

APPENDIX F

REQUIREMENTS OF APPROVED TOTAL MAXIMUM DAILY LOADS

I. Chloride TMDLs

Permittees that operate regulated MS4s in the municipalities identified in Derry, Londonderry, Salem and Windham that discharge to Beaver Brook; Dinsmore Brook; North Tributary to Canobie Lake; Policy-Porcupine Brook, and any other permittee that discharges to those waterbodies, shall reduce chloride discharges to support achievement of the WLA included in the applicable approved TMDL¹ by complying with EITHER Appendix F Part I.1 or Appendix F Part I.2 below.

1. The permittee shall develop a Chloride Reduction Plan that includes specific actions designed to achieve chloride reduction on municipal roads and facilities, and on private facilities that drain to the MS4. The Chloride Reduction Plan shall be completed within one (1) year of the effective date of the permit and shall include, at a minimum:
 - a. For municipally maintained surfaces:
 - i. Tracking of the amount of salt applied to all municipally owned and maintained surfaces and reporting of salt use using the UNH Technology Transfer Center online tool (<http://www.roadsalt.unh.edu/Salt/>) beginning in the year 2 annual report;
 - ii. Planned activities for salt reduction on municipally owned and maintained surfaces, which may include but are not limited to:
 - Operational changes such as pre-wetting, pre-treating the salt stockpile, increasing plowing prior to de-icing, monitoring of road surface temperature, etc.;
 - Implementation of new or modified equipment providing pre-wetting capability, better calibration rates, or other capability for minimizing salt use;
 - Training for municipal staff and/or contractors engaged in winter maintenance activities;
 - Adoption of guidelines for application rates for roads and parking lots (see NHDES, Chloride Reduction Implementation Plan for Dinsmore Brook, App. J and K (February 2011); Winter Parking Lot and Sidewalk Maintenance Manual (Revised edition June 2008); and the application guidelines on page 17 of Minnesota Snow and Ice Control: Field Handbook for Snow Operators (September 2012) for examples);
 - Regular calibration of spreading equipment;
 - Designation of no-salt and/or low salt zones;

¹ Total Maximum Daily Load (TMDL) Study For Waterbodies in the Vicinity of the I-93 Corridor from Massachusetts to Manchester, NH: Beaver Brook in Derry and Londonderry, NH (2008), Total Maximum Daily Load (TMDL) Study For Waterbodies in the Vicinity of the I-93 Corridor from Massachusetts to Manchester, NH: Dinsmore Brook in Windham, NH (2008), Total Maximum Daily Load (TMDL) Study For Waterbodies in the Vicinity of the I-93 Corridor from Massachusetts to Manchester, NH: North Tributary to Canobie Lake in Windham, NH (2008), Total Maximum Daily Load (TMDL) Study For Waterbodies in the Vicinity of the I-93 Corridor from Massachusetts to Manchester, NH: Policy-Porcupine Brook in Salem and Windham, NH (2008)

- Public education regarding impacts of salt use, methods to reduce salt use on private property, modifications to driving behavior in winter weather, etc.; and
 - Measures to prevent exposure of salt stockpiles (if any) to precipitation and runoff; and
 - iii. An estimate of the total tonnage of salt reduction expected by each activity; and
 - iv. A schedule for implementation of planned activities including immediate implementation of operational and training measures, continued annual progress on other measures, and full implementation of the Plan by the end of the permit term.
- b. For privately maintained facilities that drain to the MS4:
 - i. Identification of private parking lots with 10 or more parking spaces draining to the MS4;
 - ii. Requirements for private parking lot owners and operators and private street owners and operators (1) that any commercial salt applicators used for applications of salt to their parking lots or streets be trained and certified in accordance with Env-Wq 2203, and (2) to report annual salt usage within the municipal boundaries using the UNH Technology Transfer Center online tool (<http://www.roadsalt.unh.edu/Salt/>) or report salt usage directly to the permittee, in which case this information should be reported on the permittees annual report.
 - iii. Requirements for new development and redevelopment to minimize salt usage, and to track and report amounts used using the UNH Technology Transfer Center online tool (<http://www.roadsalt.unh.edu/Salt/>).
- c. At any time during the permit term the permittee may be relieved of additional requirements in Appendix F part I.1.a-b as follows.
 - i. The permittee is relieved of its additional requirements as of the date when the following conditions are met:
 - 1. The applicable TMDL has been modified or revised and EPA has approved a new TMDL applicable for the receiving water that indicates that no additional stormwater controls for the control of chloride are necessary for the permittee's discharge based on wasteload allocations in the newly approved TMDL
 - ii. When the criteria in Appendix F part I.1.c.i. are met, the permittee shall document the date of the approved TMDL in its SWMP and is relieved of any remaining requirements of Appendix F part I.1.a.-b as of that date and the permittee shall comply with the following:
 - 1. The permittee shall identify in its SWMP all activities implemented in accordance with the requirements of Appendix F part.I.1.a.-b to date to reduce chloride in their discharges including implementation schedules for non-structural BMPs and any maintenance requirements for structural BMPs
 - 2. The permittee shall continue to implement all requirements of Appendix F part I.a.-b required to be implemented prior to the date of the newly approved TMDL, including ongoing implementation of identified non-structural BMPs and routine maintenance and replacement of all structural BMPs in accordance with manufacturer or design specifications,

2. The MS4 operator shall work with NHDES to develop an Alternative Chloride Reduction Plan consistent with the applicable TMDL. The MS4 operator shall submit a NHDES-approved Alternative Chloride Reduction Plan that is consistent with the TMDL Implementation Plan and includes schedules and milestones to meet applicable Waste Load Allocations, with their Notice of Intent (NOI) as an alternative to the requirements described in Appendix F part I.1. above.
 - a. The Alternative Chloride Reduction Plan shall be subject to EPA review and the public comment period consistent with the NOI procedures at part 1.7.4.b. of the permit.
 - b. The permittee shall keep the written plan (hardcopy or electronic) as part of their SWMP.
 - c. The permittee shall implement all operator-specific permit requirements included in the permittee's authorization letter from EPA based on the Alternative Chloride Reduction Plan.
 - d. Unless the operator-specific permit requirements related to the Alternative Chloride Reduction Plan are authorized by EPA, the permittee is subject to the requirements described in Appendix F part I.1. above.

II. Bacteria TMDLs

Permittees that operate regulated MS4s in the municipalities identified on Table F-1 that discharge to waterbodies listed on Table F-1 in Appendix F, and any other permittee that discharges to waterbodies listed on Table F-1 in Appendix F, shall reduce bacteria or pathogen discharges to support achievement of the WLA included in the approved TMDLs² by complying with EITHER Appendix F Part II.1 or Appendix F Part II.2 below.

