Municipality/Organization: Town of Groveland

EPA NPDES Permit Number: MA041195

MassDEP Transmittal Number: W-035834

Annual Report Number
& Reporting Period: No. 15: May 1, 2017 – April 30, 2018

NPDES PII Small MS4 General Permit Annual Report

Part I. General Information

Contact Person: Robert P. Arakelian Title: Road Commissioner

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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:

Printed Name: Michael N. Wood

Title: Chair, Board of Selectmen

Date: April 25, 2018

Part II. Self-Assessment

The Town of Groveland's small MS4 was approved under the NPDES Stormwater General Permit in October of 2003. A Stormwater Management Committee has been established between the DPW, other applicable Town departments, and an outside consultant to monitor permit requirements and BMP implementation. In accordance with permit requirements, the Town of Groveland has completed its required annual self-assessment for its Phase II Stormwater Program. The following achievements have been made and BMPs developed as part of the Town's Stormwater Management Program (SWMP) Plan.

Groveland has created several webpages and provided downloadable documents on its Town website highlighting stormwater management goals and regulations. Contact information for the public to report possible illicit discharges is also posted on the Town website. It is expected that the existing public education program will be substantially expanded under the new permit once it becomes effective with a goal of targeting specific audiences with relevant topics. A volunteer initiative held a stream cleanup day in conjunction with Earth Day while and the Town partners with neighboring towns to sponsor hazardous waste collection events approximately twice per month during spring, summer, and fall, available to all residents.

The town has compiled a map of all of its outfalls and catch basins in its Urbanized Area, of which there are approximately 86 and 975, respectively. Additional drainage infrastructure is added to the map as it is located, and additional structures within the expanded Urbanized Area will be added once the permit becomes effective. The Highway Department routinely watches for evidence of illicit discharges, such as dry weather flows, from the stormwater outfalls during its normal operations and any suspicious outflow is reported to the Road Commissioner for follow-up. The Road Commissioner, Board of Health, and other departments work together as needed to investigate and resolve any reported issues.

New and re- development projects must comply with Article 14 of the Town's general bylaws which contains language addressing the control of erosion and sediment in runoff from construction sites. The Town conducts periodic inspections for erosion and sediment control during construction, and new construction must also comply with the Massachusetts DEP WPA Stormwater Management Policy. Developers proposing construction projects are required to obtain a Stormwater Management Permit and Land Disturbance Permit, and the project plans are subject to review by a third-party engineering firm. Developers must also file an Operations and Maintenance Plan to indicate compliance with all relevant regulations in future.

Ongoing maintenance of the streets and drainage structures is already a part of the Town's O&M program. The Highway Department performs annual street sweeping and it rebuilds or upgrades stormwater drainage structures as needed. Catch basins known to have high accumulations of debris are cleaned at least once per year; other catch basins are cleaned as resources allow. Additionally, all road salt materials used by the Town are stored in a covered storage shed at the Town garage property, where detention ponds help protect nearby surface waters from direct runoff.

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 15 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Next Permit Term
1A	Public Education Seminars	Board of Selectmen	Number per year	The Road Commissioner periodically reports to Board of Selectmen about goals at publicly televised meetings.	The Road Commissioner holds periodic meetings with Selectmen about storm water issues, including work performed to date and steps moving forward. Meetings will likely increase during the next permit term and when the new permit becomes effective to coordinate program budgeting and implementation.
Revised					
1B	Storm Water Education Flyers	Board of Selectmen	Number of flyers and posters dist per year	No flyers were distributed this period.	Explore the feasibility of including informational flyers with property tax bills to target residential audiences. Information will likely include topics on septic system maintenance, proper pet waste management, fertilizer and pesticide application, and proper lawn maintenance as specified under the new permit. Review opportunities to provide additional public information under the new permit, such as flyers on pet waste through the Town Clerk when registering dogs and another through various permitting departments to educate developers on the use of erosion and sediment controls during construction.
Revised					

BMP ID #	BMP Description	Responsible Dept./Person Name	Measurable Goal(s)	Progress on Goal(s) – Permit Year 15 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Next Permit Term
1C	Storm water web page	Board of Selectmen	Number of web page visits	The Town maintains a dedicated stormwater webpage, including information on the Town's Stormwater Management Committee, and links to historic meeting minutes and agendas. There are also direct links to the Town's Stormwater management Program, Stormwater management General Bylaw, and Stormwater Management Permit Application.	Continue to update the website to provide relevant information on the permit and its local applicability. Explore the feasibility of adding links to EPA's website and providing links to downloadable educational material content to support BMP 1B. Expand the Town website with targeted audience messages to address requirements of the new permit.
Revised					
1D	Local cable station campaign	Board of Selectmen	Number of times shown	None this period.	Determine feasibility of cable campaign for next period, such as showing EPA-produced videos such as "After the Storm" if needed under the new permit.
Revised					

1a. Additions.

