

Town of Ashland
Chesapeake Bay TMDL Action Plan
June 30, 2015

This document is the Town of Ashland's the Chesapeake Bay TMDL Action Plan, which demonstrates that the Town has:

1. Calculated the full scope of offsets for existing development and new sources that are required to be made by the end of the first permit cycle; and,
2. Determined the methods that will be used to meet the reductions required by the end of the first permit cycle.

This the Action Plan also includes:

1. A review of the current MS4 permit authority and implementation capabilities,
2. Existing, new, and modified legal authorities necessary to meet required reductions;
3. An estimate of future grandfathered projects and their acreage, if any;
4. Expected costs for implementing the Action Plan; and,
5. A description of public comment process and period.

This Chesapeake Bay TMDL Action Plans will be submitted to the Virginia Department of Environmental Quality (DEQ) for review and approval with the Town of Ashland's 2014-2015 MS4 Annual Report on or before October 1, 2015. This Action Plan becomes effective 90 days after the date received by DEQ unless specifically denied in writing by DEQ.

Permit Requirements

- 1. Current program and existing legal authority** (*General Permit Section I.C.2.a.(1)*) *A review of the current MS4 program implemented as a requirement of this state permit including a review of the existing legal authorities and the operator's ability to ensure compliance with this special condition;*

The following is a list of the Town's legal authorities that enable the Town to ensure compliance with this Action Plan:

- a. Ashland, VA, Code of Ordinance Part II, Chapter 4.1, Article I: Stormwater Management,
[http://www.amlegal.com/nxt/gateway.dll/Virginia/ashland_va/townofashlandvirginia?f=templates\\$fn=default.htm\\$3.0\\$vid=amlegal:ashland_va](http://www.amlegal.com/nxt/gateway.dll/Virginia/ashland_va/townofashlandvirginia?f=templates$fn=default.htm$3.0$vid=amlegal:ashland_va) ;
- b. Ashland, VA, Code of Ordinance Part II, Chapter 4.1, Article III: Chesapeake Bay Preservation Area,
[http://www.amlegal.com/nxt/gateway.dll/Virginia/ashland_va/townofashlandvirginia?f=templates\\$fn=default.htm\\$3.0\\$vid=amlegal:ashland_va](http://www.amlegal.com/nxt/gateway.dll/Virginia/ashland_va/townofashlandvirginia?f=templates$fn=default.htm$3.0$vid=amlegal:ashland_va) ;
- c. Ashland, VA, Code of Ordinance Part II, Chapter 4.1, Article V: Water Quality Protection,
[http://www.amlegal.com/nxt/gateway.dll/Virginia/ashland_va/townofashlandvirginia?f=templates\\$fn=default.htm\\$3.0\\$vid=amlegal:ashland_va](http://www.amlegal.com/nxt/gateway.dll/Virginia/ashland_va/townofashlandvirginia?f=templates$fn=default.htm$3.0$vid=amlegal:ashland_va) ;

- d. Ashland, VA, Code of Ordinance Part II, Chapter 4.1, Article VI: Municipal Separate Storm Sewer Systems Management Program,
[http://www.amlegal.com/nxt/gateway.dll/Virginia/ashland_va/townofashlandvirginia?f=templates\\$fn=default.htm\\$3.0\\$vid=amlegal:ashland_va](http://www.amlegal.com/nxt/gateway.dll/Virginia/ashland_va/townofashlandvirginia?f=templates$fn=default.htm$3.0$vid=amlegal:ashland_va) ;
 - e. Ashland, VA, Code of Ordinance Part II, Chapter 5: Erosion and Sediment Control,
[http://www.amlegal.com/nxt/gateway.dll/Virginia/ashland_va/townofashlandvirginia?f=templates\\$fn=default.htm\\$3.0\\$vid=amlegal:ashland_va](http://www.amlegal.com/nxt/gateway.dll/Virginia/ashland_va/townofashlandvirginia?f=templates$fn=default.htm$3.0$vid=amlegal:ashland_va) ;
 - f. Town of Ashland’s MS4 Program Plan,
<http://www.town.ashland.va.us/DocumentCenter/View/42> ;
 - g. Town of Ashland Land Disturbance Permit,
<http://www.town.ashland.va.us/DocumentCenter/Home/View/37>; and
 - h. Town Agreement in Lieu of Erosion & Sediment Control, Water Quality, and Stormwater Management,
<http://www.town.ashland.va.us/DocumentCenter/Home/View/36> .
- 2. New or modified legal authority** (*General Permit Section I.C.2.a.(2)*) *The identification of any new or modified legal authorities such as ordinances, state and other permits, orders, specific contract language, and inter-jurisdictional agreements implemented or needing to be implemented to meet the requirements of this special condition;*