1. Traditional and non-traditional MS4s operating in the municipalities listed in Table F-1 and/or that discharge to a waterbody listed on Table F-1 shall comply with the following BMPs in addition to the requirements of part 2.3 of the Permit, as described below:
 - a. Enhancement of BMPs required by part 2.3 of the permit that shall be implemented during this permit term:
 - i. Part 2.3.3. Public Education: The permittee shall replace its Residential program with an annual message encouraging the proper management of pet waste, including noting any existing ordinances where appropriate, at a minimum. The permittee or its agents shall disseminate educational materials to dog owners at the time of issuance or renewal of a dog license, or other appropriate time. Education materials shall describe the detrimental impacts of improper management of pet waste, requirements for waste collection and disposal, and penalties for non-compliance. The permittee shall also provide information to owners of septic systems about proper maintenance in any catchment that discharges to a water body impaired for bacteria or pathogens.
 - ii. Part 2.3.4 Illicit Discharge: The permittee shall implement the illicit discharge program required by this permit. Catchments draining to any waterbody impaired for bacteria or pathogens shall be designated either Problem Catchments or HIGH priority in implementation of the IDDE program.
 - b. At any time during the permit term the permittee may be relieved of additional requirements in Appendix F part II.1.a., as follows:
 - i. The permittee is relieved of its additional requirements as of the date when the following conditions are met:
 1. The applicable TMDL has been modified or revised and EPA has approved a new TMDL applicable for the receiving water that indicates that no additional stormwater controls for the control of bacteria/pathogens are necessary for the permittee's discharge based on wasteload allocations in the newly approved TMDL

² Hampton/Seabrook Harbor Bacteria TMDL, May 2004, Little Harbor Bacteria TMDL, June 2006, Final Report New Hampshire Statewide TMDL for Bacteria Impaired Waters, September 2010, Final Report TMDL Report for 58 Bacteria Impaired Waters in New Hampshire, August 2011, Final TMDL Report for 44 Bacteria Impaired Waters in New Hampshire, September 2013, Final TMDL Report for 3 Bacteria Impaired Waters in New Hampshire, September 2015, Bacteria TMDL Report for Camp Hadar Beach on Captain Pond in Salem, NH, September 2016

- ii. When the criteria in Appendix F Part II.1.b.i. are met, the permittee shall document the date of the approved TMDL in its SWMP and is relieved of any remaining requirements of Appendix F Part II.1.a. as of that date and the permittee shall comply with the following:
 1. The permittee shall identify in its SWMP all activities implemented in accordance with the requirements of Appendix F Part II.1.a. to date to reduce bacteria/pathogen in their discharges including implementation schedules for non-structural BMPs and any maintenance requirements for structural BMPs
 2. The permittee shall continue to implement all requirements of Appendix F Part II.1.a. required to be implemented prior to the date of the newly approved TMDL, including ongoing implementation of identified non-structural BMPs and routine maintenance and replacement of all structural BMPs in accordance with manufacturer or design specifications
2. The MS4 operator shall work with NHDES to develop an Alternative Bacteria/Pathogens Reduction Plan consistent with the applicable TMDL. The MS4 operator shall submit a NHDES-approved Alternative Bacteria/Pathogens Reduction Plan that is consistent with the TMDL Implementation Plan and includes schedules and milestones to meet applicable Waste Load Allocations, with their Notice of Intent (NOI) as an alternative to the requirements described in Appendix F Part II.1. above.
- a. The Alternative Bacteria/Pathogens Reduction Plan shall be subject to EPA review and the public comment period consistent with the NOI procedures at Part 1.7.4.b. of the permit.
 - b. The permittee shall keep the written plan (hardcopy or electronic) as part of their SWMP.
 - c. The permittee shall implement all operator-specific permit requirements included in the permittee's authorization letter from EPA based on the Alternative Bacteria/Pathogens Reduction Plan.
 - d. Unless the operator-specific permit requirements related to the Alternative Bacteria/Pathogens Reduction Plan are authorized by EPA, the permittee is subject to the requirements described in Appendix F Part II.1. above.

Table F-1 – Waterbodies and Primary Municipalities subject to a Bacteria TMDL.

Towns	Waterbody Name	Assessment Unit #	Impairment
ALLENSTOWN	CATAMOUNT POND - BEAR BROOK STATE PARK BEACH	NHLAK700060503-02-02	Escherichia coli
AMHERST	BABOOSIC LAKE - TOWN BEACH	NHLAK700060905-01-02	Escherichia coli
AMHERST; MILFORD	SOUHEGAN RIVER	NHRIV700060906-16	Escherichia coli
AMHERST; MERRIMACK	BABOOSIC LAKE	NHLAK700060905-01-01	Escherichia coli
BEDFORD	PATTEN BROOK	NHRIV700060803-12	Escherichia coli
BEDFORD	MCQUADE BROOK	NHRIV700060905-13	Escherichia coli

Towns	Waterbody Name	Assessment Unit #	Impairment
GOFFSTOWN; BEDFORD	RIDDLE BROOK	NHRIV700060905-18	Escherichia coli
DERRY	ISLAND POND - CHASE'S GROVE	NHLAK700061101-01-02	Escherichia coli
DERRY	BEAVER LAKE - GALLIEN'S BEACH	NHLAK700061203-02-02	Escherichia coli
DERRY	HOODS POND - TOWN BEACH	NHLAK700061203-03-02	Escherichia coli
DERRY	RAINBOW LAKE - KAREN-GENA BEACH	NHLAK700061203-05-02	Escherichia coli
DERRY	BEAVER BROOK	NHRIV700061203-09	Escherichia coli
DERRY	TAYLOR BROOK	NHRIV700061101-05	Escherichia coli
DOVER; ROLLINSFORD	SALMON FALLS RIVER	NHEST600030406-01	Enterococcus
DOVER; ROLLINSFORD	SALMON FALLS RIVER	NHEST600030406-01	Fecal coliform
DOVER	COCHECO RIVER	NHEST600030608-01	Enterococcus
DOVER	COCHECO RIVER	NHEST600030608-01	Fecal coliform
DOVER	DOVER WWTF SZ-NH	NHEST600031001-01-02	Enterococcus
DOVER	COCHECO RIVER - CENTRAL AVE DAM	NHIMP600030608-04	Escherichia coli
DOVER	BELLAMY RIVER - SAWYERS MILL DAM POND	NHIMP600030903-02	Escherichia coli
DOVER; ROLLINSFORD	FRESH CREEK POND	NHLAK600030608-01	Escherichia coli
ROCHESTER; SOMERSWORTH; DOVER	BLACKWATER BROOK-CLARK BROOK	NHRIV600030608-02	Escherichia coli
ROCHESTER; DOVER	COCHECO RIVER	NHRIV600030608-03	Escherichia coli
DOVER	REYNERS BROOK	NHRIV600030608-04	Escherichia coli
DOVER	COCHECO RIVER	NHRIV600030608-05	Escherichia coli
DOVER	INDIAN BROOK	NHRIV600030608-06	Escherichia coli
DOVER	BERRY BROOK	NHRIV600030608-15	Escherichia coli
DOVER	JACKSON BROOK	NHRIV600030608-16	Escherichia coli
DOVER	BELLAMY RIVER	NHRIV600030903-09	Escherichia coli
DOVER	VARNEY BROOK - CANNEY BROOK	NHRIV600030903-11	Escherichia coli
DOVER	GARRISON BROOK	NHRIV600030903-13	Escherichia coli
DOVER	BELLAMY RIVER NORTH	NHEST600030903-01-01	Fecal Coliform