BMP ID #	BMP Description	Responsible Dept./Person Name	Measurable Goal(s)	Progress on Goal(s) – Permit Year 15 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Next Permit Term
1E	Public Education Table	Board of Selectmen	Staff table	Staffed an informational table at Groveland Day in the fall of 2017 with information on stormwater.	Staff an informational table at Groveland Day, scheduled for the fall 2018 with information on stormwater. Also promote other public education and outreach BMPs outlined throughout this report.
Revised					

2. Public Involvement and Participation

BMP ID #	BMP Description	Responsible Dept./Person Name	Measurable Goal(s)	Progress on Goal(s) – Permit Year 15 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Next Permit Term
2A	Comment & Q&A at seminars	Board of Selectmen	Document concerns and respond	Made periodic informal presentations to the Board of Selectmen by Road Commissioner. Budgeted and retained a consultant for implementation of Year-1 requirements of the new permit.	Provide periodic status updates on stormwater management program progress. Budget for implementation of future items in order to meet requirements of the new permit.
Revised	*Present annual report to Board of Selectmen*				
2B	Volunteer cleanup & monitoring	Board of Selectmen	# of volunteers and accomplishments	Volunteers had a stream cleanup day in conjunction with Earth Day.	Continue to support program next year, currently scheduled for April 22, 2018.
Revised					
2C	Annual waste recycling day	Board of Selectmen	Amount of waste collected for recycle.	The local Boy Scout chapter held an electronics waste recycling day in June for residents to dispose of unwanted electronic goods.	Continue to support program next year.
Revised					

2a. Additions.

BMP ID #	BMP Description	Responsible Dept./Person Name	Measurable Goal(s)	Progress on Goal(s) – Permit Year 15 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Next Permit Term
2D	Storm Drain Stenciling	Board of Selectmen	Number of drains stenciled	The majority of catch basins with outfalls discharging to the Merrimack River were stenciled by 2008.	Periodically repaint faded stencils and mark new basins when they are constructed in the Town as funding and manpower are available.
Revised					
2E	Stormwater Management Committee	Stormwater Management Committee		The Stormwater Management Committee was reestablished during Year 14 with representatives to oversee permit implementation. Completed a draft Notice of Intent (NOI) to submit under the new permit once it becomes effective.	Review the draft NOI and finalize responsible departments for BMP implementation. Once complete, work towards completing other deliverables such as a Stormwater Management Plan to meet deadlines established under the new permit.
Revised					

BMP ID #	BMP Description	Responsible Dept./Person Name	Measurable Goal(s)	Progress on Goal(s) – Permit Year 15 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Next Permit Term
2F	Household Hazardous Waste Collection Event	Board of Health	Allow residents to periodically dispose of HHW	In partnership with approximately a dozen neighboring towns, residents may periodically dispose of household hazardous wastes for a fee at events held approximately every few weeks during the spring, summer, and fall of 2017.	Continue to advertise and allow local participation in HHW collection events held in neighboring communities throughout the year.
Revised					
2G	Organic Yard Waste Collection	Highway Department	Prevent organic yard waste from being dumped in culverts, streams, or wetlands	Provided a drop-off location for yard wastes, including leaves, grass clippings, and small brush from residents every Saturday through the growing season.	Continue program next permit year.
Revised					

3. Illicit Discharge Detection and Elimination

BMP ID #	BMP Description	Responsible Dept./Person Name	Measurable Goal(s)	Progress on Goal(s) – Permit Year 15 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Next Permit Term
3A	Storm drain system map	Board of Selectmen	Percent of system mapped	The Town has developed a storm drain map showing drainage structures in Groveland, including outfalls and catch basins within the regulated area totaling approximately 86 and 975, respectively. No new structures were mapped during this period.	Update the stormwater map with newly located outfalls and catch basins discovered since the map was completed and to include newly built infrastructure. Begin to update the locations of new stormwater infrastructure within the expanded urbanized area as required by the new permit. Delineate contributing catchment areas based on existing information and prioritize per new permit requirements.
Revised					
3B	Ordinance prohibiting illicit discharges	Board of Selectmen	Monitor compliance with ordinance	None this period.	Work towards reviewing and drafting an Illicit Discharge, Detection, and Elimination (IDDE) bylaw to satisfy new permit requirements.
Revised					
3C	Plan to detect illicit discharges	Board of Selectmen	# of illicit discharges identified	The Highway Department performs ongoing observations during routine operations to look for potential illicit discharges, such as dry weather flows or other evidence. Any suspect discharges are reported to the Road Commissioner for follow-up. No illicit discharges were observed during this period.	Continue ongoing observations by Highway Department personnel and the Road Commissioner. Establish a written IDDE Plan by June 2019 to fulfill new permit requirements.
Revised					

3a. Additions.