None required.

- 3. Means and methods to address discharges from new sources** (*General Permit Section I.C.2.a.(3)*) *The means and methods that will be utilized to address discharges into the MS4 from new sources;*

The MS4 General Permit requires post-construction stormwater runoff controls for:

- a. New development and development on prior developed lands that are defined as large construction activities or small construction activities in [9VAC25-870-10](#);
- b. New development and development on prior developed lands that disturb greater than or equal to 2,500 square feet, but less than one acre, located in a Chesapeake Bay Preservation Area designated by a local government located in Tidewater, Virginia, as defined in § [62.1-44.15:68](#) of the Code of Virginia; and
- c. New development and development on prior developed lands where an applicable state regulation or local ordinance has designated a more stringent regulatory size threshold than that identified in subdivision “a” or “b” above.

The Town of Ashland’s Ordinance requires that stormwater runoff controls be implemented for any land disturbing activity in excess of 2,500 s.f. There is an exception for single family residential development that is not part of a larger plan of development. Requirements for addressing stormwater runoff are described in the following sections of the Town Code:

- a. Ashland, VA, Code of Ordinance Part II, Chapter 4.1, Article I: Stormwater Management,
[http://www.amlegal.com/nxt/gateway.dll/Virginia/ashland_va/townofashlandvirginia?f=templates\\$fn=default.htm\\$3.0\\$vid=amlegal:ashland_va](http://www.amlegal.com/nxt/gateway.dll/Virginia/ashland_va/townofashlandvirginia?f=templates$fn=default.htm$3.0$vid=amlegal:ashland_va) ;
- b. Ashland, VA, Code of Ordinance Part II, Chapter 4.1, Article III: Chesapeake Bay Preservation Area,

- [http://www.amlegal.com/nxt/gateway.dll/Virginia/ashland_va/townofashlandvirginia?f=templates\\$fn=default.htm\\$3.0\\$vid=amlegal:ashland_va](http://www.amlegal.com/nxt/gateway.dll/Virginia/ashland_va/townofashlandvirginia?f=templates$fn=default.htm$3.0$vid=amlegal:ashland_va) ;
- c. Ashland, VA, Code of Ordinance Part II, Chapter 4.1, Article V: Water Quality Protection,
[http://www.amlegal.com/nxt/gateway.dll/Virginia/ashland_va/townofashlandvirginia?f=templates\\$fn=default.htm\\$3.0\\$vid=amlegal:ashland_va](http://www.amlegal.com/nxt/gateway.dll/Virginia/ashland_va/townofashlandvirginia?f=templates$fn=default.htm$3.0$vid=amlegal:ashland_va) ; and
- d. Ashland, VA, Code of Ordinance Part II, Chapter 5: Erosion and Sediment Control,
[http://www.amlegal.com/nxt/gateway.dll/Virginia/ashland_va/townofashlandvirginia?f=templates\\$fn=default.htm\\$3.0\\$vid=amlegal:ashland_va](http://www.amlegal.com/nxt/gateway.dll/Virginia/ashland_va/townofashlandvirginia?f=templates$fn=default.htm$3.0$vid=amlegal:ashland_va) ;

Note that the Town of Ashland does not utilize of an average land cover condition greater than 16% impervious cover for the design of post-development stormwater management facilities. Therefore, there are no New Source that disturbed one acre or greater as a result of the utilization of an average land cover condition greater than 16% impervious cover for the design of post-development stormwater management facilities.

