



Tennessee Department of Environment and Conservation
 Division of Water Resources
 William R. Snodgrass Tennessee Tower,
 312 Rosa L. Parks Avenue, 11th Floor, Nashville, Tennessee 37243
 1-888-891-8332 (TDEC)

Phase II Small Municipal Separate Storm Sewer System (MS4) Annual Report

1. MS4 Information

Name of MS4: City of Morristown		MS4 Permit Number: TNS076031
Contact Person: Jim Whitbeck, P.E.		Email Address: jwhitbeck@mymorristown.com
Telephone: (423) 353-1055		MS4 Program Web Address: www.mymorristown.com/departments/public_works/stormwater/index.php
Mailing Address: PO Box 1499		
City: Morristown	State: TN	ZIP code: 37816-1499

What is the current population of your MS4? 30,193

What is the reporting period for this annual report? July 1 2019 to June 30 2020

2. Discharges to Waterbodies with Unavailable Parameters or Exceptional Tennessee Waters (Section 3.1)

- A. Does your MS4 discharge into waters with unavailable parameters (previously referred to as impaired) for pathogens, nutrients, siltation or other parameters related to stormwater runoff from urbanized areas as listed on TN's most current 303(d) list and/or according to the on-line state GIS mapping tool (tdeconline.tn.gov/dwr/)? If yes, attach a list. Yes No
- B. Are there established and approved TMDLs (<http://www.tn.gov/environment/article/wr-ws-tennessees-total-maximum-daily-load-tmdl-program>) with waste load allocations for MS4 discharges in your jurisdiction? If yes, attach a list. Yes No
- C. Does your MS4 discharge to any Exceptional Tennessee Waters (ETWs - http://environment-online.tn.gov:8080/pls/enf_reports/f?p=9034:34304:4880790061142)? If yes, attach a list. Yes No
- D. Are you implementing specific Best Management Practices (BMPs) to control pollutant discharges to waterbodies with unavailable parameters or ETWs? If yes, describe the specific practices: Confirm appropriate measures are provided for construction sites which discharge to waterbodies with unavailable parameters as part of site plan review Yes No

3. Public Education/Outreach and Involvement/Participation (Sections 4.2.1 and 4.2.2)

- A. Have you developed a Public Information and Education plan (PIE)? Yes No
- B. Is your public education program targeting specific pollutants and sources, such as Hot Spots? If yes, describe the specific pollutants and/or sources targeted by your public education program: See Attachment Yes No
- C. Do you have a webpage dedicated to your stormwater program? If yes, provide a link/URL: http://www.mymorristown.com/departments/public_works/stormwater/index.php Yes No
- D. Summarize how you advertise and publicize your public education, outreach, involvement and participation opportunities: See Attachment

Phase II Small Municipal Separate Storm Sewer System (MS4) Annual Report

- E. Summarize the public education, outreach, involvement and participation activities you completed during this reporting period: See Attachment
- F. Summarize any specific successful outcome(s) (e.g., citizen involvement, pollutant reduction, water quality improvement, etc.) fully or partially attributable to your public education and participation program during this reporting period: See Attachment

4. Illicit Discharge Detection and Elimination (Section 4.2.3)

- A. Have you developed and do you continue to update a storm sewer system map that shows the location of system outfalls where the municipal storm sewer system discharges into waters of the state or conveyances owned or operated by another MS4? Yes No
- B. If yes, does the map include inputs into the storm sewer collection system, such as the inlets, catch basins, drop structures or other defined contributing points to the sewershed of that outfall, and general direction of stormwater flow? Yes No
- C. How many outfalls have you identified in your storm sewer system? 587
- D. Do you have an ordinance, or other regulatory mechanism, that prohibits non-stormwater discharges into your storm sewer system? Yes No
- E. Have you implemented a plan to detect, identify and eliminate non-stormwater discharges, including illegal disposal, throughout the storm sewer system? If yes, provide a summary: Dry weather screening is performed on all outfalls once during the permit cycle. Any observed flows are investigated to determine if the flow is an illicit discharge. Results are tracked in GIS. More frequent targeting of hot spot areas will be performed in future years. Yes No
- F. How many illicit discharge related complaints were received this reporting period? 8
- G. How many illicit discharge investigations were performed this reporting period? 8
- H. Of those investigations performed, how many resulted in valid illicit discharges that were addressed and/or eliminated? 6

