

EROSION CONTROL & MAINTENANCE PLAN NOTES:

- RETAIN FLOATABLE WIND BLOWN MATERIALS ON SITE BY STORING ALL TRASH AND BUILDING MATERIAL WASTE IN ENCLOSURES UNTIL PROPER DISPOSAL AT OFF-SITE FACILITIES. CHECK ADJACENT AREAS DAILY AND PICK UP CONSTRUCTION WASTE MATERIALS AND DEBRIS THAT HAVE BLOWN OR WASHED OFF SITE.
- PERMANENTLY STABILIZE ALL SURFACE AREA WITHIN AND ADJACENT TO THIS SITE THAT IS DISTURBED BY VEHICLES, GRADING AND OTHER CONSTRUCTION FOR THE PROPOSED FACILITY. STABILIZATION IS OBTAINED WHEN THE DISTURBED SURFACE IS COVERED WITH STRUCTURES, PAVING AND OR PERENNIAL VEGETATION HAVING A UNIFORM COVERAGE DENSITY OF AT LEAST 70%. STABILIZATION OF ALL DISTURBED AREA IS REQUIRED BEFORE TERMINATING MAINTENANCE AND REMOVAL OF EROSION CONTROL MEASURES.
- CONTRACTORS SHALL INSPECT POLLUTION CONTROL MEASURES AT LEAST EVERY 7 DAYS AND WITHIN 24 HOURS AFTER A STORM EVENT OF 1/2 INCH OR GREATER. DAMAGED MEASURES THAT PROVE TO BE INEFFECTIVE SHALL BE REPLACED WITH MORE EFFECTIVE MEASURES OR ADDITIONAL MEASURES WITHIN SEVEN DAYS. REPEATED FAILURE OF A CONTROL MEASURE REQUIRES INSTALLATION OF A MORE SUITABLE DEVICE TO PREVENT DISCHARGE OF POLLUTANTS FROM THE CONSTRUCTION SITE.
- INSTALLATION OF ADDITIONAL EROSION CONTROL MEASURES MAY BE REQUIRED BY THE CITY OR STATE. CONTRACTOR TO VERIFY REQUIREMENTS PRIOR TO BEGINNING ANY WORK ON PROJECT SITE.
- CARE SHALL BE TAKEN TO MINIMIZE THE ENCROACHMENT OF SEDIMENT INTO ALL STORM DRAIN APPURTENANCES, PUBLIC STREETS, AND ONTO PRIVATE PROPERTY UNTIL IMPERVIOUS MATERIAL (ROAD/PARKING AREA SURFACE) IS APPLIED OR UNTIL PROPOSED LANDSCAPE HAS BEEN ESTABLISHED.
- REFER TO 1(C)1.3.1 FOR SILT FENCE CONSTRUCTION.
- ALL GRASS SCOPES WHICH EXCEED 3:1 (H:V) SHALL UTILIZE CONTECH CONSTRUCTION PRODUCTS PERMANENT TURF REINFORCEMENT MAT 450 OR APPROVED EQUAL. MATS SHALL BE INSTALLED PER MANUFACTURER'S SPECIFICATIONS AND STANDARDS. CONTRACTOR SHALL COORDINATE INSTALLATION INSPECTION WITH MANUFACTURER.
- GROUND STABILIZATION IS REQUIRED IN DAYS ON PERIMETER AREAS AND SLOPES GREATER THAN 3:1. IN ALL OTHER AREAS, GROUND STABILIZATION IS REQUIRED IN 14 DAYS.
- PERMANENT GROUND COVER WILL BE PROVIDED FOR ALL DISTURBED AREAS WITHIN 15 WORKING DAYS OR NO MORE THAN 90 CALENDAR DAYS (WHICHEVER IS SHORTER).