For New Source that did not utilize an average impervious land cover condition greater than 16% for the design of post development stormwater management facilities additional offsets are not required beyond those for existing development. For New Source that disturbed less than 1 acre, additional offsets are also not required beyond those for existing development. However, if additional offsets were implemented, these offsets have been used to address the Town's total pollutant requirement.

- 4. Estimated existing source loads and calculated total pollutant of concern (POC) required reductions** (*General Permit Section I.C.2.a.(4) and (General Permit Section I.C.2.a.(5)) An estimate of the annual POC loads discharged from the existing sources as of June 30, 2009, based on the 2009 progress run. The operator shall utilize the applicable [Table/Tables] in this section based on the river basin to which the MS4 discharges by multiplying the total existing acres served by the MS4 on June 30, 2009, and the 2009 Edge of Stream (EOS) loading rate; A determination of the total pollutant load reductions necessary to reduce the annual POC loads from existing sources utilizing the applicable [Table/Tables] in this section based on the river basin to which the MS4 discharges. This shall be calculated by multiplying the total existing acres served by the MS4 by the first permit cycle required reduction in loading rate. For the purposes of this determination, the operator shall utilize those existing acres identified by the 2000 U.S. Census Bureau urbanized area and served by the MS4.*)

See Attachment 1 for Estimated Existing Source Loads: Table 2a (James River Basin) and Table 2b (York River Basin).

The regulated area of Town in the James River Basin is 1,633.91 acres. This consists of 639.25 pervious acres, 439.73 impervious acres and excluded areas. Excluded areas for this calculation include 554.93 acres of forested land. Other Excluded areas include Interstate 95 and VDOT facilities, and Hanover County facilities totaling 9.29 acres impervious and 6.21 acres pervious. These facilities will we addressed under the respective MS4s.

The regulated area of Town in the York River Basin is 2,973.94 acres. This consists of 1,079.12 pervious acres, 732.04 impervious acres and excluded areas. Excluded areas for this calculation include 1,162.77 acres of forested land. Other Excluded areas may include Interstate 95 and VDOT facilities, and Hanover County facilities totaling 73.76 acres impervious and 74.48 acres pervious. These facilities will be addressed under the respective MS4s.

The impervious, pervious and forested land covers were calculated as follows. The Town began with the GIS dataset representing land cover (impervious, pervious, and forest) developed by the Richmond Regional Planning District Commission (RRPDC). Next, the Town asked its consultant, Timmons Group to review and verify the data. Timmons Group performed a desktop analysis of the land cover data, comparing it with the Town boundary and with the most current aerial imagery. Discrepancies between the RRPDC land cover data and the Town boundary were corrected by editing the shape file to reflect the actual Town boundary and the most current aerial imagery. To ensure that the topology of the data was clean and accurate, a summation of the area for impervious, pervious, and forest was compared to the area encompassed by the Town. The analysis resulted in the following break-down of land cover: 23% impervious cover, 26% pervious cover, and 51% forested cover.

To further refine the RRPDC information, the forested area was digitized by hand using aerial photography. Hanover County impervious planimetric data generated in 2008, including road edge and building outlines, was then processed against the updated land cover data to provide better connectivity of impervious surfaces. Finally, the data was visually analyzed for errors and discrepancies against aerial imagery to produce the final breakdown of present land cover in the Town of Ashland.

See Attachment 2 for Total POC Reductions Required During this Permit Cycle: Tables 3a (James River Basin) Table 3d (York River Basin).