Towns	Waterbody Name	Assessment Unit #	Impairment
DOVER	UPPER PISCATAQUA RIVER-NH-NORTH	NHEST600031001-01-01	Fecal coliform
DOVER	UPPER PISCATAQUA RIVER-NH-SOUTH	NHEST600031001-01-03	Fecal coliform
DOVER	BELLAMY RIVER SOUTH1	NHEST600030903-01-02	Enterococcus/Fecal Coliform
DOVER	COCHeco RIVER - WATSON-WALDRON DAM POND	NHIMP600030608-02	Escherichia coli
DURHAM	OYSTER RIVER	NHEST600030902-01-03	Enterococcus
DURHAM	ADAMS POINT SOUTH - COND APP1	NHEST600030904-04-06	Enterococcus/Fecal Coliform
DURHAM	OYSTER RIVER	NHIMP600030902-04	Escherichia coli
DURHAM	BEARDS CREEK	NHIMP600030902-06	Escherichia coli
DURHAM	OYSTER RIVER	NHRIV600030902-05	Escherichia coli
DURHAM	LONGMARSH BROOK - BEAUDETTE BROOK	NHRIV600030902-06	Escherichia coli
DURHAM	HAMEL BROOK	NHRIV600030902-08	Escherichia coli
DURHAM	COLLEGE BROOK	NHRIV600030902-09	Escherichia coli
DURHAM	RESERVOIR BROOK	NHRIV600030902-10	Escherichia coli
DURHAM	LITTLEHOLE CREEK	NHRIV600030902-11	E coli
DURHAM	CROMMENT CREEK	NHEST600030904-04-02	Fecal Coliform
DURHAM	ADAMS POINT TRIB	NHEST600030904-06-11	Fecal Coliform
DURHAM	OYSTER RIVER MOUTH	NHEST600030904-06-17	Fecal Coliform
EXETER	EXETER RIVER - EXETER RIVER DAM I	NHIMP600030805-04	Escherichia coli
EXETER	EXETER RIVER	NHRIV600030805-02	Escherichia coli
EXETER	NORRIS BROOK	NHRIV600030806-01	Escherichia coli
GOFFSTOWN; MANCHESTER	NAMASKE LAKE	NHLAK700060607-02	Escherichia coli
GOFFSTOWN	HARRY BROOK	NHRIV700060607-15	Escherichia coli
GOFFSTOWN	CATAMOUNT BROOK	NHRIV700060607-20	Escherichia coli
GOFFSTOWN	GLEN LAKE - PUBLIC (STATE OWNED) BEACH	NHLAK700060607-01-02	Escherichia coli
GREENLAND	UNKNOWN RIVER - WINNICUT RIVER DAM POND	NHIMP600030901-02	Escherichia coli
GREENLAND	HAINES BROOK	NHRIV600030901-03	Escherichia coli
GREENLAND	NORTON BROOK	NHRIV600030901-06	E coli
GREENLAND	FOSS BROOK	NHRIV600030904-05	E coli

Towns	Waterbody Name	Assessment Unit #	Impairment
GREENLAND	SHAW BROOK	NHRIV600030904-13	Escherichia coli
GREENLAND	UNNAMED BROOK	NHRIV600030904-21	Escherichia coli
GREENLAND	WINNICUT RIVER	NHEST600030904-01	Fecal coliform
GREENLAND; STRATHAM; NORTH HAMPTON	WINNICUT RIVER- BARTON BROOK- MARSH BROOK- THOMPSON BROOK	NHRIV600030901-02	Escherichia coli
HAMPSTEAD	WASH POND - TOWN BEACH	NHLAK700061101-03-02	Escherichia coli
HAMPSTEAD	SUNSET LAKE - SUNSET PARK BEACH	NHLAK700061101-03-03	Escherichia coli
HAMPTON	HAMPTON RIVER MARINA SZ	NHEST600031004-09-08	Enterococcus
HAMPTON	ATLANTIC OCEAN - HAMPTON BEACH STATE PARK BEACH	NHOCN000000000-02-10	Enterococcus
HAMPTON	TAYLOR RIVER	NHEST600031003-03	Fecal Coliform
HAMPTON	HAMPTON FALLS RIVER	NHEST600031004-01-03	Fecal Coliform
HAMPTON	TAYLOR RIVER (LOWER)	NHEST600031004-02-02	Fecal Coliform
HAMPTON	HAMPTON RIVER 2, R, 65.60, AC	NHEST600031004-04-02	Enterococcus
HAMPTON; SEABROOK	HAMPTON HARBOR SEG. 04-03	NHEST600031004-04-03	Fecal Coliform
HAMPTON; SEABROOK	HAMPTON HARBOR SEG. 09-01	NHEST600031004-09-01	Fecal Coliform
HAMPTON	HAMPTON/SEABROOK HARBOR 02	NHEST600031004-09-02	
HOLLIS	SILVER LAKE - STATE PARK BEACH	NHLAK700061001-02-02	Escherichia coli
AMHERST; MILFORD; HOLLIS	WITCHES BROOK	NHRIV700061001-02	Escherichia coli
HOLLIS	FLINTS BROOK,	NHRIV700040402-03	Escherichia coli
HOOKSETT	MESSER BROOK	NHRIV700060802-09	E coli
HOOKSETT; MANCHESTER	MERRIMACK RIVER	NHRIV700060802-14-02	Escherichia coli
HUDSON	ROBINSON POND	NHLAK700061203-06-01	Escherichia coli
HUDSON	ROBINSON POND - TOWN BEACH	NHLAK700061203-06-02	Escherichia coli
HUDSON	LAUNCH BROOK	NHRIV700061203-26	Escherichia coli

Towns	Waterbody Name	Assessment Unit #	Impairment
KINGSTON	COUNTRY POND - LONE TREE SCOUT RESV. BEACH	NHLAK700061403-03-03	Escherichia coli
KINGSTON	GREAT POND - KINGSTON STATE PARK BEACH	NHLAK700061403-06-02	Escherichia coli
KINGSTON	GREAT POND - CAMP BLUE TRIANGLE BEACH	NHLAK700061403-06-03	Escherichia coli
KINGSTON	Park Association Beach, Great Pond	NHLAK700061403-06-05	Escherichia coli
MANCHESTER	MERRIMACK RIVER - AMOSKEAG DAM	NHIMP700060802-04	Escherichia coli
MANCHESTER	CRYSTAL LAKE- TOWN BEACH	NHLAK700060703-02-02	Escherichia coli
GOFFSTOWN; MANCHESTER	UNNAMED BROOK - TO PISCATAQUOG RIVER	NHRIV700060607-35	E coli
MANCHESTER; AUBURN; LONDONDERRY	COHAS BROOK - LONG POND BROOK	NHRIV700060703-05	Escherichia coli
MANCHESTER	UNNAMED BROOK - FROM PINE ISLAND POND TO MERRIMACK RIVER	NHRIV700060703-09	Escherichia coli
MANCHESTER	RAYS BROOK	NHRIV700060802-15	E coli
MANCHESTER; BEDFORD	MERRIMACK RIVER	NHRIV700060803-14-02	Escherichia coli
MERRIMACK	NATICOOK LAKE - WASSERMAN PARK BEACH	NHLAK700061002-04-02	Escherichia coli
MANCHESTER; BEDFORD; MERRIMACK; LITCHFIELD	MERRIMACK RIVER	NHRIV700060804-11	Escherichia coli
AMHERST; MERRIMACK	SOUHEGAN RIVER	NHRIV700060906-18	Escherichia coli
AMHERST; MERRIMACK; NASHUA; HOLLIS	PENNICHUCK BROOK - WITCHES BROOK	NHRIV700061001-07	Escherichia coli
MERRIMACK; LITCHFIELD	MERRIMACK RIVER	NHRIV700061002-13	Escherichia coli
MERRIMACK	SOUHEGAN RIVER	NHRIV700060906-25	Escherichia coli
MILFORD	SOUHEGAN RIVER - MCLANE DAM	NHIMP700060906-08	Escherichia coli

