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**Operations Plan** 

# Colon Mine Site Structural Fill

Charah, Inc.

Sanford, NC

March 2015

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## 1 Introduction

## 1.1 Plan History

The following table provides a brief description of the revisions to the Operations Plan.

Revision	Date of Document	Description of Revisions
Initial Issue	October 15, 2014	Initial issuance of document.
Rev 1	December 31, 2014	Revised per NCDENR Comments DIN 22536
Rev 2	January 14, 2015	Revised per NCDENR Comments DIN 22502

## **1.2 Purpose**

The purpose of this Operations Plan is to provide for the safe and efficient operation of the Colon Mine Site Structural Fill. This Operations Plan presents the operational requirements for 1) general facility operations, 2) operations management, 3) erosion and sedimentation control, and 4) vegetation management along with guidance for structural fill closure and required regulatory submittals. The Operations Plan also includes a structural fill life estimate.

The Colon Mine Site is located in Lee County, North Carolina at 1600 Colon Road, Sanford, NC 27330.

## **1.3 Contact Information**

Correspondence and questions concerning the operation of the Colon Mine Site should be directed as follows.

Owner	Operator
Green Meadow, LLC	Charah, Inc.
12601 Plantside Drive Louisville, KY 40299	12601 Plantside Drive, Louisville, KY 40299
(877) 314-7724	(502) 245-1353
Facility Contact: Mr. Charles E. Price	Operations Contact: Mr. Scott Sewell

## 1.4 Safety

Operations at the Colon Mine Site were developed considering the health and safety of the facility's operating staff. The operating staff is provided with site-specific safety training prior to operations, and onsite activities are to be conducted according to the applicable sections of the Operator's Health and Safety Plan which shall be written to comply with all applicable OSHA standards. The Operator will prepare an Emergency Action Plan to address potential emergency situations at the site.

## **1.5 Access and Security Requirements**

Security for the site consists of fencing, gates, berms, and wooded buffers. Unauthorized vehicle access to the site is prevented around the property by woodlands, fencing, gates, and stormwater conveyance features.



The access road to the site is of all-weather construction and will be maintained in good condition. Potholes, ruts, and debris on the road(s) will receive immediate attention in order to avoid damage to vehicles.

## 1.6 Equipment

In accordance with NCGS §130A-309.216 (a) (4) equipment will be provided that is capable of placing and compacting the coal combustion products (CCP) and handling the earthwork required during the periods that CCPs are received at the fill project. The structural fill site will have sufficient equipment to provide structural fill placement and compaction operations. Where possible, spare or substitute equipment will be provided as needed. If spare or substitute equipment is not available, other equipment may be obtained from other onsite operations. If other equipment is not available after 14 days, arrangements will be made for replacement equipment until the original equipment can be placed back in service.

## **1.7 Operating Hours**

The Colon Mine Site is open for operation between the hours of 7:00 AM and 7:00 PM, Monday through Saturday. It is anticipated that this schedule will continue; however, operational hours may change as the need arises.

## 1.8 Signs

A sign providing facility name and operating hours will be posted at the site entrance and shall be maintained in good condition. Additional signs may be posted to facilitate facility operations as needed.

## 1.9 Training

Due to the diversity and nature of job tasks required at the site, personnel shall be adequately trained to handle facility operations and maintenance.

The site superintendent shall have a general understanding of all the tasks required for site operations. Individuals performing the various tasks shall have adequate training for the site-specific tasks they are assigned.

Noteworthy operations and maintenance tasks to be addressed in training include the following.

- Maintaining accurate records of fill loading (quantitative and qualitative)
- Operating requirements for stormwater segregation from exposed CCP material
- Operating and maintaining the leachate collection system (LCS)

## 1.10 Recordkeeping

An operating record is to be maintained onsite and include the following records.

- Leachate Collection System Maintenance Documentation & Disposal Records
- Erosion and Sedimentation Control Inspection Logs
- Groundwater Monitoring (and Sampling) Report
- Precipitation Totals

- Daily Operation Record
- Employee Training Records and Materials
- or anything else as indicated in the Operations Plan

The above records are to be kept in the operating record for the active life of the Colon Mine Site and the 30-year post-closure period. Information contained in the operating record must be furnished upon request to the North Carolina Department of Environment and Natural Resources (NCDENR). Additional records kept onsite should include the following.

