STATE	PROJECT NUMBER	SHEET NO.	TOTAL SHEETS
GA.	EDS00-0027-00(174)	889	1057

STREAM BUFFER ENCROACHMENT

Stream Buffers are impacted by this project.

The Contractor is not authorized to enter into stream buffers, except as described in the table below:

Name (name or number of feature)	Location of Buffered Streams and State Waters**			Stream Type (Warm/Cold Water)*	Buffer Impacted? (Yes/No)	Buffer Variance Required?
	Alignment	Begin Sta (LT or RT)	End Sta (LT or RT)			
UNNAMED	SR 1/US 27	457+14, 0' (RT)	459+54, 95' (RT)	Warm	Yes	No
Allowable activities and/or restrictions within the buffer are as followed: - At Sta.459+00 is the installation of a 170 linear foot, 4' x 6' box culvert						
UNNAMED	SR 1/US 27	466+03, 39' (LT)	466+68, 39' (LT)	Warm	Yes	No
Allowable activities and/or restrictions within the buffer are as followed: - At Sta.466+90 is the installation of a 107 linear foot, 4' x 4' box culvert						
UNNAMED	SR 1/US 27	471+77, 125' (LT)	468+79, 125' (RT)	Warm	Yes	No
Allowable activities and/or restrictions within the buffer are as followed: - At Sta.470+71 is the installation of a 222 linear foot, 10' x 6' box culvert						
UNNAMED	SR 1/US 27	480+79, 125' (LT)	483+05, 125' (RT)	Warm	Yes	No
Allowable activities and/or restrictions within the buffer are as followed: - At Sta.482+00 is the installation of a 158 linear foot, 24" storm drain pipe						
UNNAMED	SR 1/US 27	490+82, 125' (LT)	491+71, 125' (RT)	Warm	Yes	No
Allowable activities and/or restrictions within the buffer are as followed: - At Sta.491+46 is the installation of a 126 linear foot, 24" storm drain						
UNNAMED	SR 1/US 27	504+24, 110' (LT)	504+11, 125' (RT)	Warm	Yes	No
Allowable activities and/or restrictions within the buffer are as followed: - At Sta.504+12 is the installation of a 162 linear foot, 24" storm drain						
UNNAMED	SR 1/US 27	510+73, 110' (LT)	510+18, 125' (RT)	Warm	Yes	No
Allowable activities and/or restrictions within the buffer are as followed: - At Sta.510+39 is the installation of a 181 linear foot, 18" storm drain						
UNNAMED	SR 1/US 27	525+94, 59' (LT)	527+46, 111' (LT)	Warm	Yes	No
Allowable activities and/or restrictions within the buffer are as followed: - At Sta.525+39 is the installation of a 144 linear foot, 18" storm drain and a 226 linear foot, 5' x 4' box culvert						
UNNAMED	SR 1/US 27	692+91, 20' (LT)	693+54, 126' (RT)	Warm	Yes	No
Allowable activities and/or restrictions within the buffer are as followed: - At Sta.693+21 is the installation of a 88 linear foot, 36" storm drain						
UNNAMED	SR 1/US 27	715+50, 165' (LT)	716+01, 150' (RT)	Warm	Yes	No
Allowable activities and/or restrictions within the buffer are as followed: - At Sta.715+47 is the installation of a 220 linear foot, 10' x 10' box culvert						
UNNAMED	SR 1/US 27	748+50, 125' (RT)	749+29, 125' (LT)	Warm	Yes	No
Allowable activities and/or restrictions within the buffer are as followed: - At Sta.747+91 is the installation of a 187 linear foot, 6' x 6' box culvert						
UNNAMED	SR 1/US 27	802+15, 170' (RT)	802+24, 145' (LT)	Warm	Yes	No
Allowable activities and/or restrictions within the buffer are as followed: - At Sta.803+10 is the installation of a 217 linear foot, 10' x 10' double box culvert						
UNNAMED	SR 1/US 27	853+75, 195' (RT)	855+07, 165' (LT)	Warm	Yes	No
Allowable activities and/or restrictions within the buffer are as followed: - At Sta.854+33 is the installation of a 259 linear foot, 9' x 9' double box culvert						

*Warm water streams have a 25-foot minimum buffer as measured from the wrested vegetation. Cold Water streams have a 50-foot buffer as measured from the wrested vegetation.
** Locations are approximate, a detailed location of stream buffers and authorized work areas are shown on the individual BMP sheets.