Towns	Waterbody Name	Assessment Unit #	Impairment
MILFORD	PURGATORY BROOK	NHRIV700060904-07	Escherichia coli
WILTON; MILFORD	SOUHEGAN RIVER	NHRIV700060904-14	Escherichia coli
MILFORD	GREAT BROOK - OX BROOK	NHRIV700060906-12	Escherichia coli
MILFORD	SOUHEGAN RIVER	NHRIV700060906-13	Escherichia coli
MILTON	MILTON POND - MILTON POND REC AREA BEACH	NHLAK600030404-01-03	Escherichia coli
MILTON	DAMES BROOK	NHRIV600030601-07	Escherichia coli
MILTON	JONES BROOK	NHRIV600030402-04	Escherichia coli
NASHUA	NASHUA RIVER - NASHUA CANAL DIKE	NHIMP700040402-03	E coli
NASHUA	NASHUA RIVER - JACKSON PLANT DAM POND	NHIMP700040402-05	Escherichia coli
NASHUA	NASHUA RIVER	NHRIV700040402-08	Escherichia coli
NASHUA	NASHUA RIVER	NHRIV700040402-09	Escherichia coli
MERRIMACK; LITCHFIELD; HUDSON; NASHUA	MERRIMACK RIVER	NHRIV700061002-14	Escherichia coli
NASHUA	SALMON BROOK - HASSELLS BROOK - OLD MAIDS BROOK - HALE BROOK	NHRIV700061201-05	Escherichia coli
NASHUA	SALMON BROOK	NHRIV700061201-07	Escherichia coli
HUDSON; NASHUA	MERRIMACK RIVER	NHRIV700061206-24	Escherichia coli
NEW CASTLE	ATLANTIC OCEAN - NEW CASTLE BEACH	NHOCN000000000-02-02	Enterococcus
NEWMARKET; GREENLAND; STRATHAM	GREAT BAY PROHIB SZ1	NHEST600030904-02	Enterococcus
NEWMARKET	LAMPREY RIVER	NHEST600030709-01	Enterococcus
NORTH HAMPTON; HAMPTON	LITTLE RIVER	NHEST600031004-10	Fecal coliform
NORTH HAMPTON	ATLANTIC OCEAN - STATE BEACH1	NHOCN000000000-02-09	Enterococcus/Fecal Coliform
NORTH HAMPTON	CHAPEL BROOK	NHEST600031002-03	Fecal coliform
NORTH HAMPTON	TRIBUTARY TO CHAPEL BROOK	NHRIV600031002-23	Escherichia coli

Towns	Waterbody Name	Assessment Unit #	Impairment
NORTH HAMPTON	CHAPEL BROOK	NHRIV600031002-24	Escherichia coli
PELHAM	LONG POND - TOWN BEACH	NHLAK700061205-02-02	Escherichia coli
WINDHAM; HUDSON; PELHAM	BEAVER BROOK	NHRIV700061203-22	Escherichia coli
PELHAM	BEAVER BROOK - TONY'S BROOK	NHRIV700061205-01	Escherichia coli
HAMPSTEAD; PLAISTOW; ATKINSON	KELLY BROOK - SEAVER BROOK	NHRIV700061401-04	Escherichia coli
PORTSMOUTH; NEW CASTLE	LOWER PISCATAQUA RIVER - SOUTH	NHEST600031001-02-02	Enterococcus
PORTSMOUTH	UPPER SAGAMORE CREEK	NHEST600031001-03	Fecal coliform
PORTSMOUTH	UPPER SAGAMORE CREEK	NHEST600031001-03	Enterococcus
PORTSMOUTH; NEW CASTLE; RYE	LOWER SAGAMORE CREEK	NHEST600031001-04	Enterococcus
PORTSMOUTH	SOUTH MILL POND	NHEST600031001-09	Enterococcus
PORTSMOUTH	NORTH MILL POND	NHEST600031001-10	Enterococcus
PORTSMOUTH; GREENLAND	PICKERING BROOK	NHRIV600030904-06	Escherichia coli
PORTSMOUTH	SAGAMORE CREEK	NHRIV600031001-03	Escherichia coli
PORTSMOUTH	LOWER HODGSON BROOK	NHRIV600031001-04	Escherichia coli
PORTSMOUTH	UPPER HODGSON BROOK	NHRIV600031001-05	Escherichia coli
PORTSMOUTH	PAULS BROOK - PEASE AIR FORCE BASE	NHRIV600031001-07	Escherichia coli
PORTSMOUTH	BORTHWICK AVE TRIBUTARY	NHRIV600031001-09	Escherichia coli
PORTSMOUTH	NEWFIELDS DITCH	NHRIV600031001-10	Escherichia coli
RAYMOND	LAMPREY RIVER - CARROLL LAKE BEACH	NHRIV600030703-07-02	Escherichia coli
ROCHESTER	SALMON FALLS RIVER - BAXTER MILL DAM POND	NHIMP600030405-04	Escherichia coli
ROCHESTER	COCHECO RIVER - GONIC DAM POND	NHIMP600030607-02	Escherichia coli
ROCHESTER	COCHECO RIVER	NHRIV600030603-06	Escherichia coli

Towns	Waterbody Name	Assessment Unit #	Impairment
ROCHESTER	COCHECO RIVER	NHRIV600030603-08	Escherichia coli
ROCHESTER	WILLOW BROOK	NHRIV600030603-10	Escherichia coli
ROCHESTER	ISINGLASS RIVER	NHRIV600030607-10	E coli
ROCHESTER	COCHECO RIVER - CITY DAM 1	NHIMP600030603-01	Escherichia coli
ROCHESTER	COCHECO RIVER - HATFIELD	NHIMP600030603-02	Escherichia coli
ROCHESTER	AXE HANDLE BROOK - HOWARD BROOK	NHRIV600030602-03	Escherichia coli
ROLLINSFORD	SALMON FALLS RIVER - SOUTH BERWICK DAM	NHIMP600030406-04	Escherichia coli
SOMERSWORTH; ROLLINSFORD	FRESH CREEK - TWOMBLY BROOK	NHRIV600030608-08	Escherichia coli
ROLLINSFORD	ROLLINS BROOK	NHRIV600030608-10	Escherichia coli
DOVER; ROLLINSFORD	FRESH CREEK	NHRIV600030608-11	Escherichia coli
RYE	WITCH CREEK1	NHEST600031002-01-01	Enterococcus/Fecal Coliform
RYE	BERRYS BROOK1	NHEST600031002-01-02	Enterococcus/Fecal Coliform
NEW CASTLE; RYE	LITTLE HARBOR	NHEST600031002-02	Total Fecal; Enterococcus
RYE	PARSONS CREEK	NHEST600031002-05	Fecal coliform
RYE	ATLANTIC OCEAN - PIRATES COVE BEACH	NHOCN000000000-02-04	Enterococcus
RYE	ATLANTIC OCEAN - CABLE BEACH	NHOCN000000000-02-05	Enterococcus
RYE	ATLANTIC OCEAN - SAWYER BEACH1	NHOCN000000000-02-06	Enterococcus/Fecal Coliform
RYE	ATLANTIC OCEAN - JENNESS BEACH	NHOCN000000000-02-07	Enterococcus
RYE; NORTH HAMPTON	BASS BROOK BEACH OUTFALL AREA1	NHOCN000000000-03-01	Enterococcus/Fecal Coliform
NORTH HAMPTON	ATLANTIC OCEAN - BASS BEACH1	NHOCN000000000-03-02	Enterococcus/Fecal Coliform
PORTSMOUTH; GREENLAND; RYE	BERRY'S BROOK	NHRIV600031002-01	Escherichia coli
RYE	UNNAMED BROOKS - TO ATLANTIC OCEAN AT CONCORD POINT	NHRIV600031002-03	Escherichia coli