- Facility permit application
- Facility permits
- Record of the amount of structural fill placed on a monthly basis
- Regulatory agency inspection reports
- Construction documents
- Employee training records
- As-built drawings and specifications
- Health & Safety Plan
- Emergency Action Plan

### 1.11 Permit Drawings

Permit drawings are included in the structural fill permit application.

## 2 Operations Management

The primary objective of operations management at the Colon Mine Site is to place structural fill in the form of CCPs in compliance with permit conditions while operating in a safe manner. Prior to placement of CCP in a new cell, new subcell, or portion of a new subcell, the Owner will submit to NCDENR the Construction Quality Assurance documentation for the constructed base liner for review. Should any discrepancies be indicated, NCDENR will contact the Owner for follow up. Placement of CCP in new cell, new subcell, or portion of a new subcell prior to approval by NCDENR will be at the owner's risk.

The structural fill site has been designed to provide separation of contact water from noncontact water. Contact water is defined as water that contacts CCP material within the geomembrane lined limits of structural fill. Contact water will be managed as leachate while non-contact water will be managed as stormwater. Contact water and non-contact water separation are further described in subsequent sections of this plan.

Filling operations will generally proceed from low to high. The working face will be limited to as small an area as practical, at the owner's discretion. Contact water from the active face will be directed to the leachate collection system.

Intermediate cover will be placed as CCP fill reaches final grades to prevent contact water from entering the stormwater control features.

### 2.1 Structural Fill Placement and Sequencing

#### 2.1.1 Structural Fill Capacity

The total anticipated airspace capacity for the Colon Mine Site is approximately 7.25million cubic yards and is based on a proposed 118-acre fill area.

#### 2.1.2 Structural Fill Acceptance Requirements

In accordance with NCGS §130A-309.216 (a) (2) CCPs shall be collected and transported in a manner that will prevent nuisances and hazards to public health and safety. CCPs shall be moisture conditioned, as necessary, and transported in covered trucks or rail cars to prevent dusting. As such, the Colon Mine Site can accept CCPs defined as fly ash, bottom ash, boiler slag, or flue gas desulfurization materials in NCGS §130A-309.216 (4).

In accordance with NCGS §130A-309.215 (b) (1) d, a Toxicity Characteristic Leaching Procedure (TCLP) analysis has been performed on a representative sample from Duke Energy's Sutton Plant and Riverbend Steam Station CCP sources to be used in the structural fill project. Each was analyzed for, at a minimum, the following constituents: arsenic, barium, cadmium, lead, chromium, mercury, selenium, and silver. The TCLP results are included in the Related Documents section of this application. TCLP tests will be performed on each new ash source and at least annually for each source.

Asbestos containing material will not be placed in the structural fill site. In addition, the removal of CCP structural fill material from the site is prohibited without owner approval. Structural fill will be hauled and placed by dedicated and consistent operators.

#### 2.1.3 Fill Sequencing

The Colon Mine Site will be developed in sequence from Cell 1 through Cell 5. CCP product will be placed in three to five foot operational lifts, low to high. A conceptual schematic of fill sequencing from low to high is included in the permit drawings; however, actual fill sequencing and lift heights may be modified at the Owner's discretion. More than one cell may be operational at a time. The cells are also subdivided into subcells.

The following procedure shall be followed to activate an area for leachate collection prior to placing CCP.

- Remove all stormwater (i.e., water that has not contacted ash) ponded within the area. Stormwater may be pumped directly into the perimeter channel.
- Open the leachate valve. Ensure the valve is opened fully.
- Remove the rain flap by cutting above the weld to the sacrificial liner above the primary geomembrane (refer detail 8 on Drawing 00C-08). Visually inspect the area to confirm the integrity of the base liner. If the base liner appears damaged, repair it in accordance with the technical specifications.

Document on a site plan the location of the subcell where the stormwater valve was closed, the leachate valve was opened, the rain flap was removed, condition of the base liner, and the specifics of any repairs that were made. Place the documentation in the operating record.

#### 2.1.4 Fill Placement

Structural fill placed at the Colon Mine Site will be transported to the facility via railcar or highway-rated vehicles. Upon reaching the site, off-road equipment may be utilized, within the facility boundary, to transport material to the active working area. After initial placement, additional operational equipment generally consisting of vibratory smooth drum rollers, sheepsfoot compactors, bulldozers, water trucks, spray trailers, track hoes, and service trucks may be utilized in fill placement.

