



BEAUFORT COUNTY
STORMWATER MANAGEMENT UTILITY BOARD AGENDA
Wednesday, July 10, 2019
2:00 p.m.
Executive Conference Room, Administration Building
Beaufort County Government Robert Smalls Complex
100 Ribaut Road, Beaufort, South Carolina
843.255.2805

In accordance with South Carolina Code of Laws, 1976, as amended, Section 30-4-80(d), all local media was duly notified of the time, date, place and agenda of this meeting.

1. CALL TO ORDER – 2:00 p.m.
 - A. Approval of Agenda
 - B. Approval of Minutes – June 12, 2019 ([backup](#))
2. INTRODUCTIONS
3. PUBLIC COMMENT
4. SPECIAL PRESENTATION
 - A. Microplastics and Tire Wear – Dr. John Weinstein, The Citadel
5. REPORTS
 - A. Utility Update – Eric Larson, P.E. ([backup](#))
 - B. Monitoring Update – Eric Larson, P.E. ([backup](#))
 - C. Stormwater Implementation Committee Report – Eric Larson, P.E. ([backup](#))
 - D. Stormwater Related Projects – Eric Larson, P.E. ([backup](#))
 - E. Upcoming Professional Contracts Report – Eric Larson, P.E. ([backup](#))
 - F. Regional Coordination – Eric Larson, P.E. ([backup](#))
 - G. Municipal Reports – Eric Larson, P.E. ([backup](#))
 - H. MS4 Update – Eric Larson, P.E. ([backup](#))
 - I. Maintenance Projects Report – David Wilhelm, P.E. ([backup](#))
6. UNFINISHED BUSINESS
7. NEW BUSINESS
8. PUBLIC COMMENT
9. NEXT MEETING AGENDA
 - A. August 14, 2019 ([backup](#))
10. ADJOURNMENT



Beaufort County Stormwater Management Utility Board (SWMU Board) Meeting Minutes

June 12, 2019 at 2:00 p.m. in Executive Conference Room, Administration Building, Beaufort County Government Robert Smalls Complex, 100 Ribaut Road, Beaufort, South Carolina

Draft Minutes 6/21/2019

Board Members

Present

William Bruggeman
Marc Feinberg
James Clark
Patrick Mitchell
Allyn Schneider
Steven Andrews

Absent

James Fargher

Ex-Officio Members

Present

Neil Desai
Kim Jones
Van Willis

Absent

Scott Liggett

Beaufort County Staff

Eric Larson
Melissa Allen
Katie Herrera
Daniel Rybak

Visitors

Alice Howard, County Council
Denise Parsick, Beaufort Conservation District
York Glover, County Council
Alan Warren, USCB
Chris Marsh, Lowcountry Institute

1. Meeting called to order – William Bruggeman

- A. Agenda – Approved.
- B. May 8, 2019 Minutes – Approved.

2. Introductions – Completed.

3. Public Comment(s) – None.

4. Reports – Mr. Eric Larson and Mr. David Wilhelm provided a written report which is included in the posted agenda and can be accessed at:

<https://www.beaufortcountysc.gov/stormwater-management-utility-board/agendas/2019/061219.pdf>

A. Utility Update – Eric Larson

An [updated manager report](#) was provided to the board. In reference to item #1 (SoLoCo Regional Board), an extensive update was done at the end of May for the regional stormwater project. The model draft ordinance is ready and in the process of finishing the technical design guide. The regional stormwater design guide will be based on codes from Beaufort and Jasper County, as well as research done on communities with similarities. The commonality is the runoff reduction method, the County calls it “effective imperviousness”. The SoLoCo Regional Board Stormwater Committee is informally partnering with Nature Conservancy, as they are working with Port Royal Sound Foundation on a mapping project

of sensitive waters. They are working to identify areas that should remain undeveloped to protect the environment and water quality. Many efforts being done by both groups were overlapping, so they are discussing commonalities to see where each other's work may be able to help one another. The draft should be ready to go to committee members within the next week. The public draft is scheduled for July. On target for both schedule and cost.

In reference #5, a special presentation on microplastics will be presented in July.

The budget, item #6, received its first reading on Monday (June 10th) and was recommended as presented with the rate increase. Some adjustments had to be made to bond interest, changing the numbers very slightly.

Update for delinquent accounts, item #8. The letters for delinquent federal accounts should be going out soon, as staff has been doing a final review with Auditor's office and legal. The County has been getting some good response [accounts being paid] from some of the state letters that were sent out.

In reference to item #9, the Town of Bluffton has adopted Option E rate structure for billing. All five communities are using the same stormwater utility rate structure, but the fee structures are different. Ms. Kim Jones thanked County staff for working with her.

B. Monitoring Update – Eric Larson

Dr. Alan Warren noted that the lab has been busy doing wet water samples and is caught up for the quarter. The lab also delivered their report from evaluating the Bold and Gold filter that was installed in the Okatie West Pond. They have been studying the pond over the last year to see the efficiency of the bold and gold media. They monitored the water prior to and after passing through the filter. The pond for the first time had zero fecal and zero E.coli bacteria. Water was not allowed to leave the Okatie West BMP nor did water flow into the BMP; shows the benefit of holding water and a considerably long period of time. The report shows the filter media removes total coliform bacteria, but there is concern that it does not decrease total suspended solids and turbidity and that it may contribute to heavy metals.

Mr. Larson commented that Bold and Gold is a research project and that reducing bacteria was successful. He mentioned that himself and Chris Bogdan submitted a paper to APWA for the annual conference and will be presenting results of Bold and Gold filter at the conference next week.

C. Stormwater Implementation Committee (SWIC) Report – Eric Larson

Please reference the report, no additional updates.

D. Stormwater Related Projects – Daniel Rybak

In reference to Horse Island, item #2a, staff met with reps of the community on May 14th. As a result of the meeting, the County has prepared a scope of work and gave to the consultant on May 22nd.

Item #2b, area of concern is on the southeast bound ramp where it meets 278. There is erosion under the ramp area. Working on solutions and to see if the work can be done in house or not. Staff met on site with the consultant on June 5th and he is working on a proposal to help evaluate.

Results of Alljoy meeting (item #3), only one property owner was interested in an acquisition. Staff submitted an application for a drainage study in the area to identify flooding and solutions. In response to a question about meeting participation, it was indicated that about 15-16 properties were represented. In response to Mr. Marc Feinberg's comment regarding only one homeowner showing interest, Mr. Rybak explained there are

two applications the County was attempting. One was for acquisition and one was for the study. Mr. Larson clarified that homeowners weren't interested in selling and moving, but they do want the drainage fixed. The study was not in the budget so the County is doing the FEMA grant and will see how to fund the land acquisition once study results are in. Since it appears to be a tidal issue and not stormwater, the County is seeking other funding sources. Alljoy is in Unincorporated Bluffton; Thomas Lawton and Shad are the area of focus.

Mr. Billy Bruggeman asked if Horse Island had been visited since the rain. Mr Rybak and Mr. Larson said no, but mentioned that it has been evaluated on two different occasions. Mr. Larson commented it is more tidally influence.

In reference to item #9, the Lady's Island plan sea level rise and no-fill ordinance committee was held on May 23rd to define a purpose statement.

E. Professional Contracts Report – Daniel Rybak

In reference Salt Creek, staff met on site with the consult on May 31st to review and discuss design elements. The BMP on Kinghorn tract is not viable due to wetland impact. The Ramsey tract BMP is being pursued. In regards to the Shanklin Road project, the Smith tract is not viable due to wetland impact, but moving forward with Roseida Storm drain tract and Shady Oaks Beachwood tract BMP.

Brewer Memorial is at 70% design development not 30%. Staff met with the consultant, Clemson Extension, and Beaufort County Open Land Trust on May 23rd to discuss slope stabilization techniques and landscaping for the BMP and about educational signage.

F. Regional Coordination – Eric Larson

Item #1, found out from BJWSA that no projects were listed in their Capital Plan (referring to one of the extra projects in the May River area that weren't stormwater but water quality related in the budget presentation).

Item #2, Mr. Larson and Mr. Desai are working on an agreement to cost share on a project.

Item #3, the group met on June 11th and Hilton Head has joined, the group is working together to coordinate maintenance.

G. Municipal Reports – Eric Larson

Mr. Desai shared that Mossy Oaks is well underway; clean-up efforts on Jane Way canal were substantially completed as of last week.

Mr. Van Willis shared that the Town of Port Royal has awarded the 12th Street drainage project and that the Cypress Wetlands didn't receive grand funding, but the Town has decided to go forward with that project and will revise the scope of work.

H. Municipal Separate Storm Sewer System (MS4 Update) – Eric Larson

Ms. Kim Jones shared a public education effort the Town of Bluffton is doing based on microbial source tracking hits. Related to dog waste reduction, they are doing a post card project. The Town purchased 900 addresses and targeting about 200 residences in this mailing. In reply to a comment about the dog bags the County gave out in the past, she explained there is a link to pledge to "scoop the poop" and the first 50 people to pledge will receive a dog bag clip dispenser through the Town.

Mr. Larson explained the process for Energov software is being developed and is about 18 months to a year out.

Mr. Larson shared an update that SCDHEC is writing a new construction related permit for SCDOT prior to beginning to write the statewide MS4 general permit.

I. Maintenance Projects Report – Eric Larson

Mr. Larson pointed out the two major projects listed in the packet. He explained the Administrative Building is the County's internal project cost, which does not include the cost for the lining that was done. The Ulmer project was done to upgrade infrastructure to accommodate a dirt road paving project.

Ms. Alice Howard asked about Hamrick Drive and if it has been done. Mr. Larson explained the project in the packet was work that was done a while ago (not current issue).

Mr. Larson commented on the amount of calls that were received because of the rain. He indicated they are being logged, priorities, inspected and scheduled.

5. Unfinished Business – None.

6. New Business –

Ms. Kim Jones shared about Dr. Weinstein, who will be presenting at next month's meeting. He is with the Citadel and partner with Oceans and Human Health Interactions that was recently established with a grant. Dr. Weinstein is specifically focusing on research regarding stormwater conveyance of tire tread wear that is ending up in the Charleston Harbor in grass shrimp and the risks that may pose.

Mr. Marc Feinberg asked about the stormwater runoff causing erosion under the flyover bridge and if that was bad engineering. Mr. Larson commented that Mr. Rybak was researching plans to see what was designed vs. what was built. The jersey wall has slots to let water out, drop off to ground that has no grass because there is no sun [creating erosion]. Mr. Rybak confirmed it was built per design. The County is asking the consultant to look at a solution, need to fix the source of the problem to eliminate maintenance. The only way to access is to walk down there as the lower clearance is 2-3 feet and need to determine how to access it with equipment or materials to fix. Why the County's responsibility?; the State maintains the two through lanes and everything associated with the bridge is the County [per MOA agreement]. This is a maintenance need.

Mr. Feinberg asked if stormwater gets to sign off on capital projects, Mr. Larson indicated yes, the department is part of the review process.

7. Public Comment(s) – None.

8. Next Meeting Agenda – Approved.

Addition After #3 Public Comment: Special Presentation – Microplastics and Tire Wear – Dr. John Weinstein

9. Meeting Adjourned



**BEAUFORT COUNTY
STORMWATER UTILITY
120 Shanklin Road
Beaufort, South Carolina 29906
Voice (843) 255-2805 Facsimile (843) 255-9436**

July 10, 2019

Stormwater Manager's Report for the Stormwater Utility Board Meeting

Utility Update

1. Southern Lowcountry Regional Board (SoLoCo)
 - a) There was no update to the Board in June. It is anticipated the preliminary draft of the Regional Standards will be presented to the Board in August.
2. Regionalization
 - a) Regional Stormwater Design Standard and Model Ordinance Project – The stakeholder committee will be meeting in mid-July to review the draft document. CWP is still working on the draft and will be distributing it to the committee members the second week of July. The project may be slightly delayed based on these dates.
 - b) Regionalization of programs – Nothing new to report.
3. FY 2020 Management fee concurrence letters from the Municipalities – All municipalities have responded.
4. Special presentations – Staff has begun research on the various topics provided by the Board for future meetings:
 - a) Military Site's Stormwater management – A site to the Naval Hospital is still pending.
 - b) Today's special presentation is by Dr. John Weinstein, Biology Professor and Department Head, Associate Dean for Accreditation for Swain Family School of Science and Mathematics for The Citadel, and member of the newly funded Center for Oceans and Human Health and Climate Change Interactions. His topic will be microplastics as well as tire wear in our coastal waterways and how stormwater runoff can facilitate transport of these pollutants into our waterways and his research on what potential risks that may pose.
 - c) Other topics?
5. FY 2020 Budget – The budget was approved and contained the SWU fee increase. For TY 20 through TY 25, the rates will be \$19 Admin. fee, \$71 IA fee, and \$10 GA fee. A typical single family home (Tier II on 2 acres or less) will pay \$100 / year.
6. Military installation and other State and Federal properties SWU fees – See “Delinquent Accounts” below.
7. Delinquent accounts – The letters to delinquent federal accounts have been mailed out. A

second round of state agency letters went out also. We have had very good response from most state agencies. We are working through several inquiries from SCDOT on properties associated to ROW acquisition.

(State and Federal accounts make up approx. 97%-98% of the delinquent account value of approx. \$7 million on our ledger)

8. TY 2019 tax run – Staff continues to work on reviewing account data for the next tax run.

Monitoring Update

1. Lab Update (From Dr. Alan Warren and Lab Manager Danielle Mickel)
 - a) No information was available at the time of this report.
2. 2nd Quarter 2019 test results – [See attached the report and location maps](#) for the 2nd quarter samples. Quarter 2 results show both increases and decreases in E.coli and Fecal Coliform bacteria. 14 locations sampled showed decreases in bacteria counts, 11 locations showed increases in bacteria levels. All four of the Okatie River TMDL sampling locations did experience an increase in bacteria levels. Three of the locations with increases were still below acceptable levels of bacteria for the DHEC Shellfish program. Further sampling will indicate where to focus efforts in the future.

Stormwater Implementation Committee (SWIC) Report

1. The SWIC has not met in the last month.

Stormwater Related Projects

1. Easements – Staff is working on numerous easement requests and meets monthly to review status. Several condemnations are still being pursued using outside legal counsel.
2. Complaints – Staff continually works numerous drainage related complaints each month.
 - a) Horse Island - The neighborhood has requested assistance with roadside drainage conveyance improvements, road overtopping and pond outfall upgrades. Staff met with Consultant on site June 5th to discuss/review project scope. The County has received scope and fee proposal from Consultant. Staff is working on a preliminary construction estimate based on several assumptions. County determination and approval to pursue proposed work is needed. The Stormwater Manager plans to contact the County Administrator and Council member for the area to discuss the project once costs are known.
 - b) Flyover bridge preventative maintenance and deferred maintenance repairs – Staff met with Consultant on site June 5th to discuss/review project scope. Scope and fee from consultant received and submitted for County approval. Design solution is to cure erosion problem under the east bound terminus ramp.

This work will be bid out due to the complexity of the solution and traffic control needs. Crew is also working on scheduling some deferred maintenance needs.

3. Alljoy subwatershed flooding – Release of the RFQ and funding pending outcome of approval/denial of FEMA Hazard Mitigation Grant Application. The Hazard Mitigation Grant funding application was submitted to South Carolina Emergency Management Division on May 31, 2019 and the County is waiting for determination of acceptance/award.
4. Factory Creek Watershed Regional Detention Basin “Phase I” & Academy Park Subdivision (Design Cost \$49,873, Tree Mitigation Cost \$18,200 & \$18,200, Construction Cost by the Developer) – Construction on-going and estimated to be 50% complete.
5. Factory Creek Watershed Regional Detention Basin “Phase II” (Design Cost = \$63,390, Tree Mitigation Cost is pending, Construction Cost by the Developer) – Construction on-going and estimated to be 80% complete.
6. Graves Property / Pepper Hall Public / private partnership – No additional update at this time.
7. Whitehall property purchase – No additional update at this time.
8. US 278 “super street” widening on Jenkins Island (Windmill Harbor area) – No update at this time.
9. Lady’s Island Plan, Sea Level Rise, and “no-fill” ordinance – The committee met June 18th to continue to define a purpose statement. Stormwater staff was unable to attend the meeting; therefore, there is no update at this time.

Professional Contracts Report

1. CIP FY 18 Grouping Stormwater Projects – (Design - Ward Edwards \$202,000, Andrews Engineering \$560,490, Const. est. \$5,512,900) – All projects are in early design phase.
 - a) Salt Creek and Shanklin Road – Consultant proceeding with 30% design development drawings. Met on-site with Consultant May 31st to formalize final design direction. **Salt Creek** - Ramsey Tract BMP being pursued and in 30% design development. **Shanklin** - Roseida SD Tract BMP and Shady Oaks/Beachwood Tract BMPs being pursued and in 30% design development.
 - b) Brewer Memorial – 70% design development drawings being developed. Staff is considering a slight change in scope to make the small pond a restored freshwater wetland.
2. Evergreen Regional Pond 319 grant project – (Design=\$89,286, Construction=\$590,000. Grant=\$229,124) – Received 30% design drawings from consultant, geotechnical

investigation/report completed, survey and wetland delineation complete. These items were reviewed and County review comments presented to Consultant. USACE Nationwide permit completed and submitted to USACE. Consultant advised to pursue 70% design development drawings and obtain required permits for construction. Quarterly reporting for the grant was submitted July 1, 2019.

Regional Coordination

1. Town of Bluffton and Beaufort County Joint meetings on Sanitary Sewer in the May River watershed – Staff from the County and Town will be meeting with BJWSA staff July 18, 2019 to discuss status of the various projects in the plan.
2. Mossy Oaks Task Force – (Design \$20,404, Construction \$205,000; County portions only). See Municipal Reports.
3. Charleston Area MS4 managers group – This group did not meet this month.
4. Bluffton Ditch Task Force – This group did not meet this month.
5. May River watershed modeling – See municipal reports for more information.
6. Port Royal Sound Conservation Working Group – Met June 14th with representatives of the Nature Conservancy. At the meeting, they discussed common points of interest and means to protect water quality and land in the Port Royal Sound region as we continue to grow and prosper as a community. They plan to meet again in 2 months and discuss: Resolution/agreement to support land protection; Review funding opportunities to finance land protection; Review comprehensive plan and related ordinances for compatibility with land protection goals; and Establish goals and leadership for this initiative.

Municipal Reports

1. Town of Hilton Head Island (From Jeff Netzinger, Stormwater Manager and Brian Eber, MS4 Coordinator)
 - i. No information was available at the time of this report.
2. Town of Bluffton (From Kim Jones, Watershed Management Division Director)
 - i. [See attached report.](#)
3. City of Beaufort (From Neil Desai, Asst. Public Works Director)
 - i. No information was available at the time of this report.
 - ii. Mossy Oak Task Force provided a public update on July 10th.
4. Town of Port Royal (From Van Willis, Town Manager and Tony Maglione, consultant)

- i. No information was available at the time of this report.

MS4 Report

1. Plan Review – [See the attached chart](#) for Beaufort County Stormwater staff plan review workload for the past 12 months.
2. Stormwater Permits – [See the attached chart](#) for Beaufort County Stormwater permits issued for the past 12 months.
3. Monthly Inspection summary - [See the attached chart](#) for Beaufort County Stormwater staff inspection, complaint, IDDE, and violations summary for the past 12 months.
4. Weather Station Data. [See attached chart.](#)
5. Public Education – Lowcountry Stormwater Partners (LSP), via Carolina Clear, continues to work on several initiatives towards public education and outreach. No additional updates are available at this time.
6. Energov permitting software – Stormwater department has completed all necessary documentation required by the Energov team to start developing the work flow for the software implementation.
7. MS4 Statewide General permit – No update at this time.
8. Statewide General permit for Construction – No update at this time.

