

NOTES:

1 A STABILIZED PAD OF CRUSHED STONE SHALL BE LOCATED WHERE TRAFFIC WILL BE ENTERING OR LEAVING A CONSTRUCTION SITE TO OR FROM A PUBLIC STREET. IF THIS LOCATION IS SUBJECT TO SEEPAGE OR HIGH WATER TABLE STABILIZE FOUNDATION WITH GEOTEXTILE FABRIC.

2 THIS ENTRANCE SHALL BE MAINTAINED IN A CONDITION WHICH WILL PREVENT TRACKING OR FLOWING OF SEDIMENT ONTO PUBLIC STREETS OR EXISTING PAVEMENT. THIS MAY REQUIRE PERIODIC TOP DRESSING WITH ADDITIONAL STONE AS CONDITIONS DEMAND AND REPAIR AND/OR CLEANOUT OF ANY MEASURES USED TO TRAP SEDIMENT.

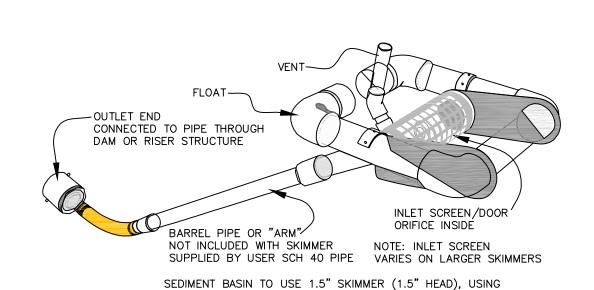
3 ALL SEDIMENT SPILLED, DROPPED, WASHED OR TRACKED ONTO PUBLIC STREETS MUST BE REMOVED IMMEDIATELY.

4 WHEN NECESSARY, WHEELS MUST BE CLEANED TO REMOVE SEDIMENT PRIOR TO ENTERING A PUBLIC STREET. WHEN WASHING IS REQUIRED, IT SHALL BE DONE ON AN AREA STABILIZED WITH CRUSHED STONE WHICH DRAINS INTO AN APPROVED SEDIMENT

MAINTENANCE REQUIREMENTS:

INSPECT CONSTRUCTION ROADS AND PARKING AREAS PERIODICALLY FOR CONDITION OF SURFACE, TOPDRESS WITH NEW GRAVEL AS NEEDED, CHECK ROAD DITCHES AND OTHER SEEDED AREAS FOR EROSION AND SEDIMENTATION AFTER RUNOFF-PRODUCING RAINS. MAINTAIN ALL VEGETATION IN A HEALTHY, VIGOROUS CONDITION. SEDIMENT-PRODUCING AREAS SHOULD BE TREATED IMMEDIATELY.

> TEMPORARY GRAVEL CONSTRUCTION ENTRANCE/EXIT NO SCALE



TYPICAL SKIMMER INSTALLATION DETAIL SCALE: NONE APPLICABLE TO ALL TRAPS

1.0" ORIFICE. SKIMMERS TO BE FAIRCLOTH SKIMMERS OR

EQUAL AS APPROVED BY ENGINEER.

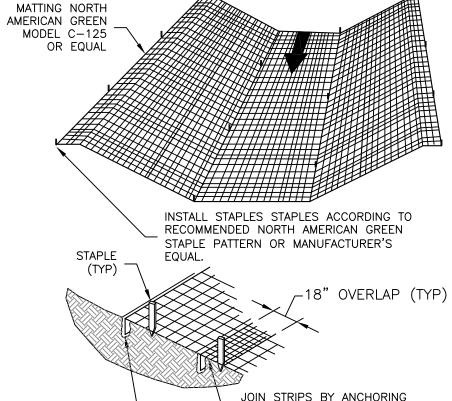
2' MIN. ALL DIVERSION DITCHES MUST LEVEL HAVE GROUND COVER WITHIN COMPACTED SOIL CROWN FROM DITCH EXCAVATION - BERM (PLACE ON LOWER SIDE OF DITCH) 2:1 SLOPE OR FLATTER FILL BERM WITH 6" d50 RIP—RAP IN AREAS WHERE EQUIPMENT MUST CROSS DIVERSION

NOTE: THE DIVERTED RUNOFF SHOULD BE RELEASED THROUGH A STABILIZED OUTLET, SLOPE DRAIN, OR SEDIMENT TRAPPING MEASURE. MAINTENANCE REQUIREMENTS:

