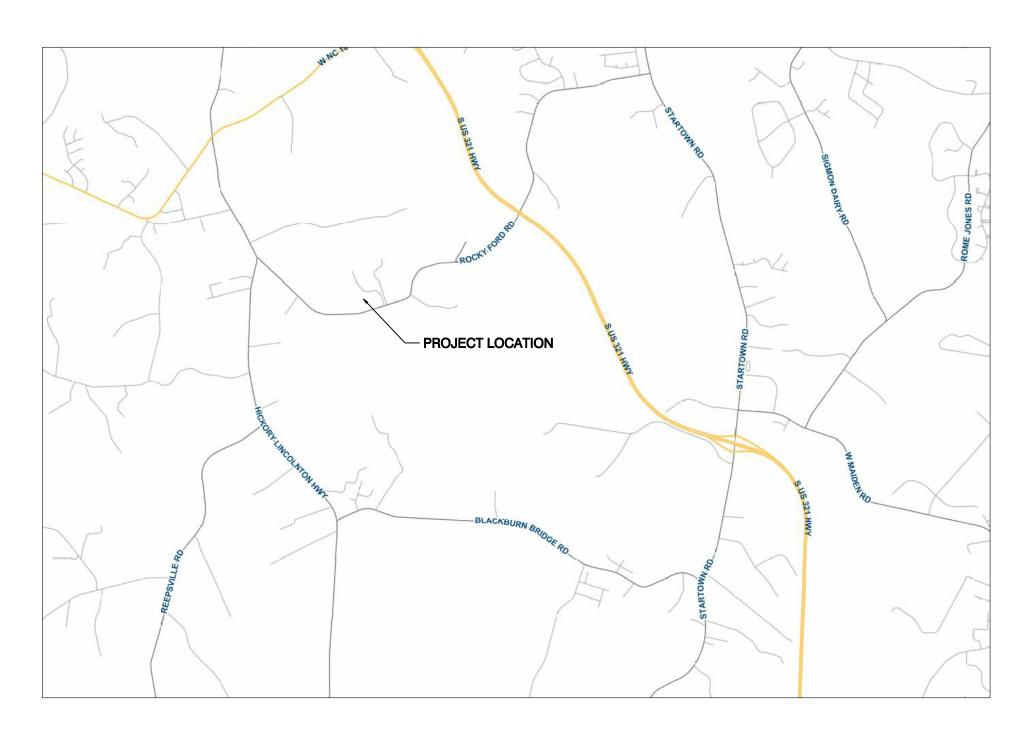
### CATAWBA COUNTY BLACKBURN RESOURCE RECOVERY FACILITY

# TREATMENT AND PROCESSING FACILITY CONSTRUCTION DRAWINGS

#### LOCATION MAP



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SHEET 1 EXISTING CONDITIONS

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**DETAILS** 

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**DETAILS** 

GONTRAM ARCHITECTS NEW SCALE HOUSE DRAWINGS

12-05-2024

RPA ENGINEERING TIRE BUILDING DRAWINGS

05-15-2025

MAY 2025





FACILITY
CESSING FACILIT
COMPOST

TREATMENT AND PROCES
SMALL TYPE 1 CON

**ISTRUCTION DRAWING** 

SHEET





GARRETT

& MOORE
Engineering for the Power and Waste In

CATAWBA COUNTY
BLACKBURN RESOURCE
RECOVERY FACILITY
REATMENT AND PROCESSING FAC

1G CONDITIONS





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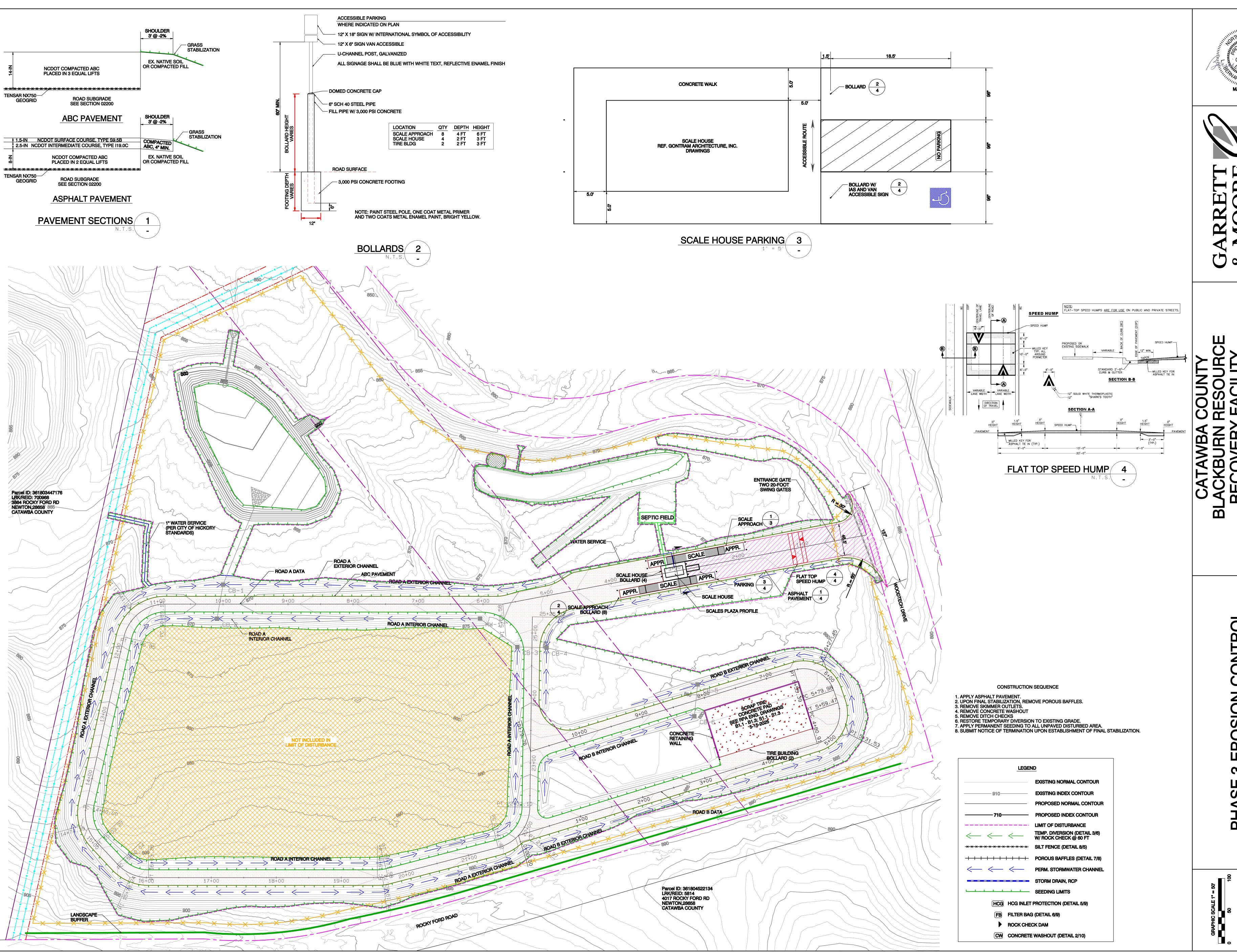