**BEAUFORT COUNTY MONITORING 2019
IN-SITU**

Date of Collection	Site ID	Time of Collection	Air Temp (°C)	Water Temp (°C)	Specific Cond (SpC) (m/s/cm)	DO (mg/L)	pH (H+)	Salinity (ppt)	Turbidity (NTU)	Weather Observed	Tide Stage	Flow (visual)	Monitoring Category	Remarks	GPS Coordinates
5/13/2019	BCCC1	1030	23.1	22.10	0.142	4.38	7.30	0.07	8.4	02	4100	M	TMDL SHARED-TOB		32.3558456, -80.8641047
5/13/2019	BCCC2	1008	22.8	22.43	3.75	1.39	6.46	1.95	32.7	01	4100	NF	TMDL SHARED-TOB		32.3627148, -80.8509683
6/12/2019	BCOK1	1108	26.6	24.99	0.175	5.50	6.64	0.07	12.8	02	2000	H	TMDL SHARED-TOB		32.27876, -80.94587
5/13/2019	BCOK2	0920	26.27	21.45	0.160	4.18	5.71	0.08	39.3	01	NA	L	TMDL SHARED-TOB		32.334256, -80.922064
5/13/2019	BCOK3	0934	24.03	22.68	5.33	NR	6.13	2.86	24.0	01	4100	L	TMDL SHARED-TOB		32.347974, -80.891552
6/10/2019	NEW1	1225	26.46	26.21	6.720	2.86	4.93	3.67	1.90	01	4300		WQ MOA-TOB		32.236088, -81.013417
4/30/2019	NEW1 DRY	1434	24.64	23.26	0.237	4.22	6.37	0.11	1.10	01	4100	M		DRY	32.236088, -81.013417
6/10/2019	OKW3A	1540	26.92	28.37	0.177	4.91	5.86	0.09	15.4	01	NA		TMDL MOA-TOB		32.27876, -80.94587
4/30/2019	OKW3A	1502	24.17	24.89	0.176	4.86	6.38	0.09	13.9	01	NA	L		DRY	32.27876, -80.94587
6/10/2019	MRR02	1525	26.33	24.68	0.268	0.99	5.99	0.13	31.4	01	NA		TMDL MOA-TOB		32.240785, -80.885964
4/30/2019	MRR02	1057	23.55	20.06	0.244	0.46	6.17	0.12	11.0	01	NA	L		DRY	32.240785, -80.885964
6/12/2019	BCD-PR	0926	22.77	25.36	6.19	4.03	6.40	3.35	56.5	22	4100	M	WQ		32.639401, -80.857303
6/5/2019	BCD-HC	1433	31.0	29.32	23.10	4.99	6.61	13.79	33.3	02	4200	M	WQ		32.48118, -80.755535
6/5/2019	BCD-CR	1531	31.0	30.64	46.7	5.05	7.43	30.56	25.6	02	4300	H	WQ		32.3135635, -80.8591359
6/5/2019	BCD-RS	1300	38.5	25.06	0.235	3.53	5.78	0.11	8.0	02	4100	L	WQ SPECIAL		32.442109, -80.628637
6/12/2019	BCD-YM	0904	22.77	26.68	17.20	4.99	6.25	10.00	13.5	22	4100	M	WQ		32.652932, -80.683649
6/5/2019	BCD-LM	1458	31.0	29.42	46.700	5.04	7.31	30.50	18.2	02	4200	H	WQ		32.373752, -80.836215
NS	BCB01	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	WQ SHARED-TOB	No Flow during sampling events	32.4095898, -80.7242011
5/13/2019	BCBR2	1130	25.00	22.54	1.408	6.63	6.54	1.05	1.9	02	2000	M	WQ MOA-TOB		32.3831697, -80.734907
6/5/2019	BCBR3 (SANDS)	1355	27.99	29.43	47.60	4.68	7.53	31.17	13.5	01	4200	M	WQ MOA-TOB SPECIAL		32.370383, -80.658153
5/13/2019	BCBR4	1250	27.20	26.13	46.3	5.23	7.40	30.1	6.0	02	2100	M	WQ MOA-COB		32.394572, -80.677906
5/13/2019	BCBR5	1223	26.30	26.21	44.8	5.38	7.44	29.06	8.6	02	2100	M	WQ MOA-COB		32.431819, -80.674322
4/2/2019	BCBR6	1121	8.89	11.12	0.000	6.23	5.82	0.01	134.0	02	4200	L	WQ MOA-COB	*Instrument misread	32.429729, -80.670973
5/13/2019	BCBR7	1204	25.50	26.01	7.13	3.43	6.59	3.92	8.7	02	2000	L	WQ		32.440031, -80.687597
6/5/2019	BRIDGE (DUP)	1310	28.05	29.45	47.90	3.80	6.16	31.39	26.0	02	4200		SPECIAL		32.38011, -80.70884
6/5/2019	Ddown	1327	27.53	29.26	47.90	3.75	7.09	31.38	10.4	01	4200		SPECIAL		32.37552, -80.69624
6/5/2019	WAREHOUSE	1344	27.57	29.22	47.80	4.54	7.07	31.22	14.1	02	4200		SPECIAL		32.37148, -80.69148
6/12/2019	BLF4IN	1040	25.50	26.04	0.078	4.95	7.21	0.04	21.9	02	4300	M	SPECIAL		32.29447173, -80.93433199
6/12/2019	BLF4OUT	1046	25.50	26.20	0.063	4.22	6.99	0.04	7.4	02	4300	M	SPECIAL		32.294560, -80.933913
6/12/2019	BLF3IN	1024	25.50	24.62	0.174	4.56	6.65	0.08	16.2	02	4300	M	SPECIAL		32.290441, -80.931489
6/12/2019	BLF3OUT	1033	25.50	27.33	18.1	5.14	6.30	10.70	24.4	02	4300	M	SPECIAL		32.290229, -80.930990
5/13/2019	BLF3IN	1338	28.80	27.01	2.05	2.58	6.39	1.03	86.8	02		L	SPECIAL		32.290441, -80.931489
5/13/2019	BLF3OUT	1346	28.80	29.56	27.9	5.46	6.18	17.23	30.6	02		L	SPECIAL		32.290229, -80.930990
4/2/2019	BGIN	NS											SPECIAL		32.27807, -80.940157
4/2/2019	BGOUT	NS											SPECIAL		32.27807, -80.940157

Notes: Further details for notes are addressed in comments section.

- NS = No Sample Collected
- NF = No Flow Observed at sample site
- H = High Flow Observed at sample site
- M = Medium Flow Observed at sample site
- L = Low Flow Observed at sample site
- NW = No Water Observed at sample site
- ND = No Data recorded
- CLR = Clear Skies
- F = Fair Weather (Partly Cloudy, no Thunderstorm/Rain event occurred in vicinity)
- CLDY = Cloudy Skies
- R = Rain (Thunderstorm or Continuous due to frontal system passage)

Additional Comments:

COC #003113

Weather Code	Tide Stage	Monitoring Category
00 = (Clear; NSW)	2000 = EBB	* TMDL (CAT 1)
01 = (Fair Weather)	2100 = 1/4 Fld	*IDDE (CAT 2)
02 = (Cloudy Skies)	2200 = 1/2 Fld	*WQ (CAT 3)
22 = (Rain/Storm)	2300 = 3/4 Fld	*MOA (CAT 4)
	4000 = FLOOD	*SPECIAL (CAT 5)
	4300 = 3/4 Ebb	* SHARED
	4200 = 1/2 Ebb	SHARED=sites in other jurisdictions that BC sampling
	4100 = 1/4 Ebb	

**Beaufort County
Monitoring
2019**

Date of Collection	Site ID	Time of Collection	MP+D4:E13N E. Coli (MPN/100 mL)	MPN Fecal (MPN/100 mL)	MPN Enterococcus (MPN/100 mL)	MPN E. Coli	MPN Fecal	MPN Enterococcus	Remarks
						Dilution	Dilution	Dilution	
5/13/2019	BCCC1	1035	677			5			
5/13/2019	BCCC2	1013	1377.5			5			
6/12/2019	BCOK1	1103	6867			10			
5/13/2019	BCOK2	0925	>12098			5			
5/13/2019	BCOK3	0939	>12098			5			
6/10/2019	NEW1	1220	189	98	221	10	10	10	
4/30/2019	NEW1 DRY	1434	1850	959	84	10	10	10	
6/10/2019	OKW3A	1545	688	509.5		5	5		
4/30/2019	OKW3A DRY	1507	9931.5	7068		5	5		
6/10/2019	MRR02	1520	165.5	240		5	5		
4/30/2019	MRR02 DRY	1102	248	220.5		5	5		
6/12/2019	BCD-PR	0921			934			10	
6/5/2019	BCD-HC	1429		4902			5		
6/5/2019	BCD-CR	1526		10.0			5		
6/5/2019	BCD-RS	1256		3065.2			5		
6/12/2019	BCD-YM	0859		43		5			
6/5/2019	BCD-LM	1453		15			5		
NS	BCBR1	NS							
5/13/2019	BCBR2	1125		1023			5		
5/13/2019	BCBR3 (SANDS)	NS	20.0		10.0	10		10	
5/13/2019	BCBR4	1243		10	30		10	10	
5/13/2019	BCBR5	1218		10			10		
4/2/2019	BCBR6	1117		627			5		wet
5/13/2019	BCBR7	1159		9931.5			5		
6/5/2019	BRIDGE (DUP)	1310	41.0		20.0	10		10	
6/5/2019	Ddown	1327	10.0			10			
6/5/2019	WAREHOUSE	1344	<10			10			
6/12/2019	BL#4IN	1038		3244			5		wet
6/12/2019	BL#4OUT	1042		2305.5			5		wet
6/12/2019	BL#3IN	1020		1179.5			5		wet
6/12/2019	BL#3OUT	1029		2506			5		wet
5/13/2019	BL#3IN	1335		5231			5		
5/13/2019	BL#3OUT	1341		5			5		
4/2/2019	BGIN	NS							
4/2/2019	BGOUT	NS							

Notes: Further details for notes are addressed in comments section.

NS = No Sample Collected
 NF = No Flow Observed at sample site
 NW = No Water Observed at sample site
 ND = No Data recorded

Comments:

Beaufort County
Monitoring
2019

Date of Collection	Site ID	Time of Collection	Total Kjeldahl Nitrogen (TKN) mg/L	Nitrate/Nitrite (NOx) mg/L	Ammonia (NH3) mg/L	Total Nitrogen (TN) mg/L	Total Phosphorous (T-P) mg/L	Metals-Copper (Cu) mg/L	Metals-Lead (Pb) mg/L	Metals-Zinc (Zn) mg/L	Metals-Mercury (Hg) mg/L	Remarks
5/13/2019	BCCC1	1035		0.22	<0.25		0.22					
4/2/2019	BCCC2	NS										
4/2/2019	BCOK1	NS										
4/2/2019	BCOK2	NS										
4/2/2019	BCOK3	NS										
4/30/2019	NEW1	1434										
4/30/2019	OKW3A	1507										
4/30/2019	MRR02	1102										
4/2/2019	BCD-PR	NS										
4/2/2019	BCD-HC	NS										
6/5/2019	BCD-CR	1526		<0.050	<0.25		<0.10					
4/2/2019	BCD-RS	NS										
4/2/2019	BCD-YM	NS										
6/5/2019	BCD-LM	1453		<0.050	<0.25							
	BCBR1	NS										
5/13/2019	BCBR2	1125		0.55	1.1		0.23					
6/5/2019	BCBR3 (SANDS)	1355		0.050	<0.25		<0.10					
5/13/2019	BCBR4	1243		<0.050	<0.25		<0.10					
5/13/2019	BCBR5	1218		<0.050	<0.25		0.10					
4/2/2019	BCBR6	1117		0.16	<0.25		1.1					
5/13/2019	BCBR7	1159		<0.050	0.31		0.12					
4/2/2019	BRIDGE (DUP)	NS										
4/2/2019	Ddown	NS										
4/2/2019	WAREHOUSE	NS										No Chem analyses required
4/2/2019	BL#4IN	NS										No Chem analyses required
4/2/2019	BL#4OUT	NS										No Chem analyses required
4/2/2019	BL#3IN	NS										No Chem analyses required
4/2/2019	BL#3OUT	NS										No Chem analyses required
4/2/2019	BGIN	NS										No Chem analyses required
4/2/2019	BGOUT	NS										No Chem analyses required

Notes: Further details for notes are addressed in comments section.

- NS = No Sample Collected
- NF = No Flow Observed at sample site
- NW = No Water Observed at sample site
- ND = No Data recorded

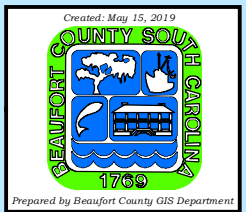
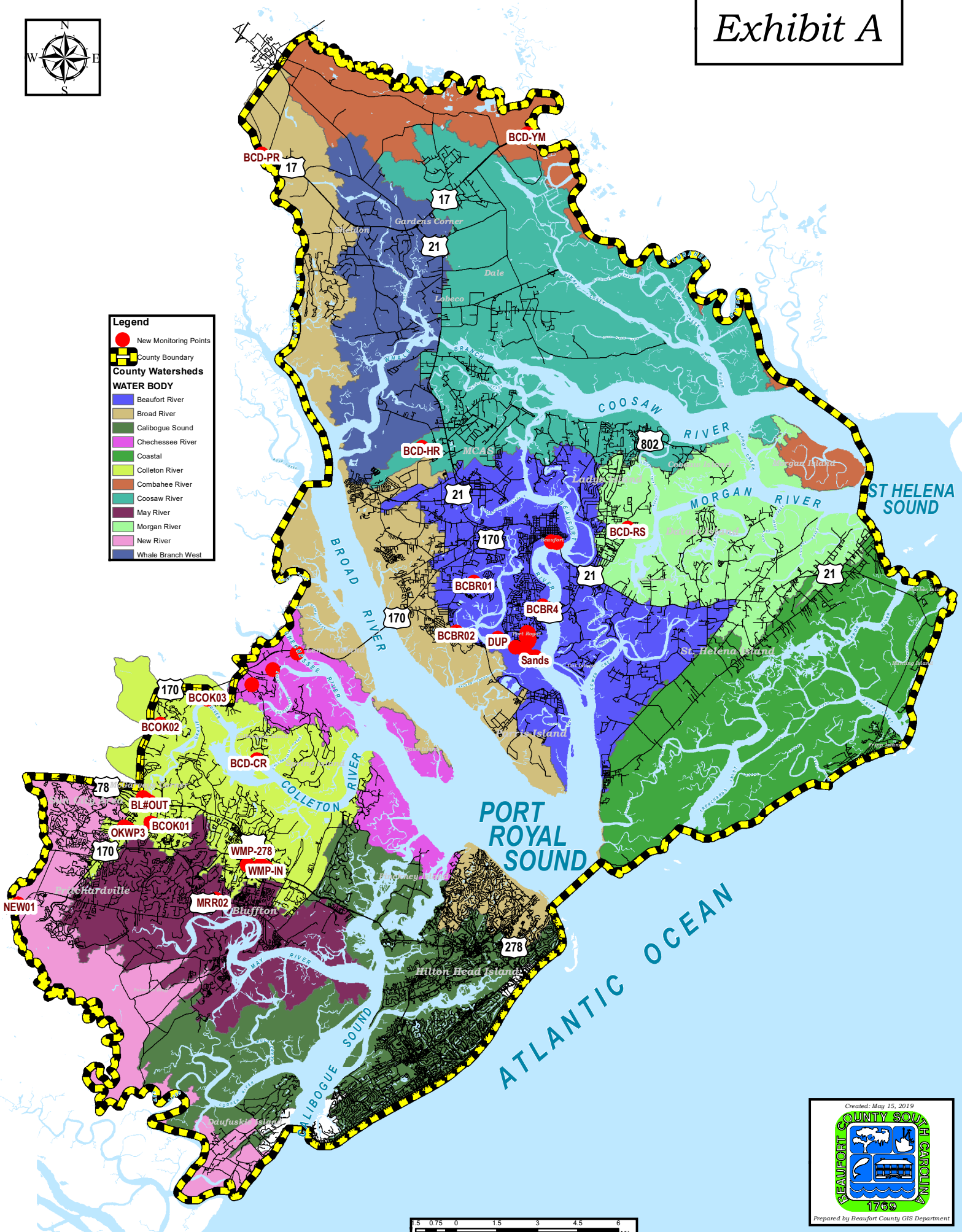
Comments:

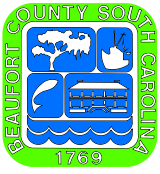
Exhibit A



Legend

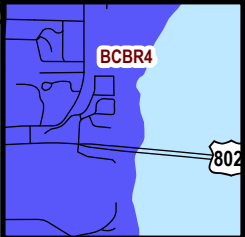
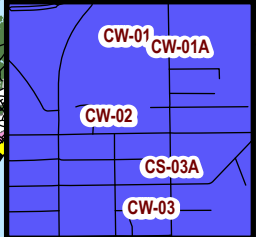
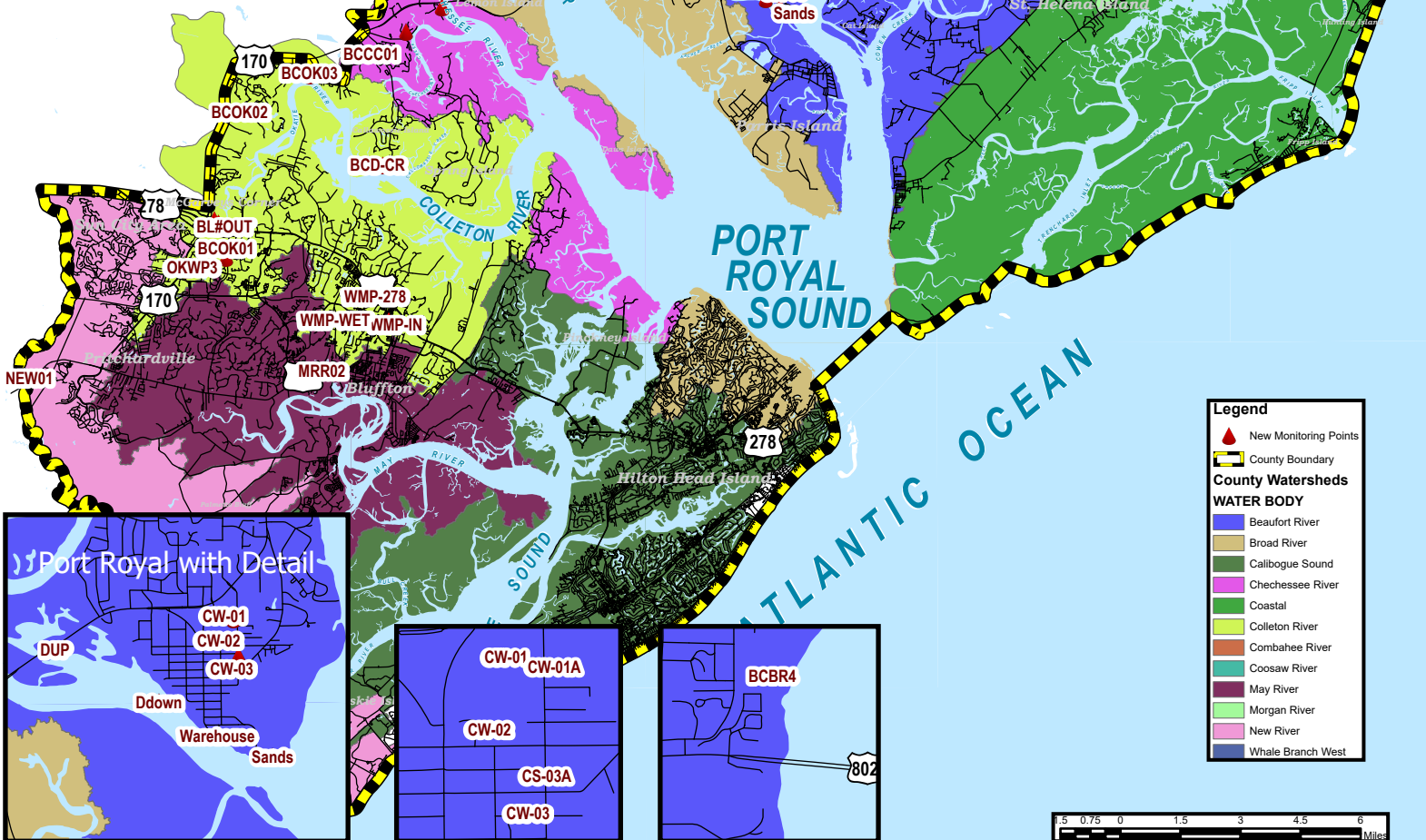
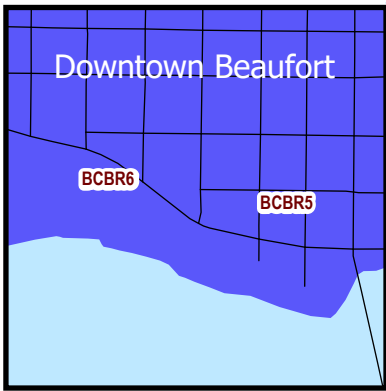
- New Monitoring Points
- County Boundary
- County Watersheds
- WATER BODY**
- Beaufort River
- Broad River
- Calibogue Sound
- Chechessee River
- Coastal
- Colleton River
- Combahee River
- Coosaw River
- May River
- Morgan River
- New River
- Whale Branch West





Created: May 30, 2019
Prepared by Beaufort County GIS Department

Exhibit A



Legend

- ▲ New Monitoring Points
- County Boundary

County Watersheds

WATER BODY

- Beaufort River
- Broad River
- Calibogue Sound
- Chechessee River
- Coastal
- Colleton River
- Combahee River
- Coosaw River
- May River
- Morgan River
- New River
- Whale Branch West



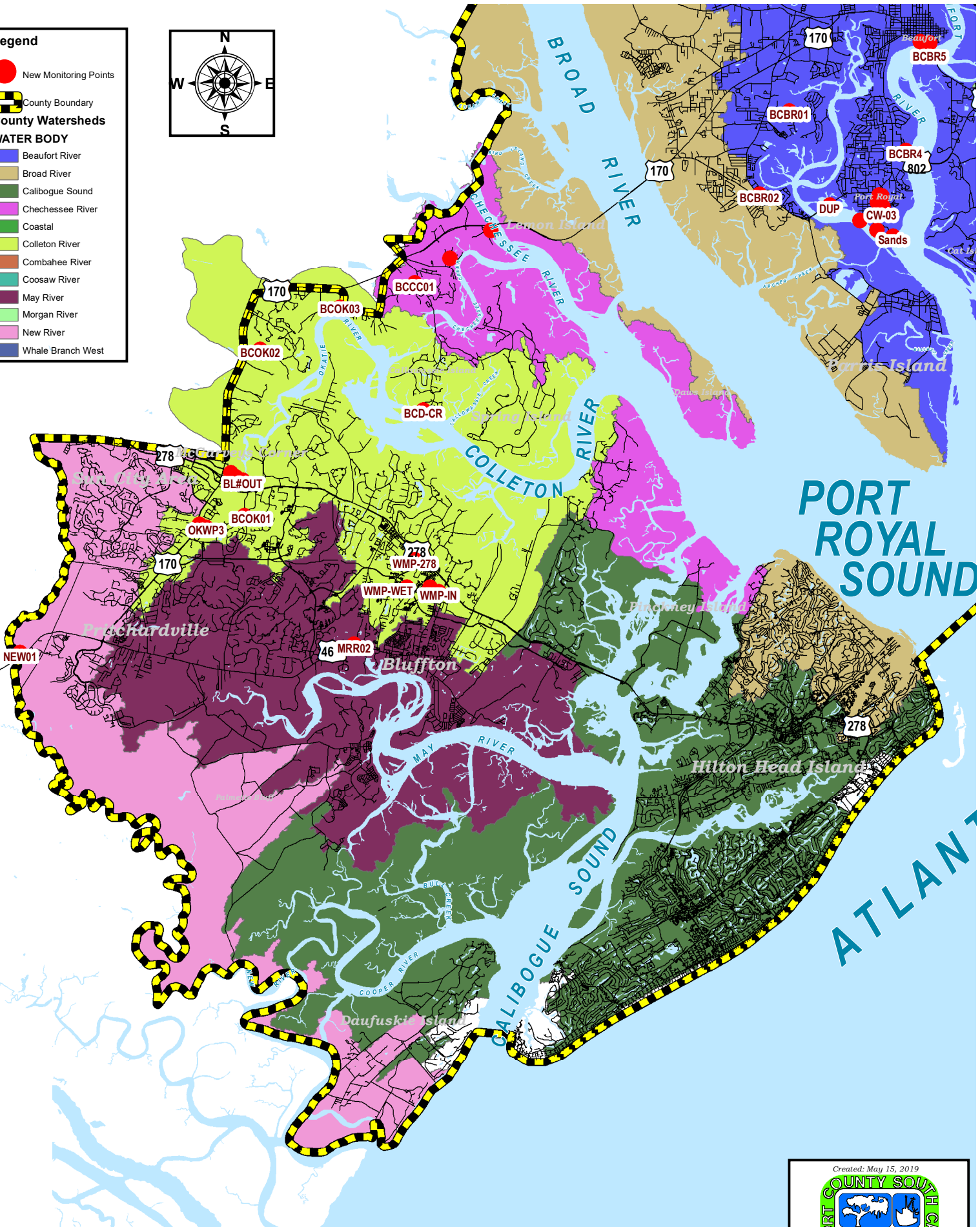
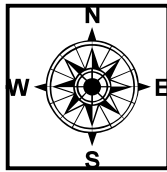
Legend