Fill progression will be maintained to provide controlled drainage of contact water to the leachate collection system and stormwater runoff to the stormwater benches and perimeter ditches. No fill shall be placed in standing water.

#### 2.1.5 Compaction Requirements and Testing

After the bottom liner is placed and approved, CCP placement may begin. The initial CCP lift placed should be two to three feet thick to protect the liner system. The initial lift shall be placed in a manner that minimizes development of folds in the geosynthetics. The surface should be lightly compacted to help avoid potential damage to the liner system.

Subsequent lifts of CCP should be placed in 12-inch thick loose lifts and compacted to at least 95 percent of its Standard Proctor (ASTM D698) maximum dry density. It may be necessary to adjust the moisture content of the CCP fill to achieve the specified compaction.

#### 2.1.5.1 IN-PLACE DENSITY AND MOISTURE CONTENT TESTING

In-place density and moisture content testing shall be performed at a minimum frequency of one test per 10,000 tons placed. CCP shall be compacted to a minimum 95 percent of its Standard Proctor (ASTM D698) maximum dry density. Compacted moisture content shall be within five percent of the material's optimum moisture content as determined by ASTM D698. If field density tests indicate that the relative compaction or moisture content requirements are not met, the material shall be moisture conditioned and/or re-worked and re-tested until the compaction density and moisture requirements are met. The field density testing report should document any failing tests and re-work required to meet testing requirements.

In-place density tests shall be performed using the Sand Cone Method (ASTM D1556), Drive-Cylinder Method (ASTM D2937), or Nuclear Method (ASTM D6938). If the nuclear method is selected, a minimum of one comparison density test using the Sand Cone or Drive Cylinder method shall be performed for every three nuclear density tests, and correlations between the test methods shall be developed and reviewed by the Engineer. A sample of CCP material shall be collected from each density test location and placed in a sealed container for subsequent field and laboratory moisture testing.

A family of Proctor curves shall be developed for the onsite CCP material as standard Proctor moisture-density tests are performed as a reference for the field density testing. Laboratory proctors shall be conducted at one test per 50,000 tons of CCP placed. A minimum of one (1) one-point field Proctor test shall be performed for each week of field density testing or if there is a noticeable change in material. Additional Standard Proctor samples shall be obtained and tested if one-point Proctor testing indicates that the estimated maximum dry density of the

material varies by more than five pounds per cubic foot (pcf) from the nearest representative standard Proctor moisture-density relationship as determined by the one-point Proctor method.

Field moisture content testing shall be performed for each density test using the Direct Heating Method (ASTM D4959). The Nuclear Method (ASTM D6938) shall not be used for moisture content testing on the CCP material. Comparison laboratory moisture content testing shall be performed using the Oven Method (ASTM D2216), at an oven temperature of 60 degrees Celsius. The laboratory moisture content shall control in the event of a discrepancy between laboratory moisture content and in-place moisture content.

#### 2.1.5.2 LABORATORY TESTING

Laboratory moisture content testing shall be performed in conjunction with the field density testing as described above. The laboratory moisture content testing shall be performed using the Oven Method (ASTM D2216), at an oven temperature of 60 degrees Celsius.

#### 2.1.6 Cover Requirements

#### 2.1.6.1 INTERIM COVER SOIL

Interim cover soil should be applied, as needed, for dust control and stormwater management. The interim cover may be applied at a thickness suited to its purpose. For example, the interim cover soil may be applied in thinner layers to provide dust control and it may be applied in thicker layers where protection from surface erosion is desired.

Interim cover layer may be placed on exterior slopes and in areas where final structural fill grades have been reached. Interim cover will be seeded within seven days in accordance with erosion and sediment control requirements. Vegetation shall be removed and the interim cover soil shall be scarified or removed prior to placing any overlying CCP material or final cover system. Interim cover soil is not required, but may be used to protect the CCP materials and segregate contact water from stormwater.

#### 2.1.6.2 FINAL COVER

The final cover consists of a six foot thick system of layers for the top slopes and a four foot thick system of layers for the sideslopes. Each area has two options. Option 1 has a one foot thick drainage soil placed directly above the HDPE geomembrane. Option 2 replaces the drainage layer soils with unclassified soils and has a geocomposite placed immediately above the HDPE geomembrane. See the table below and the details on the drawings for additional information.