BLACKBURN RESOURCE
RECOVERY FACILITY
TREATMENT AND PROCESSING FACI

SE 2 EROSION CONTROL GRADING

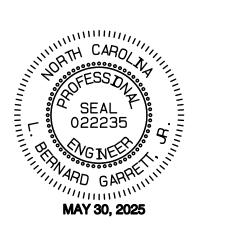
SHEET







EROSION CONTRO CONSTRUCTION

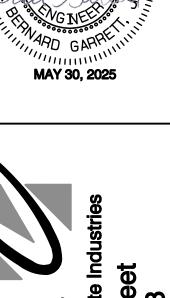




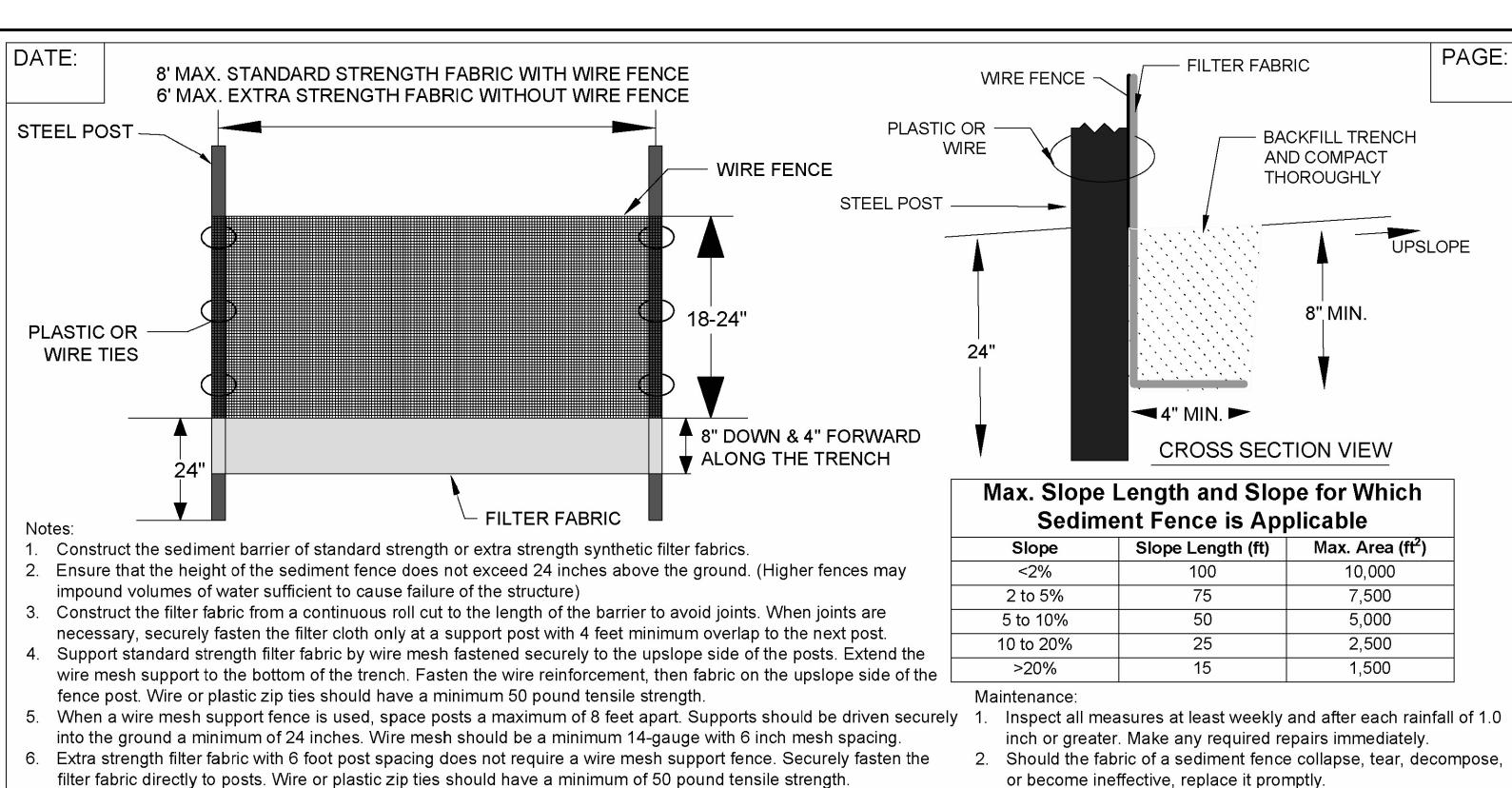
CATAWBA COUNTY
BLACKBURN RESOURCE
RECOVERY FACILITY
TREATMENT AND PROCESSING FAC

PROFILES 30AD A DATA





6.08 Temporary Gravel Construction Entrance Edt.JPG



9. Backfill the trench with soil placed over the filter fabric and compact. Thorough compaction of the backfill is critical to

8. Place 12 inches of fabric along the bottom and side of the trench.

11. Do not place across ditches, streams, or any other areas of concentrated flow.

silt fence performance.

10. Do not attach filter fabric to existing trees.

inch or greater. Make any required repairs immediately. Should the fabric of a sediment fence collapse, tear, decompose,

or become ineffective, replace it promptly. Excavate the trench approximately 4 inches wide and 8 inches deep along the proposed line of the posts and upslope 3. Remove sediment deposits as necessary to provide adequate storage volume for the next rain and reduce pressure on the fence. Take care to avoid undermining the fence during cleanouts. Remove all fencing materials and unstable sediment deposits and bring the area to grade and stabilize it after the contributing

drainage area has been properly stabilized.

3. Remove sediment deposits when it reaches

half full. Replace if baffle fabric is damaged

during clean-out operations. Sediment depth

should never exceed half the designed storage

Effective Date: 9/1/2023

In accordance with the 2013

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Effective Date: 9/1/2023 In accordance with the 2013

6.62 Sediment Fence.JPG

SEDIMENT FENCE (2)

PAGE:

UPSLOPE

**BACKFILL TRENCH** AND COMPACT

THOROUGHLY

8" MIN.

Max. Area (ft<sup>2</sup>)

10,000

7,500

5,000

2,500

1.500

Design Manual Updates

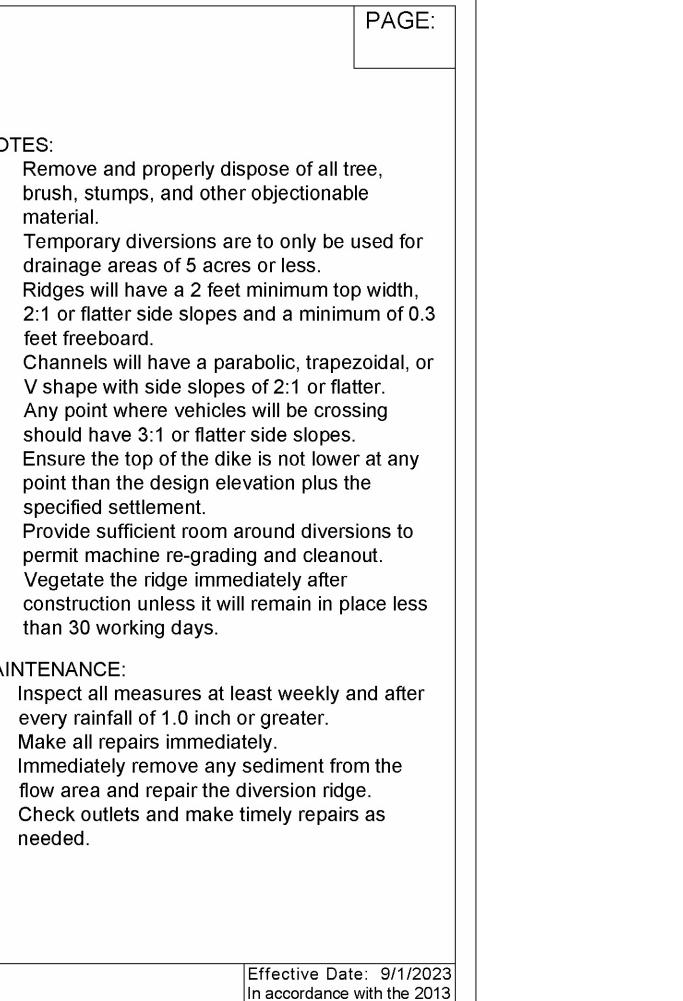
## FA 回

CONTRO SEDIMENT DETAILS

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SHEET 7



Remove and properly dispose of all tree, brush, stumps, and other objectionable

V shape with side slopes of 2:1 or flatter.

Any point where vehicles will be crossing

should have 3:1 or flatter side slopes.

point than the design elevation plus the

Provide sufficient room around diversions to

permit machine re-grading and cleanout.

Vegetate the ridge immediately after

every rainfall of 1.0 inch or greater.

Immediately remove any sediment from the

|Design Manual Updates|

flow area and repair the diversion ridge.

4. Check outlets and make timely repairs as

Make all repairs immediately.

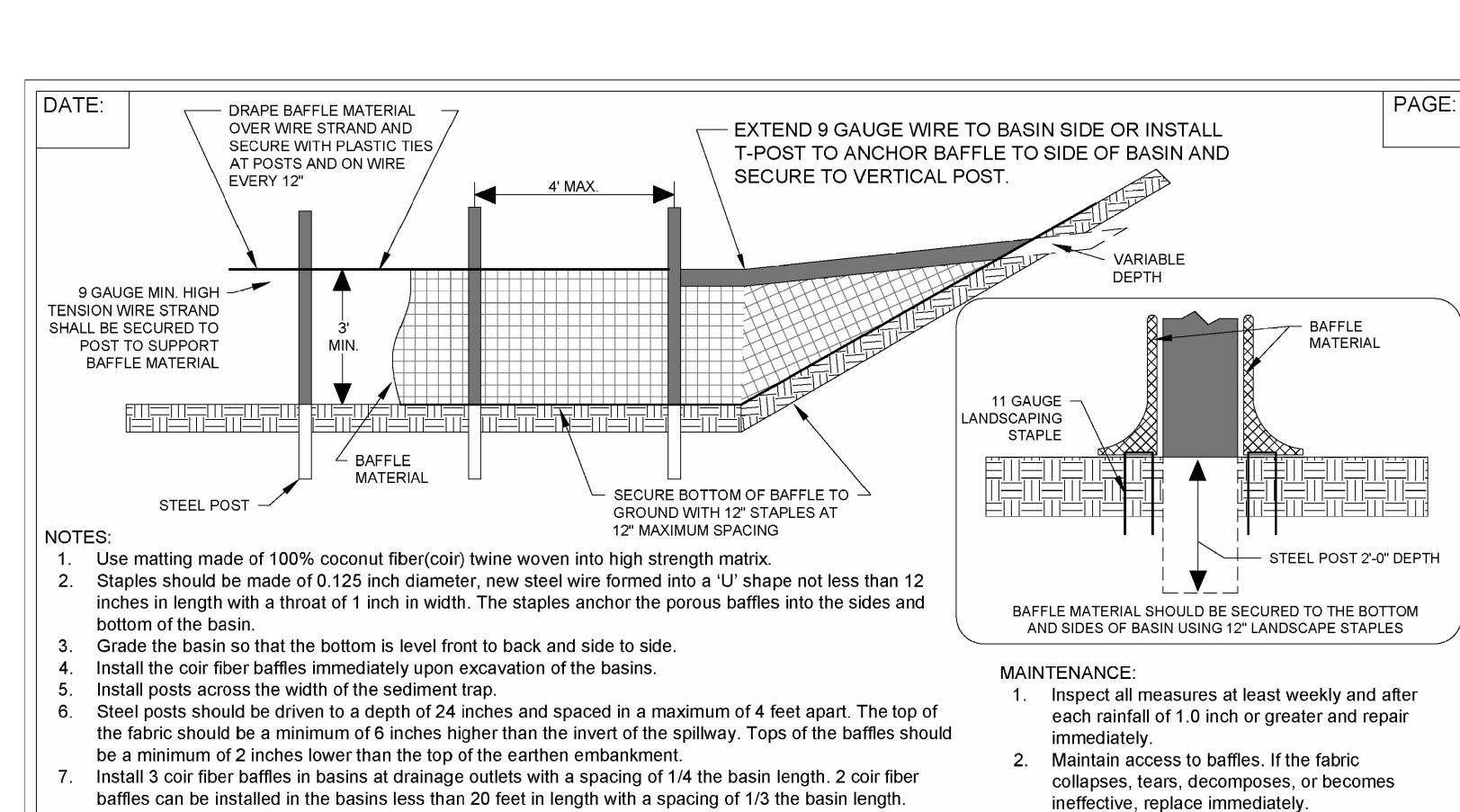
drainage areas of 5 acres or less.