- New Monitoring Points
- County Boundary

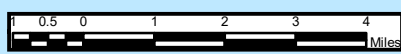
County Watersheds

WATER BODY

- Beaufort River
- Broad River
- Calibogue Sound
- Chechessee River
- Coastal
- Colleton River
- Combahee River
- Coosaw River
- May River
- Morgan River
- New River
- Whale Branch West



*Monitoring Location Plan
South of Broad*



Created: May 15, 2019

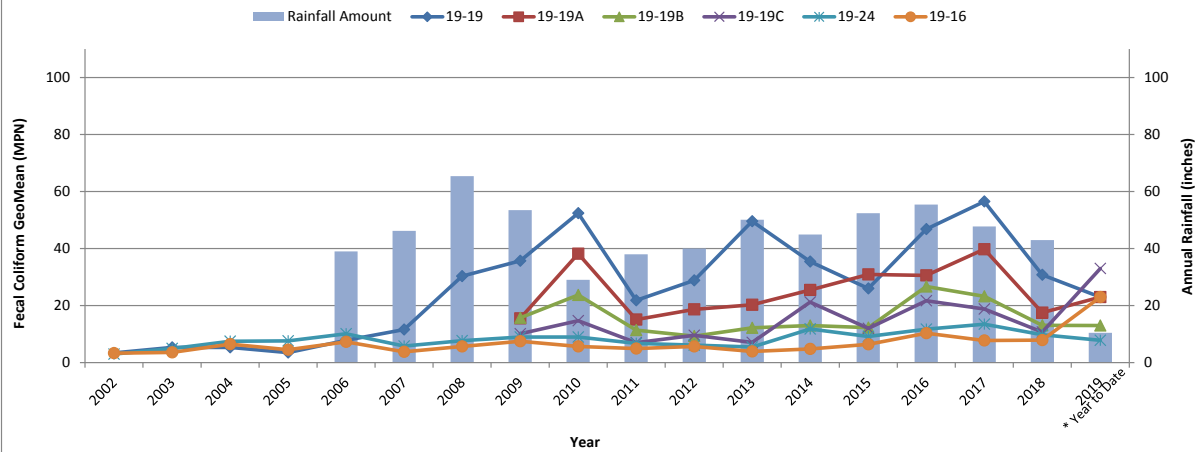
Prepared by Beaufort County GIS Department

May River Headwaters Stations

	19-19				19-19A				19-19B				19-19C				19-24				19-16			
	2016	2017	2018	2019	2016	2017	2018	2019	2016	2017	2018	2019	2016	2017	2018	2019	2016	2017	2018	2019	2016	2017	2018	2019
	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)	Fecal Coliform (MPN)
December	79.0	1600.0	79.0		23.0	920.0	49.0		49.0	540.0	33.0		33.0	240.0	46.0		7.8	220.0	23.0		23.0	49.0	21.0	
November	33.0	49.0	49.0		13.0	33.0	13.0		7.8	7.8	23.0		14.0	31.0	17.0		13.0	2.0	17.0		33.0	2.0	7.8	
October	NS	22.0	79.0		NS	49.0	23.0		NS	33.0	7.8		NS	23.0	7.8		NS	6.8	7.8		NS	2.0	2.0	
September	23.0	17.0	49.0		110.0	7.8	23.0		23.0	11.0	13.0		13.0	4.5	17.0		4.5	2.0	17.0		7.8	1.8	17.0	
August	NS	79.0	70.0		NS	70.0	23.0		NS	21.0	13.0		NS	33.0	4.5		NS	33.0	7.8		NS	33.0	17.0	
July	79.0	350.0	23.0		17.0	110.0	33.0		22.0	130.0	11.0		17.0	49.0	7.8		49.0	49.0	13.0		13.0	22.0	4.5	
June	79.0	23.0	11.0		130.0	49.0	23.0		70.0	13.0	23.0		110.0	17.0	7.8		33.0	7.8	4.5		23.0	4.5	1.8	
May	70.0	17.0	17.0	7.8	23.0	23.0	33.0	9.2	49.0	7.8	17.0	7.8	49.0	2.0	13.0	2.0	14.0	23.0	23.0	6.8	17.0	4.5	13.0	4.5
April	23.0	7.8	33.0	23.0	23.0	23.0	13.0	13.0	13.0	4.5	17.0	7.8	13.0	7.8	17.0	6.8	7.8	13.0	49.0	23.0	1.8	4.5	17.0	6.8
March	33.0	350.0	22.0	23.0	33.0	11.0	21.0	23.0	33.0	33.0	4.5	6.8	17.0	13.0	11.0	13.0	11.0	13.0	7.8	7.8	7.8	33.0	9.3	4.5
February	23.0	13.0	17.0	64.0	17.0	7.8	7.8	33.0	13.0	13.0	17.0	23.0	11.0	9.3	17.0	31.0	6.8	4.5	2.0	6.8	1.8	1.8	7.8	13.0
January	110.0	95.0	13.0	23.0	33.0	79.0	2.0	23.0	49.0	31.0	4.5	13.0	17.0	49.0	2.0	33.0	7.8	27.0	1.8	7.8	17.0	33.0	4.5	23.0
Additional Samples																								
Additional Samples																								
Average Annual GeoMean	46.8	56.5	30.8	22.7	30.6	39.8	17.5	18.4	26.7	23.3	13.1	10.4	21.7	18.8	10.7	11.3	11.7	13.5	9.8	9.2	10.3	7.7	7.9	8.4
** Truncated GeoMetric Mean	37.0	44.0	42.0	37.0	30.0	36.0	29.0	24.0	16.0	20.0	20.0	16.0	16.0	16.0	15.0	13.0	9.0	10.0	10.0	11.0	6.0	7.0	8.0	7.0
** Truncated 90th Percentile	105.0	203.0	176.0	175.0	89.0	133.0	115.0	98.0	69.0	83.0	71.0	58.0	65.0	57.0	56.0	53.0	29.0	37.0	44.0	44.0	21.0	29.0	30.0	29.0

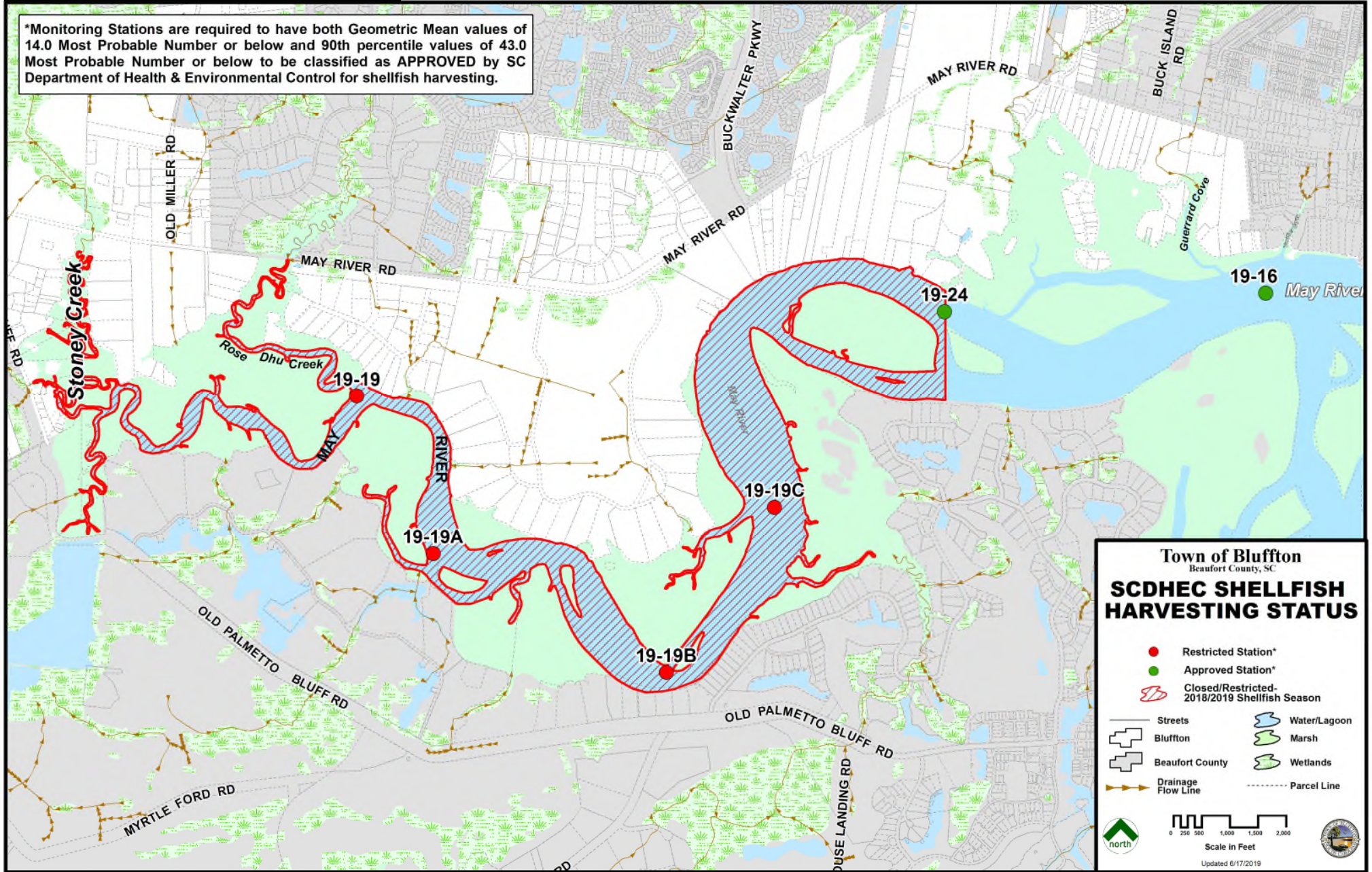
NS = No Sample
 AS = Additional Samples
 ** Town staff calculations utilizing DHEC statistics

SC DHEC Shellfish Monitoring Stations Average Annual Fecal Coliform



May River Headwaters Stations

*Monitoring Stations are required to have both Geometric Mean values of 14.0 Most Probable Number or below and 90th percentile values of 43.0 Most Probable Number or below to be classified as APPROVED by SC Department of Health & Environmental Control for shellfish harvesting.

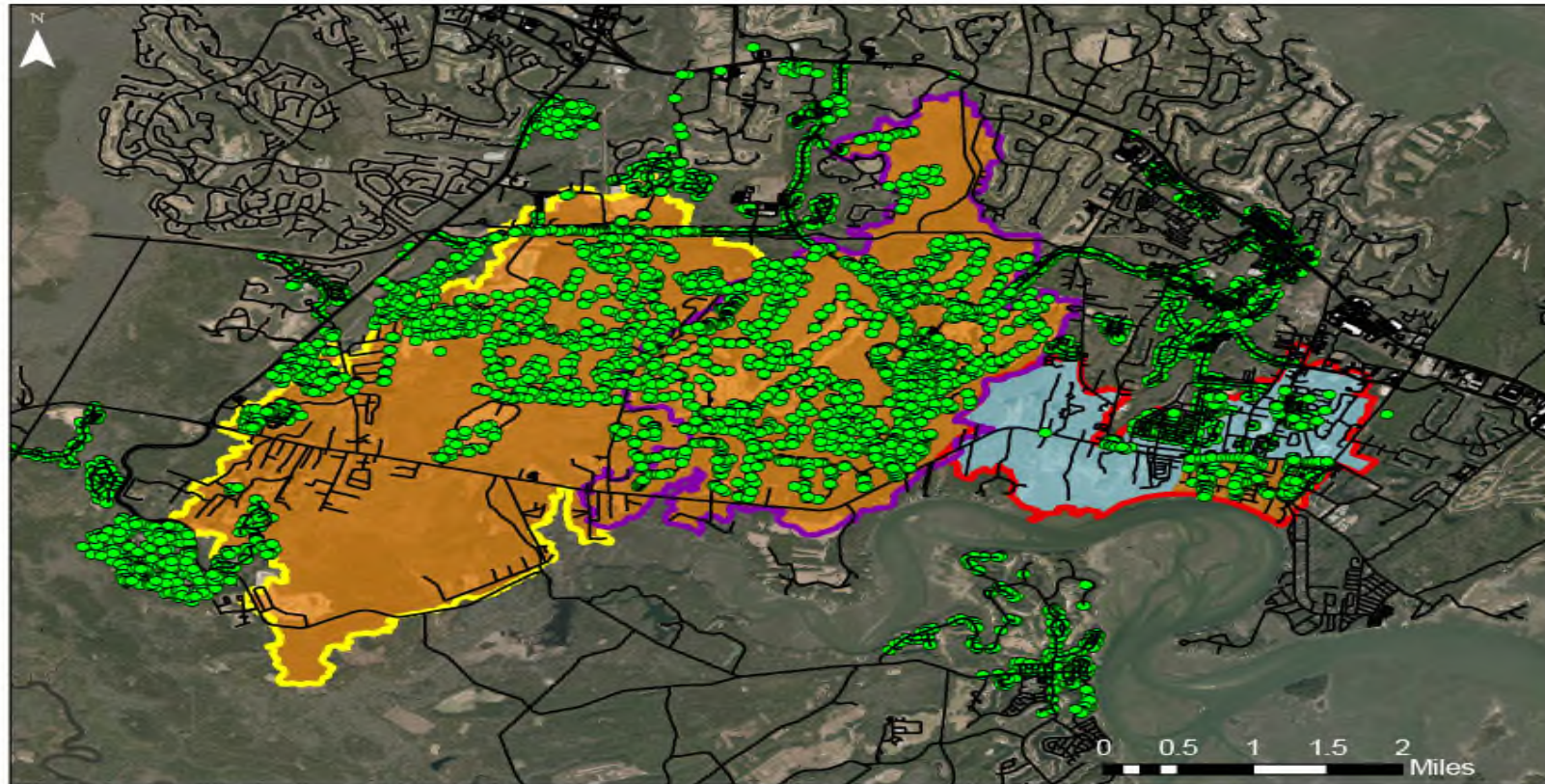


ACTIVITY - POLICY	STATUS
May River Watershed Action Plan Update	Contract to McCormick Taylor to complete MRWAP Update - Water Quality Model, current project assessment, and proposed new projects was approved by Council on 5/14/19. Notice to Proceed issued 6/20/19.
Sewer Connection & Extension Policy	Completed 2018. Council adopted the Sewer Connection & Extension Policy on 9/26/17. Ordinance and Septic to Sewer Conversion Program completed 9/20/18.
ACTIVITY - PROJECTS	STATUS
Sanitary Sewer Extension	Completed Buck Island/Simmons Road (BIS) Phases I, II, III, IV; Toy Fields; and Jason/Able. Six phases of sewer extension are proposed in the 5-year Capital Improvement Program. Current project updates are included in Engineering Consent Agenda under "Sewer & Water."
May River 319 Grant Phase 1 - New Riverside Pond (Grant award of \$483,500 in 2009)	Completed in 2013.
May River 319 Grant Phase 2 - Pine Ridge (Grant award of \$290,000 in 2011)	Completed in 2016.
May River 319 Grant Phase 3 - Town Hall Parking Retrofit (Grant award of \$231,350 in 2016)	Completed 2019. Open House ceremony held 5/29/19.
Stoney Creek Wetlands Restoration: Preliminary Design Phase	Project on hold following Council direction on 5/31/17.
May River Watershed Water Quality Model	Contract awarded to McCormick Taylor with final deliverables anticipated 1/20.
ACTIVITY - FINANCIAL	STATUS
Additional Funding Opportunities	Exploring partnership opportunities with BJWSA for future sewer phases. Council unanimously agreed on 5/14/19 to change the SWU Fee Rate Structure to Option E at \$98 for tax year 2019. Staff submitted a \$307,345.00, 319 grant proposal in support of 37 sewer lateral connections for Posey's Court and Historic District Phases 1 and 2 on 5/22/19. Notification is anticipated by 6/30/19.
ACTIVITY - PROGRAMS	STATUS
Public Outreach/Participation/Involvement (MS4 Minimum Control Measure #1 & 2)	Outreach and involvement efforts continue through county-wide partnership with Carolina Clear as Lowcountry Stormwater Partners - Neighbors for Clean Water, through local cleanups, civic group presentations, and the May River Watershed Action Plan Advisory Committee. Current updates are included in Engineering Consent Agenda and Attachment 3.
Infrastructure Mapping/GIS (MS4 Minimum Control Measure #3)	Data points continue to be collected with new development to meet MS4 requirements & populate water quality model. Current updates are included in Engineering Consent Agenda Attachment 4a.

ACTIVITY - PROGRAMS continued	STATUS continued
Water Quality Monitoring Program (MS4 Minimum Control Measure #3)	1. SCDHEC Shellfish monitoring results 2. Fecal coliform bacteria "hot spot" concentrations 3. Microbial Source Tracking of human sources of bacteria 4. Illicit Discharge investigation and monitoring 5. BMP efficacy monitoring 6. MS4 monitoring Current updates are included in Engineering Consent Agenda Attachments 1a, 1b, 4b - 4d.
Construction Site Stormwater Runoff Control Program (MS4 Minimum Control Measure #4)	Sediment and erosion control inspections with escalating enforcement response. Current updates are included in Engineering Consent Agenda Attachment 5.
Stormwater Plan Review & Related Activity Program (MS4 Minimum Control Measure #5)	SCDHEC delegated plan review-related activities. Current updates are included in Engineering Consent Agenda Attachment 6.
Ditch Inspection/Maintenance Program (MS4 Minimum Control Measure #6)	Continued coordination with SCDOT, Beaufort County and Town Public Works to inspect and maintain ditches within the Town's jurisdiction. Current updates are included in Engineering Consent Agenda Attachment 7 and under "Public Works."
Septic System Maintenance Program	On-going assistance offered to Town residents regardless of financial status through Neighborhood Assistance Program. Current updates, as reported by NAP, are included in Engineering Consent Agenda Attachment 9.
Sewer Connection Program	<i>Completed 2018.</i> Staff submitted a \$307,345.00, 319 grant proposal in support of 37 sewer lateral connections for Posey's Court and Historic District Phases 1 and 2 on 5/22/19. Notification is anticipated by 6/30/19.

MS4 Minimum Control Measure #3 – IDDE (Illicit Discharge Detection & Elimination): Stormwater Infrastructure Inventory

Stormwater Inventory Collection



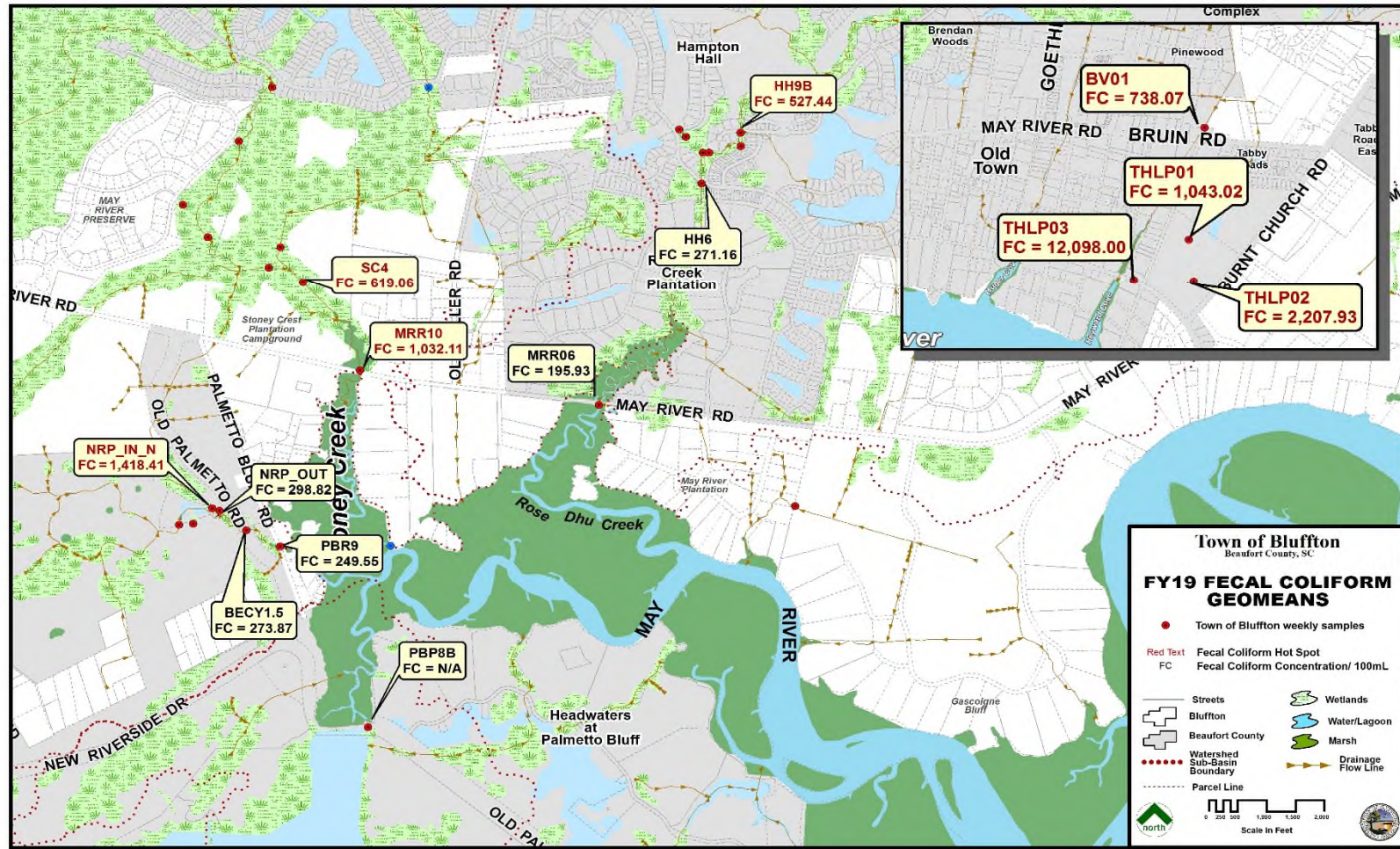
Collection Status

- Completed
- In Progress
- Inventoried SW Utilities
- Mid River/Old Town
- Rose Dhu Watershed
- Stoney Creek Watershed

DISCLAIMER
This map was created by the Town of Bluffton's Stormwater Department in order to provide an overview of the current status of the town's stormwater infrastructure. It is not intended to be used as a legal document or to provide any warranty, express or implied, for the accuracy of the information presented. The Town of Bluffton is not responsible for any errors or omissions in this map or for any consequences arising therefrom.