Layer	Sideslope Option 1	Top slope Option 1	Sideslope Option 2	Top slope Option 2
Topsoil	6 inches	6 inches	6 inches	6 inches
Low Perm Soil	12 inches	12 inches	NA	Not used
Unclassified Soil	12 Inches	24 inches	42 inches	66 inches
Drainage Soil	18 inches	30 inches	NA	NA
Geocomposite	Not used	Not used	used	used
HDPE Geomembrane	40 mil	40 mil	40 mil	40 mil

The final cover system construction for the structural fill site will begin 30 working days or 60 calendar days, whichever is less, after CCP placement completion unless otherwise approved by NCDENR.

Please refer to the Closure/Post-Closure Plan included in this Permit Application for final cover specifications and maintenance requirements.

#### 2.1.7 Dust, Litter, Odor, and Vector Control

Litter, odors, and vectors are not anticipated to be concerns. The material placed in the structural fill does not attract vectors, and windblown material is not anticipated to be a problem. Additionally, CCP materials are not typically associated with odors.

#### 2.1.7.1 DUST CONTROL

In accordance with NCGS §130A-309.216 (a) (9) the structural fill project will be operated with sufficient dust control measures to minimize airborne emissions and to prevent dust from creating a nuisance or safety hazard and shall not violate applicable air quality regulations.

The primary potential source of dust emissions on site is the top deck area and active area of structural fill placement. These areas are at a higher risk for producing dust due to vehicular and equipment traffic and earthwork-like construction. Exterior slopes are less of a dust control concern, as they have interim cover soil which is vegetated.

Dust emissions can be controlled through a variety of methods identified herein. Dust control methods may be characterized as products and/or applications, structural wind breaks and/or covers, and operational methods.

Dust control methods for the facility include the following.

- Watering
- Establishing vegetative cover
- Mulching
- Structural controls consisting of:
  - Wind breaks (i.e. fencing and/or berms), and
  - Temporary coverings (i.e. tarps)
  - Spray applied dust suppressants consisting of, and not limited to:
    - o Anionic asphalt emulsion
    - o Latex emulsion
    - o Resin in water
    - o Polymer based emulsion
    - Mineral mortar coatings (i.e. posi-shell)
- Calcium chloride
- Soil stabilizers (i.e. soil cements)
- Operational soil cover
- Modifying the active working area
- Modifying operations during dry and windy conditions



The effectiveness of the dust control methods implemented should be evaluated through visual observations of dust prone areas. Equipment operators shall continuously observe the active face and other areas within the facility for dust emissions.

If fugitive dust emissions are observed and observations indicate dust control measures are not achieving their intended purpose, then appropriate corrective actions will be taken. Dust control measures should be reapplied, repaired, or added, as necessary, to control dust emissions. The operator will construct, install, apply, and/or repair dust control measures prior to the end of the work day to control dust emissions during non-operating hours. The operator shall also implement dust control measures as preventative controls rather than in response to fugitive dust emissions.

A wheel wash system may be necessary to minimize dust and tracking of CCPs outside the facility.

### 2.2 Leachate and Contact Water Management

In accordance with NCGS §130A-309.216 (a) (5) the CCP structural fill project will be effectively maintained and operated as a nondischarge system to prevent discharge to surface water resulting from the project.

As previously described, the structural fill site has been designed to provide separation of contact water from non-contact water (stormwater). Contact water will be treated as leachate and conveyed to the LCS. Contact water which contacts exposed CCP material within the lined footprint will be conveyed through the LCS. Stormwater will be routed to onsite sediment basins prior to discharge from the site.

#### 2.2.1 Leachate Collection System

The LCS includes a synthetic composite drainage layer and leachate collection pipes with clean-outs. Leachate generated in each cell drains by gravity via perforated header pipes to a series of sumps and then pumped to a central lift station where it is then pumped into a 1,000,000 gallon storage tank with a secondary containment. Leachate will either be transported to a wastewater treatment plant or discharged directly into a sanitary sewer system.

All loading of leachate tankers will take place on the loading pad next to the storage tank. Prior to loading the operator will insure that the leachate diverter valve is open on the drain pad so any leachate that may be spilled during loading operations will drain back into the lift station.