MONITORING GENERAL NOTES:

Representative sampling may be utilized on this project. The characteristics of the individual watersheds along the project corridor have been carefully evaluated and compared on the basis of drainage characteristics, watershed size, land disturbance and earth work. After evaluation of these items as presented in the projects drainage area maps, hydrology and hydraulic studies, construction plans and erosion sedimentation and pollution control plans, it has been determined that the increase in turbidity at the specified locations will be representative of the increase in turbidity for all waters leaving the site. Approved primary and alternate representative monitoring sites are identified in the table:

Monitoring site	Primary or Alternate Site	Location (Sta. and Side)	Name of Receiving Water	Applicable construction stage for monitoring	Sampling Type (Outfall or Receiving Water)	Drainage Area (SQ.MILES)	Disturbed Area (ACRES)	Warm or Cold water Stream	Appendix B NTU value (outfall Monitoring Only)	Allowable NTU Increase (For Receiving Water)	Location Description
1.	PRIMARY (UPSTREAM)	STA.645+70.26, 65' RT.	Rhodes Branch	STAGE 1-3	Receiving	9.653	258	Warm	N/A	25	S.R.1/U.S.27
2.	PRIMARY (DOWNSTREAM)	STA.645+70.26, 74' LT.	Rhodes Branch	STAGE 1-3	Receiving	9.653	258	Warm	N/A	25	S.R.1/U.S.27

The primary site specified should be used as the initial sampling location. The alternate sampling sites may be used if additional sampling is required and/or if the primary sampling site is no longer located within the active phase of construction.

MONITORING SAMPLING METHODS & PROCEDURES

See Special Provision 167 and other contract documents for Monitoring Sampling Methods and Procedures.

READY MIX CHUTE WASH-DOWN

The washing of ready-mix concrete drums and dump truck bodies used in the delivery of portland cement concrete is prohibited on this site. In accordance with standard Specification 107 - Legal Regulations and Responsibilityto the Public, only the discharge "chute" utilized in portland cement concrete delivery may be rinsed free of fresh concrete remains. The Contractor shall excavate a pit outside of State water buffers, at least 25 feet from any storm drain and outside of the travel way, including shoulders, for a wash/pit area. The pit shall be large enough to store all wash-down water without overtopping the pit. Immediately After the wash-down operations are completed and after the wash-down water has soaked into the ground, the pit shall be filled in, and the ground above shall be graded to match the elevation of the surrounding areas smoothed out. Alternate wash down plans must be approved by the Project Engineer.

Wash-down plans describe procedures that prevent wash down water from entering streams and rivers. Never dispose of wash-down water down a storm drain. Establish a wash-down water pit location that includes the following: (1) the pit is located away from a storm drain, stream or river, (2) the pit is accessible to the vehicle being used for wash-down, (3) the pit has enough volume for wash-down water, and (4) make sure you have permission to use the area for wash-down. On some sites, you may not have permission or access to a location which allows for a wash-down pit. In those cases, the Contractor may have to wash-down into a wheelbarrow or other container and carry the container for transport to a proper disposal site. For additional information, refer to the Georgia Small Business Environmental Assistance Program's "A Guide for Ready Mix Chute/Hopper Wash-down".

ALTERNATIVE BMPs

Alternative BMPs are not used on this project. Silt Gates are used on this project as additional BMPs at pipe inlets and are not being used in place of or as a substitute for other conventional BMPs. Temporary check dams are used in ditches to provide interim stabilization and flow velocity reduction. The stability of the site is maintained with other conventional BMPs as shown on the plans. This ESPCP would be fully compliant with permit requirements if the silt gates were removed and as a result are not considered alternative BMPs when used on this project. The silt gates help to prevent pipe clogging during construction that can result from the ingestion of sediments and other large debris like rip rap, sand bags, roadway debris and other construction materials that when combined with sediments easily clog roadway drainage pipes.

THE ESCAPE OF SEDIMENT FROM THE SITE SHALL BE PREVENTED BY THE INSTALLATION OF EROSION AND SEDIMENT CONTROL MEASURES AND PRACTICES PRIOR TO, OR CONCURRENT WITH, LAND DISTURBING ACTIVITIES.

EROSION CONTROL MEASURES WILL BE MAINTAINED AT ALL TIMES. IF FULL IMPLEMENTATION OF THE APPROVED PLAN DOES NOT PROVIDE FOR EFFECTIVE EROSION CONTROL, ADDITIONAL EROSION AND SEDIMENT CONTROL MEASURES SHALL BE IMPLEMENTED TO CONTROL OR TREAT THE SEDIMENT SOURCE.

ANY DISTURBED AREA LEFT EXPOSED FOR A PERIOD GREATER THAN 7 DAYS SHALL BE STABILIZED WITH MULCH OR TEMPORARY SEEDING ACCORDING FOR THE SEASON.