Stormwater Infrastructure Inventory Collection Status	
FY 2019 YTD Collection Totals	2,925
FY 2018 Collection Totals	3,777
FY 2017 Collection Totals	3,874

MS4 Minimum Control Measure #3 – IDDE: Fecal Coliform Concentrations Trend Map

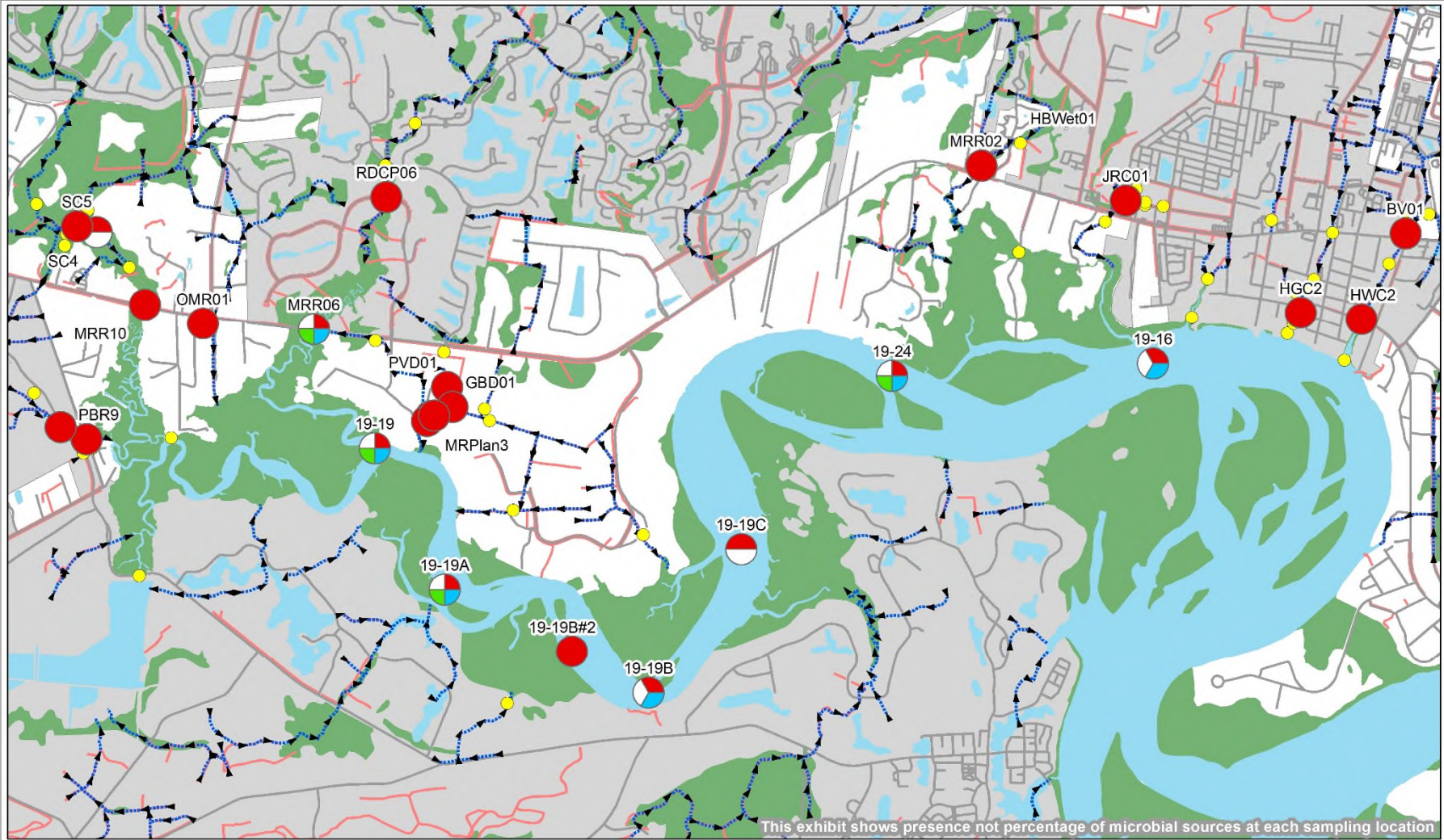


	USCB Water Quality Samples	Microbial Source Tracking Samples	MS4 Quarterly Samples Collected
FY 2019 YTD Totals	280	187	264
FY 2018 Totals	216	217	224
FY 2017 Totals	307	179	224
FY 2016 Totals	668	11	-

6/19/2019

- MST program began November 2016; MS4 Quarterly Sampling initiated 2/2017
- Totals include only samples submitted for laboratory analysis, and not *in situ* parameters.

MS4 Minimum Control Measure #3 – IDDE: Microbial Source Tracking (MST) All Sources Trend Map



This exhibit shows presence not percentage of microbial sources at each sampling location

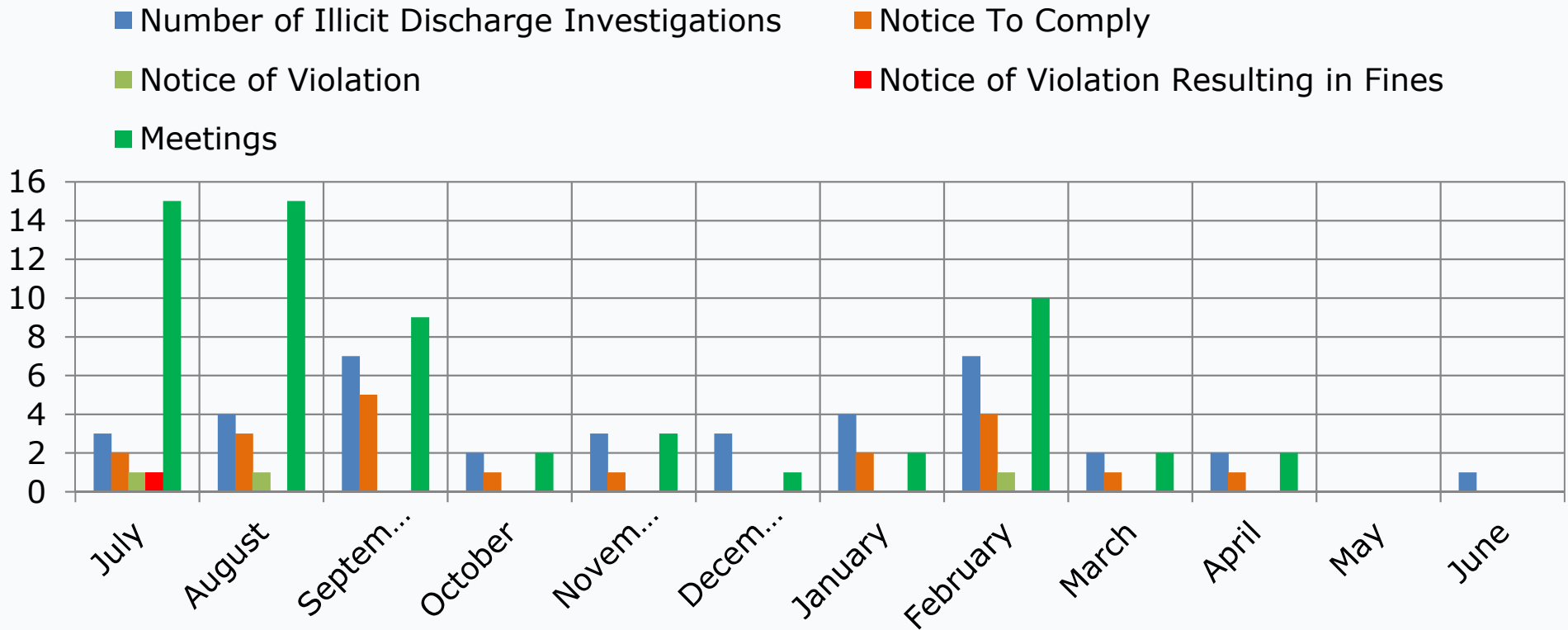
- Microbial Sources
- Human
- Bird
- Deer
- Dog
- MST Sampling Location Without Detection
- Flowline
- Drainage Ditch
- Street
- Town Jurisdiction

Microbial Sources Detected Within the May River
2017 - 2019
 Town of Bluffton
 Beaufort County, SC

DISCLAIMER:
 This map was prepared by the Town of Bluffton for informational purposes only. It is not intended to be used as a legal document. The Town of Bluffton is not responsible for any errors or omissions in this map. The Town of Bluffton is not responsible for any damages or losses resulting from the use of this map. The Town of Bluffton is not responsible for any actions taken based on the information provided in this map.



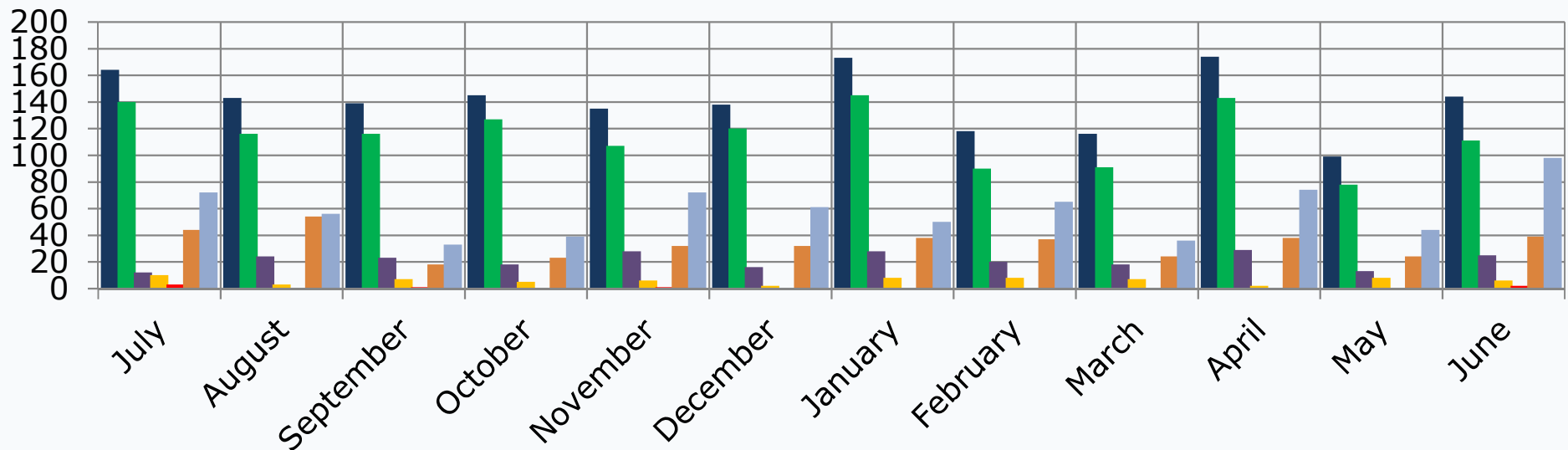
MS4 Minimum Control Measure #3 – IDDE: Illicit Discharge Investigations



	Number of Illicit Discharge Investigations	Number of Notices To Comply Issued	Number of Notices of Violation Issued	Number of NOV Enforcement Actions	Number of Meetings
FY 2019 YTD Totals	38	20	3	1	61
FY 2018 Totals	48	20	4	2	60
FY 2017 Totals	50	19	8	13	67

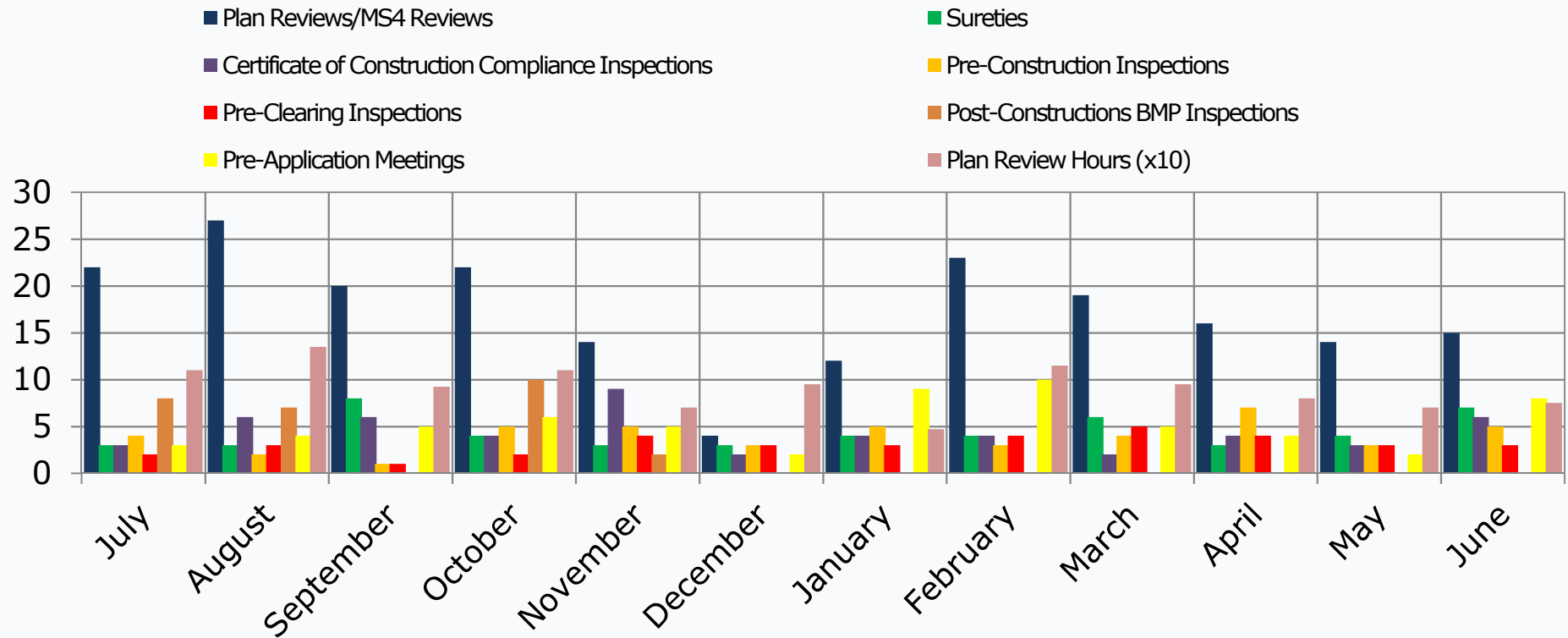
MS4 Minimum Control Measure #4 - Construction Site Stormwater Runoff Control

- Erosion & Sediment Control Inspections (E&SC)
- Number of Inspections Passed
- Number of Notice To Comply (NTC)
- Number of Notice of Violation (NOV)
- Number of Fines for Notice of Violation
- Number of Erosion & Sediment Control Meetings



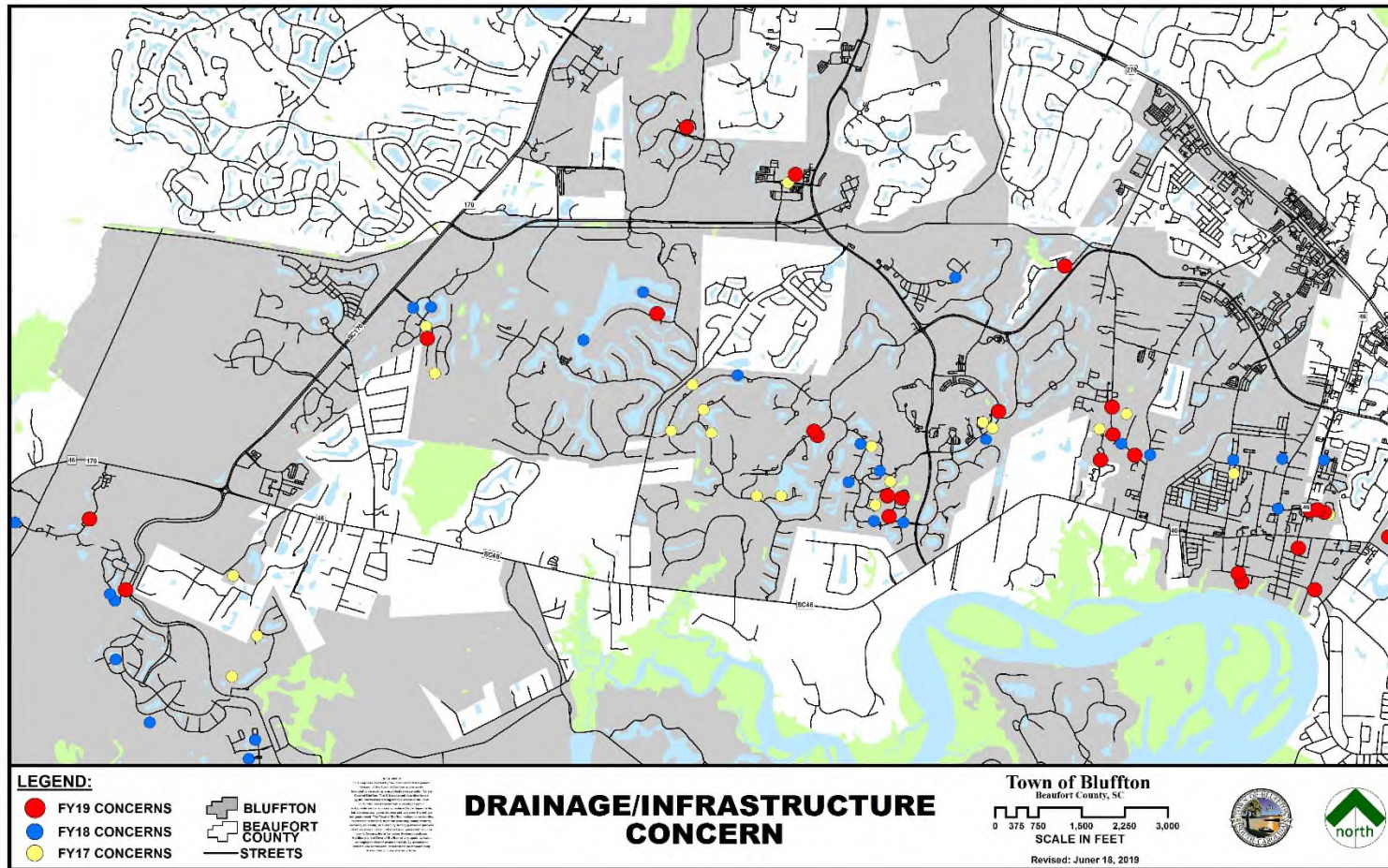
	Number of Sediment & Erosion Control Inspections	Number of Inspections Passed	Number of NTC Issued	Number of NOVs Issued	Number of NOV Enforcement Actions	Number of E&SC Meetings
FY 2019 YTD Totals	1688	1384	254	72	7	403
FY 2018 Totals	1504	1159	300	83	10	499
FY 2017 Totals	1,219	862	233	58	10	237

MS4 Minimum Control Measure #5 Stormwater Plan Review & Related Activity



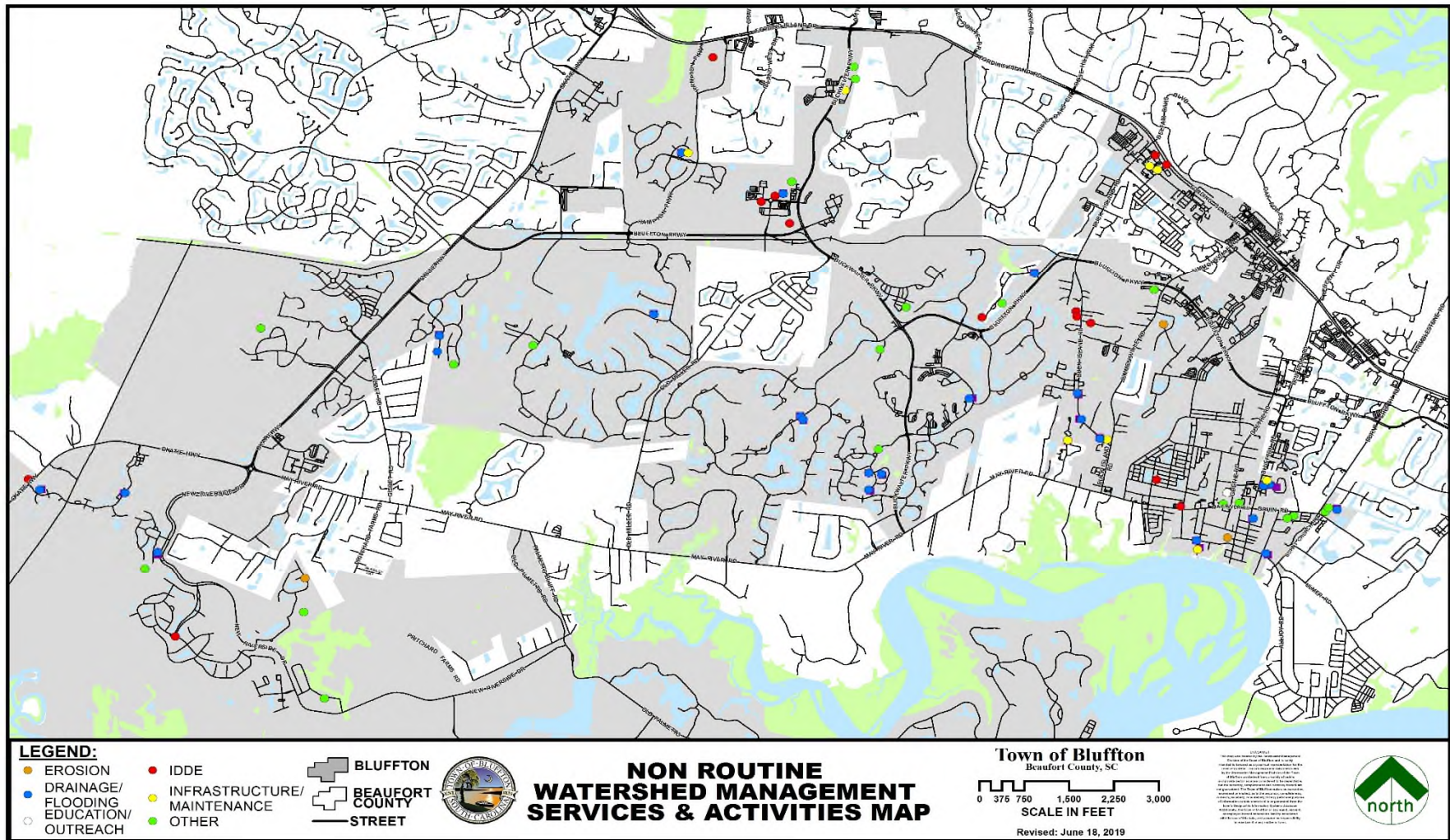
	Plan Reviews MS4 Reviews	Sureties	Certificate of Construction Compliance Inspections	Pre-Construction Meetings	Pre-Clearing Inspections	Post Construction BMP Inspections	Pre-Application Meetings	Total Plan Review Hours
FY 2019 YTD Totals	208	52	53	47	37	27	63	1,040 Hrs.
FY 2018 Totals	242	59	50	32	32	88	88	1,210 Hrs.
FY 2017 Totals	253	62	96	47	45	7	23	1,265 Hrs.