Towns	Waterbody Name	Assessment Unit #	Impairment
RYE	UNNAMED BROOK TO BASS BEACH	NHEST600031002-04	Fecal coliform
RYE	UNNAMED BROOK - FROM EEL POND TO ATLANTIC OCEAN RYE OUTFALL	NHRIV600031002-10	Escherichia coli
SALEM	ARLINGTON MILL RESERVOIR-SECOND ST BEACH	NHLAK700061101-04-02	E coli
SALEM	CAPTAIN POND - CAPTAIN'S BEACH	NHLAK700061102-03-02	Escherichia coli
SALEM	CAPTAIN POND - CAMP OTTER SWIM AREA BEACH	NHLAK700061102-03-03	Escherichia coli
SALEM	MILLVILLE LAKE - TOWN BEACH	NHLAK700061102-06-02	E coli
SALEM	Merrimack River	NHRIV700061102-03-06	Escherichia coli
SALEM	ARLINGTON MILL RESERVOIR-ARLINGTON POND IMPROVEMENT ASSOC	NHLAK700061101-04-03	Escherichia coli
SALEM	SALEM TOWN BEACH-HEDGEHOG POND	NHLAK700061102-13	Escherichia coli
SANDOWN	EXETER RIVER	NHRIV600030802-03	Escherichia coli
SEABROOK	MILL CREEK	NHEST600031004-07	Enterococcus
SEABROOK	MILL CREEK	NHEST600031004-07	Enterococcus
SEABROOK	BLACKWATER RIVER	NHEST600031004-08-04	Enterococcus
SEABROOK	SEABROOK HARBOR BEACH	NHEST600031004-09-05	Enterococcus
SEABROOK	ATLANTIC OCEAN - SEABROOK TOWN BEACH	NHOCN000000000-02-11	Enterococcus
SEABROOK	CAINS BROOK - NOYES POND	NHIMP600031004-06	E coli
SEABROOK	CAIN'S BROOK	NHRIV600031004-10	Escherichia coli
SEABROOK	CAIN'S BROOK	NHRIV600031004-12	Escherichia coli
SEABROOK	UNNAMED BROOK TO CAINS MILL POND	NHRIV600031004-21	E coli
SEABROOK	Hunts Island Creek, P/Uc, 15.99, Ac	NHEST600031004-06	Fecal Coliform
SEABROOK	BLACKWATER RIVER 1, R, 69.47, AC	NHEST600031004-08-01	Enterococcus

Towns	Waterbody Name	Assessment Unit #	Impairment
SEABROOK	BLACKWATER RIVER 2, R, 71.07, AC	NHEST600031004-08-02	Enterococcus
SOMERSWORTH	SALMON FALLS RIVER - LOWER GREAT FALLS DAM	NHIMP600030406-02	Escherichia coli
SOMERSWORTH; DOVER	WILLAND POND	NHLAK600030405-03	E coli
ROCHESTER; SOMERSWORTH	SALMON FALLS RIVER	NHRIV600030405-14	Escherichia coli
SOMERSWORTH	SALMON FALLS RIVER	NHRIV600030406-03	Escherichia coli
STRATHAM; EXETER	WHEELWRIGHT CREEK - PARKMAN BROOK	NHRIV600030806-04	Escherichia coli
STRATHAM	TRIB TO SQUAMSCOTT RIVER - STUART DAIRY FARM	NHRIV600030806-14	Escherichia coli
STRATHAM	SQUAMSCOTT RIVER	NHEST600030806-01	Enterococcus
WILTON	CAMP ANN JACKSON GIRL SCOUT POND SWIMMING AREA	NHIMP700060902-13-02	E coli
WILTON	SOUHEGAN RIVER - PINE VALLEY MILL	NHIMP700060904-08	Escherichia coli
WILTON	SOUHEGAN RIVER - TUCKER BROOK	NHRIV700060902-05	Escherichia coli
WILTON	SOUHEGAN RIVER	NHRIV700060902-13	Escherichia coli
WILTON	STONY BROOK - TOWN BEACH (GOSS PARK)	NHRIV700060903-16-02	Escherichia coli
WILTON	SOUHEGAN RIVER - STONY BROOK	NHRIV700060904-13	Escherichia coli
WINDHAM	TOWN BEACH - COBBETTS POND	NHLAK700061204-01- 03	Escherichia coli

III. Lake and Pond Phosphorus TMDLs

Permittees that operate regulated MS4s in the municipalities identified on Table F-2 that discharge to waterbodies listed on Table F-2 in Appendix F or their tributaries, and any other permittee that discharges to waterbodies listed on Table F-2 in Appendix F or their tributaries, shall reduce phosphorus discharges to support achievement of the WLA included in the approved TMDLs complying with EITHER Appendix F Part III.1 or Appendix F Part III.2 below.

1. The permittee shall develop a Lake Phosphorus Control Plan (LPCP) designed to reduce the amount of phosphorus in stormwater discharges from its MS4 to the impaired waterbody or its tributaries consistent with assumptions and requirements of the WLA for the phosphorous loadings published in the applicable phosphorus TMDL (see Table F-2 for TMDL names and links to applicable phosphorus TMDLs). Table F-2, Appendix F provides the percent reductions in stormwater total phosphorus load for each municipality to be consistent with the assumptions and requirements of the WLA

Table F-2: Waterbodies and Primary Municipalities subject to a Lake or Pond Phosphorus TMDL

Towns	Water Body Name	% Reduction In TP Load for all Sources	TMDL Link
Amherst; Merrimack	Baboosic Lake	44%	<u>Baboosic TMDL</u>
Merrimack	Horseshoe Pond	76%	<u>Horseshoe TMDL</u>
Manchester	Nutt Pond	71%	<u>Nutt TMDL</u>
Manchester	Pine Island Pond	64%	<u>Pine Island TMDL</u>
Hudson	Robinson Pond	48%	<u>Robinson TMDL</u>
Bedford	Sebbins Pond	64%	<u>Sebbins TMDL</u>
Sandown	Showell Pond	69%	<u>Showell TMDL</u>
Manchester	Stevens Pond	50%	<u>Stevens TMDL</u>
Derry	Hoods Pond	76%	<u>Hoods TMDL</u>
Kingston	Halfmoon Pond	74%	<u>Halfmoon TMDL</u>
Kingston	Greenwood Pond	69%	<u>Greenwood TMDL</u>
Hollis	Flints Pond	40%	<u>Flints TMDL</u>
Manchester	Dorrs Pond	62%	<u>Dorrs TMDL</u>
Kingston; Newton	Country Pond	52%	<u>Country TMDL</u>
Raymond	Governors Lake	47%	<u>Governors TMDL</u>
Bedford	Sandy Pond	51%	<u>Sandy TMDL</u>

- a. The permittee shall develop a Lake Phosphorous Control Plan (LPCP) as part of its written SWMP and update the LPCP in annual reports pursuant to Part 4.4 of

the Permit. The LPCP shall describe measures the permittee will undertake to reduce the amount of phosphorous in MS4 discharges.

