and debris collected.	Continue to clean catch basins at least once per year in the urbanized area of Town. Continue to record location of CBs cleaned and total amount of sediment/debris removed.
GH-3 Revised	Street sweeping	Highway Dept.	Highway Dept. will sweep every street in the urbanized area of Town once per year	Highway Dept. swept streets once in Spring and as needed. Don Parker recorded the amount of sweepings collected.	Continue to sweep streets in the urbanized area at least once per year. Continue to record volume of sweepings.
GH-4 Revised	Recycling program	Highway Dept.	Continue Town's waste oil collection	Continued to collect waste oil at the Town Barn to burn in the furnace.	Continue Town's waste oil collection.
GH-5 Revised	Municipal Operation and Maintenance Plan	Highway Dept.	Develop schedule for municipal maintenance activities	Because of the focus on the by-law revisions by the volunteer stormwater group, a formal schedule for municipal activities was not developed. Will develop schedule in Y5.	Develop a formal schedule for these municipal maintenance activities in Y5.

GH-6	Reporting	Highway Dept.	Record stormwater management activities	Don Parker prepares a weekly report of Highway Dept. activities for the Town Manager, which includes stormwater related activities.	Continue Highway Department weekly reporting to the Town Manager.
Revised					

**6a. Additions**

GH-7	Petroleum Spill Response Training	Fire Dept	Boom Deployment	The Fire Chief attended the Boom Deployment and Tactical Booming Training provided by DCR on 09/06/06.	Continue to work with DCR to identify training for municipal operations.

**7. BMPs for Meeting Total Maximum Daily Load (TMDL) Waste Load Allocations (WLA) <<if applicable>>**

BMP ID #	BMP Description	Responsible Dept./Person Name	Measurable Goal(s)	Progress on Goal(s) – Permit Year 4 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Permit Year 5
TMDL-1 Revised	Check current impairment lists	DPW	Check current list each Winter	Draft pathogen report available for the Nashua River Watershed, which includes Malagasco Brook.	Check current list in the Winter.  Follow up on draft report with DCR and develop specific BMPs for Malagasco Brook once report is final.
TMDL-2 Revised	Malagasco Brook Pathogens	Stormwater Committee	Partner with DCR	Outfalls along the Brook have been located and mapped. Samples were collected from Malagasco Brook as part of a s part of a study by DCR, UMass, and WPI. However it is not apparent from this study if stormwater adversely affects surface water quality in the Brook. Other potential sources were identified during the study.	Continue to work with DCR to monitor the Brook. In Y5 implement measures to mitigate pathogens from the Boylston MS4 as necessary.

**7a. Additions**


**7b. WLA Assessment: N/A**

**Part IV. Summary of Information Collected and Analyzed**

The Town of Boylston did not collect/analyze water quality data for the Stormwater Management Plan during Permit Year 4. DCR collected water quality information from Boylston Brook, Malagasco Brook, and French Brook during Permit Year 4 and has provided that data to the Town. The Town is currently analyzing the data and will discuss results with DCR.

**Part V. Program Outputs & Accomplishments (OPTIONAL)**

(Since beginning of permit coverage unless specified otherwise by a \*\*, which indicates response is for period covering April 1, 2006 through March 31, 2007)

**Programmatic**

	(Preferred Units)	Response
Stormwater management position created/staffed	(y/n)	N
Annual program budget/expenditures **	(\$)	\$5,000 to W&C, staff time, volunteer time; \$150K/yr, EOEA Grant \$35K (Y3 and Y4)
Total program expenditures since beginning of permit coverage	(\$)	Approx. \$55,000
Funding mechanism(s) (General Fund, Enterprise, Utility, etc)		General Fund, grant from EOEA

**Education, Involvement, and Training**

Estimated number of property owners reached by education program(s)	(# or %)	
Stormwater management committee established	(y/n)	Y
Stream teams established or supported	(# or y/n)	Y
Shoreline clean-up participation or quantity of shoreline miles cleaned **	(y/n or mi.)	
Shoreline cleaned since beginning of permit coverage	(mi.)	
Household Hazardous Waste Collection Days		

▪ days sponsored **	(#)	
▪ community participation **	(# or %)	
▪ material collected **	(tons or gal)	
School curricula implemented	(y/n)	

**Legal/Regulatory**

	In Place Prior to Phase II	Reviewing Existing Authorities	Drafted	Draft in Review	Adopted
Regulatory Mechanism Status (indicate with "X")		X			
▪ Illicit Discharge Detection & Elimination					
▪ Erosion & Sediment Control	X				X
▪ Post-Development Stormwater Management					X
Accompanying Regulation Status (indicate with "X")					
▪ Illicit Discharge Detection & Elimination		X			
▪ Erosion & Sediment Control				X	
▪ Post-Development Stormwater Management				X	