Citizen Drainage Concern Heat Map (Drainage, Maintenance and Inspections)



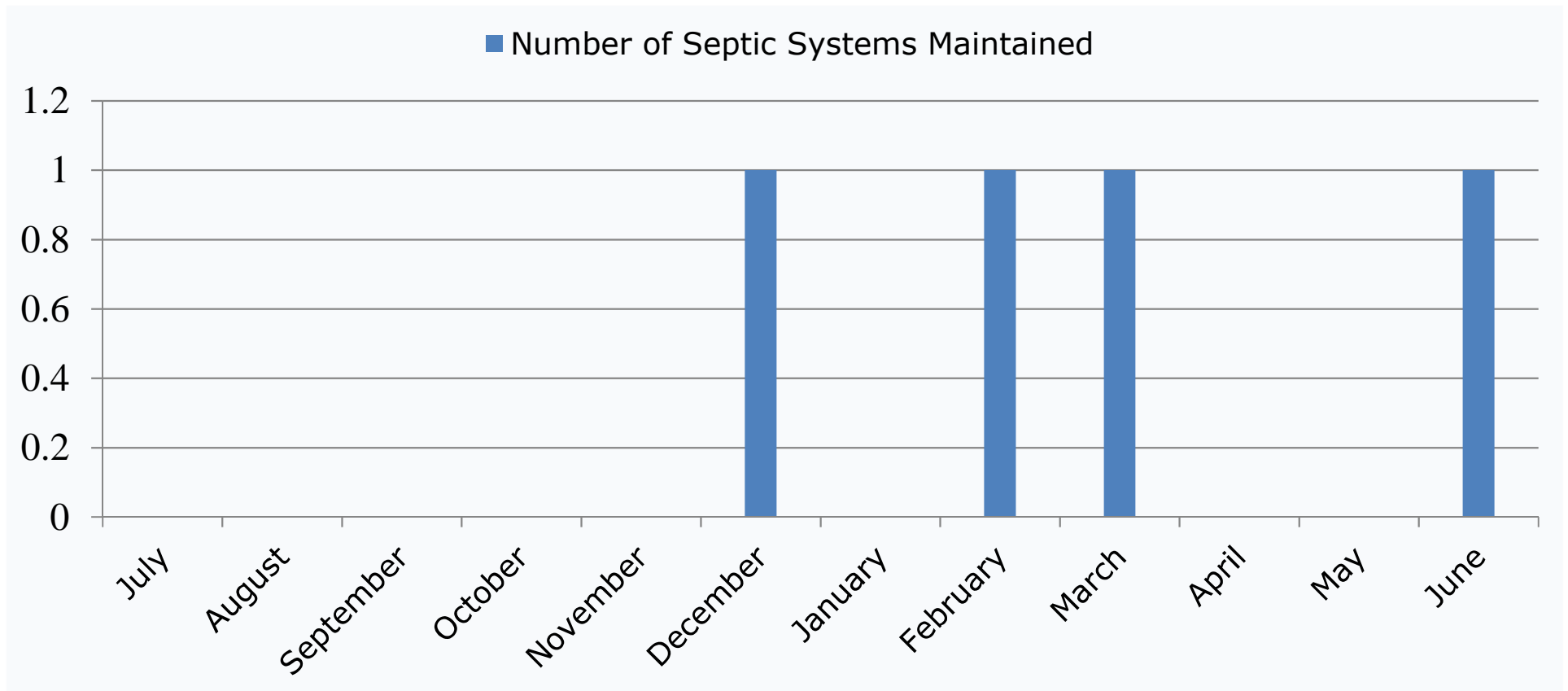
	Number of Drainage Concerns Investigated	Number of Meetings
FY 2019 YTD Totals	54	59
FY 2018 Totals	48	75
FY 2017 Totals	72	80

Citizen Request for Watershed Mngt. Services & Activities Map



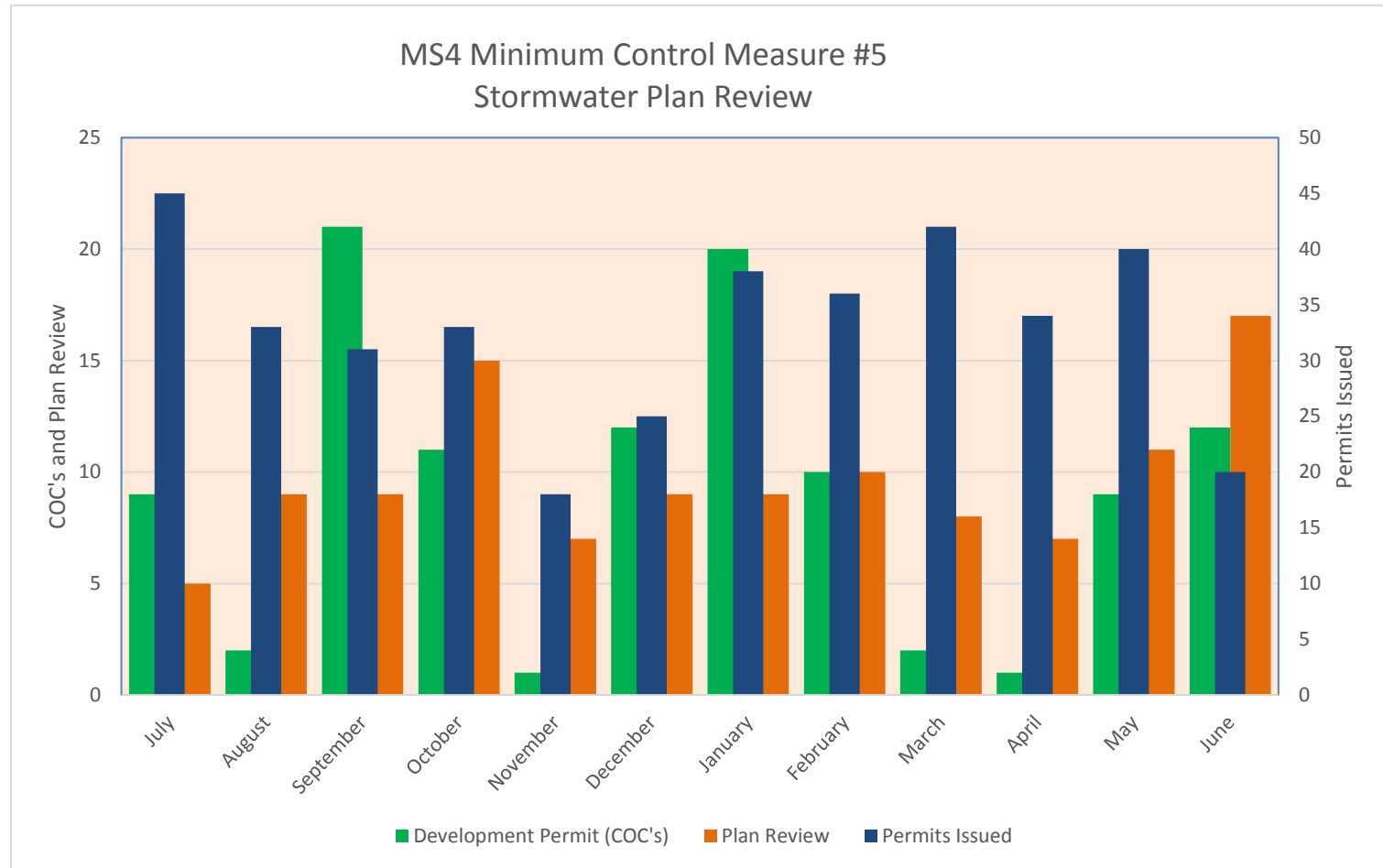
	Number of Citizen Requests Investigated	Number of Meetings
FY 2019 YTD Totals	49	52
FY 2018 Totals	75	79
FY 2017 Totals	53	82

Septic System Maintenance Assistance



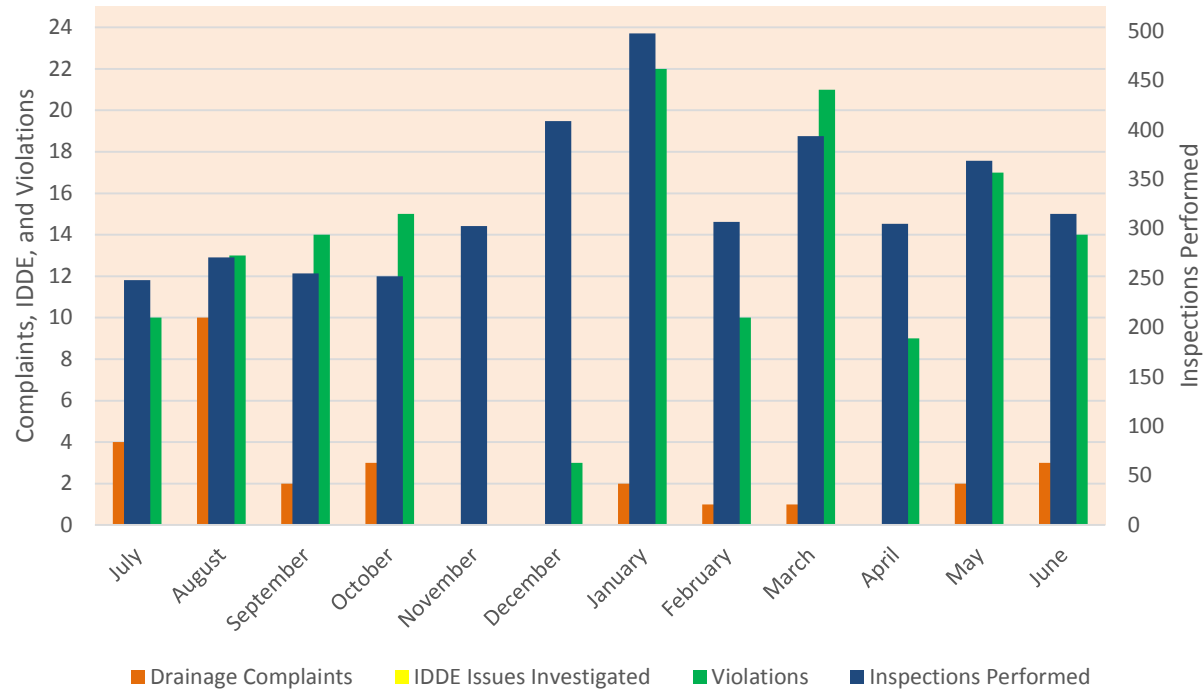
	Number of Septic Systems Maintained
FY 2019 YTD Totals	4
FY 2018 Totals	16
FY 2017 Totals	18

MS4 Minimum Control Measure #5 Stormwater Plan Review



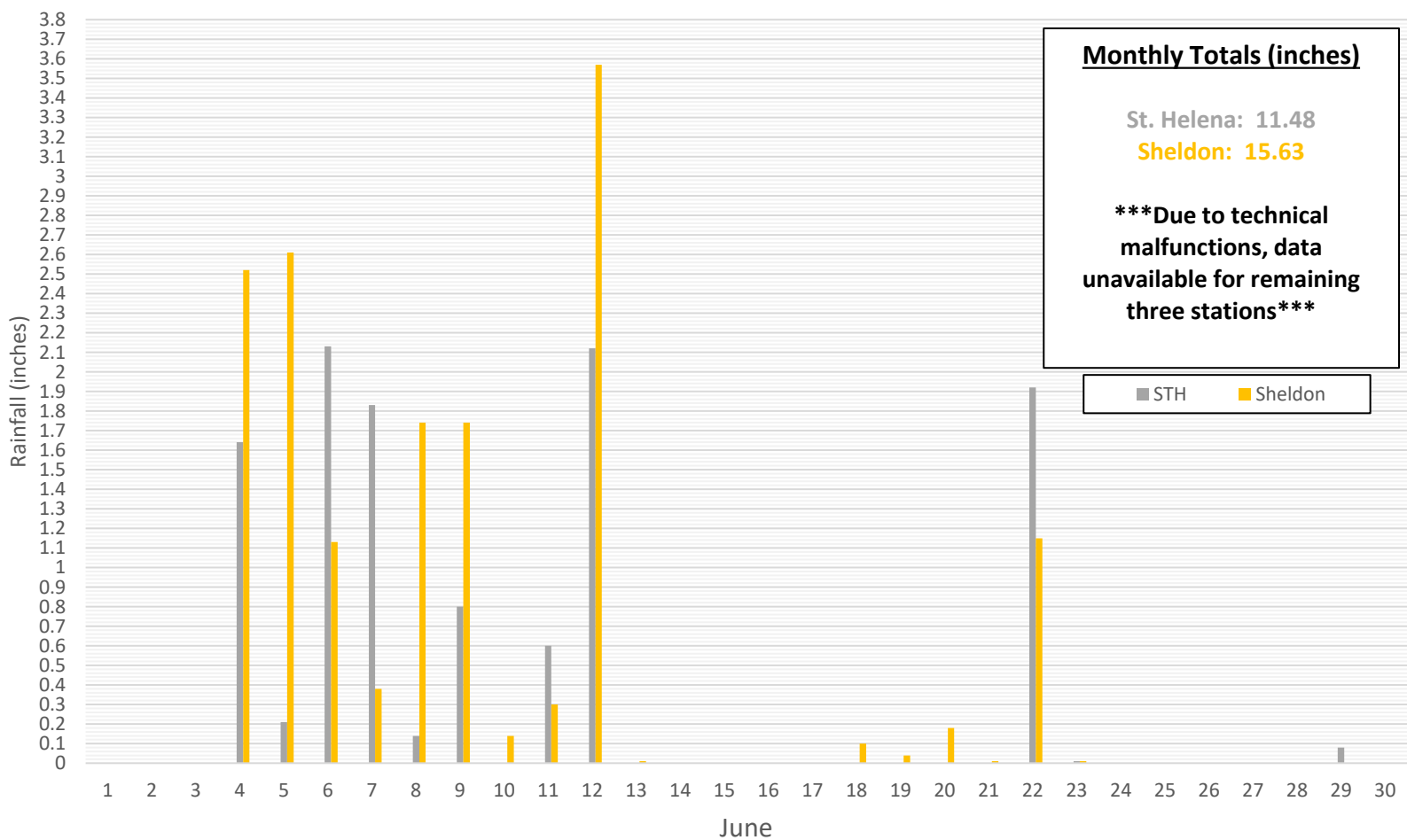
TYPE	July	August	September	October	November	December	January	February	March	April	May	June	Last 12 Months
Development Permit (COC's)	9	2	21	11	1	12	20	10	2	1	9	12	44
Plan Review	5	9	9	15	7	9	9	10	8	7	11	17	81
Permits Issued	45	33	31	33	18	25	38	36	42	34	40	20	160

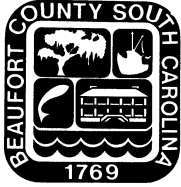
MS4 Minimum Control Measure #4 Erosion Sediment Control Inspections



TYPE	July	August	September	October	November	December	January	February	March	April	May	June	Last 12 Months
Inspections Performed	248	271	255	252	303	409	498	307	394	305	369	315	3926
Drainage Complaints	4	10	2	3	0	0	2	1	1	0	2	3	19
IDDE Issues Investigated	1	2	1	2	0	1	0	1	0	1	2	3	14
Violations	10	13	14	15	0	3	22	10	21	9	17	14	52

Beaufort County Weather Stations Daily Rainfall Amounts - June 2019





MEMORANDUM

Date: July 10, 2019

To: Stormwater Management Utility Board

From: David Wilhelm, P. E., Public Works Director

Re: **Maintenance Project Report**

This report will cover four major projects and nine minor projects. The Project Summary Reports are attached.

Major Project:

- **Dogwood Street/Magnolia Street – Port Royal Island (SWUD 6):** This project improved 2,898 feet of drainage system. The scope of work included grubbing and clearing 925 feet of workshelf, cleaning out 2,273 feet of channel, installing 3 access pipes, 1 access gate, jetting 3 crossline pipes and 2 driveway pipes. The total cost was **\$30,445.92.**
- **Old Distant Island Road – Lady’s Island (SWUD 7):** This project improved 514 feet of drainage system. The scope of work included grubbing and clearing 240 feet of workshelf, cleaning out 240 feet of channel, upsizing 1 crossline pipe, installing 1 access pipe, 244 feet of roadside pipe, rip rap and hydroseeding for erosion control. The total cost was **\$26,622.99.**
- **Mitchell Road – Sheldon (SWUD 5):** This project improved 4,199 feet of drainage system. The scope of work included grubbing and clearing 20 feet of workshelf, cleaning out 3,429 feet of channel, 750 feet of roadside ditch, jetting 2 crossline pipes, 1 driveway pipe, replacing 1 crossline pipe and installing rip rap for erosion control. The total cost was **\$24,283.90.**
- **Chesterfield Subdivision – Port Royal Island (SWUD 6):** This project improved 5,067 feet of drainage system. The scope of work included cleaning out 4,735 feet of roadside ditch, 2 catch basins, jetting 39 driveway pipes, 2 crossline pipes, 332 feet of roadside pipe and hydroseeding for erosion control. The total cost was **\$21,354.01.**

Minor or Routine Projects:

- **Hummingbird Lane – Bluffton (SWUD 4):** This project improved 3,379 feet of drainage system. The scope of work included cleaning out 3,379 feet of roadside ditch and hydroseeding for erosion control. The total cost was **\$14,890.06.**
- **Varsity Street/Alumni Road – Lady’s Island (SWUD 7):** This project improved 3,625 feet drainage system. The scope of work included cleaning out 3,625 feet of roadside ditch, jetting 21 driveway pipes, 4 crossline pipes, 1 access pipe and handseeding for erosion control. The total cost was **\$14,748.66.**

- **Bellinger Bluff Road Channel – Bluffton (SWUD 4):** This project improved 810 feet of drainage system. The scope of work included grubbing and clearing 200 feet workshelf, constructing 10 feet of swale, 400 feet of channel, reconstructing 200 feet of channel, installing 1 access pipe and rip rap for erosion control. The total cost was **\$12,852.86.**
- **Katie Miller/Ceasar Place – Hilton Head (SWUD 3):** This project improved 2,915 feet of drainage system. The scope of work included cleaning out 2,915 feet of roadside ditch and hydroseeding for erosion control. The total cost was **\$12,660.91.**
- **Pinewood Circle – Port Royal Island (SWUD 6):** This project improved 2,562 feet of drainage system. The scope of work included cleaning out 2,562 feet of roadside ditch, jetting 48 driveway pipes, 2 crossline pipes and handseeding for erosion control. The total cost was **\$8,897.31.**
- **Alljoy Area – Bluffton (SWUD 4):** This project improved 561 feet of drainage system. The scope of work included cleaning out 461 feet of roadside ditch, jetting 100 feet of channel pipe and 2 crossline pipes. The total cost was **\$6,049.35.**
- **Smith Road – Port Royal Island (SWUD 6):** This project improved 2,040 feet of drainage system. The scope of work included cleaning out 1,735 feet of channel and 305 feet of roadside ditch, jetting 5 driveway pipes and 2 crossline pipes. The total cost was **\$4,940.30.**
- **Huron Drive – Port Royal Island (SWUD 6):** This project improved 182 feet of drainage system. The scope of work included cleaning out 182 feet of roadside ditch, installing 1 catch basin, repairing a washout and hydroseeding for erosion control. The total cost was **\$4,272.21.**
- **Burton Wells Road/Middleton Recreation Dr – Port Royal Island (SWUD 8):** This project improved 510 feet of drainage system. The scope of work included cleaning out 510 feet of roadside ditch. The total cost was **\$1,417.76.**



Beaufort County Public Works
Stormwater Infrastructure
Project Summary

Project Summary: Dogwood Street, Magnolia Street
 Baynard Street and Morning Mist Drive

Activity: Routine/Preventive Maintenance

Duration: 10/16/17-02/18/18

Narrative Description of Project:

Project improved 2,898 L.F. of drainage system. Grubbed and cleared 925 L.F. workshelf. Cleaned out 2,273 L.F. of channel. Installed (3) access pipes and (1) access gate. Handseeded for erosion control. Jetted (3) crossline pipes and (2) driveway pipes.