EROSION, SEDIMENTATION & POLLUTION CONTROL PLAN CHECKLIST
INFRASTRUCTURE CONSTRUCTION PROJECTS

SWCD:_____

Project Name: U.S. 27/ S.R. 1 Address:_____

City/County: RANDOLPH COUNTY Date on Plans:_____

TO BE SHOWN ON ES&PC PLAN

Plan Page #	Included Y/N		
51-03	Y	1.	The applicable Erosion, Sedimentation and Pollution Control Plan Checklist established by the Commission as of January 1 of the year in which the land-disturbing activity was permitted. **(The completed Checklist must be submitted with the ES&PC Plan or the Plan will not be reviewed)**
50-01	Y	2.	Level II certification number issued by the Commission, signature and seal of the certified design professional. **(Signature, seal and Level II number must be on each sheet pertaining to ES&PC plan or the Plan will not be reviewed)**
50-01	Y	3.	The name and phone number of the 24-hour local contact responsible for erosion, sedimentation and pollution controls.
50-01	Y	4.	Provide name, address and phone number of primary permittee.
51-02	Y	5.	Note total and disturbed acreage of the project or phase under construction.
50-01	Y	6.	Provide land lot and district numbers for site location. Describe critical areas and any additional measures that will be utilized for these areas.
50-01	Y	7.	Provide vicinity map showing site's relation to surrounding areas. Include designation of specific phase, if necessary.
50-01	Y	8.	Graphic scale and north arrow.
55-01	Y	9.	Existing and proposed contour lines with contour lines drawn at an interval in accordance with the following: Existing Contours: USGS 1":2000' Topographical Sheets; Proposed Contours: 1" : 400' Centerline Profile
53-01	Y	10.	Delineation and acreage of contributing drainage basins on the project site.
55-01	Y	11.	Delineation of on-site wetlands and all state waters located on and within 200 feet of the project site.
55-01	Y	12.	Delineation of the applicable 25-foot or 50-foot undisturbed buffers adjacent to state waters and any additional buffers required by the Local Issuing Authority. Clearly note and delineate all areas of impact.
55-01	N	13.	Delineate all sampling locations, perennial and intermittent streams and other water bodies into which storm water is discharged.*
53-01	Y	14.	Storm-drain pipe and weir velocities with appropriate outlet protection to accommodate discharges without erosion. Identify/Delineate all storm water discharge points.
51-01	Y	15.	Soil series for the project site and their delineation.
51-01	Y	16.	Identify the project receiving waters and describe all adjacent areas including streams, lakes, residential areas, wetlands, etc. which may be affected.
N/A		17.	Any construction activity which discharges storm water into an Impaired Stream Segment, or within 1 linear mile upstream of and within the same watershed as, any portion of an Biota Impaired Stream Segment must comply with Part III. C. of the Permit. Include the completed Appendix 1 listing all the BMPs that will be used for those areas of the site which discharge to the Impaired Stream Segment.*
N/A		18.	If a TMDL Implementation Plan for sediment has been finalized for the Impaired Stream Segment (identified in item 18 above) at least six months prior to submittal of NOI, the ES&PC Plan must address any site-specific conditions or requirements included in the TMDL Implementation Plan.*
53-01	Y	19.	Delineate on-site drainage and off-site watersheds using USGS 1" : 2000' topographical sheets.
50-01	Y	20.	Initial date of the Plan and the dates of any revisions made to the Plan including the entity who requested the revisions.
54-01	Y	21.	The limits of disturbance for each phase of construction.
51-02	N	22.	Provide a minimum of 67 cubic yards of sediment storage per acre drained using a temporary sediment basin, retrofitted detention pond, and/or excavated inlet sediment traps for each common drainage location. Sediment storage volume must be in place prior to and during all land disturbance activities until final stabilization of the site has been achieved. A written rationale explaining the decision to use equivalent controls when a sediment basin is not attainable must be included in the plan for each common drainage location in which a sediment basin is not provided. Worksheets from the Manual must be included for structural BMPs and all calculations used by the design professional to obtain the required sediment storage when using equivalent controls.
N/A		23.	Use of alternative BMPs whose performance has been documented to be equivalent to or superior to conventional BMPs as certified by a Design Professional (unless disapproved by EPD or the Georgia Soil and Water Conservation Commission). Please refer to the Alternative BMP Guidance Document found at www.gaswcc.org.
54-01	Y	24.	Best Management Practices to minimize off-site vehicle tracking of sediments and the generation of dust.
51-03	Y	25.	BMPs for concrete washdown of tools, concrete mixer chutes, hoppers and the rear of the vehicles. Washout of the drum at the construction site is prohibited.*
51-01	Y	26.	Provide BMPs for the remediation of all petroleum spills and leaks.*
