

Local Program Report to the SCC

City of Newton, January 9, 2019

On January 9, 2019, personnel from NCDEQ, DEMLR, conducted a review of the City of Newton's Sedimentation and Erosion Local Program. The program is currently operating under probation since its follow up review on July 31, 2018. One staff member contributes 0.2 full time equivalent to the program. The City requires sediment and erosion control plans for sites that have a disturbed area of one acre or more and grading permits between a half acre and an acre. Since the last review on July 31, 2018, the City of Newton has received two (2) new plan sets to review. One of those plan sets has been disapproved and is now under a second review, and the other is still under its first review. The City currently has 4 active projects. The City indicated they averaged 12 site inspections per project per year. During our review of the program, we reviewed the two (2) new plan sets as well as 1 plan that had already been approved and inspected 2 of the active project sites.

The following is a summary of the projects that were reviewed:

- **McRee Trace (Plan Review Only)**

This project consists of 2.07 disturbed acres and was being constructed for residential development. The file for this project included a notarized FRO form, deed, plans, calculations, disapproval letters, and a LLC annual report. The erosion and sediment control plan had been previously disapproved and is now under its second review. Plan reviews have been conducted with help from Mooresville Regional Office staff. The first submittal of the plans was disapproved for missing grading contours and erosion control measure. The current set of plans does not specify the disturbed acres for the project. The City of Newton is concerned about steep slopes in the final grading plan and has asked the engineer to confirm the plan. Plan approval is dependent on response from engineer.

- **Moore's Investment Mini Storage (Plan Review Only)**

This project consists of 5.63 disturbed acres and was being constructed for commercial development. The file for this project included a FRO form, plan, calculations, and a LLC annual report. This plan set is still under review. Plan reviews have been conducted with help from Mooresville Regional Office staff. The stream that is within the project limits is missing from the plan set. Calculations for drainage areas and diversion ditches are missing. There is no concrete washout or stock pile location specified in the plan set. The construction sequence was missing important information. The silt fence on the low side of the project did not have any designed outlets. Some details were inadequate, such as the skimmer detail missing a pad. All of these deficiencies were observed by the City of Newton prior to our review. The plan set did not show total disturbed acres. Plan uses inconsistent terminology for designed basin, calling it a sand filter on one page and a bio-retention pond on another.

- **New Bennett Funeral Home (Plan and Site Inspection)**

This project consists of 3.37 disturbed acres and was being constructed for commercial development. The file for this project included a FRO form, deed, plan, calculations, and an approval letter. This plan set was approved on 10/27/2017. The documents were adequate. The site has been inspected six (6) times and was last inspected on 12/28/2018. The site was in compliance during the last inspection. No NOV's have been issued to this site. The site was active during our visit. During our inspection, the site was out of compliance. Violations include failure to follow approved plan, insufficient measures to retain sediment on site, failure to take all reasonable measures, unprotected exposed slopes, failure to maintain measures, and sedimentation damage. Issues noted during our inspection were slight offsite sediment damage on the southern end of the site, the sediment basin was not designed according to the approved plan, the construction entrance has been compacted and needed maintenance, there appeared to be evidence that the construction entrance had been bypassed on the northern side of the site, ground cover had died and needed to be reseeded, silt fence was down and need to be repaired, a stockpile was uncovered and unprotected, no concrete washout established on site and concrete had been washed out on ground, diversion ditch and check dams require maintenance. Recommendations made were clean out offsite sediment, repair diversion ditches and stabilize them, install riprap protection as shown on plans, establish ground cover to the entire site including slopes around the basin, repair and maintain construction entrance, install concrete washout, install baffles in basin as shown in plans, install inlet protection as shown in plans, cleanout basin sediment and restore sediment level to dimensions shown on plan.

- **Abernethy Laurels, Phase II (Site Inspection Only)**

This project was being constructed for residential development. The site was in compliance during its last inspection, and no NOV's have been issued. During our inspection the site was active. The site was not in compliance during of inspection. Violations included failure to follow approved plan and failure to maintain measures. Issues noted during the inspection included inlet protection being removed before ground stabilization has been achieved, and several unmaintained drop inlets were filled with sediment. A few of the recommendation were to clean out the drop inlets, install and maintain inlet protection until area is stabilized, establish groundcover to the entire site including slopes and areas around drop inlets.