5. Construction Site Stormwater Runoff Pollutant Control (Section 4.2.4)

- A. Do you have an ordinance or other regulatory mechanism requiring:
 - Construction site operators to implement appropriate erosion prevention and sediment control BMPs consistent with those described in the TDEC EPSC Handbook? Yes No
 - Construction site operators to control wastes such as discarded building materials, concrete truck washout, chemicals, litter, and sanitary waste? Yes No
 - Design storm and special conditions for unavailable parameters waters or Exceptional Tennessee Waters consistent with those of the current Tennessee Construction General Permit (TNR100000)? Yes No
- B. Do you have specific procedures for construction site plan (including erosion prevention and sediment BMPs) review and approval? Yes No
- C. Do you have sanctions to enforce compliance? Yes No
- D. Do you hold pre-construction meetings with operators of priority construction activities and inspect priority construction sites at least monthly? Yes No

Phase II Small Municipal Separate Storm Sewer System (MS4) Annual Report

- E. How many construction sites disturbing at least one acre or greater were active in your jurisdiction this reporting period? 33
- F. How many active priority and non-priority construction sites were inspected this reporting period? 33
- G. How many construction related complaints were received this reporting period? 12

6. Permanent Stormwater Management at New Development and Redevelopment Projects (Section 4.2.5)

- A. Do you have a regulatory mechanism (e.g. ordinance) requiring permanent stormwater pollutant removal for development and redevelopment projects? If no, have you submitted an Implementation Plan to the Division? Yes No
 Yes No
- B. Do you have an ordinance or other regulatory mechanism requiring:
 - Site plan review and approval of new and re-development projects? Yes No
 - A process to ensure stormwater control measures (SCMs) are properly installed and maintained? Yes No
 - Permanent water quality riparian buffers? If yes, specify requirements: See Attached Yes No
- C. What is the threshold for development and redevelopment project plans plan review (e.g., all projects, projects disturbing greater than one acre, etc.)? Disturbed area greater than or equal to 1 acre, net increased impervious area greater than or equal to 0.5 acre, permanent stormwater pollutant removal required, located within 100' of a water of the state, or as designated by the City Administrator
- D. How many development and redevelopment project plans were reviewed for this reporting period? 13
- E. How many development and redevelopment project plans were approved? 8
- F. How many permanent stormwater related complaints were received this reporting period? 4
- G. How many enforcement actions were taken to address improper installation or maintenance? 1
- H. Do you have a system to inventory and track the status of all public and private SCMs installed on development and redevelopment projects? Yes No
- I. Does your program include an off-site stormwater mitigation or payment into public stormwater fund? If yes, specify. N/A Yes No

7. Stormwater Management for Municipal Operations (Section 4.2.6)

- A. As applicable, have stormwater related operation and maintenance plans that include information related to maintenance activities, schedules and the proper disposal of waste from structural and non-structural stormwater controls been developed and implemented at the following municipal operations:
 - Streets, roads, highways? Yes No
 - Municipal parking lots? Yes No
 - Maintenance and storage yards? Yes No
 - Fleet or maintenance shops with outdoor storage areas? Yes No
 - Salt and storage locations? Yes No
 - Snow disposal areas? Yes No
 - Waste disposal, storage, and transfer stations? Yes No

Phase II Small Municipal Separate Storm Sewer System (MS4) Annual Report

- B. Do you have a training program for employees responsible for municipal operations at facilities within the jurisdiction that handle, generate and/or store materials which constitute a potential pollutant of concern for MS4s? Yes No
- If yes, are new applicable employees trained within six months, and existing applicable employees trained and/or retrained within the permit term? Yes No