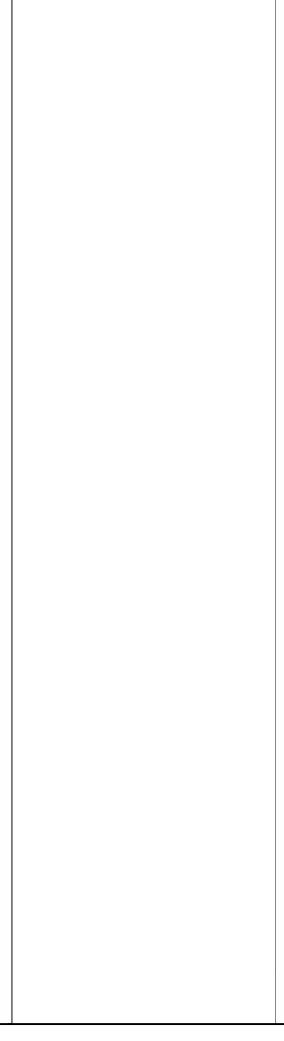
feet freeboard.

specified settlement.

than 30 working days.

MAINTENANCE:





8. Attach a 9-gauge high tension wire strand to the steel posts at a height of 6 inches above the spillway elevation with plastic ties or wire fasteners to prevent sagging. If the temporary sediment basin will be converted to a permanent stormwater basin of a greater depth, the baffle height should be based on the pool depth during use as a temporary sediment basin.

POROUS BAFFLES (4)

TEMPORARY DIVERSIONS (3)

18" MIN.

TEMPORARY EARTHEN DIVERSION DIKE

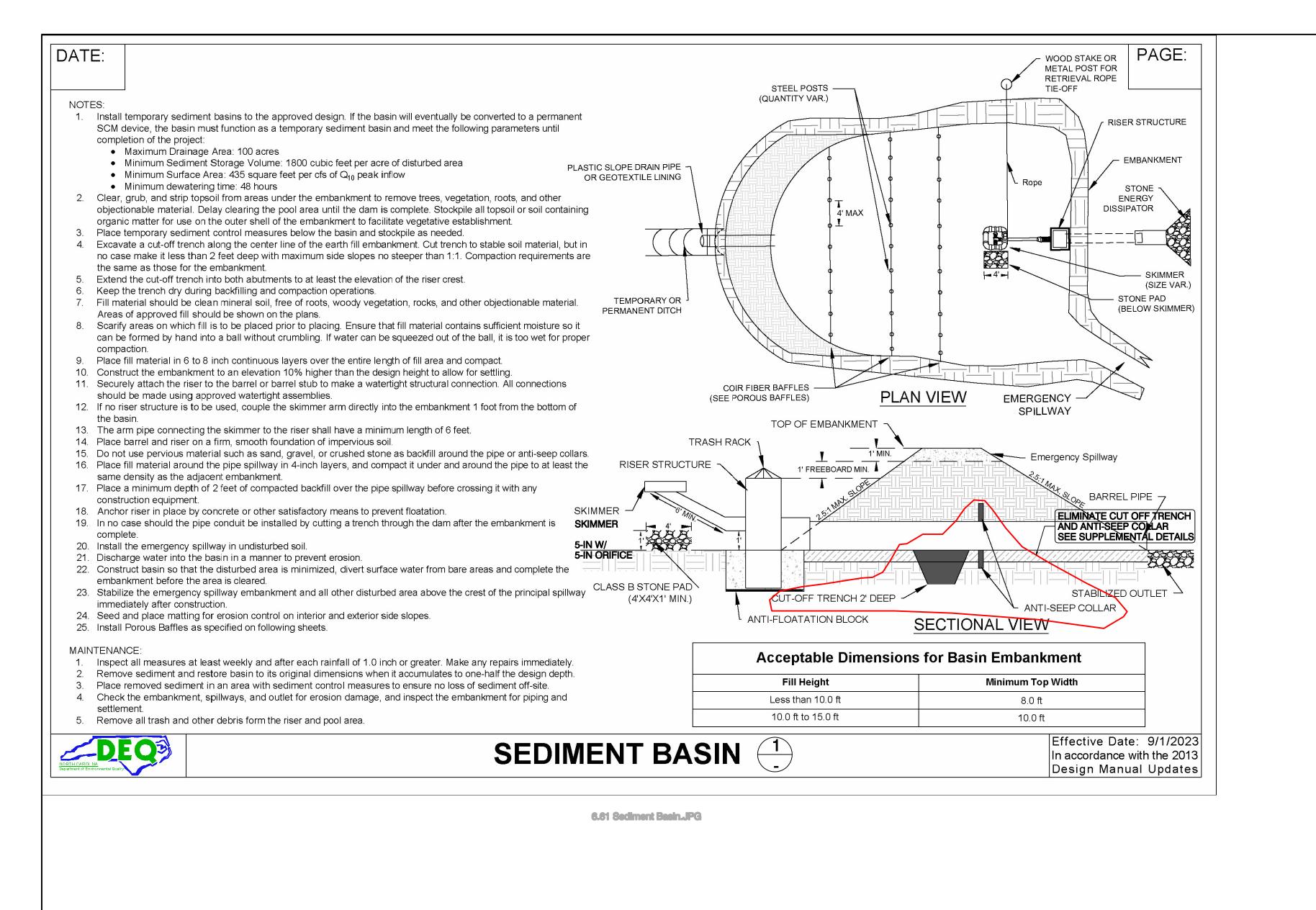
TEMPORARY GRAVEL DIVERSION DIKE FOR VEHICLE CROSSING

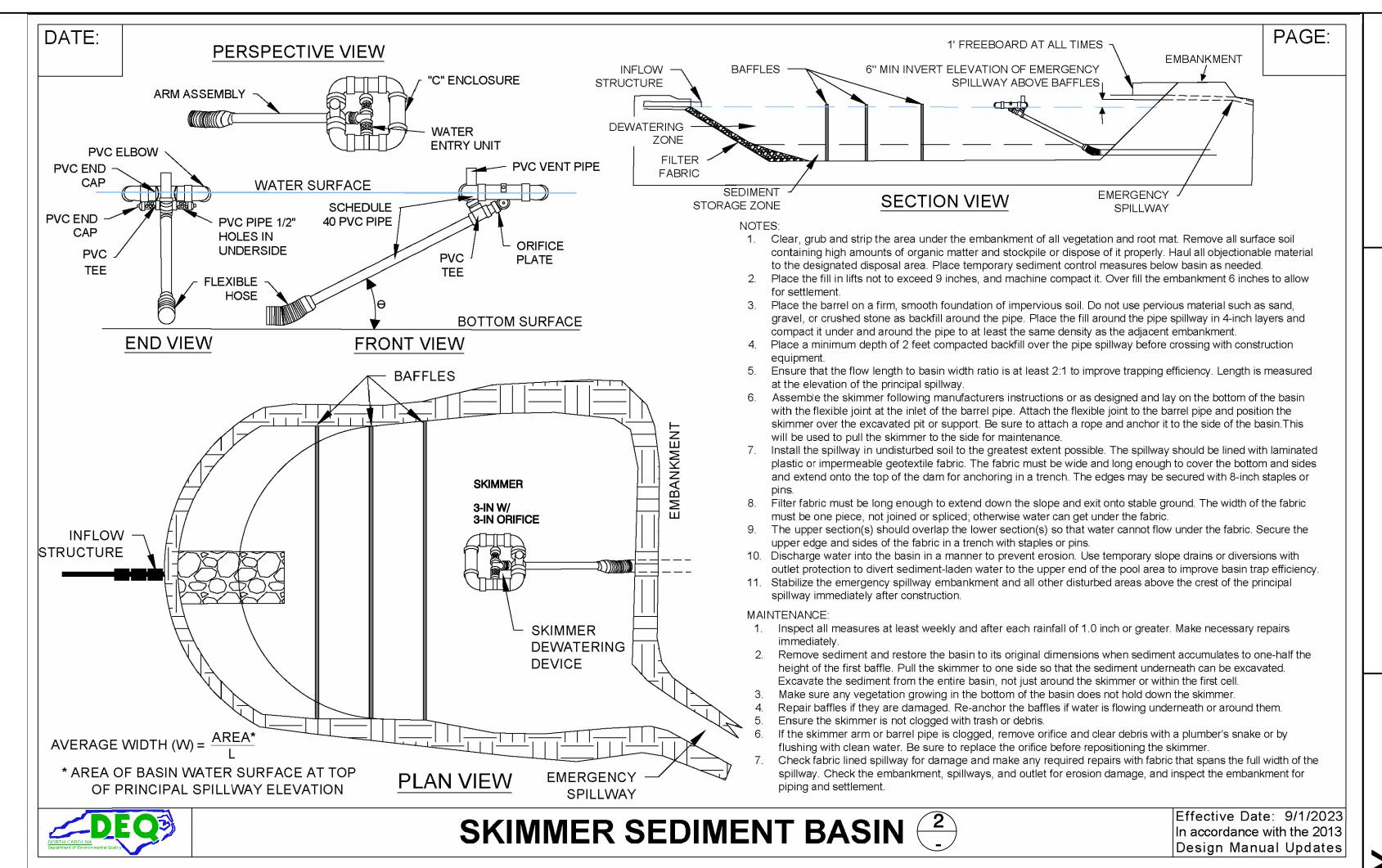
9' TYPICAL

DATE:

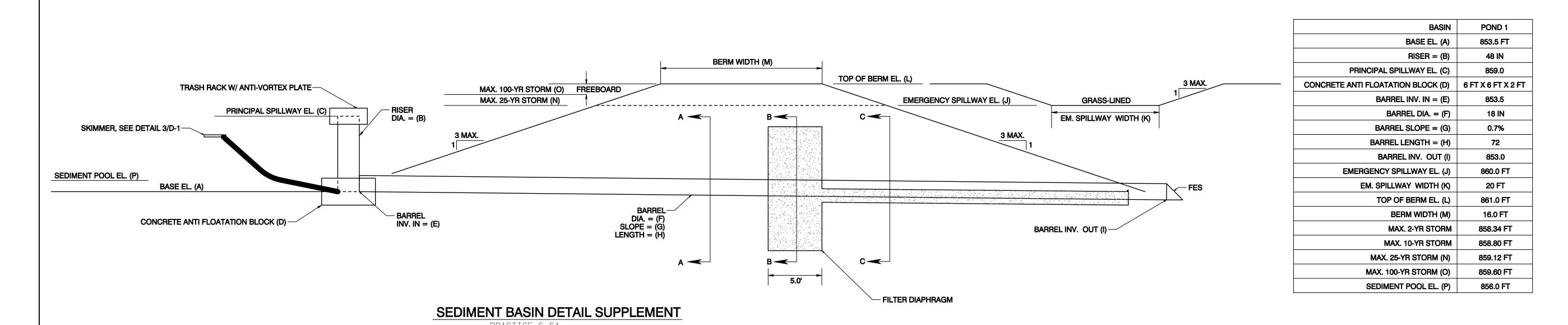
DEQ3

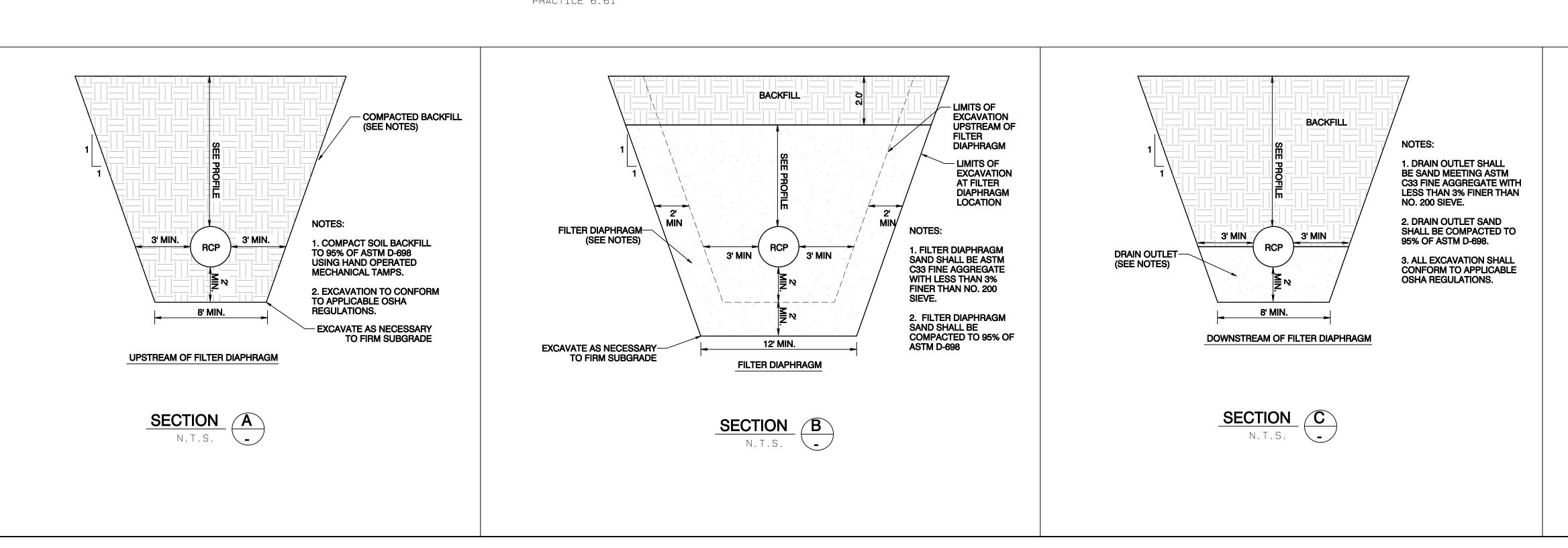
COMPACTED





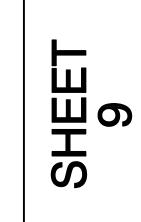
6.64 SKIMMER Sediment Basin.JPG

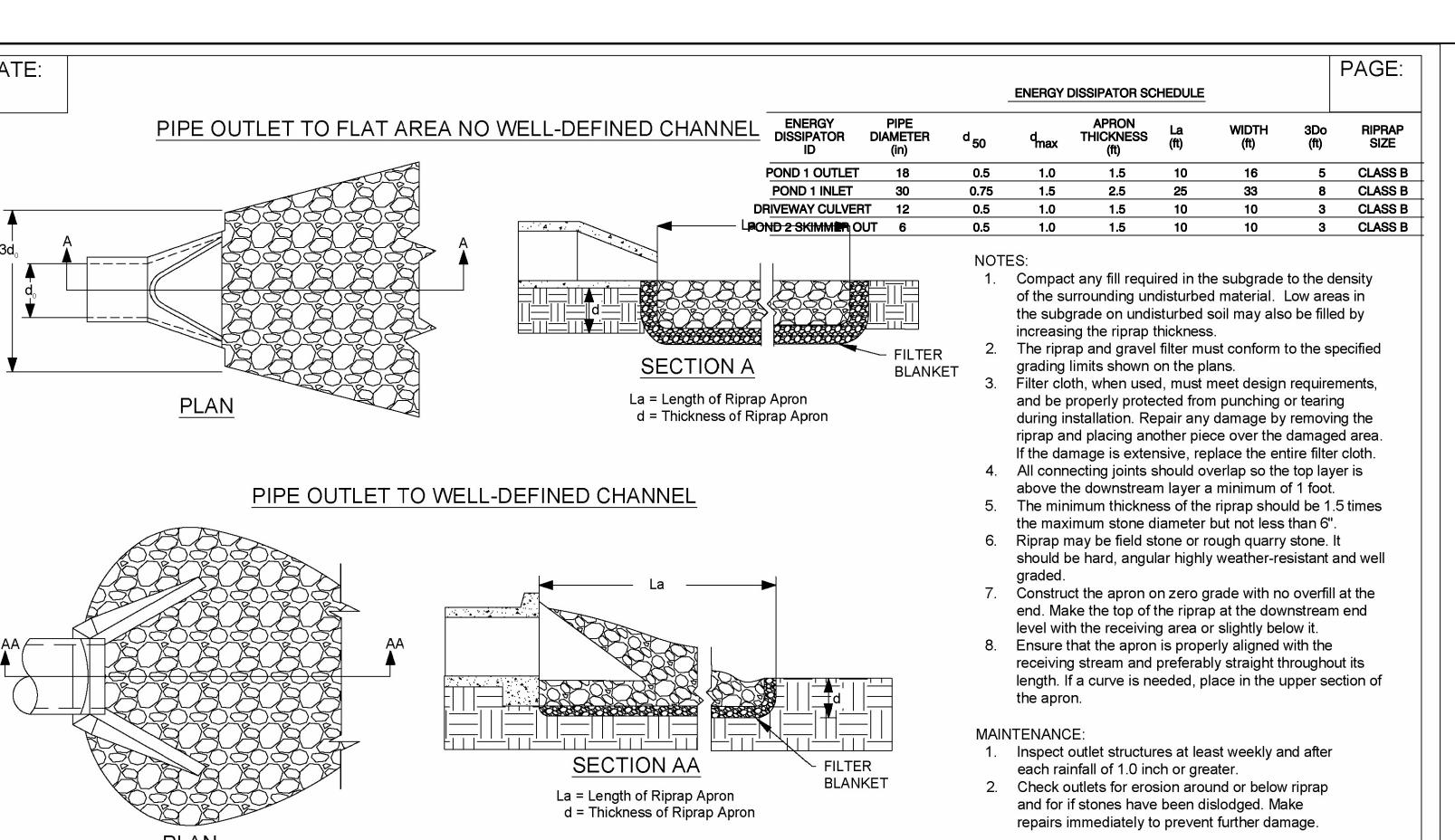




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OUTLET STABILIZATION STRUCTURE 6.41 Outlet Stabilization Structure.JPG

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1) Remove all trees, brush, stumps, and other objectionable material from the foundation Excavate the channel, and shape it to neat lines and dimensions shown on the plans plus a 0.2-foot overcut around the channel perimeter to allow for bulking during seedbed

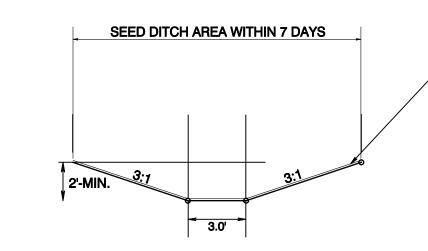
preparations and sod buildup. 3) Remove and properly dispose of all excess soil so that surface water may enter the 4) The procedure used to establish grass in the channel will depend upon the severity of the conditions and selection of species. Protect the channel with mulch or a temporary liner sufficient to withstand anticipated velocities during the establishment period (Appendix 8.05).