Conclusion:

After our previous review of the City of Newton, staff recommendations focused on improving plan reviews and mandated that the City of Newton conduct their reviews along with the staff of the Mooresville Regional Office. While the number of incoming projects has been small, we have seen that plan reviewing skills have improved and staff have been meeting statutory deadlines;

however, we now see that the inspection side of the program is lacking. With this in mind, the City should implement the following recommendations to improve the program:

1. Continue conducting plan reviews with Mooresville Regional Office staff.
2. Improve inspection reports by adding notes and site details.
3. Go with Mooresville Regional Office staff on site inspections and learn how they conduct inspections.
4. Issue NOV's immediately for any offsite sedimentation observed during inspection.
5. Note any NPDES violations you may see on an inspection and notify the Regional Office so that they can inspect the site.
6. Continue to inspect the sites frequently (at least once a month and more if needed). Please continue sending us the inspection reports for all active projects. Document all internal inspection reports.
7. Continue requiring that adequate ground cover be provided within the time limits of the local ordinance and approved plan.
8. Continue to check for self-inspection records on site. Please continue to send DEMLR a minimum of one self-inspection report per month for a site.
9. Make sure that sediment and erosion control measures such as construction entrance, silt fence are well maintained.
10. Do not approve the plan until all calculations, details and sequencing are submitted.
11. Continue to ensure the plans are reviewed by the statutory deadlines (G.S. 113A-54.1)

The reports and other documents requested must be submitted by the second week of the following month of reporting. Example- All inspection reports of January should be submitted by the second week of February.

Overall, the City of Newton's program has seen improvements. Plan reviews have been much better at catching missing information, disapproving of inadequate plans, and meeting deadlines. Site inspections are being conducted in a timely manner, but the quality of the inspections and reports has much room for improvement.

The staff recommends continuing probation for another 6 months, so the City of Newton can work on improving inspection reports as well as continue improving their plan reviews under the supervision of the Regional Office.

This report has been prepared based on the review of the City of Newton's Local Program. This report will be presented to the Sedimentation Control Commission (SCC) on February 7, 2019.

SEDIMENTATION/CONSTRUCTION STORMWATER INSPECTION REPORT

North Carolina Department of Environmental Quality

Land Quality Section: 610 East Center Avenue, Suite 301, Mooresville, North Carolina 28115,

Phone: (704)-663-1699

County: Catawba Project: Bennetts Funneral Home Project #: Local Program Project

Person Financially Responsible: Bennetts Real Estate Holding LLC River basin: Catawba

Address: PO Box 234 Newton, NC 28658

1. Project location: HWY 16 First Inspection: Yes No
2. Weather & soil conditions: Sunny, Workable Soils Pictures: Yes No Video: Digital:
3. Is site currently under notice of violation? Yes No
4. Is the site in compliance with S.P.C.A. and rules? Yes No If no, check violations below:

5. Violations:

- a. No approved plan, G.S. 113A-57 (4) and 15A NCAC 4B.0107(c)
 b. Failure to follow approved plan, G.S. 113A-57(5)
 c. Failure to submit revised plan, G.S. 113A-54.1(b) and 15A NCAC 4B.0118(a)
 d. Failure to provide adequate groundcover, G.S. 113A-57(3); 15A NCAC 4B.0107(b) or 15A NCAC 4B.0124(e)
 e. Insufficient measures to retain sediment on site, G.S. 113A-57(3)
 f. Failure to take all reasonable measures, 15A NCAC 4B.0105
 g. Inadequate buffer zone, G.S. 113A-57(1)
 h. Graded slopes and fills too steep, G.S. 113A-57(2) or 15A NCAC 4B.0124(d)
 i. Unprotected exposed slopes, G.S. 113A-57(2)
 j. Failure to maintain measures, 15A NCAC 4B.011
 k. Failure to self-inspect G.S. 113A-54.1(e) and 15A NCAC 4B.0131
 l. Other:

6. Is the site in compliance with NPDES Permit NCG 010000? Yes No Not Applicable

If no, check violations below:

- m. Failure to manage construction site pollutants, NCG 010000 Sec. II, B.1
 n. Failure to provide ground stabilization, NCG 010000 Sec. II, B.2
 o. Failure to maintain rain gauge or record daily rainfall, NCG 010000 Sec. II, B.3(a,b)
 p. Failure to meet self-inspection and reporting requirements, NCG 010000 Sec. II, B.3(c-i)
 q. Failure to dewater sediment basin from surface, NCG 010000 Sec. II, B.4
 r. Failure to have approved plan and NPDES permit on site, NCG 010000 Sec. III, 3(d)
 s. Failure to install and maintain BMP's, NCG 010000 Sec. III, 4
 t. Failure to operate and maintain control measures, NCG 010000 Sec. IV, 1
 u. Bypass of stormwater control facilities, NCG 010000, Sec. IV, 3
 v. Other: Failure to install adequate concrete wash out

7. Has sedimentation damage occurred: since last inspection at 1st inspection? Yes No

If yes, where? (check all that apply):

- Lake/natural watercourse on the tract, Lake/natural watercourse off the tract, Other property

Description: Sediment has left the site from the ditch south of the site

Stormwater Discharge Outfall with sediment loss:

Degree of damage: slight moderate severe

8. Contact made with: Jerry Long Title: Site Supervisor

Date Inspection report sent to financially responsible party: N/A

Report by: Kenny S. Llywelyn Others present: NCDEQ: ZK, TY, JC/ Newton: AF

Date of inspection: 01/09/2019 Time arriving on site: 2:30PM Time leaving site: 3:00PM

cc:

SEDIMENTATION/CONSTRUCTION STORMWATER INSPECTION REPORT

North Carolina Department of Environmental Quality

Land Quality Section: 610 East Center Avenue, Suite 301, Mooresville, North Carolina 28115,

Phone: (704)-663-1699

9. Corrective actions needed:

1. Clean out offsite sediment in the ditch along HWY 16.
2. Repair all ditchlines and diversions on site and stabilize them. Install Rip rap protection as shown on the plans.
3. Establish groundcover to the entire site including slopes and areas around the basin.
4. Install energy dissipator to the discharge pipe in the basin as shown on the plans.
5. Repair and maintain construction entrance as shown on the plans.
6. Install concrete washout.
7. Install baffles in the basin as shown on the plans, to prevent shortcircuiting of the discharge pipe flow to the skimmer.
8. Install inlet protection as shown on the plans. Silt fence is not an approved material for inlet protection.
9. Clean out basin sediment and restore sediment level to the dimensions shown on the plan.

10. Comments:

Site is active. Measures have been installed. Measures have not been maintained. Site supervisor had a rain gauge and presented self inspection reports. The site was slightly wet with workable conditions to do site work.

Construction entrance stone has been compacted and is not functioning as designed. Silt fence along HWY 16 has fallen and has not been repaired. The site looks like it was seeded at some point but at the time of the inspection the vegetation has died out. Groundcover needs to be established on all completed and/or inactive areas including slopes, diversions, and the basin. There is not an established concrete wash out on site. There is an area between the building pad and the proposed septic field where concrete has been poured out.

Sediment has left the site in the south corner of the site near HWY 16. Sediment has washed out from the ditchline and from the discharge pipe in the basin. Sediment was observed inside the basin discharge pipe at the time of the basin. Rip rap stone in the ditch had been partially covered with sediment from the site. The diversion ditch at the back of the site (eastern side) has been mostly filled in with sediment and is almost flat to the grade of the site. There is a bend in this diversion to get the flow into the basin. This area is not sufficient to channel flow into the basin and has potential to cause sediment flow to bypass the basin and go offsite in the south east corner of the site. Sediment basin has been dug out deeper in the area around the skimmer than the rest of the basin. The bottom of the sediment basin should be uniform as shown on the plans and not a pit around the skimmer.