It will be the responsibility of the tanker operator to ensure that the load is within legal transportable limits. If the load exceeds permissible limits then the tanker operator will:



- Go back to the loading drain pad
- Verify that the leachate diverter valve is open
- Discharge a quantity of leachate sufficient to meet the maximum transport weight capacity

The owner is responsible for the operation of the leachate collection and removal system and for maintaining the system as designed for the life of the structural fill and the post-closure period. The department may allow the constructor or operator to stop managing leachate upon a satisfactory demonstration that leachate from the project no longer poses a threat to human health and the environment. Leachate shall be collected and treated as necessary so that water quality standards and criteria are not violated. A recording rain gauge will be maintained onsite to record precipitation at the structural fill site. Precipitation records are included with the operating record and are maintained and used by the Operator to compare with leachate generation rates.

#### 2.2.2 LCS Maintenance

The maintenance of the leachate collection system's physical facilities (consisting of highdensity polyethylene (HDPE) piping and storage unit(s)) and records will be performed by or under the direct supervision of the Owner or Owner's representative. Visual observations of proper LCS performance will be made periodically to verify that the LCS is performing properly.

New leachate collection systems will be water pressure washed and inspected by video recording prior to putting the system into service. Until the structural fill unit is closed, the system will be re-inspected by video once every two years, then cleaned if video indicates a concern. If it becomes apparent that the system is not functioning properly, it may be inspected by video. Records of the collection system cleanings and inspections shall be kept onsite. A report shall document each video and/or cleaning activity and shall include the following details at a minimum.

- General details (a signed letter/report with company name that performed the cleaning/video inspection, dates & time for jet-cleaning/video inspection, any historical issues associated with jet-cleaning/video inspection, etc.)
- Pipe IDs that were jet-cleaned/video inspected; for example: Cleanout 1 was jet cleaned/video inspected
- Length of each pipe jet-cleaned/video inspected; for example: Cleanout 1 was jet cleaned/video inspected for 400 feet
- Any obstruction or unusual situation that occurs during jet-cleaning/video inspection. For example: Cleanout 2 was jet cleaned 20 feet only as pressure hose did not go beyond
- The maintenance frequency of the LCS may be modified based on consecutive inspection results and observed operating conditions

#### 2.2.3 LCS Record Keeping and Sampling

. Untreated leachate shall be sampled and analyzed at least semi-annually concurrently with the groundwater sampling. Leachate will be sampled as a composite grab sample from the effluent line of the leachate collection system. The leachate must be analyzed for the same constituents

as the groundwater monitoring wells in the Water Quality Monitoring Plan included with the Design Hydrogeological Report contained in this Permit Application. The results must be submitted to NCDENR with groundwater results.

### 2.3 Stormwater Management System

The stormwater management system includes slope drains, culverts, perimeter channels, etc., that convey stormwater to the sediment basins. Stormwater that does not come in contact with structural fill will be treated as non-contact water. To improve operations, stormwater should be diverted from the active area. Excessive surface water at the working face creates difficulties for maneuvering equipment and prevents the operator from achieving maximum compaction of structural fill. To divert stormwater runoff away from the working face, temporary diversion berms may be installed as dictated by the direction of grade. In addition, interim soil cover may be placed over structural fill that has reached final grade. This cover will be uniformly graded and compacted to prevent the formation of erosion channels. In the event that channels do form, the cover should be promptly repaired.

Typically, all stormwater runoff that has not contacted structural fill will be drained from the active fill areas and routed to the peripheral drainage channels that surround each working area. The stormwater channels, culverts, and sedimentation ponds are designed to convey and discharge all stormwater runoff from a 25-year, 24-hour-duration storm event. Within the active portion of the site, all working areas are to be maintained and graded to allow stormwater to flow away from the active face and toward the peripheral drainage channels. Interceptor berms to control the flow of runoff from the surface are to be constructed so that runoff will not be allowed to cascade down the side slopes.

The stormwater management system within the structural fill boundary will be constructed during each phase of partial closure. A series of permanent swales and structures to control the flow of runoff from the finished and capped structural fill will be used. These swales and structures will assist in the prevention of erosion damage to the structural fill's final cover. The stormwater management structures will be in accordance with the closure plan for the full buildout. Minor modifications to the locations of terraces, inlet structures and slope drains may be required depending on the prevailing grades of the structural fill cover at the time of closure due to settlement. If such modifications are needed, an investigation will be performed to confirm that worst case input parameters will not be exceeded. If any of the worst case input parameters exceed, original calculations will be revised prior to closure to confirm that original design intent is met.