Maintenance, Grass-Lined Ditches: During the establishment period, check grass-lined channels after every rainfall. After grass is established, periodically check the channel; check it after every heavy rainfall event. Immediately make repairs. It is particularly important to check the channel outlet and all road crossings for bank stability and evidence of piping or scour holes. Remove all significant sediment accumulations to maintain the designed carrying

area, and dispose of properly.

capacity. Keep the grass in a healthy, vigorous condition at all times, since it is the primary erosion protection for the channel (Practice 6.11, Maintenance, Riprap-Lined Ditches: Inspect channels at regular intervals as well as after major rains, and make repairs promptly. Give special attention to the outlet and inlet sections and other points where concentrated flow enters. Carefully check stability at road crossings, and look for indications of piping, scour holes, or bank failures. Make repairs immediately. Maintain all vegetation adjacent to the channel in

a healthy, vigorous condition to protect the area from erosion and scour during



**GRASS-LINED CHANNEL** TURF REINFORCEMENT MATTING, DITCH WIDTH NORTH AMERICAN GREEN C350 OR EQUIVALENT **INSTALL PER MANUFACTURER RECOMMENDATIONS** SEE DETAIL 3, THIS SHEET.

PERMANENT STORMWATER CHANNEL 2

PAGE: DATE: TO ALLOW BULKING OVERLAP DURING SEEDBED ANCHOR TRENCH STAKES AT 3'-5' PREPARATION 25' INTERVALS TYPICAL INSTALLATION TH EROSION CONTROL **BLANKETS OR TURF** REINFORCEMENT MATS INITIAL CHANNEL ANCHOR TRENCH TERMINAL SLOPE AND CHANNEL INTERMITTENT CHECK SLO LONGITUDINAL ANCHOR TRENCH SINGLE-LAP SPLICED ENDS OR BEGIN NEW **ROLL IN AN INTERMITTENT CHECK SLOT** ANCHOR 6"X6" MIN. TRENCH AND STAPLE AT 12" INTERVALS 6" MIN. OVERLAP FLOW PREPARE SOIL AND APPLY SEED BEFORE INSTALLING BLANKETS, MATS OR OTHER STAPLE OVERLAPS TEMPORARY CHANNEL LINER SYSTEMS MAX. 5" SPACING BRING MATERIAL DOWN TO A LEVEL AREA, TURN THE END UNDER 4" AND STAPLE AT 12" INTERVALS. 1. Lime, fertilize and seed before installation. Planting of shrubs, trees, etc. should occur after installation. Slope surface shall be smooth before placement for proper soil contact. 3. Design velocities exceeding 2 feet/second require temporary blankets, mats or similar liners to protect seed and soil until vegetation becomes

4. Terminal anchor trenches are required at RECP ends and intermittent check slots must be constructed across channels at 25 foot intervals.

5. Terminal anchor trenches should be a minimum of 12 inches in depth and 6 inches in width. Intermittent check slots should be 6 inches deep

inches deep by 6 inches wide. Pin the RECP at 1 foot intervals along the bottom of the trench, backfill and compact. Unroll the RECP down

6. For installation on a slope, place RECP 2-3 feet over the top of the slope and into an excavated end trench measuring approximately 12

the slope maintaining direct contact between the soil and RECP. Secure using staples or pins in a 3 foot center-to-center pattern.

7. 11 gauge, at least 6 inch by 1 inch staples or 12 inch minimum length wooden stakes are recommended for anchoring.

8. Grass-lined channels with design velocities exceeding 6 feet/second should include turf reinforcement mats

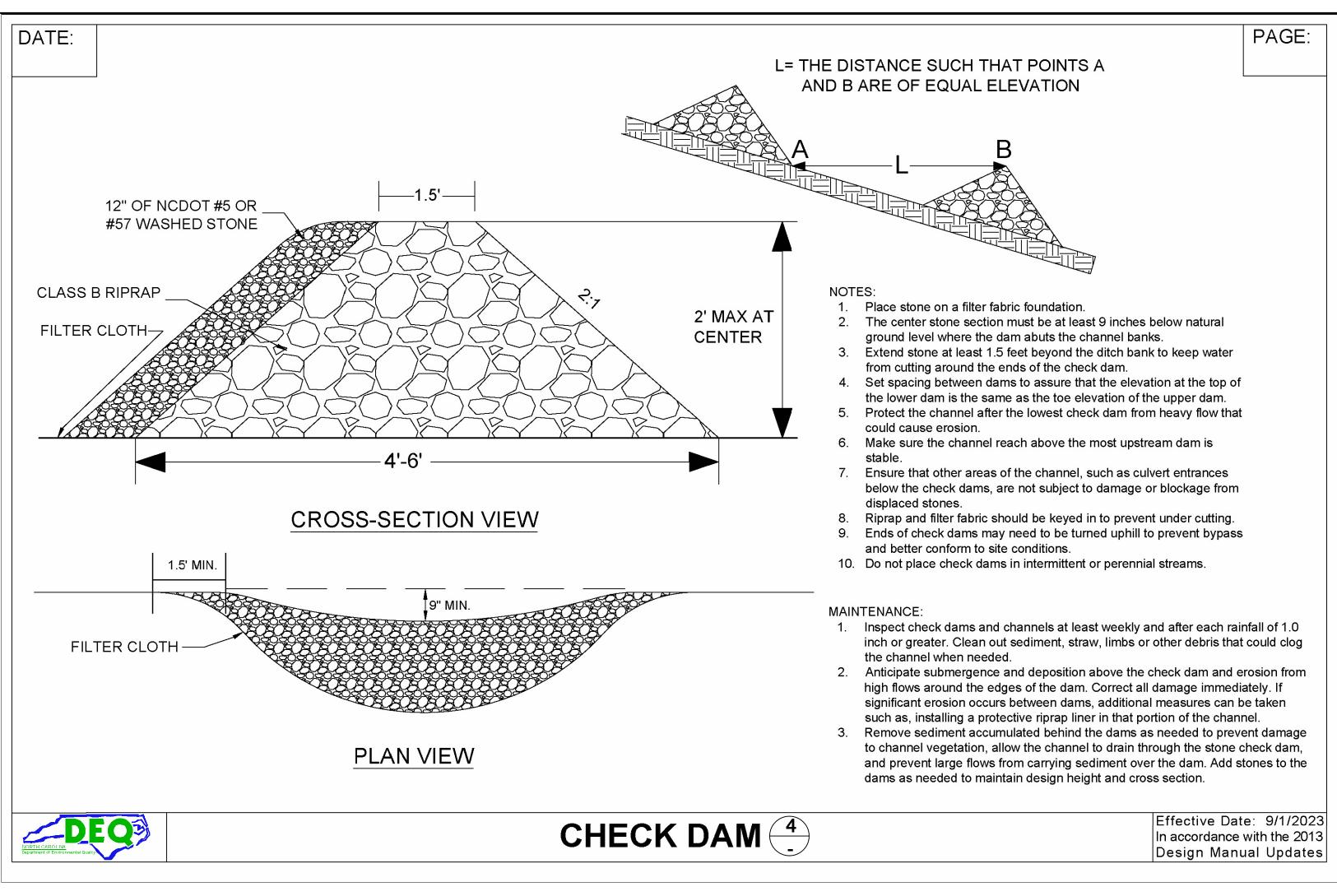
9. Check slots to be constructed per manufacturers specifications.

11. If there is a berm at the top of slope, anchor up-slope of the berm.

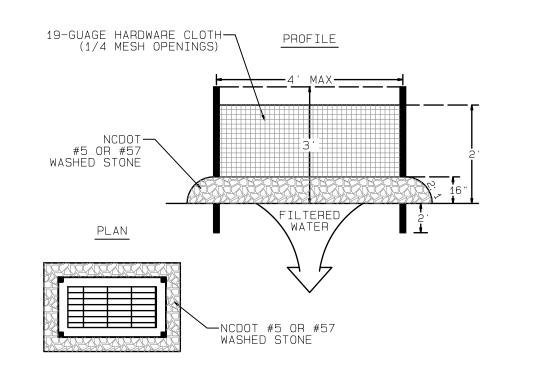
13. For slopes less than 3H:1V, rolls may be placed in horizontal strips.