STAGES OF CONSTRUCTION:

- CONTRACTOR TO PERFORM DETAILED SITE INSPECTION TO LOCATE ALL EXISTING UTILITIES AND VERIFY ANY POSSIBLE CONFLICTS WITH PROPOSED IMPROVEMENTS PRIOR TO BEGINNING ANY CONSTRUCTION. CONTACT OWNER WITH ANY CONFLICTS. MONTH 1
- INSTALLATION OF CONSTRUCTION ENTRANCE. MONTH 1
- INSTALLATION OF EROSION CONTROL FENCE. MONTH 1
- DEMOLITION OF EXISTING SITE IMPROVEMENTS. MONTH 1
- REMOVAL OF EXISTING PAVEMENT ON THE SITE. MONTH 1
- INSTALLATION OF ALL STORM WATER DRAINAGE IMPROVEMENTS. MONTH 1
- ROUGH GRADING. MONTH 1 & MONTH 2
- CONSTRUCTION OF NEW SITE IMPROVEMENTS. MONTH 2
- FINAL GRADING. MONTH 3
- PLACEMENT OF FINAL LANDSCAPING ITEMS AND SOD. MONTH 3
- REMOVAL OF EROSION CONTROL FENCE. MONTH 3

RIVER BASIN:

DROWNING CREEK 11-BW WATERSHED
MAINTENANCE CONTACT:

TO BE DETERMINED BY CONTRACTOR.
NAME:
COMPANY:
ADDRESS:
PHONE NUMBER:
EMAIL:

RECEIVING WATER:

EXISTING DITCH IN NORTH CAROLINA DEPARTMENT OF TRANSPORTATION ROW.

Table 6.10a
Temporary Seeding
Recommendations for Late
Winter and Early Spring

Species	Rate (lb/acre)
Rye (grain)	120
Annual lespedeza (Kobe in Piedmont and Coastal Plain, Korean in Mountains)	50

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

Seeding dates
Mountains—Above 2500 feet: Feb. 15 - May 15
Below 2500 feet: Feb. 1 - May 1
Piedmont—Jan. 1 - May 1
Coastal Plain—Dec. 1 - Apr. 15

Soil amendments
Follow recommendations of soil tests or apply 2,000 lb/acre ground agricultural limestone and 750 lb/acre 10-10-10 fertilizer.

Mulch
Apply 4,000 lb/acre straw. Anchor straw by tacking with asphalt, netting, or a mulch anchoring tool. A disk with blades set nearly straight can be used as a mulch anchoring tool.

Maintenance
Referentize if growth is not fully adequate. Reseed, referentize and mulch immediately following erosion or other damage.

Table 6.10b
Temporary Seeding
Recommendations for
Summer

Species	Rate (lb/acre)
German millet	40

In the Piedmont and Mountains, a small-stemmed Sudangrass may be substituted at a rate of 50 lb/acre.

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

Soil amendments
Follow recommendations of soil tests or apply 2,000 lb/acre ground agricultural limestone and 750 lb/acre 10-10-10 fertilizer.

Mulch
Apply 4,000 lb/acre straw. Anchor straw by tacking with asphalt, netting, or a mulch anchoring tool. A disk with blades set nearly straight can be used as a mulch anchoring tool.

Maintenance
Referentize if growth is not fully adequate. Reseed, referentize and mulch immediately following erosion or other damage.

Table 6.10c
Temporary Seeding
Recommendations for Fall

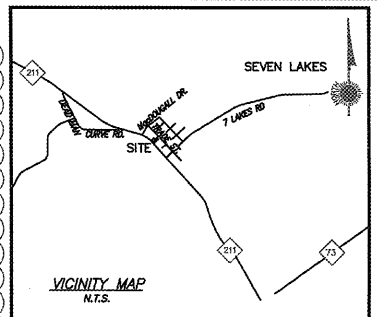
Species	Rate (lb/acre)
Rye (grain)	120

Seeding dates
Mountains—Aug. 15 - Dec. 15
Coastal Plain and Piedmont—Aug. 15 - Dec. 30

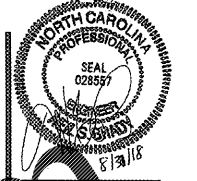
Soil amendments
Follow soil tests or apply 2,000 lb/acre ground agricultural limestone and 1,000 lb/acre 10-10-10 fertilizer.

