

Impaired Waters Plan 2017-2022

The Georgia Environmental Protection Division (EPD) is responsible for establishing water quality standards for waterbodies in the state. Consistent with the U.S. Clean Water Act, the state collects water quality sampling data and identifies streams that do not meet these water quality standards. The list, published bi-annually, of waters that do not meet state standards is referred to as the 303(d) list of impaired waters (after the section in the Clean Water Act where the state requirement is identified).

The City of Dunwoody has prepared this Impaired Waters Plan following Part 4.4.2 of the City's General NPDES Stormwater Permit No. GAG610000 for Phase II MS4's. Three streams located in the City are listed as impaired on the 2016 303(d) list, approved by the USEPA on October 4, 2018. The streams listed are Ball Mill Creek, Marsh Creek and Nancy Creek.

Table 1 includes information from the 2016 303(d) list regarding the specific Reach ID in Dunwoody that is impaired, along with the use not being supported, the cause and source of the impairment and other pertinent details from the 303(d) list. Table 2 provides the data provider codes and Table 3 includes the reference for the Assessment Category codes.

Table 1 - 2016 303(d) Listed Streams (Dunwoody, Georgia)

Assessment Unit ID	River Basin	Assessment Unit Name	Assessment Unit Location	Designated Uses	Assessment Category	Decision Notes	Cause	Source	DATA PROVIDERS
GAR031300010905	Chattahoochee	Ball Mill Creek	Headwaters to the Chattahoochee River	Fishing	4a	TMDL completed FC 2003 (revised 2008).	FC	UR	1,15,17
GAR031300011102	Chattahoochee	Marsh Creek (aka March Creek)	Headwaters to Chattahoochee River	Fishing	4a, 5	TMDL completed FC 2003 (revised 2008). EPD needs to collect more data before a determination is made as to whether pH is meeting water quality criteria.	Bio F, FC	UR	1,4,17
GAR031300011203	Chattahoochee	Nancy Creek	Headwaters to Peachtree Creek, Atlanta	Fishing	4a	TMDL completed FC 2003 (revised 2008). TMDL completed Bio F 2008.	Bio F, FC	UR	1,10,4

Table 2 - Data Sources

1	DNR-EPD, Watershed Planning & Monitoring Program
4	DNR, Wildlife Resources Division
10	U.S. Geological Survey
15	Dekalb County
17	Fulton County

Table 3 - Assessment Categories

4a	Data indicate that at least one designated use is not being supported, but TMDL(s) have been completed for the parameter(s) that are causing a water not to meet its use(s).
5	Data indicate that at least one designated use is not being supported and TMDL(s) need to be completed for one or more pollutants. Waters in Category 5 make up the 303(d) list.

Sample Locations

Figure 1 shows the impaired segments of Ball Mill Creek, Marsh Creek and Nancy Creek, the 4 sampling locations, and the outfalls located 1 linear mile upstream of the listed waters. There are two monitoring sites for the impaired portion of Nancy Creek because the segment exist the City limits twice. Appendix B.0 includes larger versions of all maps associated with the City's Impaired Waters Plan, including maps of the individual basins and their associated outfalls.