- b. The LPCP shall be implemented in accordance with the following schedule and contain the following elements:
 - i. LPCP Implementation Schedule – The permittee shall complete the implementation of its LPCP as soon as possible but no later than 15 years after the effective date of the permit.
 - ii. The LPCP shall be implemented in accordance with the following schedule and contain the following elements:

Number	LPCP Component and Milestones	Completion Date
1	Legal Analysis	2 years after permit effective date
2	Funding source assessment	3 years after permit effective date
3	Define LPCP scope (LPCP Area)	4 years after permit effective date
4	Calculate Baseline Phosphorus, Allowable Phosphorus Load and Phosphorus Reduction Requirement	4 years after permit effective date
5	Description of planned nonstructural and structural controls	5 years after permit effective date
6	Description of Operation and Maintenance (O&M) Program	5 years after permit effective date
7	Implementation schedule	5 years after permit effective date
8	Cost and Funding Source Assessment	5 years after permit effective date
9	Complete written LPCP	5 years after permit effective date
10	Full implementation of nonstructural controls.	6 years after permit effective date
11	Performance Evaluation.	6 and 7 years after permit effective date
12	1. Performance Evaluation. 2. Full implementation of all structural controls used to demonstrate that the total phosphorus export rate (P_{exp}) from the LPCP Area in mass/yr is equal to or less than the applicable Allowable Phosphorus Load (P_{allow}) plus the applicable Phosphorus Reduction Requirement (P_{RR}) multiplied by 0.80 $P_{exp} \leq P_{allow} + (P_{RR} \times 0.80)$	8 years after permit effective date
13	Performance Evaluation	9 years after permit effective date

14	1. Performance Evaluation. 2. Update LPCP 3. Full implementation of all structural controls used to demonstrate that the total phosphorus export rate (P_{exp}) from the LPCP Area in mass/yr is equal to or less than the applicable Allowable Phosphorus Load(P_{allow}) plus the applicable Phosphorus Reduction Requirement (P_{RR}) multiplied by 0.60 $P_{exp} \leq P_{allow} + (P_{RR} \times 0.60)$ OR that the permittee has reduced their phosphorus export rate by 30kg/year (whichever is greater, unless full Phosphorus Reduction Requirement has been met)	10years after permit effective date
15	Performance Evaluation	11 and 12 years after permit effective date
16	1. Performance Evaluation. 2. Full implementation of all structural controls used to demonstrate that the total phosphorus export rate (P_{exp}) from the LPCP Area in mass/yr is equal to or less than the applicable Allowable Phosphorus Load(P_{allow}) plus the applicable Phosphorus Reduction Requirement (P_{RR}) multiplied by 0.30 $P_{exp} \leq P_{allow} + (P_{RR} \times 0.30)$	13years after permit effective date
17	Performance Evaluation	14 years after permit effective date
18	1. Performance Evaluation. 2. Full implementation of all structural controls used to demonstrate that the total phosphorus export rate (P_{exp}) from the LPCP Area in mass/yr is equal to or less than the applicable Allowable Phosphorus Load(P_{allow}) $P_{exp} \leq P_{allow}$	15years after permit effective date

Table F-3: LPCP components and milestones

iii. Description of LPCP Components:

Legal Analysis- The permittee shall develop and implement an analysis that identifies existing regulatory mechanisms available to the MS4 such as by-laws and ordinances and describe any changes to these regulatory mechanisms that may be necessary to effectively implement the LPCP. This may include the creation or amendment of financial and regulatory authorities. The permittee shall adopt necessary regulatory changes by the end of the permit term.

Scope of the LPCP (LPCP Area) - The permittee shall indicate the area in which the permittee plans to implement the LPCP, this area is known as the "LPCP Area". The permittee must choose one of the following: 1) to implement its LPCP in the entire area within its jurisdiction discharging to the impaired waterbody (for a municipality this would be the municipal boundary) or 2) to implement its LPCP in only the urbanized area portion of its jurisdiction discharging to the impaired waterbody. If the permittee chooses to implement the LPCP in its entire jurisdiction discharging to the impaired waterbody, the permittee may demonstrate compliance with the Phosphorus Reduction Requirement and Allowable Phosphorus Load requirements applicable to it through structural and non-structural controls on discharges that occur both inside and outside the urbanized area. If the permittee chooses to implement the LPCP in its urbanized area only discharging to the impaired waterbody, the permittee must demonstrate compliance with the Phosphorus Reduction Requirement and Allowable Phosphorus Load requirements applicable to it through structural and non-structural controls on discharges that occur within the urbanized area only.

Calculate Baseline Phosphorus Load (P_{base}), Phosphorus Reduction Requirement (P_{RR}) and Allowable Phosphorus Load (P_{allow}) – Permittees shall calculate their numerical Allowable Phosphorus Load and Phosphorus Reduction Requirement in mass/yr by first estimating their Baseline Phosphorus Load in mass/yr from its LPCP Area consistent with the methodology in Attachment 1 to Appendix F or the applicable TMDL, the baseline shall only be estimated using land use phosphorus export coefficients in Attachment 1 to Appendix F or the applicable TMDL methodology and not account for phosphorus reductions resulting from implemented structural BMPs completed to date. Table F-2 contains the percent phosphorus reduction required from urban stormwater consistent with the TMDL of each impaired waterbody. The permittee shall apply the applicable required percent reduction in Table F-2 to the calculated Baseline Phosphorus Load to obtain the permittee specific Phosphorus Reduction Requirement in mass/yr. The Phosphorus Reduction Requirement load shall then be subtracted from the Baseline Phosphorus Load to obtain the permittee specific Allowable Phosphorus Load.

Description of planned non-structural controls – The permittee shall describe the non-structural stormwater control measures to be implemented to support the achievement of the milestones in Table F-3. The description of non-structural controls shall include the planned measures, the areas where the measures will be implemented, and the annual phosphorus reductions that are expected to result from their implementation. Annual phosphorus reduction from non-structural BMPs shall be calculated consistent with Attachment 2 to Appendix F. The permittee shall update the description of planned non-structural controls as needed to support the achievement of the milestones in Table F-3, including an update in the updated written LPCP 10 years after the permit effective date.