Mulch
Apply 4,000 lb/acre straw. Anchor straw by tacking with asphalt, netting, or a mulch anchoring tool. A disk with blades set nearly straight can be used as a mulch anchoring tool.

Maintenance
Repair and referentize 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 Coastal Plain) or Korean (Mountains) lespedeza in late February or early March.



ANDERSON ENGINEERING
EMPLOYEE OWNED
ENGINEERS - SURVEYORS - LABORATORIES - DRILLING
2433 W. MOBILE AVE., SUITE 100
MOBILE, AL 36688
WWW.ANDERSONENGINEERING.COM
DWG BY: MRR # 109477 DRAWING # WB-1111-001



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TEMPORARY SEDIMENT TRAP CALCULATIONS:

DRAINAGE AREA = 1.19 ACRES

VOLUME:
DISTURBED AREA = 1.19 ACRES
REQUIRED VOLUME = (1,800 CUBIC FEET/ACRE)*1.19 ACRES = 2,142 CUBIC FEET
VOLUME IS MET IN POND AT ELEVATION = 618.60'

SURFACE AREA:
 $Q_{10} = CIA = (0.30)(18.0 \text{ IN/HR})(1.19 \text{ ACRES}) = 2.86 \text{ CFS}$
SURFACE AREA REQUIRED = $(325 \text{ FT}^2/\text{CFS}) * 2.86 \text{ CFS} = 930 \text{ FT}^2$
SURFACE AREA PROVIDED AT VOLUME REQUIRED = 2,780 FT²

SKIMMER SIZING:
 $Q_s = V/T_s = 4,284 \text{ CUBIC FEET} / 3 \text{ DAYS} = 1,428 \text{ CUBIC FEET} / \text{DAY}$
SKIMMER SIZE = 4 IN
HEAD ON ORIFICE = 0.333 FT
 $D = \sqrt{Q_s / (2310 * h)} = \sqrt{1,428 / (2310 * 0.333)} = 1.04 \text{ INCHES}$, USE 1 INCH

NPDES Groundcover Requirements

Site Area Description	Stabilization Time Frame	Stabilization Time Frame Exceptions
Perimeter dikes, swales, ditches, and slopes	7 Days	None
High Quality Water (HQW) Zones	7 Days	None
Slopes Steeper than 3:1	7 Days	If slopes are 10' of loss in length and are not steeper than 2:1, 14 Days are allowed.
Slopes 3:1 or Flatter	14 Days	7 Days for slopes greater than 50 feet in length.
All other areas with slopes flatter than 4:1	14 Days	None (except for perimeters and HQW zones)

* Extension of time may be approved by the permitting authority based on weather or other site-specific condition that make compliance impracticable. (Section II.B(2)(b))



Know what's below.
Call before you dig.

VEGETATIVE STABILIZATION:

- AREA TO BE STABILIZED WITH VEGETATION = 0.44 ACRES
PREPARATION TO BE PER LANDSCAPE PLAN AND O'REILLY SPECS.
SEED, FERTILIZER, AND MULCH TYPE AND RATES TO BE PER LANDSCAPE PLAN AND O'REILLY SPECS.
- LAWNS: (HYDROSEED), FRESH, CLEAN, NEW CROP SEED MIXTURE BY APPROVED METHOD COMPOSED OF FALCON TALL FESCUE (75%) AND CROSSFIRE (25%) AND DEGRADABLE GREEN DYED WOOD CELLULOSE FIBER OR 100% RECYCLED LONG FIBER PULP. MIXTURE SHALL BE FREE FROM WEEDS OR OTHER FOREIGN MATTER TOXIC TO SEED GERMINATION. SEED PURITY SHALL BE 95% WITH A MINIMUM 80% GERMINATION.
 - LAWNS: (SOD), STRONGLY ROOTED, 2 YEARS OLD, ASPA APPROVED, CONSISTING OF FALCON TALL FESCUE (75%) AND OR CROSSFIRE (25%) CUT WITH MINIMUM 1/2-INCH AND MAXIMUM 1-INCH TOPSOIL BASE OR APPROVED EQUAL.
 - TOPSOIL: FROM SITE STOCKPILE OR ADDITIONAL FERTILE, FRABLE TOPSOIL FROM LOCAL SOURCE. MATERIAL SHALL BE REASONABLY FREE OF SUBSOIL, CLAY, LUMPS, BRUSH, REPRODUCTIVE PARTS OF NOXIOUS WEEDS, AND OTHER LITTER, AND FREE OF ROOTS, STUMPS, STICKS, AND STONES LARGER THAN 2" IN ANY DIMENSIONS.
 - PLANTING SOIL MIXTURE: PROVIDE MIXTURE IN RATIO OF 3 PARTS TOPSOIL, 1 PART PEAT MOSS AND 1 PART SAND. ADD AMENDMENTS AS REQUIRED.
 - SOIL AMENDMENTS:
 - FERTILIZER: TEN POUNDS OF 13-13-13, NON-BURNING FERTILIZER PER 1000 SQUARE FOOT COMPOSED OF NOT LESS THAN 50% ORGANIC SLOW ACTING GUARANTEED ANALYSIS FERTILIZER OR APPROVED EQUAL.
 - ROTTED COMPOSTED MANURE.
 - PLANTING TABLETS: 21 GRAM AGRIFORM (20-10-5) OR APPROVED EQUAL.
 - LIME, PEAT MOSS, AND OTHER AMENDMENTS AS REQUIRED FOR PLANTING SOIL MIXTURE.
 - LANDSCAPE MATERIALS:
 - BARK OR MULCH:
 - STRAW, WOOD CELLULOSE FIBER, GROUND OR SHREDDED BARK.
 - 1-1/2" TO 3" PINE BARK WOOD CHIPS.
 - MEDIUM OR LARGE SIZE REDWOOD BARK.
 - SHREDDED PIPE BARK.
 - SHREDDED CEDAR.
 - AGED 1 YEAR SHREDDED HARDWOOD.

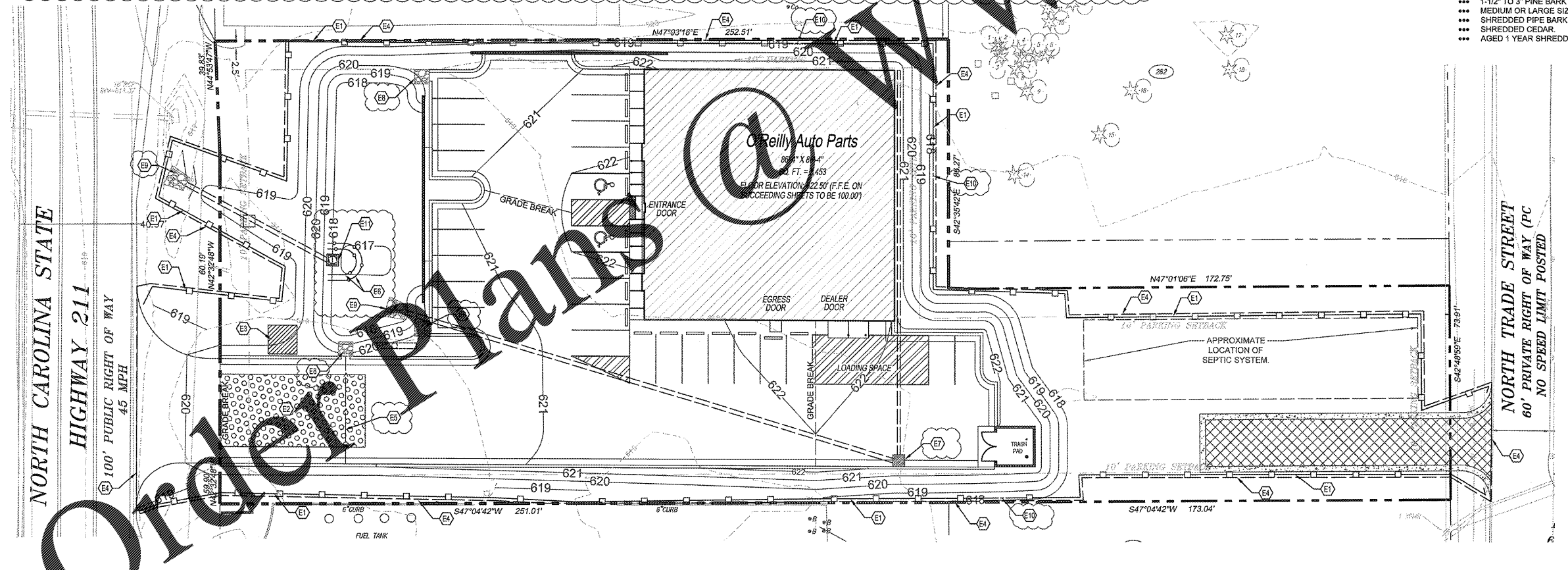
KEY NOTES:

- E1 LIMITS OF SILT FENCE, REFER TO DETAIL 1(C)1.3.1.
- E2 INSTALL CONSTRUCTION ENTRANCE, REFER TO DETAIL 6(C)1.3.1. LAT: 35.2655° LONG: -79.5877°
- E3 INSTALL CONCRETE WASHOUT, REFER TO DETAIL 6(C)1.2.
- E4 LIMITS OF DISTURBED AREA = 1.19 ACRES
- E5 SURFACE FLOW ARROW, DRAIN DRIVEWAY TO CURB CUT.
- E6 INSTALL 2 POROUS BAFFLES, REFER TO DETAIL 5(C)1.3.1.
- E7 INSTALL INLET PROTECTION, REFER TO DETAIL 3(C)1.3.1.
- E8 INSTALL 5' x 5' RIP RAP OUTLET PROTECTION, REFER TO DETAIL 4(C)1.2.
- E9 INSTALL 5' W1 x 7' W2 x 7' RIP RAP OUTLET PROTECTION, REFER TO DETAIL 4(C)1.2.
- E10 INSTALL SILT FENCE OUTLET, REFER TO DETAIL 4(C)1.3.1.
- E11 INSTALL 4" TEMPORARY SKIMMER WITH 1" Ø ORIFICE, REFER TO DETAIL 2(C)1.3.1.

SYMBOLS LEGEND

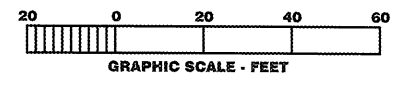
REFER TO SURVEY (SV1) FOR EXISTING CONDITION SYMBOLS LEGEND AND SITE CONTROL.

[Symbol]	SILT FENCE
[Symbol]	CONCRETE WASHOUT
[Symbol]	CONSTRUCTION ENTRANCE



1
C1.3

SEDIMENTATION AND EROSION CONTROL PLAN



PROJECT:
O'REILLY AUTO PARTS
NEW O'REILLY AUTO PARTS STORE
NC STATE HWY 211
SEVEN LAKES, NC
SEDIMENTATION AND EROSION CONTROL PLAN

O'Reilly AUTO PARTS
CORPORATE OFFICES
233 SOUTH PATTERSON
SPRINGFIELD, MISSOURI 65802
(417) 862-2674 TELEPHONE

COMM #	4155
DATE:	3-23-18
REVISION DATE:	8-8-18
	8-16-18
	8-29-18
	8-30-18

C1.3