BMP ID #	BMP Description	Responsible Dept./Person Name	Measurable Goal(s)	Progress on Goal(s) – Permit Year 15 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Next Permit Term
3D	Inspect outfalls / perform dry weather screening	Office of the Road Commissioner	Number of outfalls inspected/screened	None this period.	Continue to monitor and inspect for possible illicit discharges during routine department operations, and follow up on any potential problems. Establish procedures to meet the schedule required under the new Phase II permit within the timeline outlined and complete sampling during future permit years.
Revised					
3E	Provide Contact Information for Reporting an Illicit Discharge	Board of Selectmen	Distribute contact info to all households in the town	All department contact information is provided on the Town website. Calls and complaints pertaining to potential illicit discharges are addressed by the Road Commissioner, Board of Health, or other department as appropriate. Departments work together to coordinate responses as needed. No calls were received during this period.	Address calls as received. Provide contact information to residents on illicit discharges via the website.
Revised					

4. Construction Site Stormwater Runoff Control

BMP ID #	BMP Description	Responsible Dept./Person Name	Measurable Goal(s)	Progress on Goal(s) – Permit Year 15 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Next Permit Term
4A	Ordinance for erosion & sediment control at construction sites	Board of Selectmen	Enforcement of ordinance	The Town adopted a Stormwater Management bylaw on April 30, 2007 as part of the general bylaws (Article 14). No additional work was performed during this period.	Continue to enforce the bylaw as approved in 2007. Review the existing bylaw and determine if changes are required under the new permit.
Revised					

4a. Additions.

BMP ID #	BMP Description	Responsible Dept./Person Name	Measurable Goal(s)	Progress on Goal(s) – Permit Year 15 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Next Permit Term
4B	Peer Reviews of construction plans	Board of Selectmen	# or % of plans reviewed	Groveland employs third-party engineering firms to conduct peer reviews for all construction projects that will disturb >20,000 square feet proposed in town, paid for by the developer. Proposed development must also prepare a Stormwater Management and Erosion & Sediment Control Reviews are performed to make sure there are adequate erosion and sediment best management practices in place during construction.	Continue to perform peer reviews in advance of construction to ensure adequate erosion and sediment controls are proposed. Establish written procedures for site plan review when updating the town's SWMP Plan as required under the new permit.
Revised					
4C	Construction Site Inspection	Planning Board	# of site inspections performed	Town departments, primarily the Planning Board, performs periodic site inspections to make sure erosion and sediment controls are in place and being maintained. Any issues are noted for follow-up by the developer.	Continue to perform periodic site inspections during construction. Establish written procedures for performing site inspections when updating the town's SWMP Plan as required under the new permit.
Revised					

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 15 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Next Permit Term
5A	Enforce MA DEP WPA Storm water management policy on sites > 1 ac.	Board of Selectmen	Maintenance of Site Plan Review Zoning By-Law	All new subdivisions and site plans comply with MassDEP WPA Storm Water Management Policy as regulated by the Rules & Regulations Governing the Subdivision of Land, most recently revised October 11, 2005.	Continue to enforce rules and regulations when reviewing subdivision proposals. Begin review of existing bylaws and regulations to evaluate changes required under the new permit.
Revised					
5B	Ordinance for post storm water management	Board of Selectmen	Maintenance of ordinance	The Town adopted a Stormwater Management bylaw on April 30, 2007 as part of the general bylaws (Article 14). No additional work was performed during this period.	Continue to enforce the bylaw as approved in 2007. Begin to review the existing bylaw to determine if changes are required under the new permit.
Revised					
5C	Low impact development storm water management incorporated into subdivision regulations	Planning Board	Implement new regulations	The Town has adopted Rules & Regulations Governing the Subdivision of Land, most recently revised October 11, 2005 to ensure post-development conditions will minimize water quality impacts due to stormwater runoff.	Continue to enforce rules and regulations when reviewing subdivision proposals. Begin review of regulations governing Low Impact Development (LID) and street design to evaluate the changes required under the new permit within the timeline outlined.
Revised					

5a. Additions

BMP ID #	BMP Description	Responsible Dept./Person Name	Measurable Goal(s)	Progress on Goal(s) – Permit Year 15 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Next Permit Term
Revised					