2018-528 / Dogwood Street and Magnolia Street	Labor Hours	Labor Cost	Equipment Cost	Material Cost	Contractor Cost	Indirect Labor	Total Cost
AGI / Access Gate - Installed	10.0	\$201.60	\$9.00	\$118.59	\$0.00	\$94.13	\$423.32
APINS / Access pipe - installed	40.0	\$846.50	\$346.63	\$213.78	\$0.00	\$390.90	\$1,797.81
AUDIT / Audit Project	2.0	\$43.58	\$0.00	\$0.00	\$0.00	\$0.00	\$43.58
CCO / Channel - cleaned out	149.0	\$3,295.22	\$818.10	\$153.99	\$0.00	\$1,563.46	\$5,830.77
CLPJT / Crossline Pipe - Jetted	14.0	\$311.92	\$60.76	\$55.60	\$0.00	\$200.76	\$629.04
DEBREM / Debris Removal - Jobsite	56.0	\$1,166.31	\$538.70	\$127.09	\$0.00	\$730.20	\$2,562.30
DPJT / Driveway Pipe - Jetted	4.0	\$89.12	\$17.36	\$20.04	\$0.00	\$57.36	\$183.88
HAUL / Hauling	162.5	\$3,411.35	\$1,530.75	\$2,298.38	\$0.00	\$1,160.81	\$8,401.28
PL / Project Layout	36.0	\$767.84	\$86.00	\$20.37	\$0.00	\$461.70	\$1,335.91
WSDR / Workshelf - Dressed	40.0	\$878.00	\$194.66	\$61.45	\$0.00	\$418.35	\$1,552.46
WSGRB / Workshelf - Grubbed	198.0	\$4,167.88	\$1,117.18	\$426.21	\$0.00	\$1,974.30	\$7,685.57
2018-528 / Dogwood Street and Magnolia Street Sub Total	711.5	\$15,179.32	\$4,719.14	\$3,495.50	\$0.00	\$7,051.97	\$30,445.92
Grand Total	711.5	\$15,179.32	\$4,719.14	\$3,495.50	\$0.00	\$7,051.97	\$30,445.92

Before



During



After





Project: Dogwood Street, Magnolia Street, Baynard Road and Morning Mist Drive Map #1

Activity: Routine/ Preventive Maintenance

Project #: 2018-528

Township/SW Dist: Port Royal Island/6

Completed: February 2018

Legend

Drainage Type

- Access Pipe
- Bleeder Pipe
- Channel Pipe
- Channel
- Stream
- Crossline Pipe
- Driveway Pipe
- Lateral
- Lateral Pipe
- River
- Road Pipe
- Roadside
- Roadside Pipe



1 inch = 83 feet

Prepared By: BC Stormwater Management Utility

Date Print: 04/09/19

File: C:\project summaries map\Dogwood Street and Magnolia Street_2018-528



Project: Dogwood Street, Magnolia Street, Baynard Road and Morning Mist Drive Map #2

Activity: Routine/ Preventive Maintenance














Project #: 2018-528

Township/SW Dist: Port Royal Island/6

Completed: February 2018

Legend

Drainage Type

-  Access Pipe
-  Bleeder Pipe
-  Channel Pipe
-  Channel
-  Stream
-  Crossline Pipe
-  Driveway Pipe
-  Lateral
-  Lateral Pipe
-  River
-  Road Pipe
-  Roadside
-  Roadside Pipe

0 40 80 160 240 320 Feet

1 inch = 170 feet

Prepared By: BC Stormwater Management Utility

Date Print: 04/09/19

File: C:\project summaries map\Dogwood Street and Magnolia Street Map #2_2018-528



Project: Dogwood Street, Magnolia Street, Baynard Road and Morning Mist Drive Map #3

Activity: Routine/ Preventive Maintenance














Project #: 2018-528

Township/SW Dist: Port Royal Island/6

Completed: February 2018

Legend

Drainage Type

-  Access Pipe
-  Bleeder Pipe
-  Channel Pipe
-  Channel
-  Stream
-  Crossline Pipe
-  Driveway Pipe
-  Lateral
-  Lateral Pipe
-  River
-  Road Pipe
-  Roadside
-  Roadside Pipe

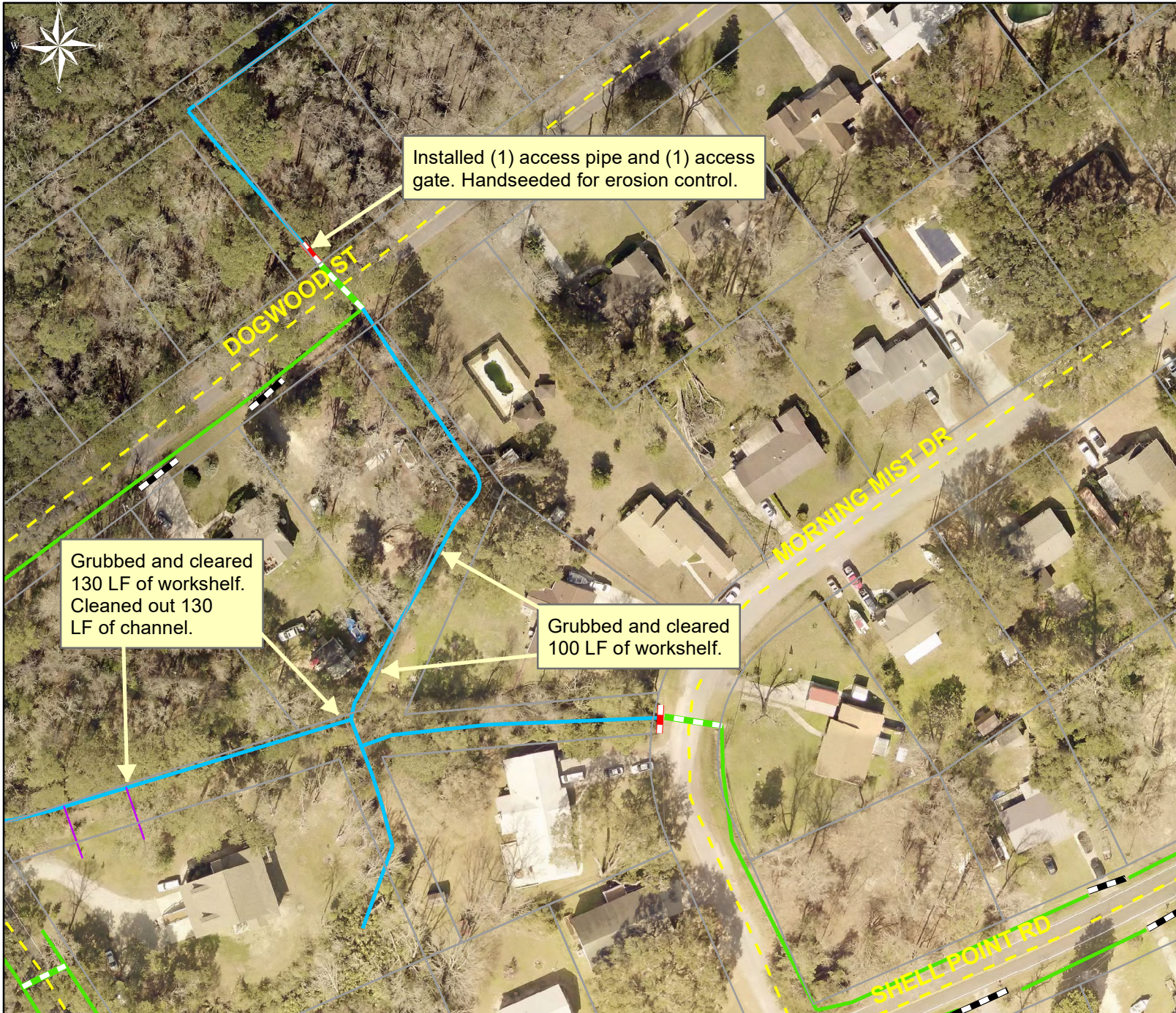


1 inch = 210 feet

Prepared By: BC Stormwater Management Utility

Date Print: 04/09/19

File: C:\project summaries map\Dogwood Street and Magnolia Street Map #3_2018-528



Project: Dogwood Street, Magnolia Street, Baynard Road and Morning Mist Drive Map #4

Activity: Routine/ Preventive Maintenance

Project #: 2018-528

Township/SW Dist: Port Royal Island/6

Completed: February 2018

Legend

Drainage Type

- Access Pipe
- Bleeder Pipe
- Channel Pipe
- Channel
- Stream
- Crossline Pipe
- Driveway Pipe
- Lateral
- Lateral Pipe
- River
- Road Pipe
- Roadside
- Roadside Pipe

0 25 50 100 150 200 Feet

1 inch = 100 feet

Prepared By: BC Stormwater Management Utility

Date Print: 04/09/19

File: C:\project summaries map\Dogwood Street and Magnolia Street Map #4_2018-528



Beaufort County Public Works
Stormwater Infrastructure
Project Summary

Project Summary: Old Distant Island Road

Activity: Drainage Improvement

Duration: 02/27/19-04/03/19

Narrative Description of Project:

Project improved 514 L.F. of drainage system. Grubbed and cleared 240 L.F. of workshelf. Cleaned out 240 L.F. of channel. Upsized (1) crossline pipe. Installed (1) access pipe, 244 L.F. of roadside pipe, rip rap and hydroseeded for erosion control.

2019-552 / Old Distant Island Road

	Labor Hours	Labor Cost	Equipment Cost	Material Cost	Contractor Cost	Indirect Labor	Total Cost
APINS / Access pipe - installed	40.0	\$837.70	\$95.57	\$353.52	\$0.00	\$386.70	\$1,673.49
AUDIT / Audit Project	1.5	\$32.69	\$0.00	\$0.00	\$0.00	\$0.00	\$32.69
CCO / Channel - cleaned out	30.0	\$619.80	\$277.12	\$908.17	\$0.00	\$386.70	\$2,191.79
CPUP / Crossline Pipe - Upsized	98.0	\$2,309.88	\$434.59	\$1,313.31	\$0.00	\$1,139.48	\$5,197.26
HAUL / Hauling	166.5	\$4,274.66	\$2,357.64	\$2,234.08	\$0.00	\$1,506.33	\$10,372.71
RSPI / Roadside Pipe - Installed	55.0	\$1,141.70	\$211.11	\$1,497.27	\$0.00	\$575.80	\$3,425.88
UTLOC / Utility locates	1.0	\$21.79	\$0.00	\$0.00	\$0.00	\$0.00	\$21.79
WSGRB / Workshelf - Grubbed	84.0	\$1,727.16	\$779.64	\$195.17	\$0.00	\$1,005.42	\$3,707.39
2019-552 / Old Distant Island Road Sub Total	476.0	\$10,965.37	\$4,155.67	\$6,501.52	\$0.00	\$5,000.43	\$26,622.99
Grand Total	476.0	\$10,965.37	\$4,155.67	\$6,501.52	\$0.00	\$5,000.43	\$26,622.99

Before



During



After



Project: Old Distant
Island Road
Map #2

Activity: Drainage
Improvement

Project #:
2019-552

Township/SW Dist:
Lady's Island/7

Completed:
April 2019



Legend	
Drainage Type	
	Access Pipe
	Bleeder Pipe
	Channel Pipe
	Channel
	Stream
	Crossline Pipe
	Driveway Pipe
	Lateral
	Lateral Pipe
	River
	Road Pipe
	Roadside
	Roadside Pipe



1 inch = 170 feet

Prepared By: BC Stormwater Management Utility
Date Print: 05/07/19
File: C:\project summaries map\Old Distant Island Road Map #2_2019-552

Project: Old Distant Island Road
Map #1

Activity: Drainage Improvement

Project #:
2019-552

Township/SW Dist:
Lady's Island/7

Completed:
April 2019



Legend	
Drainage Type	
	Access Pipe
	Bleeder Pipe
	Channel Pipe
	Channel
	Stream
	Crossline Pipe
	Driveway Pipe
	Lateral
	Lateral Pipe
	River
	Road Pipe
	Roadside
	Roadside Pipe



1 inch = 170 feet

Prepared By: BC Stormwater Management Utility
Date Print:05/07/19
File:C:\project summaries map\Old Distant Island Road Map #1_2019-552



Beaufort County Public Works
Stormwater Infrastructure
Project Summary

Project Summary: Mitchell Road

Activity: Routine/Preventive Maintenance

Duration: 02/22/18-04/17/19

Narrative Description of Project:

Project improved 4,199 L.F. of drainage system. Grubbed and cleared 20 L.F. of workshelf. Cleaned out 3,429 L.F. of channel and 750 L.F. of roadside ditch. Jetted (2) crossline pipes and (1) driveway pipe. Replaced (1) crossline pipe. Installed rip rap for erosion control.

2018-538 / Mitchell Road

	Labor Hours	Labor Cost	Equipment Cost	Material Cost	Contractor Cost	Indirect Labor	Total Cost
AUDIT / Audit Project	1.5	\$32.69	\$0.00	\$0.00	\$0.00	\$0.00	\$32.69
CCO / Channel - cleaned out	194.0	\$4,333.84	\$1,246.85	\$203.88	\$0.00	\$2,786.94	\$8,571.51
CLPJT / Crossline Pipe - Jetted	8.0	\$178.24	\$34.72	\$24.81	\$0.00	\$114.72	\$352.49
CPRPL / Crossline Pipe - Replaced	50.0	\$1,041.00	\$261.85	\$1,031.45	\$0.00	\$651.30	\$2,985.60
HAUL / Hauling	126.0	\$2,798.42	\$1,405.20	\$1,582.89	\$0.00	\$1,497.42	\$7,283.93
PRRECON / Project Reconnaissance	18.0	\$412.62	\$80.21	\$81.11	\$0.00	\$159.78	\$733.72
RSDCL / Roadside Ditch - Cleanout	24.0	\$534.64	\$143.32	\$20.97	\$0.00	\$343.44	\$1,042.37
STAGING / Staging Materials/Equipment	15.0	\$309.90	\$96.37	\$25.63	\$0.00	\$193.35	\$625.25
UTLOC / Utility locates	1.0	\$24.70	\$0.00	\$0.00	\$0.00	\$13.23	\$37.93
WSDR / Workshelf - Dressed	40.0	\$830.40	\$106.74	\$55.92	\$0.00	\$519.00	\$1,512.06
WSGRB / Workshelf - Grubbed	25.0	\$559.40	\$115.20	\$104.21	\$0.00	\$327.55	\$1,106.36
2018-538 / Mitchell Road Sub Total	502.5	\$11,055.85	\$3,490.46	\$3,130.86	\$0.00	\$6,606.73	\$24,283.90
Grand Total	502.5	\$11,055.85	\$3,490.46	\$3,130.86	\$0.00	\$6,606.73	\$24,283.90

Before



During



After

(No Picture Available)



Project: Mitchell Road Map #1

Activity: Routine/ Preventive Maintenance














Project #: 2018-538

Township/SW Dist: Sheldon/5

Completed: April 2019

Legend

Drainage Type

-  Access Pipe
-  Bleeder Pipe
-  Channel Pipe
-  Channel
-  Stream
-  Crossline Pipe
-  Driveway Pipe
-  Lateral
-  Lateral Pipe
-  River
-  Road Pipe
-  Roadside
-  Roadside Pipe



1 inch = 330 feet

Prepared By: BC Stormwater Management Utility

Date Print: 06/05/19

File: C:\project summaries map\Mitchell Road Map #1_2018-538



Project: Mitchell Road Map #2

Activity: Routine/ Preventive Maintenance

Project #: 2018-538

Township/SW Dist: Sheldon/5

Completed: April 2019

Legend

Drainage Type

- Access Pipe
- Bleeder Pipe
- Channel Pipe
- Channel
- Stream
- Crossline Pipe
- Driveway Pipe
- Lateral
- Lateral Pipe
- River
- Road Pipe
- Roadside
- Roadside Pipe



1 inch = 170 feet

Prepared By: BC Stormwater Management Utility

Date Print: 06/05/19

File: C:\project summaries map\Mitchell Road Map #2_2018-538

Project: Mitchell Road Map #3

Activity: Routine/ Preventive Maintenance

Project #: 2018-538

Township/SW Dist: Sheldon/5

Completed: April 2019



Legend	
Drainage Type	
	Access Pipe
	Bleeder Pipe
	Channel Pipe
	Channel
	Stream
	Crossline Pipe
	Driveway Pipe
	Lateral
	Lateral Pipe
	River
	Road Pipe
	Roadside
	Roadside Pipe

0 50 100 200 300 400 Feet

1 inch = 210 feet

Prepared By: BC Stormwater Management Utility
Date Print:06/05/19
File:C:\project summaries map\Mitchell Road Map #3_2018-538



Project: Mitchell Road Map #4

Activity: Routine/ Preventive Maintenance

Project #: 2018-538

Township/SW Dist: Sheldon/5

Completed: April 2019

Legend

Drainage Type

- Access Pipe
- Bleeder Pipe
- Channel Pipe
- Channel
- Stream
- Crossline Pipe
- Driveway Pipe
- Lateral
- Lateral Pipe
- River
- Road Pipe
- Roadside
- Roadside Pipe



1 inch = 210 feet

Prepared By: BC Stormwater Management Utility

Date Print:06/05/19

File:C:\project summaries map\Mitchell Road Map #4_2018-538



Beaufort County Public Works
Stormwater Infrastructure
Project Summary

Project Summary: Chersterfield Subdivision-
 Chesterfield Lake Drive and Chesterfield Drive

Activity: Routine/Preventive Maintenance

Duration: 01/08/19-02/07/19

Narrative Description of Project:

Project improved 5,067 L.F. of drainage system. Cleaned out 4,735 L.F. of roadside ditch and (2) catch basins. Jetted (39) driveway pipes, (2) crossline pipes and 332 L.F. of roadside pipe. Hydroseeded for erosion control.

2019-543 / Chesterfield Drive Subdivision

	Labor Hours	Labor Cost	Equipment Cost	Material Cost	Contractor Cost	Indirect Labor	Total Cost
AUDIT / Audit Project	1.5	\$32.69	\$0.00	\$0.00	\$0.00	\$0.00	\$32.69
CBCO / Catch basin - clean out	12.0	\$267.36	\$229.92	\$29.90	\$0.00	\$172.08	\$699.26
CLPJT / Crossline Pipe - Jetted	6.0	\$133.68	\$114.96	\$31.80	\$0.00	\$86.04	\$366.48
DPJT / Driveway Pipe - Jetted	76.0	\$1,693.28	\$1,456.16	\$282.78	\$0.00	\$1,089.84	\$4,522.06
HAUL / Hauling	90.5	\$1,998.32	\$1,142.04	\$399.13	\$0.00	\$1,217.50	\$4,756.99
HYDR / Hydroseeding	13.0	\$292.03	\$95.25	\$1,584.38	\$0.00	\$188.19	\$2,159.85
RSDCL / Roadside Ditch - Cleanout	205.0	\$4,506.05	\$1,117.85	\$293.68	\$0.00	\$2,880.15	\$8,797.73
UTLOC / Utility locates	0.5	\$12.35	\$0.00	\$0.00	\$0.00	\$6.62	\$18.97
2019-543 / Chesterfield Drive Subdivision Sub Total	404.5	\$8,935.75	\$4,156.18	\$2,621.67	\$0.00	\$5,640.41	\$21,354.01
Grand Total	404.5	\$8,935.75	\$4,156.18	\$2,621.67	\$0.00	\$5,640.41	\$21,354.01

Before



During



After





Project:
 Chesterfield
 Subdivision -
 Chesterfield
 Drive Map #1

Activity: Routine/
 Preventive
 Maintenance














Project #:
 2019-543

Township/SW Dist:
 Port Royal Island/6

Completed:
 February 2019

Legend

Drainage Type

-  Access Pipe
-  Bleeder Pipe
-  Channel Pipe
-  Channel
-  Stream
-  Crossline Pipe
-  Driveway Pipe
-  Lateral
-  Lateral Pipe
-  River
-  Road Pipe
-  Roadside
-  Roadside Pipe



1 inch = 170 feet

Prepared By: BC Stormwater Management Utility

Date Print: 06/13/19

File: C:\es project summaries map\Chesterfield S/D- Chesterfield Drive Map #1_2019-543

Project:
 Chesterfield
 Subdivision -
 Chesterfield Lake
 Drive Map #2

Activity: Routine/
 Preventive
 Maintenance

Project #:
 2019-543

Township/SW Dist:
 Port Royal Island/6

Completed:
 February 2019



Legend

Drainage Type

- Access Pipe
- Bleeder Pipe
- Channel Pipe
- Channel
- Stream
- Crossline Pipe
- Driveway Pipe
- Lateral
- Lateral Pipe
- River
- Road Pipe
- Roadside
- Roadside Pipe

Cleaned out 670 LF of roadside ditch and (1) catch basin. Jetted 232 LF of roadside pipe.



1 inch = 210 feet

Prepared By: BC Stormwater Management Utility
 Date Print: 06/13/19

File: C:\es project summaries map\Chesterfield S/D- Chesterfield Lake Drive Map #2_2019-543



Project:
 Chesterfield
 Subdivision -
 Chesterfield Lake
 Drive Map #3

Activity: Routine/
 Preventive
 Maintenance

Project #:
 2019-543

Township/SW Dist:
 Port Royal Island/6

Completed:
 February 2019

Legend	
Drainage Type	
	Access Pipe
	Bleeder Pipe
	Channel Pipe
	Channel
	Stream
	Crossline Pipe
	Driveway Pipe
	Lateral
	Lateral Pipe
	River
	Road Pipe
	Roadside
	Roadside Pipe



1 inch = 130 feet



Project:
 Chesterfield
 Subdivision -
 Chesterfield
 Drive Map #4

Activity: Routine/
 Preventive
 Maintenance

Project #:
 2019-543

Township/SW Dist:
 Port Royal Island/6

Completed:
 February 2019

Legend

Drainage Type

- Access Pipe
- Bleeder Pipe
- Channel Pipe
- Channel
- Stream
- Crossline Pipe
- Driveway Pipe
- Lateral
- Lateral Pipe
- River
- Road Pipe
- Roadside
- Roadside Pipe



1 inch = 170 feet



Project:
 Chesterfield
 Subdivision -
 Chesterfield Lake
 Drive Map #5

Activity: Routine/
 Preventive
 Maintenance

Project #:
 2019-543

Township/SW Dist:
 Port Royal Island/6

Completed:
 February 2019

Legend	
Drainage Type	
	Access Pipe
	Bleeder Pipe
	Channel Pipe
	Channel
	Stream
	Crossline Pipe
	Driveway Pipe
	Lateral
	Lateral Pipe
	River
	Road Pipe
	Roadside
	Roadside Pipe



1 inch = 170 feet

Prepared By: BC Stormwater Management Utility

Date Print: 06/13/19

File: C:\es project summaries map\Chesterfield S/D- Chesterfield Lake Drive Map #5_2019-543



Project:
 Chesterfield
 Subdivision -
 Chesterfield Lake
 Drive Map #6

Activity: Routine/
 Preventive
 Maintenance














Project #:
 2019-543

Township/SW Dist:
 Port Royal Island/6

Completed:
 February 2019

Legend

Drainage Type

-  Access Pipe
-  Bleeder Pipe
-  Channel Pipe
-  Channel
-  Stream
-  Crossline Pipe
-  Driveway Pipe
-  Lateral
-  Lateral Pipe
-  River
-  Road Pipe
-  Roadside
-  Roadside Pipe

0 25 50 100 150 200
 Feet

1 inch = 100 feet

Prepared By: BC Stormwater Management Utility

Date Print: 06/13/19

File: C:\es project summaries map\Chesterfield S/D- Chesterfield Lake Drive Map #6_2019-543



Beaufort County Public Works
Stormwater Infrastructure
Project Summary

Project Summary: Hummingbird Lane, Oriole Lane and Cardinal Lane

Activity: Routine/Preventive Maintenance

Duration: 02/06/18-04/15/19

Narrative Description of Project:

Project improved 3,379 L.F. of drainage system. Cleaned out 3,379 L.F. of roadside ditch. Hydroseeded for erosion control.