8. Reviewing and Updating Stormwater Management Programs (Section 4.4)

- A. Describe any revisions to your program implemented during this reporting period including but not limited to:
 Modifications or replacement of an ineffective activity/control measure. N/A
 Changes to the program as required by the division to satisfy permit requirements. N/A
 Information (e.g. additional acreage, outfalls, BMPs) on newly annexed areas and any resulting updates to your program. 26.4 acres annexed; no updates required
- B. In preparation for this annual report, have you performed an overall assessment of your stormwater management program effectiveness? If yes, summarize the assessment results, and any modifications and improvements scheduled to be implemented in the next reporting period. See Attached Yes No

9. Enforcement Response Plan (Section 4.5)

- A. Have you implemented an enforcement response plan that includes progressive enforcement actions to address non-compliance, and allows the maximum penalties specified in TCA 68-221-1106? If no, explain. N/A Yes No
- B. As applicable, identify which of the following types of enforcement actions (or their equivalent) were used during this reporting period; indicate the number of actions, the minimum measure (e.g., construction, illicit discharge, permanent stormwater management), and note those for which you do not have authority:

<u>Action</u>	<u>Construction</u>	<u>Permanent Stormwater</u>	<u>Illicit Discharge</u>	<u>In Your ERP?</u>	
Verbal warnings	<u>#10</u>	<u>#1</u>	<u>#4</u>	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> No
Written notices	<u>#2</u>	<u>#1</u>	<u>#1</u>	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> No
Citations with administrative penalties	<u>#0</u>	<u>#0</u>	<u>#0</u>	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> No
Stop work orders	<u>#0</u>	<u>#0</u>	<u>#0</u>	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> No
Withholding of plan approvals or other authorizations	<u>#0</u>	<u>#1</u>	<u>#0</u>	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> No
Additional Measures	<u>#0</u>	<u>#0</u>	<u>#0</u>	Describe: <u>N/A</u>	

- C. Do you track instances of non-compliance and related enforcement documentation? Yes No
- D. What were the most common types of non-compliance instances documented during this reporting period?
mud in the road

Phase II Small Municipal Separate Storm Sewer System (MS4) Annual Report

10. Monitoring, Recordkeeping and reporting (Section 5)

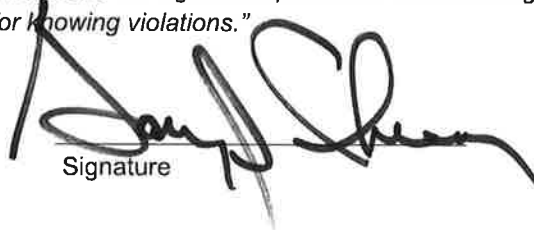
- A. Summarize any analytical monitoring activities (e.g., planning, collection, evaluation of results) performed during this reporting period. None
- B. Summarize any non-analytical monitoring activities (e.g., planning, collection, evaluation of results) performed during this reporting period. None
- C. If applicable, are monitoring records for activities performed during this reporting period submitted with this report. Yes No

11. Certification

This report must be signed by a ranking elected official or by a duly authorized representative of that person. See signatory requirements in sub-part 6.7.2 of the permit.

"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."

Gary D. Chesney
 Printed Name and Title
MAYOR


 Signature

9/29/2020
 Date

Annual reports must be submitted by September 30 of each calendar year (Section 5.4) to the appropriate Environmental Field Office (EFO), identified in the table below:

EFO	Street Address	City	Zip Code	Telephone
Chattanooga	1301 Riverfront Pkwy, Suite 206	Chattanooga	37402	(423) 634-5745
Columbia	1421 Hampshire Pike	Columbia	38401	(931) 380-3371
Cookeville	1221 South Willow Ave.	Cookeville	38506	(931) 520-6688
Jackson	1625 Hollywood Drive	Jackson	38305	(731) 512-1300
Johnson City	2305 Silverdale Road	Johnson City	37601	(423) 854-5400
Knoxville	3711 Middlebrook Pike	Knoxville	37921	(865) 594-6035
Memphis	8383 Wolf Lake Drive	Bartlett	38133	(901) 371-3000
Nashville	711 R S Gass Boulevard	Nashville	37216	(615) 687-7000