The stormwater management system outside the structural fill footprint will be constructed along with each cell construction. The stormwater channels are constructed around the perimeter of the site as shown on the closure plan so that stormwater from the closed fill areas will flow into these ditches and then into the stormwater detention ponds. The stormwater detention areas are designed to control all runoff from this nearly impervious final cover cap.

Stormwater collection and conveyance measures will be inspected and maintained in accordance with the current Erosion and Sedimentation Control (E&SC) Plan.

The following shall be performed on all permitted systems.

- Removal of debris, if any
- Inspection of inlets, outlets and culverts
- Removal of sediments when the storage volume or conveyance capacity of the system is below design level or when the system is rendered ineffective on account of clogging/sedimentation of the pond bottom
- Any breach of the system's integrity shall be immediately repaired. Whenever erosion is detected, measures shall be taken to stabilize and protect the affected area
- Mowing and removal of grass clippings

#### 2.3.1 Stormwater Discharge

The stormwater system at the site was designed to assist in preventing the discharge of pollutants. Structural fill operation shall not cause a discharge of pollutants into waters of the United States, including wetlands, that violates any requirement of the Clean Water Act, including but not limited to NPDES requirements, pursuant of Section 402. In addition, under the requirements of Section 404 of the Clean Water Act, the discharge of dredge or fill material into waters of the state that would be a violation of the requirements shall not be allowed.

Operations of the site shall not cause the discharge of a non-point source of pollution to waters of the United States, including wetlands, that violates any requirements of an area-wide or statewide water quality management plan that has been approved under Section 208 or 319 of the Clean Water Act, as amended.

#### 2.3.2 Contact and Stormwater Maintenance Requirements

All drainage features (i.e., diversion ditches, berms, risers, discharge pipes, etc.) will be inspected and maintained in accordance with the current E&SC Plan and documented for signs of damage, settlement, clogging, silt buildup, or washouts. If necessary, repairs to drainage control features will be made as early as practical. The stormwater controls and/or erosion control measures shall be employed to correct any erosion which exposes CCP or causes malfunction of the stormwater management system. Such measures shall be implemented within three days of occurrence. If the erosion cannot be corrected within seven days of occurrence the structural fill site operator shall notify the Department and propose a correction schedule.

### 2.4 Water Quality Monitoring Requirements and Management

In accordance with NCGS §130A-309.216 (a) (6) the structural fill project will be effectively maintained and operated to ensure no violations of groundwater standards adopted by the Commission pursuant to Article 21 of Chapter 143 of the General Statutes due to the project. Groundwater and surface water will be monitored in accordance with the Water Quality Monitoring Plan included with the Design Hydrogeological Report contained in this Permit Application.



Groundwater monitoring wells are located around the facility's perimeter. A readily accessible, unobstructed path shall be maintained so that monitoring wells may be accessed using four-wheel drive vehicles. Care must be taken to prevent any damage to the wells.

## 3 Erosion and Sedimentation Control

Erosion and sedimentation control during filling operations will consist of monitoring and repairing E&SC stormwater conveyance features and surface erosion as defined in this Operations Plan and the current E&SC plan. Monitoring and maintenance of the E&SC system will be in accordance with the current E&SC Plan.

## 4 Vegetation Management

Vegetation will be established to minimize erosion and to ensure no visible CCP migration to adjacent properties. Temporary and permanent seeding will be applied as required. Temporary and permanent seeding will be applied in accordance with Technical Specification 02485, Seeding included in this Permit Application.

# 5 Site Closure

The Colon Mine Site will be closed in accordance with the design drawings and Closure/Post-Closure Plan. The Closure/Post-Closure Plan outlines the sequence for closing the site and the post-closure maintenance activities. Closure is designed to minimize the need for long-term maintenance and to control the post-closure release of contaminants. Closure activities may be revised as appropriate for materials, specifications, technology advancements, or changes in regulations at the time the site is closed or in post-closure. In general, the site development is designed so that final cover can be established as soon as practical.

# 6 Required Regulatory Submittals

Water Quality Monitoring Reports will be submitted to NCDENR in accordance with the Water Quality Monitoring Plan included with the Design Hydrogeological Report contained in this Permit Application.