2019-548 / Hummingbird Ln, Cardinal Ln and Oriole Ln

	Labor Hours	Labor Cost	Equipment Cost	Material Cost	Contractor Cost	Indirect Labor	Total Cost
AUDIT / Audit Project	1.0	\$21.79	\$0.00	\$0.00	\$0.00	\$0.00	\$21.79
HAUL / Hauling	68.5	\$1,678.54	\$969.96	\$292.42	\$0.00	\$1,041.75	\$3,982.66
RSDCL / Roadside Ditch - Cleanout	246.0	\$5,265.39	\$946.05	\$2,169.31	\$0.00	\$2,241.09	\$10,621.84
TT / Travel Time	6.0	\$170.16	\$7.20	\$13.32	\$0.00	\$51.30	\$241.98
UTLOC / Utility locates	1.0	\$21.79	\$0.00	\$0.00	\$0.00	\$0.00	\$21.79
2019-548 / Hummingbird Ln, Cardinal Ln and Oriole Ln Sub Total	322.5	\$7,157.67	\$1,923.21	\$2,475.05	\$0.00	\$3,334.13	\$14,890.06
Grand Total	322.5	\$7,157.67	\$1,923.21	\$2,475.05	\$0.00	\$3,334.13	\$14,890.06

Before



During



After



Project: Hummingbird Lane, Cardinal Lane and Oriole Lane Map #1

Activity: Routine/ Preventive Maintenance

Project #: 2019-548

Township/SW Dist: Bluffton/4

Completed: April 2019



Legend	
Drainage Type	
	Access Pipe
	Bleeder Pipe
	Channel Pipe
	Channel
	Stream
	Crossline Pipe
	Driveway Pipe
	Lateral
	Lateral Pipe
	River
	Road Pipe
	Roadside
	Roadside Pipe



1 inch = 170 feet

Prepared By: BC Stormwater Management Utility

Date Print: 06/05/19

File: C:\project summaries map\Hummingbird Lane and Cardinal Lane Map #1_2019-548

Project: Hummingbird Lane, Cardinal Lane and Oriole Lane Map #2

Activity: Routine/ Preventive Maintenance

Project #: 2019-548

Township/SW Dist: Bluffton/4

Completed: April 2019



Legend	
Drainage Type	
	Access Pipe
	Bleeder Pipe
	Channel Pipe
	Channel
	Stream
	Crossline Pipe
	Driveway Pipe
	Lateral
	Lateral Pipe
	River
	Road Pipe
	Roadside
	Roadside Pipe



1 inch = 130 feet

Prepared By: BC Stormwater Management Utility

Date Print: 06/05/19

File: C:\project summaries map\Hummingbird Lane and Cardinal Lane Map #2_2019-549



Project: Hummingbird Lane, Cardinal Lane and Oriole Lane Map #3

Activity: Routine/ Preventive Maintenance














Project #: 2019-548

Township/SW Dist: Bluffton/4

Completed: April 2019

Legend

Drainage Type

-  Access Pipe
-  Bleeder Pipe
-  Channel Pipe
-  Channel
-  Stream
-  Crossline Pipe
-  Driveway Pipe
-  Lateral
-  Lateral Pipe
-  River
-  Road Pipe
-  Roadside
-  Roadside Pipe

0 30 60 120 180 240 Feet

1 inch = 130 feet

Prepared By: BC Stormwater Management Utility

Date Print: 06/05/19

File: C:\project summaries map\Hummingbird Lane and Cardinal Lane Map #3_2019-549



Beaufort County Public Works
Stormwater Infrastructure
Project Summary

Project Summary: Varsity Street and Alumni Road

Activity: Routine/Preventive Maintenance

Duration: 04/15/19-05/20/19

Narrative Description of Project:

Project improved 3,625 L.F. of drainage system. Cleaned out 3,625 L.F. of roadside ditch. Jetted (21) driveway pipes, (4) crossline pipes and (1) access pipe. Handseeded for erosion control.

2019-562 / Varsity Street/Alumni Road

	Labor Hours	Labor Cost	Equipment Cost	Material Cost	Contractor Cost	Indirect Labor	Total Cost
AUDIT / Audit Project	1.5	\$32.69	\$0.00	\$0.00	\$0.00	\$0.00	\$32.69
DEBRIS / Debris Removal	9.0	\$195.77	\$10.80	\$7.26	\$0.00	\$89.10	\$302.93
DPJT / Driveway Pipe - Jetted	40.0	\$891.20	\$766.40	\$130.12	\$0.00	\$573.60	\$2,361.32
HAND / HANDSEEDED	8.0	\$260.88	\$14.40	\$140.41	\$0.00	\$53.76	\$469.45
HAUL / Hauling	67.0	\$1,589.29	\$948.72	\$290.40	\$0.00	\$1,048.14	\$3,876.55
RSDCL / Roadside Ditch - Cleanout	204.0	\$4,453.34	\$910.37	\$157.44	\$0.00	\$2,151.90	\$7,673.05
UTLOC / Utility locates	1.5	\$32.69	\$0.00	\$0.00	\$0.00	\$0.00	\$32.69
2019-562 / Varsity Street/Alumni Road Sub Total	331.0	\$7,455.85	\$2,650.69	\$725.63	\$0.00	\$3,916.50	\$14,748.66
Grand Total	331.0	\$7,455.85	\$2,650.69	\$725.63	\$0.00	\$3,916.50	\$14,748.66

Before



During



After

(No Picture Available)



Project: Varsity Street and Alumni Road Map #1

Activity: Routine/ Preventive Maintenance














Project #: 2019-562

Township/SW Dist: Lady's Island/7

Completed: May 2019

Legend

Drainage Type

-  Access Pipe
-  Bleeder Pipe
-  Channel Pipe
-  Channel
-  Stream
-  Crossline Pipe
-  Driveway Pipe
-  Lateral
-  Lateral Pipe
-  River
-  Road Pipe
-  Roadside
-  Roadside Pipe

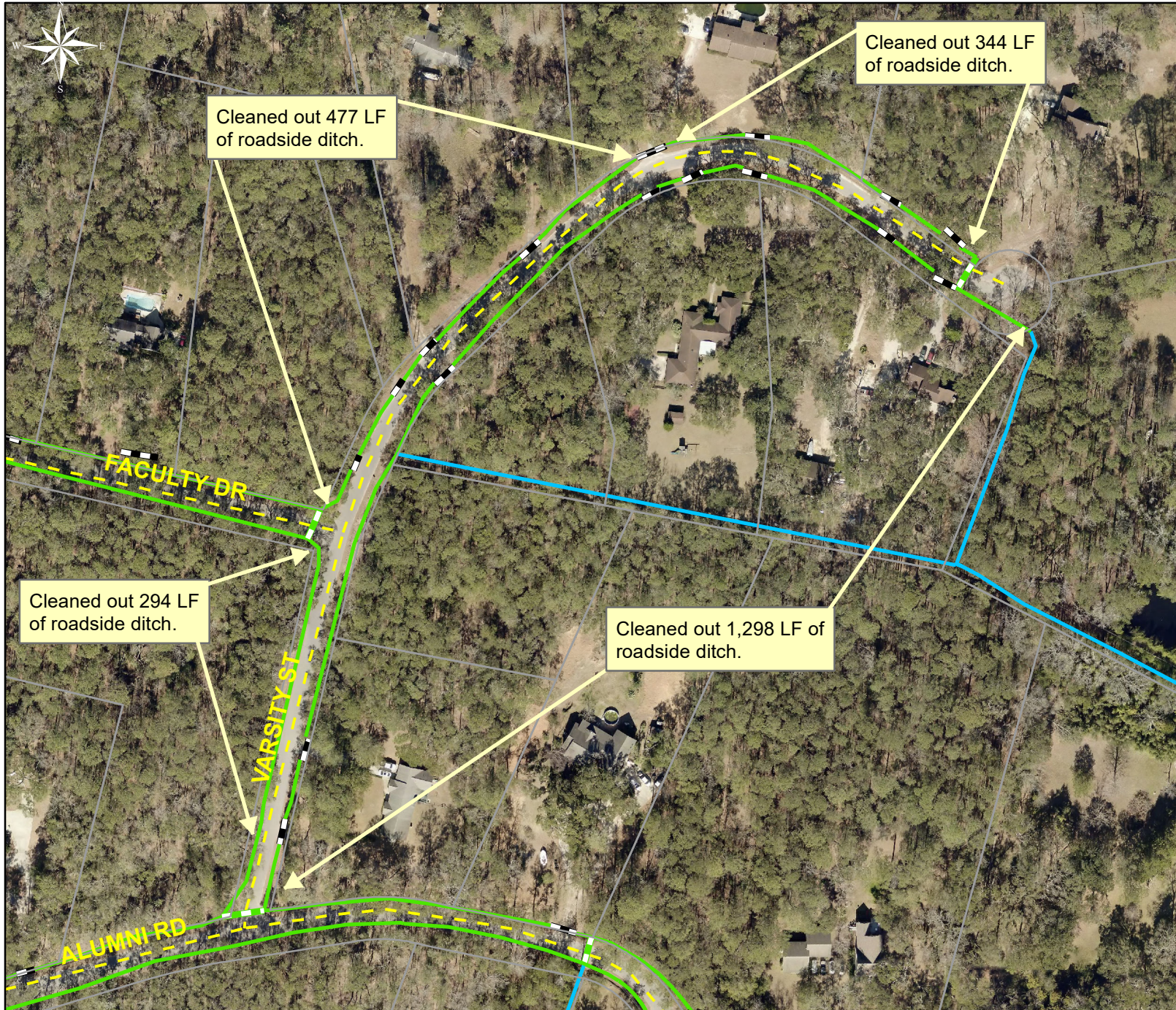


1 inch = 130 feet

Prepared By: BC Stormwater Management Utility

Date Print:06/19/19

File:C:\project summaries map\Varsity Street and Alumni Road Map #1_2019-562



Project: Varsity Street and Alumni Road Map #2

Activity: Routine/ Preventive Maintenance

Project #: 2019-562

Township/SW Dist: Lady's Island/7

Completed: May 2019

Legend

Drainage Type

- Access Pipe
- Bleeder Pipe
- Channel Pipe
- Channel
- Stream
- Crossline Pipe
- Driveway Pipe
- Lateral
- Lateral Pipe
- River
- Road Pipe
- Roadside
- Roadside Pipe

0 40 80 160 240 320 Feet

1 inch = 170 feet

Prepared By: BC Stormwater Management Utility

Date Print:06/19/19

File:C:\project summaries map\Varsity Street and Alumni Road Map #2_2019-562



Project: Varsity Street and Alumni Road Map #3

Activity: Routine/ Preventive Maintenance

Project #: 2019-562

Township/SW Dist: Lady's Island/7

Completed: May 2019

Legend

Drainage Type

- Access Pipe
- Bleeder Pipe
- Channel Pipe
- Channel
- Stream
- Crossline Pipe
- Driveway Pipe
- Lateral
- Lateral Pipe
- River
- Road Pipe
- Roadside
- Roadside Pipe



1 inch = 170 feet

Prepared By: BC Stormwater Management Utility

Date Print: 06/19/19

File: C:\project summaries map\Varsity Street and Alumni Road Map #3_2019-562

Project: Varsity Street and Alumni Road Map #4

Activity: Routine/ Preventive Maintenance

Project #: 2019-562

Township/SW Dist: Lady's Island/7

Completed: May 2019



Legend

Drainage Type

- Access Pipe
- Bleeder Pipe
- Channel Pipe
- Channel
- Stream
- Crossline Pipe
- Driveway Pipe
- Lateral
- Lateral Pipe
- River
- Road Pipe
- Roadside
- Roadside Pipe



1 inch = 210 feet

Prepared By: BC Stormwater Management Utility
Date Print:06/19/19
File:C:\project summaries map\Varsity Street and Alumni Road Map #4_2019-562



Beaufort County Public Works
Stormwater Infrastructure
Project Summary

Project Summary: Bellinger Bluff Road Channel

Activity: Drainage Improvement

Duration: 12/04/18-02/19/19

Narrative Description of Project:

Project improved 810 L.F. of drainage system. Grubbed and cleared 200 L.F. of workshelf. Constructed 10 L.F. of swale and 400 L.F. of channel. Reconstructed 200 L.F. of channel. Installed (1) access pipe and rip rap for erosion control.

2018-004A / Bellinger Bluff Road Channel

	Labor Hours	Labor Cost	Equipment Cost	Material Cost	Contractor Cost	Indirect Labor	Total Cost
AUDIT / Audit Project	1.5	\$32.69	\$0.00	\$0.00	\$0.00	\$0.00	\$32.69
CCON / Channel - constructed	63.0	\$1,298.99	\$421.98	\$718.35	\$0.00	\$726.60	\$3,165.92
CI / Channel - Inspection	9.0	\$185.94	\$11.52	\$8.80	\$0.00	\$116.01	\$322.27
CREC / Channel - reconstructed	45.0	\$943.10	\$400.62	\$39.78	\$0.00	\$453.70	\$1,837.20
DEBRIS / Debris Removal	21.0	\$478.80	\$461.68	\$79.52	\$0.00	\$100.94	\$1,120.94
HAUL / Hauling	36.0	\$792.78	\$794.96	\$679.69	\$0.00	\$475.86	\$2,743.29
PI / Project Inspection	4.0	\$81.84	\$7.20	\$8.96	\$0.00	\$50.88	\$148.88
RRI / Rip Rap - Installed	20.0	\$409.20	\$75.26	\$553.64	\$0.00	\$254.40	\$1,292.50
SCON / Swale - Constructed	10.0	\$204.60	\$76.46	\$8.80	\$0.00	\$127.20	\$417.06
STAGING / Staging Materials/Equipment	6.0	\$122.76	\$10.80	\$31.36	\$0.00	\$76.32	\$241.24
WSGRB / Workshelf - Grubbed	35.0	\$713.10	\$343.45	\$31.68	\$0.00	\$442.65	\$1,530.88
2018-004A / Bellinger Bluff Road Channel Sub Total	250.5	\$5,263.80	\$2,603.93	\$2,160.57	\$0.00	\$2,824.56	\$12,852.86
Grand Total	250.5	\$5,263.80	\$2,603.93	\$2,160.57	\$0.00	\$2,824.56	\$12,852.86

Before

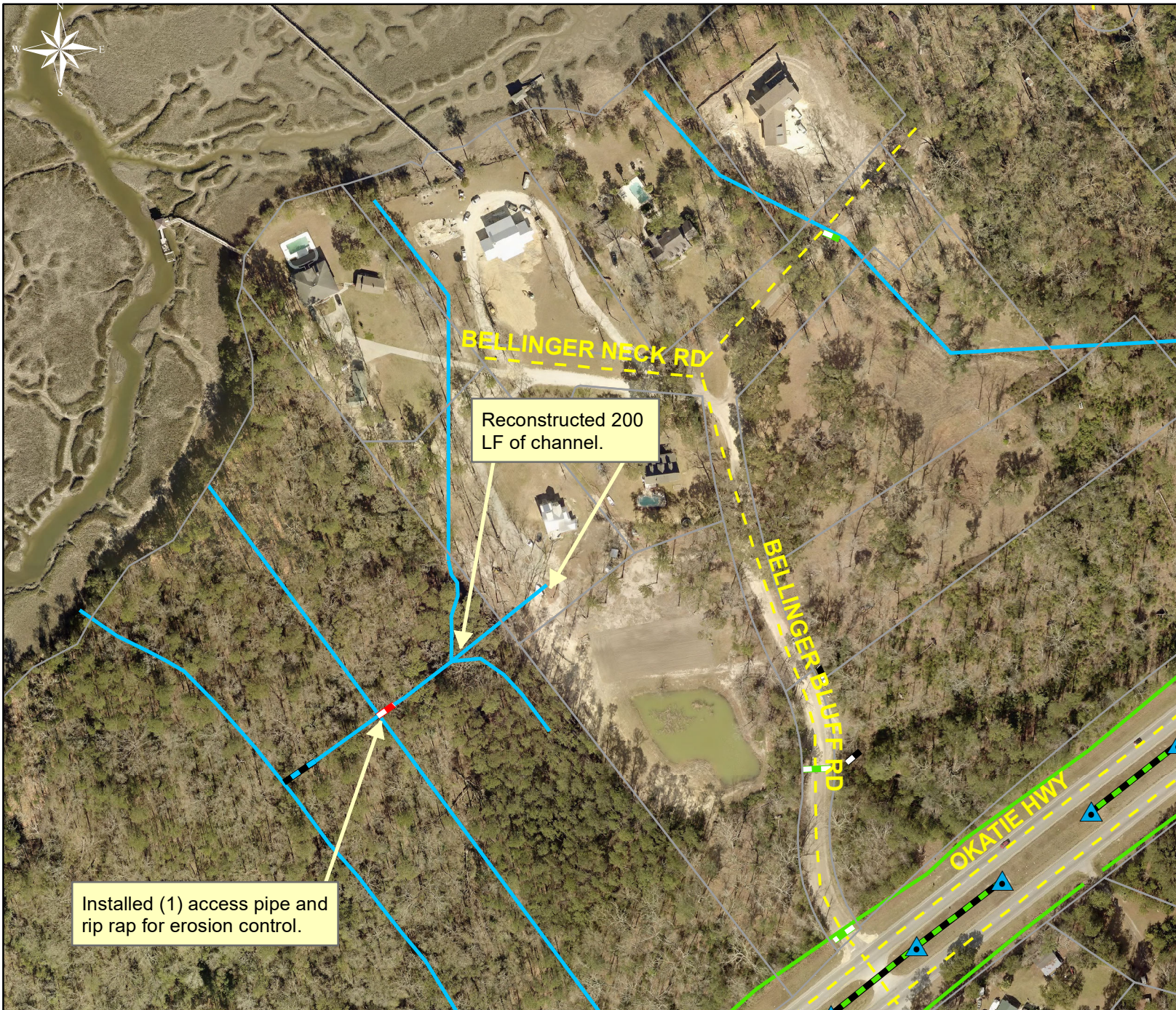
During

After

(No Picture Available)



(No Picture Available)



Project: Bellinger Bluff Road Channel Map #1

Activity: Drainage Improvement

Project #: 2018-004A

Township/SW Dist: Bluffton/4

Completed: February 2019

Legend	
Drainage Type	
	Access Pipe
	Bleeder Pipe
	Channel Pipe
	Channel
	Stream
	Crossline Pipe
	Driveway Pipe
	Lateral
	Lateral Pipe
	River
	Road Pipe
	Roadside
	Roadside Pipe



1 inch = 210 feet

Prepared By: BC Stormwater Management Utility
Date Print: 06/11/19

File: C:\project summaries map\Bellinger Bluff Road Channel Map #1_2018-004A



Project: Bellinger Bluff Road Channel Map #2

Activity: Drainage Improvement

Project #: 2018-004A

Township/SW Dist: Bluffton/4

Completed: February 2019

Legend	
Drainage Type	
	Access Pipe
	Bleeder Pipe
	Channel Pipe
	Channel
	Stream
	Crossline Pipe
	Driveway Pipe
	Lateral
	Lateral Pipe
	River
	Road Pipe
	Roadside
	Roadside Pipe



1 inch = 250 feet

Prepared By: BC Stormwater Management Utility
Date Print: 06/11/19

File: C:\project summaries map\Bellinger Bluff Road Channel Map #2_2018-004A



Beaufort County Public Works
Stormwater Infrastructure
Project Summary

Project Summary: Katie Miller Drive and Ceasar Place

Activity: Routine/Preventive Maintenance

Duration: 03/07/18-03/26/19

Narrative Description of Project:

Project improved 2,915 L.F. of drainage system. Cleaned out 2,915 L.F. of roadside ditch. Hydroseeded for erosion control.

2019-554 / Katie Miller Drive and Ceasar Place

	Labor Hours	Labor Cost	Equipment Cost	Material Cost	Contractor Cost	Indirect Labor	Total Cost
AUDIT / Audit Project	1.5	\$32.69	\$0.00	\$0.00	\$0.00	\$0.00	\$32.69
DITCHI / Ditch - Inspection	9.0	\$255.24	\$10.80	\$11.88	\$0.00	\$76.95	\$354.87
HAUL / Hauling	50.0	\$1,235.00	\$708.00	\$217.86	\$0.00	\$823.50	\$2,984.36
RSDCL / Roadside Ditch - Cleanout	220.0	\$4,703.65	\$734.69	\$1,712.28	\$0.00	\$2,105.70	\$9,256.32
UTLOC / Utility locates	1.5	\$32.69	\$0.00	\$0.00	\$0.00	\$0.00	\$32.69
2019-554 / Katie Miller Drive and Ceasar Place Sub Total	282.0	\$6,259.26	\$1,453.49	\$1,942.01	\$0.00	\$3,006.15	\$12,660.91
Grand Total	282.0	\$6,259.26	\$1,453.49	\$1,942.01	\$0.00	\$3,006.15	\$12,660.91

Before



During



After





Project: Katie Miller Drive and Ceasar Place Map #1

Activity: Routine/ Preventive Maintenance

Project #: 2019-554

Township/SW Dist: Hilton Head Island/3

Completed: March 2019

Legend

Drainage Type

- Access Pipe
- Bleeder Pipe
- Channel Pipe
- Channel
- Stream
- Crossline Pipe
- Driveway Pipe
- Lateral
- Lateral Pipe
- River
- Road Pipe
- Roadside
- Roadside Pipe

0 50 100 200 300 400 Feet

1 inch = 210 feet

Prepared By: BC Stormwater Management Utility

Date Print: 05/29/19

File: C:\project summaries map\Katie Miller Drive and Ceasar Place Map #1_2019-554



Project: Katie Miller Drive and Ceasar Place Map #2

Activity: Routine/ Preventive Maintenance

Project #: 2019-554

Township/SW Dist: Hilton Head Island/3

Completed: March 2019

Legend

Drainage Type

- Access Pipe
- Bleeder Pipe
- Channel Pipe
- Channel
- Stream
- Crossline Pipe
- Driveway Pipe
- Lateral
- Lateral Pipe
- River
- Road Pipe
- Roadside
- Roadside Pipe



1 inch = 100 feet

Prepared By: BC Stormwater Management Utility

Date Print: 05/29/19

File: C:\project summaries map\Katie Miller Drive and Ceasar Place Map #2_2019-554



Beaufort County Public Works
Stormwater Infrastructure
Project Summary

Project Summary: Pinewood Circle

Activity: Routine/Preventive Maintenance

Duration: 05/02/19-05/20/19

Narrative Description of Project:

Project improved 2,562 L.F. of drainage system. Cleaned out 2,562 L.F. of roadside ditch. Jetted (48) driveway pipes and (2) crossline pipes. Handseeded for erosion control.