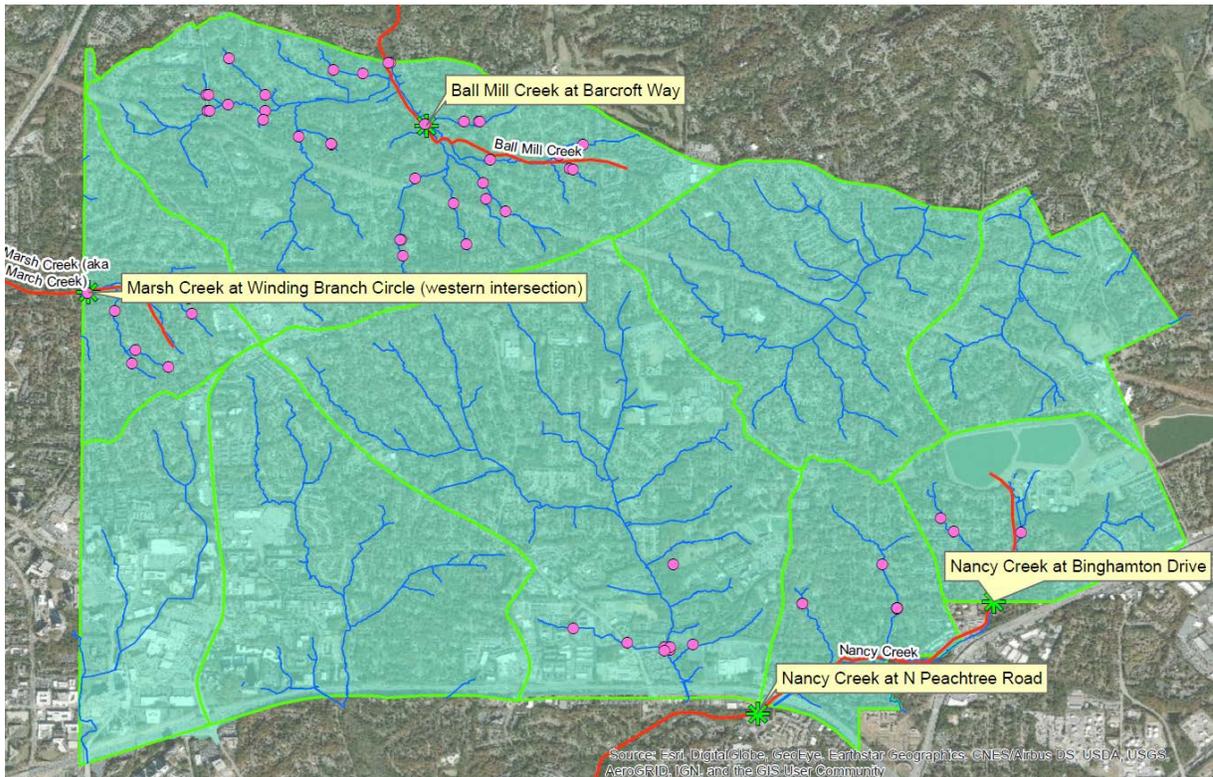


Figure 1 – Sampling Locations and Outfalls (City of Dunwoody, Impaired Waters Plan 2017-2022)

Pollutants of Concern

Fecal Coliform

The City's sampling for fecal coliform will follow the 391-3-6-.03 Water Use Classifications and Water Quality Standards (attached) sampling requirements for bacteriological sampling of waters with fishing identified as the unsupported designated use.

The City plans to begin sampling for fecal coliform in the summer of 2019 (May through October). At each of the 4 locations, at least 4 instream samples will be collected during a one-month period (30 days) in order to derive a geometric mean for each location. A second geometric mean will be obtained using the same method in the winter of 2019 (November through December).

Sampling activities for each following year will follow the same sampling requirements referenced in the 391-3-6-.03 Water Use Classifications and Water Quality Standards, obtaining at least 2 geometric means annually for each site monitoring for fecal coliform, resulting in a total of 8 bacteriological samples per location annually.

Total Suspended Solids (TSS)

The City will collect an instream sample for Total Suspended Solids (TSS) at least once annually from the Marsh Creek and Nancy Creek sampling locations.

Data Assessment

The City of Dunwoody is conducting this sampling for its impaired streams over a 5 year period per its MS4 Permit requirements. Each year, the sampling schedule is based upon the standard method for each pollutant of concern as discussed in the previous section.

The City will analyze the collected fecal coliform and TSS water quality data in separate spreadsheets. Line graphs will be generated using the geometric means for the fecal coliform sampling results. Known sanitary sewer overflows will be cited in the analysis of the fecal coliform results so that any correlation can be demonstrated.