12. Do not stretch blankets/matting tight, allow the rolls to conform to any irregularities.

10. Staking or stapling layout per manufacturers specification.



6.87 Check Dem.JPG



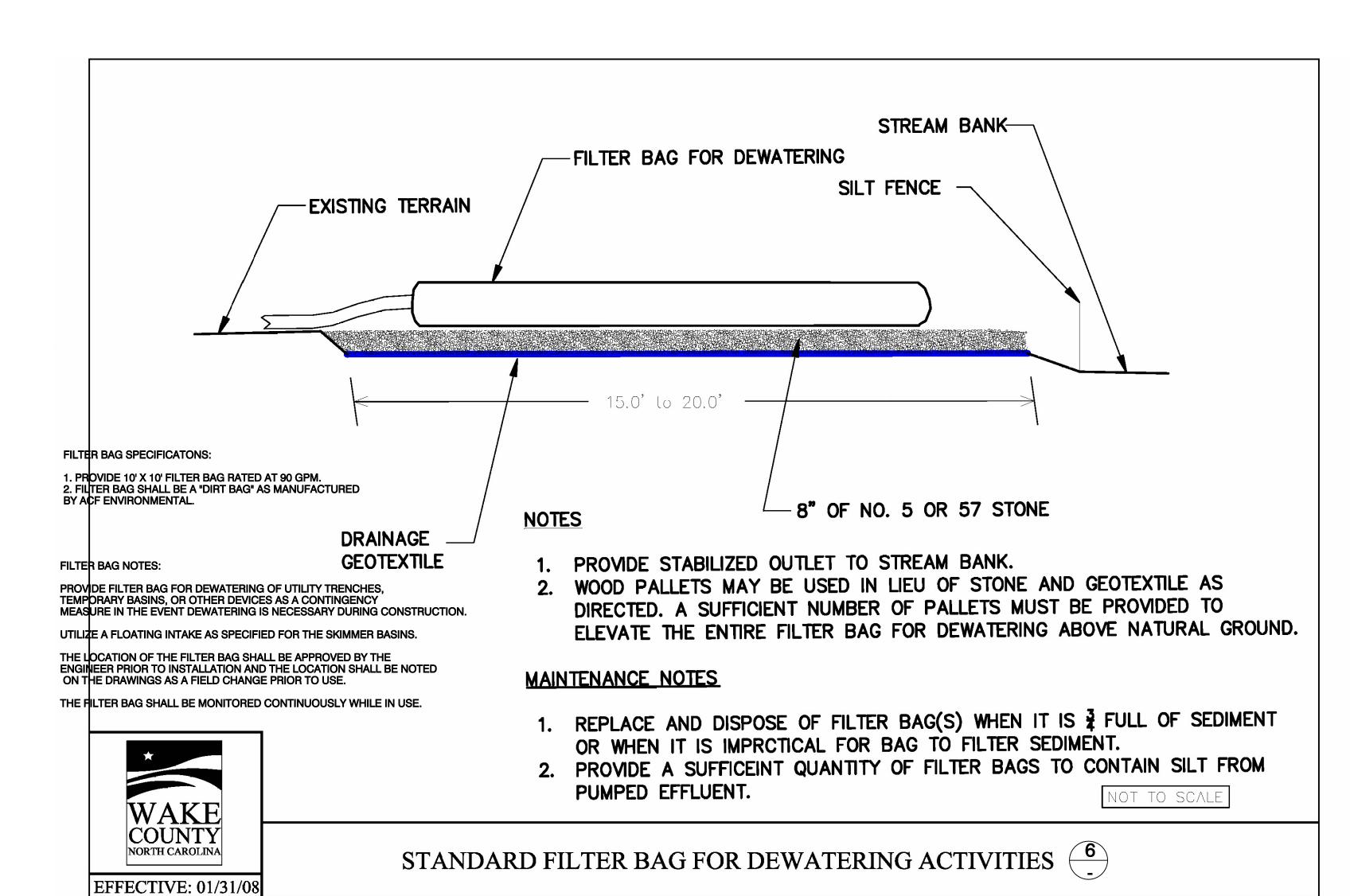
**SPECIFICATIONS:** 1. UNIFORMLY GRADE A SHALLOW DEPRESSION APPROACHING THE INLET. 2. DRIVE 5-FT STEEL POSTS 2 FT INTO THE GROUND SURROUNDING THE INLET. SPACE POSTS EVENLY AROUND THE PERIMETER OF THE INLET, A MAXIMUM OF 4 FT APART. 3. SURROUND THE POSTS WITH WIRE MESH HARDWARE CLOTH. SECURE THE WIRE MESH TO THE STEEL POSTS AT THE TOP. MIDDLE. AND BOTTOM. PLACING A 2-FT FLAP OF THE WIRE MESH UNDER THE GRAVEL FOR ANCHORING IS RECOMMENDED. 4. PLACE CLEAN GRAVEL (NCDOT #5 OR #57) ON A 2:1 SLOPE WITH A HEIGHT OF 16" AROUND THE WIRE, AND SMOOTH TO AN EVEN GRADE. 5. ONCE THE CONTRIBUTING DRAINAGE AREA HAS BEEN STABILIZED. REMOVE ACCUMULATED SEDIMENT AND ESTABLISH FINAL GRADING 6. COMPACT THE AREA PROPERLY AND STABILIZE IT WITH GROUND COVER.

MAINTENANCE: INSPECT INLETS AT LEAST WEEKLY AND AFTER EACH SIGNIFICANT (1/2" OR GREATER) RAINFALL EVENT. CLEAR THE MESH WIRE OF ANY DEBRIS OR OTHER OBJECTS TO PROVIDE ADEQUATE FLOW FOR SUBSEQUENT RAINS. TAKE CARE NOT TO DAMAGE OR UNDERCUT THE WIRE MESH DURING

SEDIMENT REMOVAL. REPLACE STONE AS NEEDED.

HARDWARE CLOTH AND GRAVEL INLET PROTECTION

PRACTICE 6.51



6.17 Rolled Erceion Control products.JPG

ROLLED EROSION CONTROL PRODUCTS (3)

MAINTENANCE:

1. Inspect Rolled Erosion Control Products at least weekly and

2. Good contact with the ground must be maintained, and

3. Any areas of the RECP that are damaged or not in close

4. If erosion occurs due to poorly controlled drainage, the

contact with the ground shall be repaired and stapled.

problem shall be fixed and the eroded area protected.

5. Monitor and repair the RECP as necessary until ground cover

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erosion must not occur beneath the RECP.

after each rainfall of 1.0 inch or greater; repair immediately.

FilterBegforDewateringDetail.JPG

LITTER, BUILDING MATERIAL AND LAND CLEARING WASTE nd disturbance (a) Perimeter dikes, swales, ditches, ar perimeter slopes (b) High Quality Wate (HQW) Zones If slopes are 10 feet or less in length and (c) Slopes steepe are not steeper than 2:1, 14 days are than 3:1 length and with slopes steeper than 4:1 7 days for perimeter dikes, swales (d) Slopes 3:1 to 4:1 ditches, perimeter slopes and HQV PAINT AND OTHER LIQUID WASTE <sup>7</sup> davs for perimeter dikes, swales, ditches perimeter slopes and HQW Zones 10 days for Falls Lake Watershed unless flatter than 4:1 there is zero slope **Note:** After the permanent cessation of construction activities, any areas with temporary

ground stabilization shall be converted to permanent ground stabilization as soon as practicable but in no case longer than 90 calendar days after the last land disturbing activity. Temporary ground stabilization shall be maintained in a manner to render the surface stable against accelerated erosion until permanent ground stabilization is achieved.

Stabilize the ground sufficiently so that rain will not dislodge the soil. Use one of the techniques in the table below Temporary Stabilization

Permanent grass seed covered with straw Temporary grass seed covered with straw or or other mulches and tackifiers other mulches and tackifiers. Geotextile fabrics such as permanent soil reinforcement matting Rolled erosion control products with or without temporary grass seed Shrubs or other permanent plantings Appropriately applied straw or other mulch covered with mulch Plastic sheeting Uniform and evenly distributed ground cover sufficient to restrain erosion Structural methods such as concrete, asphalt or retaining walls Rolled erosion control products with grass

POLYACRYLAMIDES (PAMS) AND FLOCCULANTS Select flocculants that are appropriate for the soils being exposed during construction,

selecting from the NC DWR List of Approved PAMS/Flocculants. Apply flocculants at or before the inlets to Erosion and Sediment Control Measures. Apply flocculants at the concentrations specified in the NC DWR List of Approved PAMS/Flocculants and in accordance with the manufacturer's instructions. Provide ponding area for containment of treated Stormwater before discharging offsite. 5. Store flocculants in leak-proof containers that are kept under storm-resistant cover or

surrounded by secondary containment structures.

NORTH CAROLINA

Environmental Quality

EQUIPMENT AND <u>VEHICLE MAINTENANCE</u> Maintain vehicles and equipment to prevent discharge of fluids. Identify leaks and repair as soon as feasible, or remove leaking equipment from the

Never bury or burn waste. Place litter and debris in approved waste containers

Provide a sufficient number and size of waste containers (e.g dumpster, trash

upland areas and does not drain directly to a storm drain, stream or wetland.

Anchor all lightweight items in waste containers during times of high winds.

Empty waste containers as needed to prevent overflow. Clean up immediately if

On business days, clean up and dispose of waste in designated waste containers.

Do not dump paint and other liquid waste into storm drains, streams or wetlands

Containment must be labeled, sized and placed appropriately for the needs of site.

Prevent the discharge of soaps, solvents, detergents and other liquid wastes from

Locate paint washouts at least 50 feet away from storm drain inlets and surface waters

Install portable toilets on level ground, at least 50 feet away from storm drains, streams

or wetlands unless there is no alternative reasonably available. If 50 foot offset is not

attainable, provide relocation of portable toilet behind silt fence or place on a gravel pad

Provide staking or anchoring of portable toilets during periods of high winds or in high

Monitor portable toilets for leaking and properly dispose of any leaked material. Utilize a

Show stockpile locations on plans. Locate earthen-material stockpile areas at least 50

feet away from storm drain inlets, sediment basins, perimeter sediment controls and

surface waters unless it can be shown no other alternatives are reasonably available.

Protect stockpile with silt fence installed along toe of slope with a minimum offset of five

Stabilize stockpile within the timeframes provided on this sheet and in accordance with

the approved plan and any additional requirements. Soil stabilization is defined as

Do not store hazardous chemicals, drums or bagged materials directly on the ground.

vegetative, physical or chemical coverage techniques that will restrain accelerated

erosion on disturbed soils for temporary or permanent control needs.

Place hazardous waste containers under cover or in secondary containment

Create designated hazardous waste collection areas on-site.

licensed sanitary waste hauler to remove leaking portable toilets and replace with

secondary containment. Repair or replace damaged waste containers

a recycling or disposal center that handles these materials.

receptacle) on site to contain construction and domestic wastes.

unless no other alternatives are reasonably available.

Dispose waste off-site at an approved disposal facility.

unless no other alternatives are reasonably available.

Contain liquid wastes in a controlled area.

Provide stable stone access point when feasible

and surround with sand bags.

ARDOUS AND TOXIC WASTE

containers overflow.