Description of planned structural controls – The permittee shall develop a priority ranking of areas and infrastructure within the municipality for

potential implementation of phosphorus control practices. The ranking shall be developed through the use of available screening and monitoring results collected during the permit term either by the permittee or another entity and the mapping required pursuant to Part 2.3.4.6 of the Permit. The permittee shall also include in this prioritization a detailed assessment of site suitability for potential phosphorus control measures based on soil types and other factors. The permittee shall coordinate this activity with the requirements of Part 2.3.6.e. of the Permit. A description and the result of this priority ranking shall be included in the LPCP. The permittee shall describe the structural stormwater control measures necessary to support achievement of the milestones in Table F-3. The description of structural controls shall include the planned measures, the areas where the measures will be implemented, and the annual phosphorus reductions in units of mass/yr that are expected to result from their implementation. Structural measures to be implemented by a third party may be included in the LPCP. Annual phosphorus reduction from structural BMPs shall be calculated consistent with Attachment 3 to Appendix F. The permittee shall update the description of planned structural controls as needed to support the achievement of the milestones in Table F-3, including an update in the updated written LPCP 10 years after the permit effective date.

Description of Operation and Maintenance (O&M) Program for all planned and existing structural BMPs – The permittee shall establish an Operation and Maintenance Program for all structural BMPs being claimed for phosphorus reduction credit as part the LPCP. This includes BMPs implemented to date as well as BMPs to be implemented. The Operation and Maintenance Program shall become part of the LPCP and include: (1) inspection and maintenance schedule for each BMP according to BMP design or manufacturer specification and (2) program or department responsible for BMP maintenance.

Implementation Schedule – An initial schedule for implementing the BMPs, including, as appropriate: funding, training, purchasing, construction, inspections, monitoring, O&M and other assessment and evaluation components of implementation. Implementation of planned BMPs must begin upon completion of the LPCP, and all non-structural BMPs shall be fully implemented within six years of the permit effective date. Where planned structural BMP retrofits or major drainage infrastructure projects are expected to take additional time to construct, the permittee shall within four years of the effective date of the permit have a schedule for completion of construction consistent with the reduction requirements in Table F-3. The permittee shall complete the implementation of its LPCP as soon as possible or at a minimum in accordance with the milestones set forth in Table F-3. The implementation schedule shall be updated as needed to support the achievement of the milestones in Table F-3, including an update in the updated written LPCP 10 years after the permit effective date.

Cost and funding source assessment – The permittee shall estimate the cost for implementing its LPCP and describe known and anticipated funding mechanisms. The permittee shall describe the steps it will take to implement its funding plan. This may include but is not limited to

conceptual development, outreach to affected parties, and development of legal authorities.

Complete written LPCP – The permittee must complete the written LPCP 5 years after permit effective date. The complete LPCP shall include item numbers 1-8 in Table F-3. The permittee shall make the LPCP available to the public for public comment during the LPCP development. EPA encourages the permittee to post the LPCP online to facilitate public involvement. The LPCP shall be updated as needed with an update 10 years after the permit effective date at a minimum to reflect changes in BMP implementation to support achievement of the phosphorus export milestones in Table F-3. The updated LPCP shall build upon the original LPCP and include additional or new BMPs the permittee will use to support the achievement of the milestones in Table F-3.

Performance Evaluation – The permittee shall evaluate the effectiveness of the LPCP by tracking the phosphorus reductions achieved through implementation of structural and non-structural BMPs³ and tracking increases in phosphorus loading from the LPCP Area beginning six years after the effective date of the permit. Phosphorus reductions shall be calculated consistent with Attachment 2 (non-structural BMP performance), Attachment 3 (structural BMP performance) and Attachment 1 (reductions through land use change), to Appendix F for all BMPs implemented to date.⁴ Phosphorus load increases resulting from development shall be calculated consistent with Attachment 1 to Appendix F. Phosphorus loading increases and reductions in units of mass/yr shall be added or subtracted from the calculated Baseline Phosphorus Load to estimate the yearly phosphorous export rate from the LPCP Area in mass/yr. The permittee shall also include all information required in Part III.1.c. of this Appendix in each performance evaluation.

Alternative Schedule Request– If the permittee determines that the schedule to meet required phosphorus reductions contained in items 12, 14, 16 or 18 in Table F-3 is impracticable, the permittee may submit to EPA an Alternative Schedule Request to meet the phosphorus reduction requirements in items 12, 14, 16 or 18 in Table F-3 on the shortest schedule that is achievable considering the factors below.⁵

- a. The Alternative Schedule Request shall include an analysis demonstrating that the schedule to meet phosphorus reduction requirements in items 12, 14, 16 or 18 in Table F-3 is impracticable.

³ In meeting its phosphorus reduction requirements a permittee may quantify phosphorus reductions by actions undertaken by another entity, except where those actions are credited to another permittee identified in Appendix F Table F-2

⁴ Annual phosphorus reductions from structural BMPs installed in the LPCP Area prior to the effective date of this permit shall be calculated consistent with Attachment 3 to Appendix F. Phosphorus Reduction Credit for previously installed BMPs will only be given if the Permittee demonstrates that the BMP is performing up to design specifications and certifies that the BMP is properly maintained and inspected according to manufacturer design or specifications. This certification shall be part of the annual performance evaluation during the year credit is claimed for the previously installed BMP.

⁵ See part A.II.4 for information regarding the Alternative Schedule Request submittal and review process.

EPA expects that an Alternative Schedule Request to meet the phosphorus reduction requirement in item number 12 in Table F-3 would only be submitted in extraordinary circumstances and would occur rarely, where meeting the phosphorus reductions in number 12 in Table F-3 is unaffordable⁶. All Alternative Schedule Requests must include, where relevant, the following:

- i. A narrative of the reasons for the permittee's request for an alternative schedule, including information demonstrating the applicant's efforts and extent of progress made toward meeting required phosphorus reductions in Table F-3,
- ii. A description of the planned structural controls to meet applicable phosphorus reduction milestones,
- iii. Suitability and availability of areas for siting and constructing structural controls, including, if appropriate, a review of third-party partnerships considered for within-watershed structural control sites,
- iv. Access and acquisition of real property rights for constructing and maintaining structural controls,
- v. Timelines for the permittee's planning, design, financing, easement or property interest acquisition, and procurement for and construction of structural controls,
- vi. Timelines for and constraints due to the federal, state and/or local approval(s) and permitting processes for structural controls,
- vii. Anticipated phosphorus reductions due to the rate of redevelopment within the community and the degree to which future redevelopment may be reasonably anticipated to achieve the desired reductions in lieu of reliance upon structural controls by the permittee,
- viii. Estimated cost of the planned structural controls to meet applicable phosphorus reduction milestones,
- ix. Scale of structural BMP controls required and phasing considerations with other capital improvement projects that are being implemented by the permittee or other parties that impact the permittee, municipality or relevant taxpayers or ratepayers,
- x. Affordability for taxpayers or ratepayers (as applicable), including a projection of sources and uses of funds, taking into consideration existing or potential financial capability and funding mechanisms (e.g., property taxes, stormwater rate changes, or stormwater utility fees),
- xi. Other relevant information, and
- xii. A requested schedule to meet all phosphorus reduction requirements from which relief is sought.