Because TSS is only sampled once annually, the analysis to be included in each annual report will include, at minimum, a table of that year's results for the two monitoring locations along Nancy Creek, as well as for the Marsh Creek site. Results from past samples taken during the implementation of this Plan will also be included as they are available annually. Charts may also be used when beneficial to the analysis of the TSS results.

Proposed Best Management Practices (BMPs)

The City of Dunwoody views the following activities as the best strategies for protecting local water quality. As more monitoring is performed, additional BMPs or other Watershed Improvement Projects may be added based on the results of that data.

Public Education and Outreach

Educating the public about preventing pollution of local streams and providing ways to participate helps to foster mindfulness and ownership among citizens. One of the primary sources of pollution in our streams is non-point source pollution. Most people do not realize that their daily activities, even as minor and common as blowing leaves into the street, contribute to the pollution of streams. The public also may not know that when it rains, pollutants that have been spilled or placed on the ground are washed into drains directly connected to local streams.

The City places educational materials (*BMP A-1 and BMP C-4*) from organizations such as the Clean Water Campaign and the Metropolitan North Georgia Water Planning District (MNGWPD) in the lobby of City Hall in order to provide information to residents, contractors and local business owners about how they can avoid being a contributor to runoff pollution. The City also hosts a storm drain marking event at least once a year (*BMP B-1*). These markers are a useful way to highlight the purpose of the storm sewer system and to let the public know that anything down the drain ends up in the streams.

Continued Illicit Discharge Detection and Elimination

As part of Dunwoody's MS4 permit, the City performs inspections of its MS4 and municipal facilities on a rotating basis, scheduled by geographical area. Through the ongoing asset management program and MS4 outfall inspection program are looking for areas where illicit discharges may be occurring to the stormwater system. These will be addressed as found by the City during these routine inspections.

Continued Implementation of Ordinances for new developments and redevelopments

The City has adopted the latest model ordinance for Erosion and Sediment Control and has a Litter Control ordinance to address construction site waste. The ordinances guide the plan review process as well as inspections during development and redevelopment activities. Working closely with the development community to prevent excess sediment from construction sites from entering local streams helps to limit the sediment impact to fish habitat. Ensuring new developments have the proper post-development stormwater controls that mitigate peak flows help in reducing bank erosion commonly found in suburban and urban stream systems.

Evaluating BMP Effectiveness

Overall, the proposed BMPs associated with the City's Impaired Waters Plan will be considered effective if the monitoring data shows water quality remaining the same or improving. Outlined below are the reasons why each proposed BMP is anticipated to be effective in protecting water quality. In the event that monitoring data indicates a degradation of water quality over time, then the City will revise its existing BMPs or propose new BMPs in order to address the decline.

Public Education and Outreach

BMP A-1 (Pamphlet Distribution) and BMP C-4 (IDDE Education): Distribution of educational material will reflect public awareness of the problems that the materials identify.

BMP B-1 (Storm Drain Marker Program): Community participation in this activity will reflect increased public awareness about proper use of the MS4.

Illicit Discharge Detection and Elimination

BMP C-3 (IDDE Plan): Detection and removal of illegal connections and illicit discharges discovered in the screening process will reflect the effectiveness of the BMP. Finding no illicit discharges will also reflect the effectiveness of the BMP and program.

BMP C-5 (Complaint Response IDDE): The effectiveness of the BMP will be reflected through the verification of illegal connections and/or illicit discharges from the complaints received.

BMP F-2 (MS4 Inspection Program): Inspections of the MS4 structures results in the proper operation of the MS4 system, reducing the amount of pollution to the stormwater system. The completion of scheduled inspections of the MS4 per the Stormwater Management Program will demonstrate the effectiveness of this BMP.

Implementation of Ordinances

BMP D-1 (E&SC Ordinance and Litter Ordinance): The City's ability to enforce regulations regarding site-generated waste will demonstrate this BMP's effectiveness.

BMP D-3 (Inspection Program): Conducting inspections on construction sites will reflect the effectiveness of this BMP since these limit the number of permit violations.