City of Morristown

Attachment to Small Municipal Separate Storm Sewer System (MS4) Annual Report 2019-2020 (Year 4) Reporting Period

2.A *Does your MS4 discharge into waters with unavailable parameters (previously referred to as impaired) for pathogens, nutrients, siltation or other parameters related to stormwater runoff from urbanized areas as listed on TN's most current 303(d) list and/or according to the on-line state GIS mapping tool (tdeconline.tn.gov/dwr/)? If yes, attach a list.*

River Basin	Waterbody ID#	Cause	TMDL Approved?	TMDL Pollutant
Holston	TN06010104004T-1900 Fall Creek	Alteration in stream-side or littoral vegetative covers; Sedimentation / Siltation; Nitrate / Nitrite (Nitrite + Nitrate as N); Phosphorus (Total); Escherichia coli	Yes	E. Coli
Holston	TN06010104004T-2220 Stubblefield Creek	Other anthropogenic substrate alterations	No	N/A
Holston	TN06010104004T-2300 Turkey Creek	Nitrate / Nitrite (Nitrite + Nitrate as N); Alteration in stream-side or littoral vegetative covers; Sedimentation / Siltation; Escherichia coli	Yes	E. Coli
Nolichucky	TN06010108001-0100 Flat Creek	Escherichia coli	Yes	E. Coli
Nolichucky	TN06010108043-0400 Cedar Creek	Alteration in stream-side or littoral vegetative covers; Sedimentation / Siltation	Yes	E. Coli; Siltation and Habitat Alteration

2.B *Are there established and approved TMDLs (<http://www.tn.gov/environment/article/wrws-tennessees-total-maximum-daily-load-tmdl-program>) with waste load allocations for MS4 discharges in your jurisdiction? If yes, attach a list.*

See table in 2.A.

3.B *Is your public education program targeting specific pollutants and sources, such as Hot Spots? If yes, describe the specific pollutants and/or sources targeted by your public education program:*

Specific pollutant sources which are targeted include: litter, household hazardous waste, BOPAE (Batteries, Oil, Paint, Antifreeze, and Electronics) waste, general water pollution, construction sites, and hot spots.

New developments classified as hot spots require a Special Pollution Abatement Plan, which requires the owner to conduct employee training on pollution prevention at the site. More details on how the other pollutants and sources are targeted are contained in Sections 3.D and 3.E.

3.D Summarize how you advertise and publicize your public education, outreach, involvement and participation opportunities:

The City maintains a website which includes:

- a link to the Keep Morristown-Hamblen Beautiful (KMHB) website for education and involvement opportunities
- a summary of each minimum control measure required by the TDEC permit
- requirements for plan submittal and review
- a copy of the City's stormwater ordinance
- targeted education on stormwater pollution prevention
- rates and other information for the stormwater utility

Keep Morristown Hamblen Beautiful (KMHB) coordinates and participates in events and education efforts in line with the mission and focus of Keep America Beautiful to encourage everyone to take action every day to improve and beautify the community. Targeted litter reduction and stormwater education efforts are provided to the public through local partnerships with the City of Morristown and Hamblen County Government.

The KMHB website and social media are utilized to disseminate information based on the guidance of their Executive Director and Board of Directors. They utilize Facebook, Instagram, Snapchat, Twitter, and local media (newspaper, radio stations, and the local TV cable channel) to notify the public about upcoming events, how-to's, recycling and litter prevention tips, and other ways for the public to participate.

The draft Report was posted on the City's website. Public notice of the Annual Report with links to the draft was posted on the City's website, Facebook and Twitter accounts. Comments were accepted via e-mail and telephone.