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 15 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Next Permit Term
6A	Develop municipal O&M plan	Office of the Road Commissioner	# of structures/streets cleaned, amount of employee training	Groveland performs Operation and Maintenance as part of routine operations. Tasks include periodic street sweeping, catch basin cleaning, drainage system reconstruction, etc.	Continue periodic O&M procedures. Prepare written procedures within the timeline outlined in the new permit to address stormwater infrastructure, parks and open space, material storage, etc.
Revised					
6B	Upgrade drainage systems	Office of the Road Commissioner	Number of upgrades per year	2 drainage structures were rebuilt during this period.	Continue to inspect and maintain the drainage system as needed. Work towards preparing procedures in support of BMP 6A.
Revised					

6a. Additions.

BMP ID #	BMP Description	Responsible Dept./Person Name	Measurable Goal(s)	Progress on Goal(s) – Permit Year 15 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Next Permit Term
6C	Ensure Covered Storage for Salt Materials	Office of the Road Commissioner	All salt stored in covered shed	All salt materials were stored under cover in the salt storage shed during this permit period.	Continue storing and loading of salt materials in the covered storage shed.
Revised					
6D	Sweep streets 1x/year	Office of the Road Commissioner	All streets swept 1x/year	All streets are swept annually using in-house staff and equipment.	Continue annual street sweeping program. Review the need for a targeted sweeping plan for rural, uncurbed roadways for submittal with the Year 1 annual report under the new permit.
Revised					

BMP ID #	BMP Description	Responsible Dept./Person Name	Measurable Goal(s)	Progress on Goal(s) – Permit Year 15 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Next Permit Term
6D	Clean catch basins with high sediment accumulation rates 1x/year	Office of the Road Commissioner	# of catch basins cleaned	Catch basins known to have high sediment accumulation rates are cleaned at least once per year using in-house staff and equipment. Catch basins targeted are typically those on highly traveled streets or those at the low point of a hill.	Continue annual catch basin cleaning. Evaluate sediment accumulation in the basins throughout Town and add basins to the schedule as needed to ensure that sumps remain less than half full. Begin review and preparation of a catch basin optimization plan under new permit requirements.
Revised					

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 15 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Next Permit Term
Revised					

7a. Additions.

BMP ID #	BMP Description	Responsible Dept./Person Name	Measurable Goal(s)	Progress on Goal(s) – Permit Year 15 (Reliance on non-municipal partners indicated, if any)	Planned Activities – Next Permit Term
Revised					

7b. WLA Assessment

The MassDEP final 2014 303(d) Integrated List of Waters outlines three waterbodies in the Town of Groveland that are classified as Category 5 "Waters Requiring a TMDL": the Merrimack River (MA84A-05_201), impaired for PCB in fish tissue and Enterococcus; Johnson Creek (MA84A-15_201), impaired for E.coli bacteria; and Johnsons Pond (MA84027-2014), impaired for mercury in fish tissue and dissolved oxygen. Water quality concerns associated with 303d waters are also addressed through the implementation of BMPs under the six minimum measures for Phase II. Once the new permit becomes effective, the stormwater management program will work towards developing and implementing BMPs to meet impaired waters and TMDL requirements.

Part IV. Summary of Information Collected and Analyzed

Groveland has approximately 975 catch basins and 86 outfalls located within its Urbanized Area. Known structures were mapped during efforts performed in 2008 and 2010. Since that time, additional structures have been located and/or constructed as part of new developments and will be updated during mapping efforts anticipated to occur in conjunction with the new permit. The town has approximately 10 structural BMPs, mostly consisting of detention basins that it is responsible for maintaining. Approximately 60% of the town is on sewer (directed to the Haverhill treatment plant), with the remaining areas on local septic systems. The formerly combined storm/sanitary systems in the downtown area were fully separated in 1978.

Part V. Program Outputs & Accomplishments (OPTIONAL)

Programmatic

Stormwater management position created/staffed	(y/n)	
Annual program budget/expenditures	($)	
Total program expenditures since beginning of permit coverage	($)	
Funding mechanism(s) (General Fund, Enterprise, Utility, etc.)		