2019-563 / Pinewood Circle

	Labor Hours	Labor Cost	Equipment Cost	Material Cost	Contractor Cost	Indirect Labor	Total Cost
AUDIT / Audit Project	1.5	\$32.69	\$0.00	\$0.00	\$0.00	\$0.00	\$32.69
DPJT / Driveway Pipe - Jetted	40.0	\$891.20	\$766.40	\$129.94	\$0.00	\$573.60	\$2,361.14
HAND / HANDSEDED	6.0	\$195.66	\$10.80	\$357.26	\$0.00	\$40.32	\$604.04
HAUL / Hauling	36.0	\$823.32	\$509.76	\$116.16	\$0.00	\$129.78	\$1,579.02
RSDCL / Roadside Ditch - Cleanout	111.0	\$2,492.85	\$538.40	\$139.48	\$0.00	\$1,138.80	\$4,309.53
UTLOC / Utility locates	0.5	\$10.90	\$0.00	\$0.00	\$0.00	\$0.00	\$10.90
2019-563 / Pinewood Circle Sub Total	195.0	\$4,446.61	\$1,825.36	\$742.84	\$0.00	\$1,882.50	\$8,897.31
Grand Total	195.0	\$4,446.61	\$1,825.36	\$742.84	\$0.00	\$1,882.50	\$8,897.31

(No Pictures Available)



Project: Pinewood Circle Map #1

Activity: Routine/ Preventive Maintenance














Project #: 2019-563

Township/SW Dist: Port Royal Island/6

Completed: May 2019

Legend

Drainage Type

-  Access Pipe
-  Bleeder Pipe
-  Channel Pipe
-  Channel
-  Stream
-  Crossline Pipe
-  Driveway Pipe
-  Lateral
-  Lateral Pipe
-  River
-  Road Pipe
-  Roadside
-  Roadside Pipe

0 40 80 160 240 320 Feet

1 inch = 170 feet

Prepared By: BC Stormwater Management Utility

Date Print: 05/29/19

File: C:\project summaries map\Pinewood Circle Map #1_2019-563

Project: Pinewood
Circle Map #2

Activity: Routine/
Preventive
Maintenance

Project #:
2019-563

Township/SW Dist:
Port Royal Island/6

Completed:
May 2019



Legend	
Drainage Type	
	Access Pipe
	Bleeder Pipe
	Channel Pipe
	Channel
	Stream
	Crossline Pipe
	Driveway Pipe
	Lateral
	Lateral Pipe
	River
	Road Pipe
	Roadside
	Roadside Pipe

0 80 160 320 480 640
Feet

1 inch = 330 feet

Prepared By: BC Stormwater Management Utility
Date Print: 05/29/19
File: C:\project summaries map\Pinewood Circle Map #2_2019-563

Project: Pinewood
Circle Map #3

Activity: Routine/
Preventive
Maintenance

Project #:
2019-563

Township/SW Dist:
Port Royal Island/6

Completed:
May 2019



Legend	
Drainage Type	
	Access Pipe
	Bleeder Pipe
	Channel Pipe
	Channel
	Stream
	Crossline Pipe
	Driveway Pipe
	Lateral
	Lateral Pipe
	River
	Road Pipe
	Roadside
	Roadside Pipe



1 inch = 330 feet

Prepared By: BC Stormwater Management Utility
Date Print: 05/29/19
File: C:\project summaries map\Pinewood Circle Map #3_2019-563



Beaufort County Public Works
Stormwater Infrastructure
Project Summary

Project Summary: Alljoy Area
 Tillman Street and Scotia Street

Activity: Routine/Preventive Maintenance
Duration: 01/17/19-02/19/19

Narrative Description of Project:

Project improved 561 L.F. of drainage system. Cleaned out 461 L.F. of roadside ditch. Jetted 100 L.F. of channel pipe and (2) crossline pipes.

2019-003 / Alljoy Area

	Labor Hours	Labor Cost	Equipment Cost	Material Cost	Contractor Cost	Indirect Labor	Total Cost
AUDIT / Audit Project	1.5	\$32.69	\$0.00	\$0.00	\$0.00	\$0.00	\$32.69
CLPJT / Crossline Pipe - Jetted	60.0	\$1,487.60	\$421.60	\$105.40	\$0.00	\$421.20	\$2,435.80
HAUL / Hauling	20.0	\$385.60	\$283.20	\$120.37	\$0.00	\$0.00	\$789.17
RSDCL / Roadside Ditch - Cleanout	60.0	\$1,392.10	\$261.76	\$69.57	\$0.00	\$685.30	\$2,408.73
SG / Shoot Grade	12.0	\$254.25	\$10.80	\$17.92	\$0.00	\$89.10	\$372.07
UTLOC / Utility locates	0.5	\$10.90	\$0.00	\$0.00	\$0.00	\$0.00	\$10.90
2019-003 / Alljoy Area Sub Total	154.0	\$3,563.13	\$977.36	\$313.26	\$0.00	\$1,195.60	\$6,049.35
Grand Total	154.0	\$3,563.13	\$977.36	\$313.26	\$0.00	\$1,195.60	\$6,049.35

Before



During



After





Project: Alljoy Area
Tillman Street and
Scotia Street Map #1

Activity: Routine/
Preventive
Maintenance














Project #:
2019-003

Township/SW Dist:
Bluffton/4

Completed:
February 2019

Legend

Drainage Type

-  Access Pipe
-  Bleeder Pipe
-  Channel Pipe
-  Channel
-  Stream
-  Crossline Pipe
-  Driveway Pipe
-  Lateral
-  Lateral Pipe
-  River
-  Road Pipe
-  Roadside
-  Roadside Pipe

0 20 40 80 120 160
Feet

1 inch = 83 feet

Prepared By: BC Stormwater Management Utility

Date Print: 05/14/19

File: C:\project summaries map\Alljoy Area-Tillman Street and Scotia Street Map #1_2019-003



Project: Alljoy Area
Tillman Street and
Scotia Street Map #2

Activity: Routine/
Preventive
Maintenance














Project #:
2019-003

Township/SW Dist:
Bluffton/4

Completed:
February 2019

Legend

Drainage Type

-  Access Pipe
-  Bleeder Pipe
-  Channel Pipe
-  Channel
-  Stream
-  Crossline Pipe
-  Driveway Pipe
-  Lateral
-  Lateral Pipe
-  River
-  Road Pipe
-  Roadside
-  Roadside Pipe



1 inch = 67 feet

Prepared By: BC Stormwater Management Utility

Date Print: 05/14/19

File: C:\project summaries map\Alljoy Area-Tillman Street and Scotia Street Map #2_2019-003



Beaufort County Public Works
Stormwater Infrastructure
Project Summary

Project Summary: Smith Road

Activity: Routine/Preventive Maintenance

Duration: 03/07/19-03/20/19

Narrative Description of Project:

Project improved 2,040 L.F. of drainage system. Cleaned out 1,735 L.F. of channel and 305 L.F. of roadside ditch. Jetted (5) driveway pipes and (2) crossline pipes.

2019-555 / Smith Road

	Labor Hours	Labor Cost	Equipment Cost	Material Cost	Contractor Cost	Indirect Labor	Total Cost
AUDIT / Audit Project	1.0	\$21.79	\$0.00	\$0.00	\$0.00	\$0.00	\$21.79
CCO / Channel - cleaned out	15.0	\$338.35	\$105.09	\$19.57	\$0.00	\$138.25	\$601.26
DPJT / Driveway Pipe - Jetted	10.0	\$222.80	\$191.60	\$36.64	\$0.00	\$143.40	\$594.44
HAUL / Hauling	27.0	\$604.89	\$382.32	\$109.51	\$0.00	\$317.24	\$1,413.96
RSDCL / Roadside Ditch - Cleanout	60.0	\$1,337.70	\$448.99	\$90.57	\$0.00	\$420.70	\$2,297.96
UTLOC / Utility locates	0.5	\$10.90	\$0.00	\$0.00	\$0.00	\$0.00	\$10.90
2019-555 / Smith Road Sub Total	113.5	\$2,536.43	\$1,128.00	\$256.29	\$0.00	\$1,019.59	\$4,940.30
Grand Total	113.5	\$2,536.43	\$1,128.00	\$256.29	\$0.00	\$1,019.59	\$4,940.30

(No Pictures Available)



Project: Smith Road Map #1

Activity: Routine/ Preventive Maintenance














Project #: 2019-555

Township/SW Dist: Port Royal Island/6

Completed: March 2019

Legend

Drainage Type

-  Access Pipe
-  Bleeder Pipe
-  Channel Pipe
-  Channel
-  Stream
-  Crossline Pipe
-  Driveway Pipe
-  Lateral
-  Lateral Pipe
-  River
-  Road Pipe
-  Roadside
-  Roadside Pipe

0 20 40 80 120 160 Feet

1 inch = 83 feet

Prepared By: BC Stormwater Management Utility

Date Print:04/30/19

File:C:\project summaries map\Smith Road Map #1_2019-555



Project: Smith Road Map #2

Activity: Routine/ Preventive Maintenance














Project #: 2019-555

Township/SW Dist: Port Royal Island/6

Completed: March 2019

Legend

Drainage Type

-  Access Pipe
-  Bleeder Pipe
-  Channel Pipe
-  Channel
-  Stream
-  Crossline Pipe
-  Driveway Pipe
-  Lateral
-  Lateral Pipe
-  River
-  Road Pipe
-  Roadside
-  Roadside Pipe



1 inch = 83 feet

Prepared By: BC Stormwater Management Utility

Date Print: 04/30/19

File: C:\project summaries map\Smith Road Map #2_2019-555

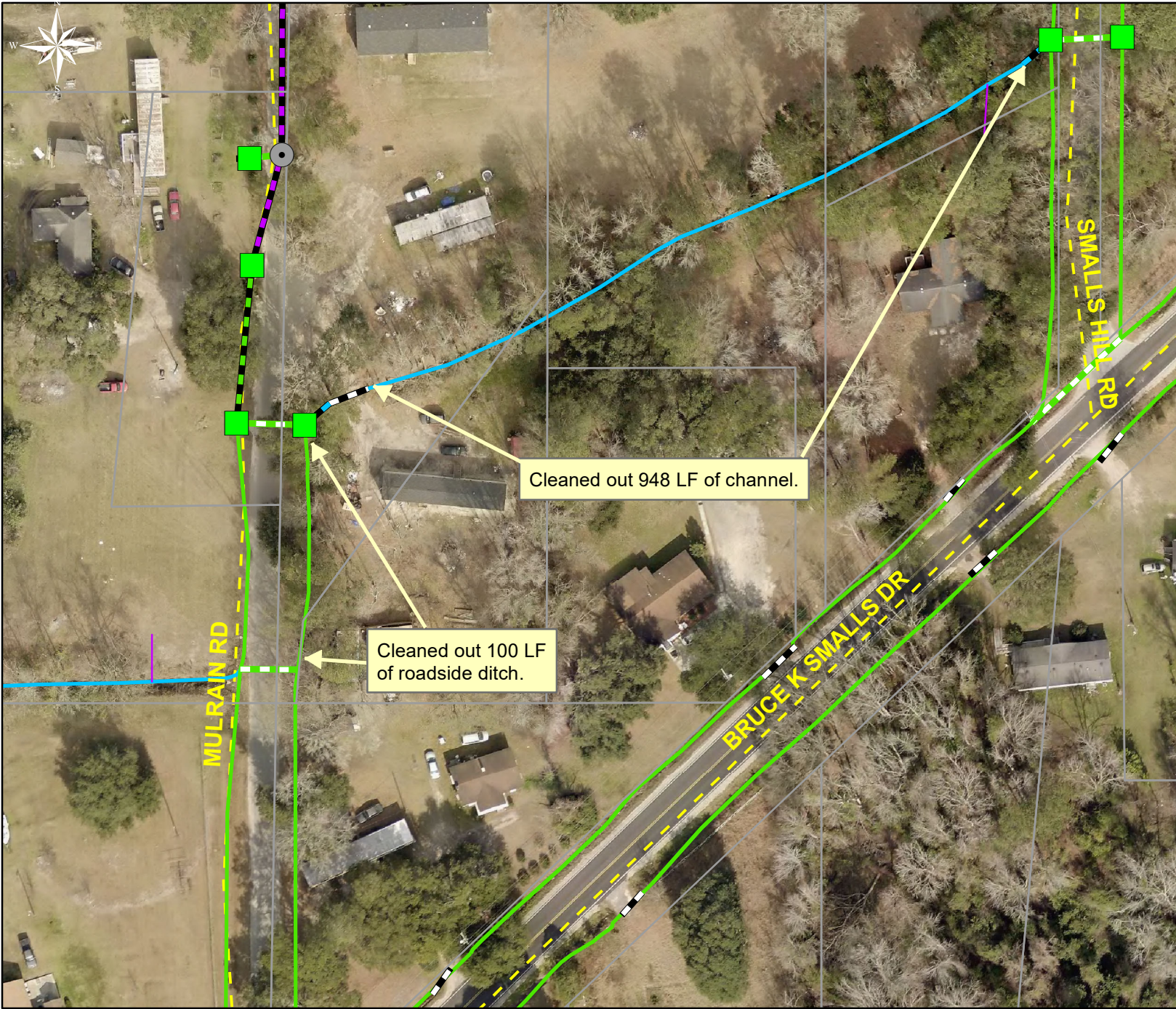
Project: Smith Road Map #3

Activity: Routine/ Preventive Maintenance

Project #: 2019-555

Township/SW Dist: Port Royal Island/6

Completed: March 2019



Legend	
Drainage Type	
	Access Pipe
	Bleeder Pipe
	Channel Pipe
	Channel
	Stream
	Crossline Pipe
	Driveway Pipe
	Lateral
	Lateral Pipe
	River
	Road Pipe
	Roadside
	Roadside Pipe



1 inch = 83 feet

Prepared By: BC Stormwater Management Utility
 Date Print: 04/30/19
 File: C:\project summaries map\Smith Road Map #3_2019-555



Project: Smith Road Map #4

Activity: Routine/ Preventive Maintenance














Project #: 2019-555

Township/SW Dist: Port Royal Island/6

Completed: March 2019

Legend

Drainage Type

-  Access Pipe
-  Bleeder Pipe
-  Channel Pipe
-  Channel
-  Stream
-  Crossline Pipe
-  Driveway Pipe
-  Lateral
-  Lateral Pipe
-  River
-  Road Pipe
-  Roadside
-  Roadside Pipe



1 inch = 67 feet



Project: Smith Road Map #5

Activity: Routine/ Preventive Maintenance














Project #: 2019-555

Township/SW Dist: Port Royal Island/6

Completed: March 2019

Legend

Drainage Type

-  Access Pipe
-  Bleeder Pipe
-  Channel Pipe
-  Channel
-  Stream
-  Crossline Pipe
-  Driveway Pipe
-  Lateral
-  Lateral Pipe
-  River
-  Road Pipe
-  Roadside
-  Roadside Pipe



1 inch = 83 feet

Prepared By: BC Stormwater Management Utility

Date Print: 04/30/19

File: C:\project summaries map\Smith Road Map #5_2019-555



Beaufort County Public Works
Stormwater Infrastructure
Project Summary

Project Summary: Huron Drive

Activity: Routine/Preventive Maintenance

Duration: 04/10/19-04/25/19

Narrative Description of Project:

Project improved 182 L.F. of drainage system. Cleaned out 182 L.F. of roadside ditch. Installed (1) catch basin. Repaired washout. Hydroseeded for erosion control.

2019-560 / Huron Drive

	Labor Hours	Labor Cost	Equipment Cost	Material Cost	Contractor Cost	Indirect Labor	Total Cost
AUDIT / Audit Project	1.0	\$21.79	\$0.00	\$0.00	\$0.00	\$0.00	\$21.79
CBINS / Catch basin - installed	30.0	\$652.55	\$206.95	\$281.08	\$0.00	\$297.00	\$1,437.58
GRDGEN / Grading - General	15.0	\$326.30	\$18.00	\$58.29	\$0.00	\$148.50	\$551.09
HAUL / Hauling	20.0	\$494.00	\$283.20	\$55.92	\$0.00	\$329.40	\$1,162.52
RSDCL / Roadside Ditch - Cleanout	30.0	\$652.60	\$111.24	\$27.49	\$0.00	\$297.00	\$1,088.33
UTLOC / Utility locates	0.5	\$10.90	\$0.00	\$0.00	\$0.00	\$0.00	\$10.90
2019-560 / Huron Drive Sub Total	96.5	\$2,158.14	\$619.39	\$422.79	\$0.00	\$1,071.90	\$4,272.21
Grand Total	96.5	\$2,158.14	\$619.39	\$422.79	\$0.00	\$1,071.90	\$4,272.21

Before



During



After



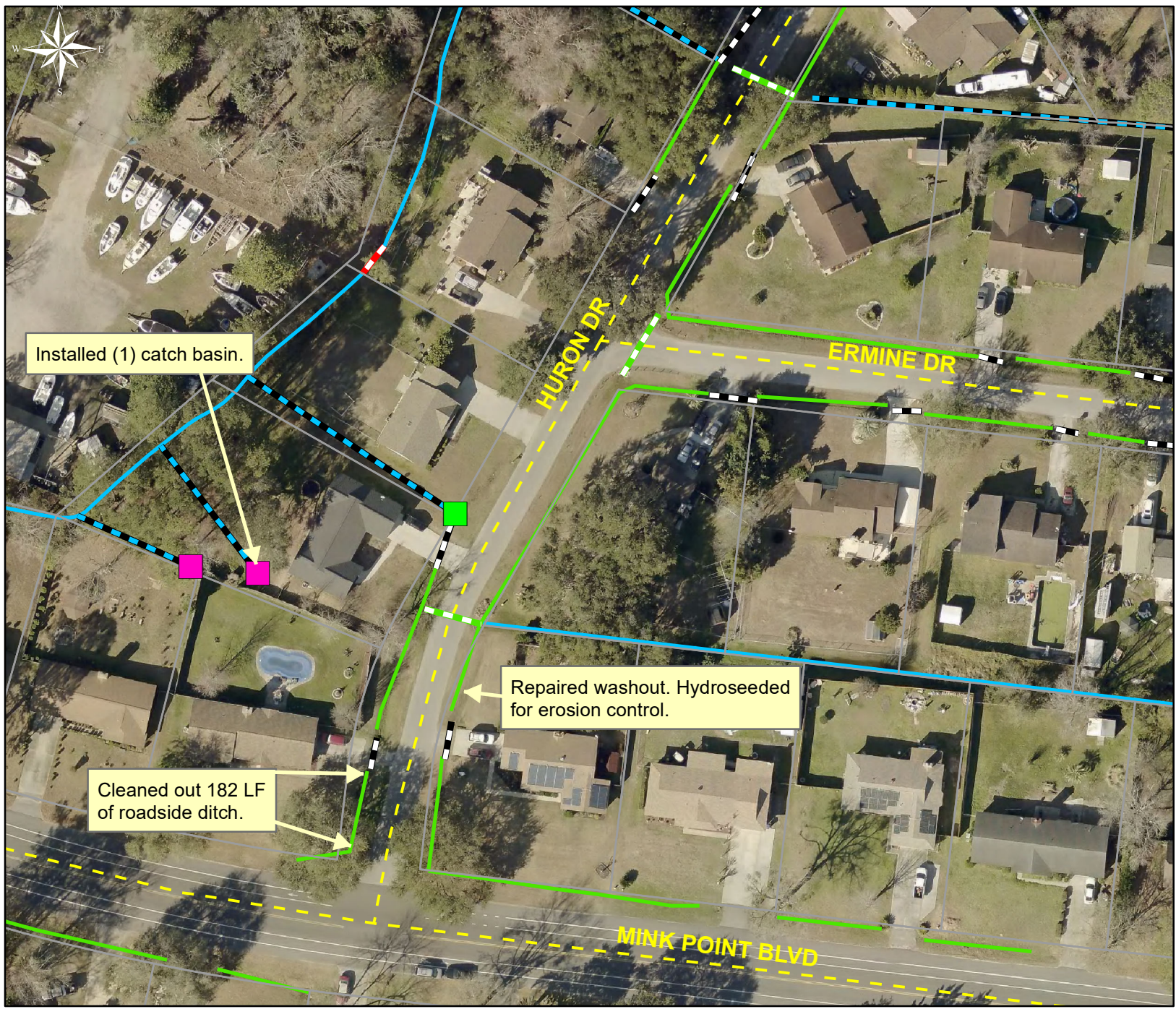
Project: Huron Drive

Activity: Routine/ Preventive Maintenance

Project #: 2019-560

Township/SW Dist: Port Royal Island/6

Completed: April 2019



Legend	
Drainage Type	
	Access Pipe
	Bleeder Pipe
	Channel Pipe
	Channel
	Stream
	Crossline Pipe
	Driveway Pipe
	Lateral
	Lateral Pipe
	River
	Road Pipe
	Roadside
	Roadside Pipe



1 inch = 83 feet

Prepared By: BC Stormwater Management Utility
Date Print:05/29/19
File:C:\project summaries map\Huron Drive_2019-560



Beaufort County Public Works
Stormwater Infrastructure
Project Summary

Project Summary: Burton Wells Road and Middleton Recreation Drive

Activity: Routine/Preventive Maintenance

Duration: 08/22/18-09/10/18

Narrative Description of Project:

Project improved 510 L.F. of drainage system. Cleaned out 510 L.F. of roadside ditch.

2019-519 / Burton Wells Rd. & Middleton Recreation Dr.

	Labor Hours	Labor Cost	Equipment Cost	Material Cost	Contractor Cost	Indirect Labor	Total Cost
AUDIT / Audit Project	1.0	\$21.79	\$0.00	\$0.00	\$0.00	\$0.00	\$21.79
HAUL / Hauling	9.0	\$198.03	\$127.44	\$22.86	\$0.00	\$57.68	\$406.01
RSDCL / Roadside Ditch - Cleanout	25.0	\$538.75	\$67.54	\$22.86	\$0.00	\$341.85	\$971.00
UTLOC / Utility locates	0.5	\$12.35	\$0.00	\$0.00	\$0.00	\$6.62	\$18.97
2019-519 / Burton Wells Rd. & Middleton Recreation Dr. Sub Total	35.5	\$770.92	\$194.98	\$45.72	\$0.00	\$406.14	\$1,417.76
Grand Total	35.5	\$770.92	\$194.98	\$45.72	\$0.00	\$406.14	\$1,417.76

Before



During



After



Project: Burton Wells Road and Middleton Recreation Drive

Activity: Routine/ Preventive Maintenance

Project #: 2019-519

Township/SW Dist: Port Royal Island/6

Completed: September 2018



Legend	
Drainage Type	
	Access Pipe
	Bleeder Pipe
	Channel Pipe
	Channel
	Stream
	Crossline Pipe
	Driveway Pipe
	Lateral
	Lateral Pipe
	River
	Road Pipe
	Roadside
	Roadside Pipe



1 inch = 130 feet



BEAUFORT COUNTY
STORMWATER MANAGEMENT UTILITY BOARD AGENDA
Wednesday, August 14, 2019
2:00 p.m.
Executive Conference Room, Administration Building
Beaufort County Government Robert Smalls Complex
100 Ribaut Road, Beaufort, South Carolina
843.255.2805

In accordance with South Carolina Code of Laws, 1976, as amended, Section 30-4-80(d), all local media was duly notified of the time, date, place and agenda of this meeting.

1. CALL TO ORDER – 2:00 p.m.
 - A. Approval of Agenda
 - B. Approval of Minutes – July 10, 2019 ([backup](#))
2. INTRODUCTIONS
3. PUBLIC COMMENT
4. REPORTS
 - A. Utility Update – Eric Larson, P.E. ([backup](#))
 - B. Monitoring Update – Eric Larson, P.E. ([backup](#))
 - C. Stormwater Implementation Committee Report – Eric Larson, P.E. ([backup](#))
 - D. Stormwater Related Projects – Eric Larson, P.E. ([backup](#))
 - E. Upcoming Professional Contracts Report – Eric Larson, P.E. ([backup](#))
 - F. Regional Coordination – Eric Larson, P.E. ([backup](#))
 - G. Municipal Reports – Eric Larson, P.E. ([backup](#))
 - H. MS4 Update – Eric Larson, P.E. ([backup](#))
 - I. Maintenance Projects Report – David Wilhelm, P.E. ([backup](#))
5. UNFINISHED BUSINESS
6. NEW BUSINESS
 - A. Special Presentation - TBD
7. PUBLIC COMMENT
8. NEXT MEETING AGENDA
 - A. September 11, 2019 ([backup](#))
9. ADJOURNMENT