Collect all spent fluids, store in separate containers and properly dispose as hazardous waste (recycle when possible) Remove leaking vehicles and construction equipment from service until the problem has been corrected. Bring used fuels, lubricants, coolants, hydraulic fluids and other petroleum products to

STRUCTURE NEEDS TO BE CLEAN MARKED WITH SIGNAGE NOTING SECTION A-A Locate waste containers at least 50 feet away from storm drain inlets and surface waters Locate waste containers on areas that do not receive substantial amounts of runoff from Cover waste containers at the end of each workday and before storm events or provide ABOVE GRADE WASHOUT STRUCTURE

NOTES:

1. ACTUAL LOCATION DETERMINED ICTURES SHALL BE MAINTAI SIGNAGE NOTING DEVICE.

1. ACTUAL LOCATION DETERMINED

UCTURES SHALL BE

MAINTAINED WHEN THE LIQUI

Do not discharge concrete or cement slurry from the site. Dispose of, or recycle settled, hardened concrete residue in accordance with local and state solid waste regulations and at an approved facility. Manage washout from mortar mixers in accordance with the above item and in addition place the mixer and associated materials on impervious barrier and within lot perimeter

STRUCTURE WITH LINER

Install temporary concrete washouts per local requirements, where applicable. If an alternate method or product is to be used, contact your approval authority for review and approval. If local standard details are not available, use one of the two types of temporary concrete washouts provided on this detail. Do not use concrete washouts for dewatering or storing defective curb or sidewalk

sections. Stormwater accumulated within the washout may not be pumped into or discharged to the storm drain system or receiving surface waters. Liquid waste must be pumped out and removed from project Locate washouts at least 50 feet from storm drain inlets and surface waters unless it can be shown that no other alternatives are reasonably available. At a minimum, insta protection of storm drain inlet(s) closest to the washout which could receive spills or Locate washouts in an easily accessible area, on level ground and install a stone entrance pad in front of the washout. Additional controls may be required by the

Install at least one sign directing concrete trucks to the washout within the project limits Post signage on the washout itself to identify this location Remove leavings from the washout when at approximately 75% capacity to limit overflow events. Replace the tarp, sand bags or other temporary structural components when no longer functional. When utilizing alternative or proprietary

products, follow manufacturer's instructions. At the completion of the concrete work, remove remaining leavings and dispose of in an approved disposal facility. Fill pit, if applicable, and stabilize any disturbance caused by removal of washout.

HERBICIDES, PESTICIDES AND RODENTICIDES Store and apply herbicides, pesticides and rodenticides in accordance with label Store herbicides, pesticides and rodenticides in their original containers with the label, which lists directions for use, ingredients and first aid steps in case of accidental

Do not store herbicides, pesticides and rodenticides in areas where flooding is possible or where they may spill or leak into wells, stormwater drains, ground water or surface water. If a spill occurs, clean area immediately

NCG01-Ground-Stabilization-and-Materials-Handling-Sheet-3-29-19.JPG

NCG-01 GROUND COVER & MATERIALS HANDLING (1)

PART II. SECTION G. ITEM (4) DRAW DOWN OF SEDIMENT BASINS FOR MAINTENANCE OR CLOSE OUT

Sediment basins and traps that receive runoff from drainage areas of one acre or more shall use outlet structures that withdraw water from the surface when these devices need to be drawn down for maintenance or close out unless this is infeasible. The circumstances in which it is not feasible to withdraw water from the surface shall be rare (for example, times with extended cold weather). Non-surface withdrawals from sediment basins shall be allowed only when all of the following criteria have been met:

(a) The E&SC plan authority has been provided with documentation of the non-surface withdrawal and the specific time periods or conditions in which it will occur. The non-surface withdrawal shall not commence until the E&SC plan authority has approved these items, (b) The non-surface withdrawal has been reported as an anticipated bypass in accordance with Part III, Section C, Item (2)(c) and (d) of this permit,

Dewatering discharges are treated with controls to minimize discharges of pollutants from stormwater that is removed from the sediment basin. Examples of appropriate controls include properly sited, designed and maintained dewatering tanks, weir tanks, and filtration systems (d) Vegetated, upland areas of the sites or a properly designed stone pad is used to the extent feasible at the outlet of the dewatering treatment devices described in Item (c) above,

(e) Velocity dissipation devices such as check dams, sediment traps, and riprap are provided at the discharge points of all dewatering devices, and Sediment removed from the dewatering treatment devices described in Item (c) above is disposed of in a manner that does not cause deposition of sediment into waters of the United States.

SELF-INSPECTION, RECORDKEEPING AND REPORTING SELF-INSPECTION, RECORDKEEPING AND REPORTING SECTION B: RECORDKEEPING Self-inspections are required during normal business hours in accordance with the table . E&SC Plan Documentatio below. When adverse weather or site conditions would cause the safety of the inspection The approved E&SC plan as well as any approved deviation shall be kept on the site. The personnel to be in jeopardy, the inspection may be delayed until the next business day on approved E&SC plan must be kept up-to-date throughout the coverage under this permit. The which it is safe to perform the inspection. In addition, when a storm event of equal to or following items pertaining to the E&SC plan shall be kept on site and available for inspection at greater than 1.0 inch occurs outside of normal business hours, the self-inspection shall be performed upon the commencement of the next business day. Any time when inspections were delayed shall be noted in the Inspection Record. (during normal the approved E&SC plan or complete, date and a) Each E&SC measure has been installed and If no daily rain gauge observations are made during weekend maintained in sign an inspection report that lists each E&SC on holiday periods, and no individual-day rainfall information is does not significantly deviate from the locations. good working measure shown on the approved E&SC plan. This dimensions and relative elevations shown on the available, record the cumulative rain measurement for those documentation is required upon the initial approved E&SC plan. unattended days (this will determine if a site inspection is installation of the E&SC measures are modified needed). Days on which no rainfall occurred shall be recorded after initial installation. as "Zero." The permittee may use another rain-monitoring device approved by the Division (b) A phase of grading has been completed. Initial and date a copy of the approved E&SC plan At least once per 7 1, Identification of the measures inspected or complete, date and sign an inspection report to calendar days and 2. Date and Time of the inspection indicate completion of the construction phase. within 24 hours of 3. Name of the person performing the inspection (c) Ground cover is located and installed in Initial and date a copy of the approved E&SC plan a rain event ≥ 1.0 4. Indication of whether the measures were operating properly or complete, date and sign an inspection report to accordance with the approved E&SC plan. inch in 24 hours. 5. Description of maintenance needs for the measure indicate compliance with approved ground cover 6. Description. Evidence, and date of corrective actions taken specifications. Stormwater At least once per 7 1. Identification of the discharge outfalls inspected discharge calendar days and 2. Date and Time of the inspection d) The maintenance and repair requirements for | Complete, date and sign an inspection report. outfalls(SDOs) within 24 hours of 3. Name of the person performing the inspection all E&SC measures have been performed. a rain event ≥ 1.0 4. Evidence of indicators of stormwater pollution such as oil inch in 24 hours. sheen, floating or suspended solids or discoloration Description, Evidence, and date corrective actions taken e) Corrective actions have been taken to E&SC | Initial and date a copy of the approved E&SC plan 4) Perimeter At least once per 7 If visible Sedimentation is found outside site limits, then record calendar days and of the following shall be made: within 24 hours of |1) Actions taken to clean up or stabilize sediment that has left a rain event ≥ 1.0 the site limits Additional Documentation to be Kept on Site inch in 24 hours. | 2) Description, Evidence and date of corrective actions taken

In addition to the E&SC plan documents above, the following items shall be kept on the 3) An explanation as to the actions taken to control future site and available for inspectors at all times during normal business hours, unless the Division provides a site-specific exemption based on unique site conditions that make 5) Streams or At least once per 7 If the stream or wetland has increased visible sedimentation or this requirement not practical: calendar days and has visible increased turbidity from the construction activity, ther within 24 hours of a record of the following shall be made: offsite (where ∣a rain event ≥ 1.0 │1) Description, Evidence and date of corrective actions taken This General Permit as well as the Certificate of Coverage, after it is received. accessible) | inch in 24 hours. | 2)Records of required reports to the appropriate Division Regional Office per Part III, Section C, Item(2)(a) of this permi Records of inspections made during the previous twelve months. The permittee shall

The phase of grading (installation of perimeter E&SC

measures, clearing and grubbing, installation of storm

2. Documentation that the required ground stabilization

NOTE: The rain inspection resets the required 7 calendar day inspection requirement

NON-INVASIVE PERMANENT SEEDING RECOMMENDATIONS

FOR LATE WINTER AND EARLY SPRING

drainage facilities, completion of all land-disturbing activity,

construction or redevelopment, permanent ground cover).

measures have been provided within the required timeframe

or assurance that they will be provided as soon as possible

or a similar inspection form that includes all the required elements. Use of electronically-available records in lieu of the required paper copies will be allowed if shown to provide equal access and utility as the hard-copy records. Documentation to be Retained for Three Years All data used to complete the e-NOI and all inspection records shall be maintained for a period of three years after project completion and made available upon request. [40 CFR 122.41]

NON-INVASIVE PERMANENT SEEDING

RECOMMENDATIONS FOR SUMMER

record the required observations on the Inspection Record Form provided by the Division

or complete, date and sign an inspection report to release of hazardous substances per item 1(b)-(c) abov (c) Anticipated bypasses [40 CFR

A report at least ten days before the date of the bypass, if possible. The report shall include an evaluation of the anticipated quality and effect of the bypass. Within 24 Hours, an oral or electronic notification Within 7 calendar days, a report that includes an evaluation of the quality and effect of the bypass

of the spill or release.

SELF-INSPECTION, RECORDKEEPING AND REPORTING

They are less than 25 gallons but cannot be cleaned up within 24 hours,

(e) Noncompliance with the conditions of this permit that may endanger health or the

to the Department's Environmental Emergency Center personnel at (800) 858-0368.

After a permittee becomes aware of an occurrence that must be reported, he shall contact the

requirements listed below. Occurrences outside normal business hours may also be reported

Reporting Timeframe (After Discovery) and Other Requirements

• Within 7 Calendar Days, a report that contains a description of the

sediment and actions taken to address the cause of the deposition

If the stream is named on the NC 303(d) list as impaired for sediment-

monitoring, inspections or apply more stringent practices if staff

compliance with the federal or state impaired-waters conditions.