5. Means and methods to meet the required reductions and schedule (*General Permit Section I.C.2.a.(6)*) *The means and methods, such as management practices and retrofit programs that will be utilized to meet the required reductions included in subdivision 2 a (5) of this subsection, and a schedule to achieve those reductions. The schedule should include annual benchmarks to demonstrate the ongoing progress in meeting those reductions;*

Attachment 3 shows the management practices and retrofit programs (including improvements from redevelopment) that have or will be implemented between July 1, 2009 and the end of the first permit cycle to achieve the 5.0% reductions required for existing development.

An electronic version of the spreadsheet will be provided to DEQ with the submittal of this Action Plan.

6. Means and methods to offset increased loads from new sources initiating construction between July 1, 2009 and June 30, 2014 (*General Permit Section I.C.2.a.(7)*) *The means and methods to offset the increased loads from new sources initiating construction between July 1, 2009, and June 30, 2014, that disturb one acre or greater as a result of the utilization of an average land cover condition greater than 16% impervious cover for the design of*

post-development stormwater management facilities. The operator shall utilize the [applicable table] in this section to develop the equivalent pollutant load for nitrogen and total suspended solids. The operator shall offset 5.0% of the calculated increased load from these new sources during the permit cycle.

The Town of Ashland only uses an average land cover condition of 16% impervious cover. The Town has no “in-lieu of” fees for stormwater.

- 7. Means and methods to offset increased loads from grandfathered projects that begin construction after July 1, 2014** (*General Permit Section I.C.2.a.(8)*) *The means and methods to offset the increased loads from projects as grandfathered in accordance with 9VAC25-870-48, that disturb one acre or greater that begin construction after July 1, 2014, where the project utilizes an average land cover condition greater than 16% impervious cover in the design of post-development stormwater management facilities. The operator shall utilize Table 4 in this section to develop the equivalent pollutant load for nitrogen and total suspended solids.*

There are no grandfathered projects in the Town of Ashland.

- 8. A list of future projects, and associated acreage that qualify as grandfathered** (*General Permit Section I.C.2.a.(10)*) *A list of future projects and associated acreage that qualify as grandfathered in accordance with 9VAC25-870-48*

There are no grandfathered projects in the Town of Ashland.

- 9. An estimate of the expected cost to implement the necessary reductions** (*General Permit Section I.C.2.a.(11)*) *An estimate of the expected costs to implement the requirements of this special condition during the state permit cycle;*

The Town of Ashland drains to the James River Basin and the York River Basin. For the York River Basin, the required 5.0% reductions have been exceeded.

For the James River Basin, the Town plans to add Filterra (or equivalent) units to treat up to 3 acres of impervious area. The cost for this installation of these BMPS is projected to be \$360,000.

For the next permit cycle, the Town of Ashland is considering performing a stream restoration Stony Run, which is the primary tributary to the James River basin in Ashland. We project this stream restoration project will cost approximately \$500,000 to \$900,000 to design and construct.

Attachment 5 includes an estimate of expected costs to achieve:

- 5.0% reductions for the existing sources, and
- 5.0% reductions for the new sources that disturb one acre or greater and have an average impervious land cover condition greater than 16% for the design of post-development stormwater management facilities.

Because there are no grandfathered projects in the Town of Ashland, no estimate for offsetting grandfathered projects was developed.

The Town continues to plan for the full reductions that are required by the end of three permit cycles. A general project is included in Attachment 5.

10. Public comments on draft Action Plan (GENERAL PERMIT REQUIREMENTS)

(General Permit Section I.C.2.a.(12)) An opportunity for receipt and consideration of public comment regarding the draft Chesapeake Bay TMDL Action Plan.

This draft Chesapeake Bay TMDL Action Plan will be posted on the Town's website for public comment for 30 days. At the conclusion of the 30 days, the Town will incorporate comments received, if any, where appropriate. The Town will respond to all comments regardless of whether they are incorporated into the plan.