SEDIMENTATION/CONSTRUCTION STORMWATER INSPECTION REPORT

North Carolina Department of Environmental Quality

Land Quality Section: 610 East Center Avenue, Suite 301, Mooresville, North Carolina 28115,

Phone: (704)-663-1699

County: Catawba Project: Abernethy Phase 2 Project #: Local Program Project

Person Financially Responsible: United Church Homes and Services

River basin: Catawba

Address: 100 Leonard Ave. Newton, NC 28658

1. Project location: Shuford Circle Dr. First Inspection: Yes No
2. Weather & soil conditions: Sunny, Workable Soils Pictures: Yes No Video: Digital:
3. Is site currently under notice of violation? Yes No
4. Is the site in compliance with S.P.C.A. and rules? Yes No If no, check violations below:

5. Violations:

- a. No approved plan, G.S. 113A-57 (4) and 15A NCAC 4B.0107(c)
- b. Failure to follow approved plan, G.S. 113A-57(5)
- c. Failure to submit revised plan, G.S. 113A-54.1(b) and 15A NCAC 4B.0118(a)
- d. Failure to provide adequate groundcover, G.S. 113A-57(3); 15A NCAC 4B.0107(b) or 15A NCAC 4B.0124(e)
- e. Insufficient measures to retain sediment on site, G.S. 113A-57(3)
- f. Failure to take all reasonable measures, 15A NCAC 4B.0105
- g. Inadequate buffer zone, G.S. 113A-57(1)
- h. Graded slopes and fills too steep, G.S. 113A-57(2) or 15A NCAC 4B.0124(d)
- i. Unprotected exposed slopes, G.S. 113A-57(2)
- j. Failure to maintain measures, 15A NCAC 4B.011
- k. Failure to self-inspect G.S. 113A-54.1(e) and 15A NCAC 4B.0131
- l. Other:

6. Is the site in compliance with NPDES Permit NCG 010000? Yes No Not Applicable

If no, check violations below:

- m. Failure to manage construction site pollutants, NCG 010000 Sec. II, B.1
- n. Failure to provide ground stabilization, NCG 010000 Sec. II, B.2
- o. Failure to maintain rain gauge or record daily rainfall, NCG 010000 Sec. II, B.3(a,b)
- p. Failure to meet self-inspection and reporting requirements, NCG 010000 Sec. II, B.3(c-i)
- q. Failure to dewater sediment basin from surface, NCG 010000 Sec. II, B.4
- r. Failure to have approved plan and NPDES permit on site, NCG 010000 Sec. III, 3(d)
- s. Failure to install and maintain BMP's, NCG 010000 Sec. III, 4
- t. Failure to operate and maintain control measures, NCG 010000 Sec. IV, 1
- u. Bypass of stormwater control facilities, NCG 010000, Sec. IV, 3
- v. Other:

7. Has sedimentation damage occurred: since last inspection at 1st inspection? Yes No

If yes, where? (check all that apply):

- Lake/natural watercourse on the tract, Lake/natural watercourse off the tract, Other property

Description:

Stormwater Discharge Outfall with sediment loss:

Degree of damage: slight moderate severe

8. Contact made with: Brad Crumley Title: Site Supervisor

Date Inspection report sent to financially responsible party: N/A

Report by: Kenny S. Llywelyn Others present: NCDEQ: ZK, TY, JC/ Newton: AF

Date of inspection: 01/09/2019 Time arriving on site: 1:50PM Time leaving site: 2:25PM

SEDIMENTATION/CONSTRUCTION STORMWATER INSPECTION REPORT

North Carolina Department of Environmental Quality

Land Quality Section: 610 East Center Avenue, Suite 301, Mooresville, North Carolina 28115,

Phone: (704)-663-1699

cc:

9. Corrective actions needed:

1. Clean out drop inlets that are filled with sediment.
2. Install and maintain drop inlet protection until the area is stabilized.
3. Establish groundcover to the entire site including slopes and areas around drop inlets.

10. Comments:

Site is active and close to completion. Measures have been installed. The site was in the process of being landscaped at the time of the inspection. Site supervisor had a rain gauge and presented self inspection reports. The site was slightly wet with workable conditions to do site work.

At the time of the inspection there was not much left of site work. Parking lots have been installed and paved. The main building was built and contractors were working on small areas throughout the site. It was observed that inlet protection was being removed from the drop inlets on the western part of the site. It is in this area that several of the drop inlets were filled with sediment and need to be cleaned out. The discharge pipe for these western inlets was observed to have sediment in the pipe and in the rip rap apron beyond the pipe.