Within 24 Hours, an oral or electronic notification. The notification shall

include information about the date, time, nature, volume and location

determine that additional requirements are needed to assure

related caused, the permittee may be required to perform additional

Division staff may waive the requirement for a written report on a case-

appropriate Division regional office within the timeframes and in accordance with the other

Within 24 hours, an oral or electronic notification

Releases of hazardous substances in excess of reportable quantities under Section 311

of the Clean Water Act (Ref: 40 CFR 110.3 and 40 CFR 117.3) or Section 102 of CERCLA

They cause sheen on surface waters (regardless of volume), or

They are within 100 feet of surface waters (regardless of volume).

SECTION C: REPORTING

(b) Oil spills if:

deposition in a

stream or wetland

. Occurrences that Must be Reported

Permittees shall report the following occurrences:

(Ref: 40 CFR 302.4) or G.S. 143-215.85.

. Reporting Timeframes and Other Requirements

Anticipated bypasses and unanticipated bypasses.

They are 25 gallons or more,

(a) Visible sediment deposition in a stream or wetland.

 Within 24 Hours, an oral or electronic notification with the conditions • Within 7 calendar days, a report that contains a description of the of this permit that noncompliance, and its causes: the period of noncompliance, including may endanger exact dates and times, and if the noncompliance has not been health or the corrected, the anticipated time noncompliance is expected to continue environment [40] and steps taken or planned to reduce, eliminate and prevent CFR 122.41(I)(7)] reoccurrence of the noncompliance. [40 CFR 122.41(I)(6). Division staff may waive the requirement for a written report on a case-

NON-INVASIVE PERMANENT SEEDING RECOMMENDATIONS FOR FALL

15 lbs/acre

NORTH CAROLINA 🐠 Environmental Quali

DATE:

**SEEDING MIXTURE** 

Seeding Dates

March 1 - May 15

Stabilization

l Measures

After each phase

NCG-01 SELF INSPECTION



NCG01-Self-Inspection-Sheet-revised-5-17-19.JP0

### FA TAWBA KBURN I REC $\mathbf{m}$

PAGE:

CONTRO SEDIMENT DETAILS  $\infty$ 

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Rate SEEDING MIXTURE Switchgrass 2.5-3.5 lbs/acre\* 5 lbs/acre Species Indian Grass 5-7 lbs/acre\* Indian Woodoats 1.5-2.5 lbs/acre\* Indian Woodoats 1.5-2.5 lbs/acre\* 5-7 lbs/acre\* Big Bluestem Virginia Wild Rye 4-6 lbs/acre Virginia Wild Rye 4-6 lbs/acre\* Indian Woodoats 1.5-2.5 lbs/acre\* Virginia Wild Rye 4-6 lbs/acre\* \*Depending upon mix with other species. See table 6.11.d \*Depending upon mix with other species. from Chapter 6 of the NC Erosion and Sediment Control See table 6.11.d from Chapter 6 of the NC | \*Depending upon mix with other species. See table 6.11.d from Planning and Design Manual. Erosion and Sediment Control Planning Chapter 6 of the NC Erosion and Sediment Control Planning and and Design Manual. | Design Manual. Coastal or Eastern Piedmont for Centipede- Sept. 1 - May Seeding Dates **Seeding Dates** Coastal and Piedmont for Indian Woodoats and Virginia Mountains - July 15- Aug 15 | Mountains - Hard Fescue- Aug 1 - June 1 Wild Rye- Feb 15 - April 1 Piedmont - Aug 15 - Oct 15 | Mountains- Switchgrass, Indian Grass, Big Bluestem- Dec 1 - April 15|| Mountains for Indian Woodoats and Virginia Wild Rye-Piedmont and Coastal- Switchgrass, Indian Grass, Big Bluestem-Maintenance: | Dec 1 - April 1 Indian Woodoats and Virginia Wild Rye Coastal- Indian Woodoats and Virginia Wild Rye- Sept 1 - Nov 1 are both sun and shade tolerant. Significant maintenance may be required to obtain desired Hard Fescue is not recommended for slopes > 5%. Prefers shade **SEED BED PREPARATION:** LIMING- Apply lime according to soil test recommendations. If the pH (acidity) of the soil is not known, an application of ground agricultural limestone at the rate of 1 to 1½ tons/acre on coarse0textured soils and 2-3 tons/acre on fine-textured soils is usually sufficient. Apply limestone uniformly and incorporate into the top 4-6 inches of soil. Soils with a pH of 6 or higher need not be limed. FERTILIZER- Base application rates on soil tests. When these are not possible, apply a 10-10-10 grade fertilizer at 700-1,000 lb/acre. Both fertilizer and lime should be incorporated into the top 4-6 inches of soil. If a hydraulic seeder is used, do not mix seed and fertilizer more than 30 minutes before application. SURFACE ROUGHENING- If recent tillage operations have resulted in a loose surface additional roughening may not be required, except to break up large clods. If rainfall causes the surface to become sealed or crusted, loosen it just prior to seeding by raking, harrowing, or other suitable methods for fine grading. the finished grade shall be a smooth even soil surface with a loosen uniformly fine texture. all ridges and depressions shall be removed and filled to provide the approved surface drainage. Planting is to be done immediately after finished grades are obtained and seedbed preparation is Permanent seeding, sodding or other means of stabilization are required when all construction work is completed according to the NPDES timeframes table. 2. A North Carolina Department of Agriculture soils test (or equal) is highly recommended to be obtained for all areas to be seeded, sprigged, sodded or planted.

PAGE: DATE:

TEMPORARY SEEDING RECOMMENDATIONS FOR LATE WINTER AND EARLY SPRING **Seeding Mixture** Rate (lb/acre)

120 Annual lespedeza (Kobe in Piedmont and Coastal Plain, Korean in Mountains)

Omit annual lespedeza when duration of temporary cover is not to extend beyond June.

Mountains—Above 2500 feet: Feb. 15 - May 15 Below 2500 feet: Feb. 1- May 1

Coastal Plain—Dec. 1 - Apr. 15 Apply 4,000 lb/acre straw. Anchor straw by tacking with asphalt, netting, Apply 4,000 lb/acre straw. Anchor straw by tacking with asphalt, or a mulch anchoring tool. A disk with blades set nearly straight can be | netting, or a mulch anchoring tool. A disk with blades set nearly

used as a mulch anchoring tool.

Piedmont—Jan. 1 - May 1

Refertilize if growth is not fully adequate. Reseed, refertilize and mulch mmediately following erosion or other damage.

Seeding Mixture Rate (lb/acre) Species n the Piedmont and Mountains, a small-stemmed Sudangrass may be substituted at a rate of 50 lb/acre

TEMPORARY SEEDING RECOMMENDATIONS FOR SUMMER

Mountains — May 15 - Aug. 15 Piedmont — May 1 - Aug. 15 Coastal Plain — Apr. 15 - Aug. 15

straight can be used as a mulch anchoring tool.

immediately following erosion or other damage.

Repair and refertilize damaged areas immediately. Topdress with 50 lb/acre of nitrogen in March. If it is necessary to extend temporary cover beyond June 15, overseed with 50 lb/acre Kobe (Piedmont and Refertilize if growth is not fully adequate. Reseed, refertilize and mulch | Coastal Plain) or Korean (Mountains) lespedeza in late February or

Apply 4,000 lb/acre straw. Anchor straw by tacking with asphalt,

netting, or a mulch anchoring tool. A disk with blades set nearly

TEMPORARY SEEDING RECOMMENDATIONS FOR FALL

Seeding Mixture

Mountains — Aug. 15 - Dec. 15

Coastal Plain and Piedmont — Aug. 15 - Dec. 31

straight can be used as a mulch anchoring tool.

#### **SEED BED PREPARATION:**

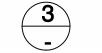
LIMING- Apply lime according to soil test recommendations. If the pH (acidity) of the soil is not known, an application of ground agricultural limestone at the rate of 1-1 $\frac{1}{2}$ tons/acre on coarse-textured soils and 2-3 tons/acre on fine-textured soils is usually sufficient. Apply limestone uniformly and incorporate into the top 4-6 inches of soil. Soils with a pH of 6 or higher need not be limed.

FERTILIZER- Base application rates on soil tests. When these are not possible, apply a 10-10-10 grade fertilizer at 700 - 1,000 lb/acre. Both fertilizer and lime should be incorporated into the top 4-6 inches of soil. If a hydraulic seeder is used, do not mix seed and fertilizer more than 30 minutes before application.

SURFACE ROUGHENING- If recent tillage operations have resulted in a loose surface additional roughening may not be required, except to break up large clods. If rainfall causes the surface to become sealed or crusted, loosen it just prior to seeding by raking, harrowing, or other suitable methods for fine grading. The finished grade shall be a smooth even soil surface with a loosen uniformly fine texture. All ridges and depressions shall be removed and filled to provide the approved surface drainage. Planting is to be done immediately after finished grades are obtained and seedbed preparation is completed.



TEMPORARY SEEDING



Effective Date: 9/1/2023 In accordance with the 2013 |Design Manual Updates| completed.

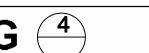
NOTES:

PERMANENT SEEDING (4)

3. Use a seeding mix that will produce fast0growing nurse crops and includes non-invasive species that will eventually provide a permanent groundcover. Soil blankets may be used in lieu of nurse crops.

Mat, tack or crimp mulch, as needed to stabilize seeded areas until root establishment. Mulch must cover at leaser 80% of the soil surface.

4. Ground cover shall be maintained until permanent vegetation is established and stable against accelerated erosion.



SEEDING MIXTURE

Species

Hard Fescue

Effective Date: 9/1/2023 In accordance with the 2013 |Design Manual Updates|