⁶ EPA notes that such expectation regarding infrequency does not constitute or establish an additional criterion for the applicant to satisfy

- c. Reporting. Beginning 6 years after the permit effective date, the permittee shall include the following in each annual report submitted pursuant to Part 4.4 of the Permit:
- i. All non-structural control measures implemented during the reporting year along with the phosphorus reduction in mass/yr (P_{NSred}) calculated consistent with Attachment 2 to Appendix F
 - ii. Structural controls implemented during the reporting year and all previous years including:
 1. Location information of structural BMPs (GPS coordinates or street address)
 2. Phosphorus reduction from all structural BMPs implemented to date in mass/yr (P_{Sred}) calculated consistent with Attachment 3 to Appendix F
 3. Date of last completed maintenance for each Structural control
 - iii. Phosphorus load increases due to development over the previous reporting period and incurred to date (P_{DEVinc}) calculated consistent with Attachment 1 to Appendix F.
 - iv. Estimated yearly phosphorus export rate (P_{exp}) from the LPCP Area calculated using Equation 1. Equation 1 calculates the yearly phosphorus export rate by subtracting yearly phosphorus reductions through implemented nonstructural controls and structural controls to date from the Baseline Phosphorus Load and adding loading increases incurred through development to date. This equation shall be used to demonstrate compliance with applicable phosphorus reduction milestones.

$$P_{exp} \left(\frac{\text{mass}}{\text{yr}} \right) = P_{base} \left(\frac{\text{mass}}{\text{yr}} \right) - \left(P_{Sred} \left(\frac{\text{mass}}{\text{yr}} \right) + P_{NSred} \left(\frac{\text{mass}}{\text{yr}} \right) \right) + P_{DEVinc} \left(\frac{\text{mass}}{\text{yr}} \right)$$

Equation 1. Equation used to calculate yearly phosphorus export rate from the chosen LPCP Area. P_{exp} =Current phosphorus export rate from the LPCP Area in mass/year. P_{base} =baseline phosphorus export rate from LPCP Area in mass/year. P_{Sred} = yearly phosphorus reduction from implemented structural controls in the LPCP Area in mass/year. P_{NSred} = yearly phosphorus reduction from implemented non-structural controls in the LPCP Area in mass/year. P_{DEVinc} = yearly phosphorus increase resulting from development since the year baseline loading was calculated in the LPCP Area in mass/year.

- v. Certification that all structural BMPs are being inspected and maintained according to the O&M program specified as part of the PCP. The certification statement shall be:

I certify under penalty of law that all source control and treatment Best Management Practices being claimed for phosphorus reduction credit have been inspected, maintained and repaired in accordance with manufacturer or design specification. I certify that, to the best of my knowledge, all Best Management Practices being claimed for a phosphorus reduction credit are performing as originally designed.

- d. At any time during the permit term the permittee may be relieved of additional requirements in Appendix F Part III.1.a - b as follows.

- i. The permittee is relieved of its additional requirements as of the date when the following conditions are met:
 - 1. The applicable TMDL has been modified or revised and EPA has approved a new TMDL applicable for the receiving water that indicates that no additional stormwater controls for the control of phosphorus are necessary for the permittee's discharge based on wasteload allocations in the newly approved TMDL
 - ii. When the criteria in Appendix F part III.1.d.i. are met, the permittee shall document the date of the approved TMDL in its SWMP and is relieved of any remaining requirements of Appendix F part III.1.a.-b. as of that date and the permittee shall comply with the following:
 - 1. The permittee shall identify in its SWMP all activities implemented in accordance with the requirements of Appendix F part III.1.a.-b. to date to reduce phosphorus in their discharges including implementation schedules for non-structural BMPs and any maintenance requirements for structural BMPs
 - 2. The permittee shall continue to implement all requirements of Appendix F part III.1.a.-b. required to be implemented prior to the date of the newly approved TMDL, including ongoing implementation of identified non-structural BMPs and routine maintenance and replacement of all structural BMPs in accordance with manufacturer or design specifications, and the reporting requirements of Appendix F part III.1.c. remain in place.
- e. The permittee may be relieved of the schedules and milestones contained in Table F-3 as follows:
- i. The permittee is relieved of the applicable schedules and milestones when all the following conditions are met:
 - 1. The permittee has submitted an Alternative Schedule Request package to EPA.^{7,8}
 - 2. EPA has determined the Alternative Schedule Request submittal is complete. The Alternative Schedule Request will be deemed complete 30 days from submittal, unless EPA requests additional information from the permittee.
 - 3. Following a 30-day public comment period on the complete Alternative Schedule Request, EPA approves the request in writing.⁹ If EPA has not acted to approve, modify with permittee consent, or deny an Alternative Schedule Request within 90 days of the close of the public comment period, the Alternative Schedule Request shall be deemed approved.

⁷ Alternative Schedule Request package must be made available to the public consistent with 2.3.3. of the permit.

⁸ Submittal of an alternative schedule request does not relieve the permittee of noncompliance and potential enforcement for failure to comply with any permit requirements prior to the date of approval of an Alternative Schedule.

⁹ EPA expects that an Alternative Schedule Request by a permittee that at the time of such request is in non-compliance with applicable Table F-3 phosphorus reduction percentages would be denied unless the permittee provides information regarding its phosphorus reduction efforts that EPA finds acceptable for this purpose.

- ii. Any action by EPA approving or denying an Alternative Schedule Request is a final agency action that shall be subject to judicial review in federal district court.
- iii. When the permittee meets the conditions in Appendix F part III.1.e.i, the permittee shall incorporate the approved Alternative Schedule Request and the approval date in its LPCP. An approved Alternative Schedule Request will supersede any remaining schedules and milestones in Table F-3. The permittee shall:
 - 1. Identify in its LPCP all activities implemented to date in accordance with the requirements of Appendix F part III.1 and conducted to reduce phosphorus in its discharges pursuant to the submitted Alternative Schedule Request, including non-structural BMP planning and implementation schedules and any structural BMP maintenance requirements;
 - 2. Continue to implement all requirements of Appendix F part III.1 required to be implemented prior to the date of Alternative Schedule Request approval, including ongoing implementation of identified non-structural BMPs and routine maintenance and replacement of all structural BMPs in accordance with manufacturer or design specifications and
 - 3. Continue to implement their LPCP, and the reporting requirements of Appendix F Part III.1.c remain in place

2. The MS4 operator shall work with NHDES to develop an Alternative Phosphorus Reduction Plan consistent with the applicable TMDL. The MS4 operator shall submit a NHDES-approved Alternative Phosphorus Reduction Plan that is consistent with the TMDL Implementation Plan and includes schedules and milestones to meet applicable Waste Load Allocations consistent with the schedules and milestones contained in Appendix F part III.1 above, with their Notice of Intent (NOI) as an alternative to the requirements described in Appendix F part III.1 above.

- a. The Alternative Phosphorus Reduction Plan shall be subject to EPA review and the public comment period consistent with the NOI procedures at part 1.7.4.b. of the permit.
- b. The permittee shall keep the written plan (hardcopy or electronic) as part of their SWMP.
- c. The permittee shall implement all operator-specific permit requirements included in the permittee's authorization letter from EPA based on the Alternative Phosphorus Reduction Plan.
- d. Unless the operator-specific permit requirements related to the Alternative Phosphorus Reduction Plan are authorized by EPA, the permittee is subject to the requirements described in Appendix F part III.1 above.