3.E Summarize the public education, outreach, involvement and participation activities you completed during this reporting period:

Two annual education events presented by KMHB were canceled this year due to scheduling conflicts: Soil Conservation Field Days, where all fourth-grade students participate in the "Freddie the Fish" presentation (a hands-on demonstration on common water pollutants) and the Household Hazardous Waste collection. The "Sammy Soil" curriculum and a second BOPAE were implemented to replace these events. In addition, KMHB promoted the HHW Collections in two adjoining counties which accepted items from Hamblen County.

Restrictions and closures resulting from the COVID-19 pandemic significantly reduced activities in the spring and summer. Schools were closed from March through the end of the reporting period. Only primarily outdoor activities could be held, which severely limited opportunities to provide education and encourage public participation. Project Graduation, which targets graduating high school seniors, was canceled.

Completed by KMHB

- KMHB provided information at an in-person presentation to the AM Rotary Club.
- A curriculum based on the Natural Resources Conservation Service “Sammy Soil” character was provided to local elementary schools as a supplemental activity to educate students on soil conservation and the damage resulting from soil erosion.
- Two BOPAE (batteries, oil, paint, antifreeze, and electronics) collection events were held, one each in fall and spring. The first event collected nearly 28,000 pounds of those items from about 230 households. The second event, held during a Community Recycling Day, collected over 17,000 pounds from 294 households, and included 42 pounds of medicine. Participants received education materials on general water quality, and smokers were provided with litter prevention information and ashtrays. In addition, t-shirts and trash bags were provided at the second event.
- The Tire Collection disposed of nearly 66 tons of tires from 115 households. Participants received “When It Rains, It Drains” t-shirts, along with general information about stormwater pollution and proper disposal. Children received coloring sheets, litter bags and stickers, and “Dirt in the Drain, Turtles Complain” t-shirts. Smokers received ash containers and anti-litter information.
- KMHB partnered with the local mall for two events. In January, art made with recycled products by local children was displayed. Brochures on general stormwater information and recycling were available. In March, KMHB staffed a booth during the Home Show, which drew approximately 8,000 participants. Participants were invited to work with the Enviroscope interactive watershed / nonpoint source model. In addition, a rain barrel was on display and was awarded to a participant via a drawing. Numerous educational materials were available on general stormwater, litter, cigarettes, and soil conservation.
- KMHB staffed booths at several community events, including Music on the Green, CEASE Carnival, Lakeway Hola Festival, Touch-a-Truck, Fall Fest, Mountain Makins, Boo Fest, Heritage Park Salute, and the Missions Festival. They provided educational information similar to that at the Tire Collection. 23 volunteers provided 61 hours to work the events, which had approximately 19,000 participants.
- KMHB used social media to provide general stormwater information and to convey details on events. Topics included recycling, litter prevention, and water pollution. These posts and details about most KMHB events were shared on Facebook (approximately 500 followers), Instagram (88), and/or Twitter (151).
- Radio PSAs ran to promote the Tire Collection and BOPAE.
- Several articles ran in the local newspaper, the *Citizen Tribune*. One ad and three articles about the BOPAE included details on the events; one of these also included educational material. Two articles on the Tire Collection included event details and education about the harm of improper disposal.

- Several litter pickups were performed at organized events or as individual efforts. Cherokee Lake and shoreline benefitted from 16 volunteers spending over 30 hours picking up litter. In addition, volunteers performed four pickups with one or two volunteers each at area parks and along roads.
- Recycling receptacles were provided at several outdoor events, including Music on the Green, Lakeway Hola Festival, Craft Beer Festival, Fall Fest, and Boo Fest. This encouraged proper disposal of litter.

Completed by the City

- Stormwater personnel gave a presentation on the City’s stormwater permit and compliance program at a City Council workshop. Information included the basics of the City’s stormwater permit, enforcement, and repair and maintenance work performed.
- One newspaper article ran in the *Citizen Tribune* about the Council workshop.
- The City Newsletter advertised the details on the March BOPAE collection in two issues and on the Tire Collection in one issue. The newsletter is distributed to about 650 recipients via hard copy and e-mail to the general public, community members, and city employees.
- Information on proper tire disposal is included with all City codes violations letters as appropriate.