**Mapping and Illicit Discharges**

	(Preferred Units)	Response
Outfall mapping complete	(%)	
Estimated or actual number of outfalls	(#)	
System-Wide mapping complete (complete storm sewer infrastructure)	(%)	
Mapping method(s)		
▪ Paper/Mylar	(%)	
▪ CADD	(%)	
▪ GIS	(%)	
Outfalls inspected/screened **	(# or %)	
Outfalls inspected/screened (Since beginning of permit coverage)	(# or %)	
Illicit discharges identified **	(#)	
Illicit discharges identified (Since beginning of permit coverage)	(#)	

Illicit connections removed **	(# ); and (est. gpd)	
Illicit connections removed (Since beginning of permit coverage)	(#); and (est. gpd)	
% of population on sewer	(%)	
% of population on septic systems	(%)	

### Construction

	(Preferred Units)	Response
Number of construction starts (>1-acre) **	(#)	
Estimated percentage of construction starts adequately regulated for erosion and sediment control **	(%)	
Site inspections completed **	(# or %)	
Tickets/Stop work orders issued **	(# or %)	
Fines collected **	(# and \$)	
Complaints/concerns received from public **	(#)	

### Post-Development Stormwater Management

Estimated percentage of development/redevelopment projects adequately regulated for post-construction stormwater control	(%)	
Site inspections (for proper BMP installation & operation) completed **	(# or %)	
BMP maintenance required through covenants, escrow, deed restrictions, etc.	(y/n)	
Low-impact development (LID) practices permitted and encouraged	(y/n)	Y

### Operations and Maintenance

Average frequency of catch basin cleaning (non-commercial/non-arterial streets) **	(times/yr)	2
Average frequency of catch basin cleaning (commercial/arterial or other critical streets) **	(times/yr)	2
Qty of structures cleaned **	(#)	

Qty. of storm drain cleaned **	(%, LF or mi.)	
Qty. of screenings/debris removed from storm sewer infrastructure **	(lbs. or tons)	
Disposal or use of screenings (landfill, POTW, compost, beneficial use, etc.) **	(location)	

<b>Basin Cleaning Costs</b>		
• Annual budget/expenditure (labor & equipment)**	(\$)	
• Hourly or per basin contract rate **	(\$/hr or \$ per basin)	
• Disposal cost**	(\$)	
<b>Cleaning Equipment</b>		
• Clam shell truck(s) owned/leased	(#)	
• Vacuum truck(s) owned/leased	(#)	
• Vacuum trucks specified in contracts	(y/n)	
• % Structures cleaned with clam shells **	(%)	
• % Structures cleaned with vector **	(%)	

(Preferred Units) Response

Average frequency of street sweeping (non-commercial/non-arterial streets) **	(times/yr)	1
Average frequency of street sweeping (commercial/arterial or other critical streets) **	(times/yr)	1
Qty. of sand/debris collected by sweeping **	(lbs. or tons)	
Disposal of sweepings (landfill, POTW, compost, beneficial use, etc.) **	(location)	
<b>Annual Sweeping Costs</b>		
• Annual budget/expenditure (labor & equipment)**	(\$)	
• Hourly or lane mile contract rate **	(\$/hr. or ln mi.)	
• Disposal cost**	(\$)	
<b>Sweeping Equipment</b>		
• Rotary brush street sweepers owned/leased	(#)	
• Vacuum street sweepers owned/leased	(#)	
• Vacuum street sweepers specified in contracts	(y/n)	
• % Roads swept with rotary brush sweepers **	%	
• % Roads swept with vacuum sweepers **	%	

Reduction (since beginning of permit coverage) in application on public land of:  
 (“N/A” = never used; “100%” = elimination)

▪ Fertilizers	(lbs. or %)	
▪ Herbicides	(lbs. or %)	
▪ Pesticides	(lbs. or %)	
Integrated Pest Management (IPM) Practices Implemented	(y/n)	

	(Preferred Units)	Response
Average Ratio of Anti-/De-Icing products used **  (also identify chemicals and ratios used in specific areas, e.g., water supply protection areas)	% NaCl % CaCl <sub>2</sub> % MgCl <sub>2</sub> % CMA % Kac % KCl % Sand	
Pre-wetting techniques utilized **	(y/n or %)	
Manual control spreaders used **	(y/n or %)	
Zero-velocity spreaders used **	(y/n or %)	
Estimated net reduction or increase in typical year salt/chemical application rate	(±lbs/ln mi. or %)	
Estimated net reduction or increase in typical year sand application rate **	(±lbs/ln mi. or %)	
% of salt/chemical pile(s) covered in storage shed(s)	(%)	
Storage shed(s) in design or under construction	(y/n or #)	
100% of salt/chemical pile(s) covered in storage shed(s) by May 2008	(y/n)	

**Water Supply Protection**

Storm water outfalls to public water supplies eliminated or relocated	# or y/n	
Installed or planned treatment BMPs for public drinking water supplies and their protection areas	# or y/n	
<ul style="list-style-type: none"> <li>Treatment units induce infiltration within 500-feet of a wellhead protection area</li> </ul>	# or y/n	