54-01	Y	27.	Location of Best Management Practices that are consistent with and no less stringent than the Manual for Erosion and Sediment Control in Georgia. Use uniform coding symbols from the Manual, Chapter 6, with legend.
50-01	Y	28.	Description of the nature of construction activity.
51-01	Y	29.	A description of appropriate controls and measures that will be implemented at the construction site including: (1) initial sediment storage requirements and perimeter control BMPs, (2) intermediate grading and drainage BMPs, and (3) final BMPs. *
51-01	Y	30.	Description and chart or timeline of the intended sequence of major activities which disturb soils for the major portions of the site (i.e., initial perimeter and sediment storage BMPs, clearing and grubbing activities, excavation activities, utility activities, temporary and final stabilization).
51-01	Y	31.	Description of the practices that will be used to reduce the pollutants in storm water discharges.*
51-01	Y	32.	Description of the measures that will be installed during the construction process to control pollutants in storm water that will occur after construction operations have been completed.*
50-01	Y	33.	Design professional's certification statement and signature that the site was visited prior to development of the ES&PC Plan as stated on page 15 of the permit.
50-01	Y	34.	Design professional's certification statement and signature that the permittee's ES&PC Plan provides for an appropriate and comprehensive system of BMPs and sampling to meet permit requirements as stated on page 14 of the permit.*
50-01	Y	35.	Certification statement and signature of the permittee or the duly authorized representative as stated in section V.G.2.d. of the state general permit.*
53-01	Y	36.	An estimate of the runoff coefficient or peak discharge flow of the site prior to and after construction activities are completed.
51-03	Y	37.	Indication that non-exempt activities shall not be conducted within the 25 or 50-foot undisturbed stream buffers as measured from the point of wrested vegetation without first acquiring the necessary variances and permits.
50-01	Y	38.	Indication that the design professional who prepared the ES&PC Plan is to inspect the installation of the initial sediment storage requirements and perimeter control BMPs within 7 days after installation.*
51-01	Y	39.	Indication that amendments/revisions to the ES&PC Plan which have a significant effect on BMPs with a hydraulic component must be certified by the design professional.*
51-01	Y	40.	Indication that waste materials shall not be discharged to waters of the State, except as authorized by a Section 404 permit.*
51-01	Y	41.	Documentation that the ES&PC Plan is in compliance with waste disposal, sanitary sewer, or septic tank regulations during and after construction activities have been completed.*
51-01	Y	42.	Provide complete requirements of inspections and record keeping by the primary permittee.*
51-03	Y	43.	Provide complete requirements of sampling frequency and reporting of sampling results.*
51-01	Y	44.	Provide complete details for retention of records as per Part IV.F. of the permit.*
51-03	Y	45.	Description of analytical methods to be used to collect and analyze the samples from each location.*
51-03	Y	46.	Appendix B rationale for outfall sampling points where applicable.*
50-01	Y	47.	Clearly note statement in bold letters- **"The escape of sediment from the site shall be prevented by the installation of erosion and sediment control measures and practices prior to, or concurrent with, land disturbing activities."**
50-01	Y	48.	Clearly note maintenance statement in bold letters - **"Erosion control measures will be maintained at all times. If full implementation of the approved plan does not provide for effective erosion control, additional erosion and sediment control measures shall be implemented to control or treat the sediment source."**
50-01	Y	49.	Clearly note the statement in bold letters - **"Any disturbed area left exposed for a period greater than 14 days shall be stabilized with mulch or temporary seeding."**
54-01	Y	50.	Provide detailed drawings for all structural practices. Specifications must, at a minimum, meet the guidelines set forth in the Manual for Erosion and Sediment Control in Georgia.
51-01	Y	51.	Provide vegetative plan, noting all temporary and permanent vegetative practices. Include species, planting dates and seeding, fertilizer, lime and mulching rates. Vegetative plan shall be site specific for appropriate time of year that seeding will take place and for the appropriate geographic region of Georgia.

Effective January 1, 2013

*If using this checklist for a project that is less than 1 acre and not part of a common development but within 200 ft of a perennial stream the " checklist items would be N/A.

EROSION, SEDIMENTATION, AND POLLUTION CONTROL PLAN GENERAL NOTES

Moreland Altobelli Associates, Inc.

DATE	REVISIONS

GEORGIA
DEPARTMENT OF TRANSPORTATION
ESPCP GENERAL NOTES
PROJECT - EDS00-0027-00(174)
COUNTY - RANDOLPH
DATE: DRAWING NO. 51-03