Education, Involvement, and Training

Estimated number of residents reached by education program(s)	(# or %)	
Stormwater management committee established	(y/n)	Yes
Stream teams established or supported	(# or y/n)	1

Shoreline clean-up participation or quantity of shoreline miles cleaned	(y/n or mi.)	Yes
Shoreline cleaned since beginning of permit coverage	(mi.)	
Household Hazardous Waste Collection Days		
▪ days sponsored	(#)	0 in-Town, several in nearby towns which residents may attend
▪ community participation	(%)	
▪ material collected	(tons or gal)	
School curricula implemented	(y/n)	No

Legal/Regulatory

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

Mapping and Illicit Discharges

Outfall mapping complete	(%)	
Estimated or actual number of outfalls	(#)	86
System-Wide mapping complete	(%)	
Mapping method(s)		

▪ Paper/Mylar	(%)	
▪ CADD	(%)	
▪ GIS	(%)	
Outfalls inspected/screened	(# or %)	
Outfalls inspected/screened (Since beginning of permit coverage)	(# or %)	
Illicit discharges identified	(#)	0
Illicit discharges identified (Since beginning of permit coverage)	(#)	0
Illicit connections removed	(#) (est. gpd)	0
Illicit connections removed (Since beginning of permit coverage)	(#) (est. gpd)	0
% of population on sewer	(%)	60
% of population on septic systems	(%)	40

Construction

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)	Yes
Low-impact development (LID) practices permitted and encouraged	(y/n)	Yes

Operations and Maintenance

Average frequency of catch basin cleaning (non-commercial/non-arterial streets)	(times/yr)	1
Average frequency of catch basin cleaning (commercial/arterial or other critical streets)	(times/yr)	1

Total number of structures cleaned	(#)	
Storm drain cleaned	(lf or mi.)	
Qty. of screenings/debris removed from storm sewer infrastructure	(lbs. or tons)	
Disposal or use of sweepings (landfill, POTW, compost, recycle for sand, beneficial use, etc.)	(location)	
Cost of screenings disposal	($)	
Basin Cleaning Costs		
Annual budget/expenditure (labor & equipment)	($)	20,000.00
Hourly or per basin contract rate	($/hr or $ per basin)	20.00 per basin
Disposal cost	($)	
Cleaning Equipment		
Clam shell truck(s) owned/leased	(#)	1 leased
Vacuum truck(s) owned/leased	(#)	0
Vacuum truck(s) specified in contracts	(y/n)	0
% Structures cleaned with clam shells	(%)	100
% Structures cleaned with vactor	(%)	0
Average frequency of street sweeping (non-commercial/non-arterial streets)	(times/yr)	1
Average frequency of street sweeping (commercial/arterial or other critical streets)	(times/yr)	1
Qty. of sand/debris collected by sweeping	(lbs. or tons)	
Disposal of sweepings (landfill, POTW, compost, beneficial use, etc.)	(location)	
Cost of sweepings disposal	($)	
Annual Sweeping Costs		
Annual budget/expenditure (labor & equipment)	($)	9,000.00
Hourly or lane mile contract rate	($/hr or $/ln mi.)	105.00/hr
Disposal cost	($)	
Sweeping Equipment		
Number of rotary brush street sweepers owned/leased	(#)	1 owned
Number of vacuum street sweepers owned/leased	(#)	0
Vacuum street sweepers specified in contracts	(y/n)	No

% Roads swept with rotary brush sweepers	(%)	100
% Roads swept with vacuum sweepers	(%)	0
Reduction (since beginning of permit coverage) in application on public land of: ("N/A" = never used; "100%" = elimination)		
▪ Fertilizers	(lbs. or %)	Organic only
▪ Herbicides	(lbs. or %)	n/a
▪ Pesticides	(lbs. or %)	n/a
Integrated Pest Management (IPM) Practices Implemented	(y/n)	
Anti-/De-Icing products and ratios (also identify chemicals and ratios used in specific areas, e.g., water supply protection areas)	% NaCl % $CaCl_2$ % $MgCl_2$ % CMA % Kac % KCl % Sand	45 45 10
Pre-wetting techniques utilized	(y/n)	Yes
Manual control spreaders used	(y/n)	No
Automatic or Zero-velocity spreaders used	(y/n)	Yes
Estimated net reduction or increase in typical year salt/chemical application rate	(±lbs. or %)	
Estimated net reduction or increase in typical year sand application rate	(±lbs. or %)	
% of salt/chemical pile(s) covered in storage shed(s)	(%)	100
Storage shed(s) in design or under construction or already in place	(y/n or #)	1 in place
100% of salt/chemical pile(s) covered in storage shed(s) by May 2008	(y/n)	Yes

Water Supply Protection

Storm water outfalls to public water supplies eliminated or relocated	(# or y/n)	No
Installed or planned treatment BMPs for public drinking water supplies and their protected areas	(# or y/n)	No
Treatment units induce infiltration within 500 ft of a wellhead protection area	(# or y/n)	No