3.F Summarize any specific successful outcome(s) (e.g., citizen involvement, pollutant reduction, water quality improvement, etc.) fully or partially attributable to your public education and participation program during this reporting period:

- The education efforts summarized in Section 3.E resulted in the following volunteer participation by members of the public. Note that the “volunteers” and “hours” columns in the table reflect active participation in organizing and conducting the activities. The “attendees” column is an estimate of attendees who were exposed to the education message.

Summary of Public Participation

Category	Volunteers	Hours	Attendees
BOPAE Collection	12	44.5	519
HHW Collection	0	0.0	0
Litter Cleanup	22	36.1	23
Misc Education	20	107.8	14,548
Recycling	11	20.0	12,200
Soil Conservation Field Days	0	0.0	0
Tire Collection	25	69.1	115
Total	90	277.4	27,405

- BOPAE (batteries, oil, paint, antifreeze, electronics) waste collection attendees delivered approximately 44,700 pounds of those items plus 42 pounds of medicine.
- About 66 tons of tires were delivered by participants representing 115 households at the Tire Collection.
- The City’s Litter Crew collected 3,645 bags of litter, or an estimated 37 tons, devoting 714 hours to the task.

6.B *Do you have an ordinance or other regulatory mechanism requiring: Permanent water quality riparian buffers?*

A water quality buffer zone (WQBZ), measured from the top of bank, is required as follows:

- stream with drainage area less than 1 square mile: 30’ wide
- stream with drainage area greater than or equal to 1 square mile, and/or water with unavailable parameters: 60’ wide
- wetland: 30’ wide around perimeter

Variances are permitted with approval from the Stormwater Violations Appeals Board.

7.A *As applicable, have stormwater related operation and maintenance plans that include information related to maintenance activities, schedules and the proper disposal of waste from structural and non-structural stormwater controls been developed and implemented at the following municipal operations: (Items Marked “No”)*

The City does not operate snow disposal areas or waste disposal, storage, and transfer stations.

8.B *In preparation for this annual report, have you performed an overall assessment of your stormwater management program effectiveness? If yes, summarize the assessment results, and any modifications and improvements scheduled to be implemented in the next reporting period.*

Public participation dropped significantly this year. The number of attendees at events dropped 57%, from around 63,500 to 27,400. Volunteers dropped from 124 to 90 (27%), and volunteer hours dropped accordingly, from 425 to 277 (35%). This is due to COVID-19, which resulted in cancellation of events and reduced participation from volunteers.

The Household Hazardous Waste (HHW) collection was not held this year due to scheduling issues. An additional BOPAE event was held with the Community Recycling event to partially make up for the loss of this event, since BOPAE is typically also collected at the HHW.

BOPAE collections were up significantly, likely due to two events being held. A total of about 44,700 pounds were collected, with 27,500 pounds in the fall and 17,200 pounds in the spring, for an average of 22,400 pounds. About 230 households participated in the fall, with 294 in the spring, for an average of 262. The average pounds collected this year is about 16% less than the total of 26,500 at last year’s single event, but the average number of households is up (200 vs

262, or 31%). The lower collection amount at the second event this year is to be expected since many people would have taken some or all of their waste to the first event.

The City's Litter Crew, composed of a City police officer and inmates from the county jail, collected 3,645 bags and 5,345 pounds of unbagged litter during 714 hours of work. These values are all down from last year (-10%, -35%, and -4%, respectively). However, COVID-19 restrictions limited the availability of inmates. For example, no work was performed in April.

Unfortunately all of the Program BMP Milestones were not met, partially due to the COVID-19. 77% of the milestones were fully met. Some of the items that were not fully met include adding hotspots to the outfalls map, revising the Dry Weather Screening to target hot spots, revising and implementing the City Municipal Operations SOP's, revising the PIE plan, providing targeted education to specified groups, coordinating with first responders, and developing and implementing a post-construction stormwater control measures inspection plan. The unmet Milestones are all very staff-intensive. Staff will work on these Milestones in the next permit years as time allows.