INSPECT TEMPORARY DIVERSIONS ONCE A WEEK AND AFTER EVERY RAINFALL. IMMEDIATELY REMOVE SEDIMENT FROM THE FLOW AREA AND REPAIR THE DIVERSION RIDGE. CAREFULLY CHECK OUTLETS AND MAKE TIMELY REPAIRS AS NEEDED. WHEN THE AREA PROTECTED IS PERMANENTLY STABILIZED, REMOVE THE RIDGE AND THE CHANNEL TO BLEND WITH THE NATURAL GROUND LEVEL AND APPROPRIATELY STABILIZE IT.

CLEAN WATER TEMPORARY NO SCALE

IN CHANNELS, ROLL OUT STRIPS OF MATTING PARALLEL TO THE DIRECTION OF FLOW AND OVER THE PROTECTIVE MULCH



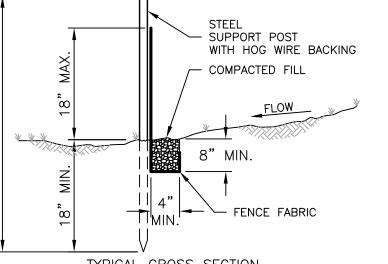
1. Inspect Rolled Erosion Control Products at least weekly and after each significant (1/2 inch or greater) rain fall event repair

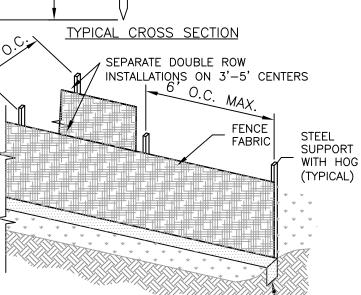
ANCHOR MATTING IN

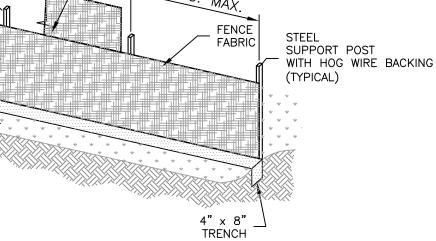
6" TRENCH (TYP)

AND OVERLAPPING AS SHOWN

immediately. 2. Good contact with the ground must be maintained, and erosion must not occur beneath the RECP. 3. Any areas of the RECP that are damaged or not in close contact with the ground shall be repaired and stapled. 4. If erosion occurs due to poorly controlled drainage, the problem shall be fixed and the eroded area protected. 5. Monitor and repair the RECP as necessary until ground cover is established.







. SUPPORT POST: 1.33 POUND/LINEAR FEET STEEL WITH HOG WIRE BACKING 2. FENCE FABRIC: EXTRA STRENGTH SYNTHETIC FILTER FABRIC OR PERVIOUS SHEET OF POLYPROPYLENE. NYLON. POLYESTER OR POLYETHYLENE YARN MEETING SPECIFICATIONS AS SHOWN IN TABLE 6.62B OF N.C. EROSION AND SEDIMENT CONTROL PLANNING AND DESIGN MANUAL

3. IF FENCE FABRIC JOINTS ARE NECESSARY, SECURELY FASTEN THE FABRIC ONLY AT A SUPPORT POST WITH OVERLAP TO THE 4. ANCHOR BOTTOM OF FENCE FABRIC IN TRENCH WITH BACKFILL OF COMPACTED SOIL OR GRAVEL.

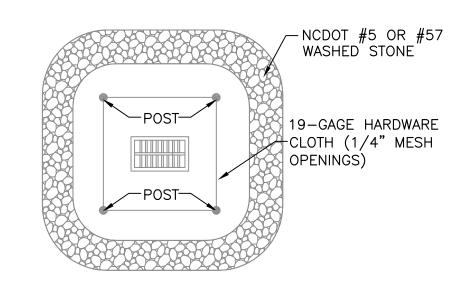
INSPECT SEDIMENT FENCES AT LEAST ONCE A WEEK AND AFTER EACH RAINFALL. MAKE ANY REQUIRED REPAIRS IMMEDIATELY. SHOULD THE FABRIC OF A SEDIMENT FENCE COLLAPSE, TEAR,

DECOMPOSE, OR BECOME INEFFECTIVE, REPLACE IT PROMPTLY.

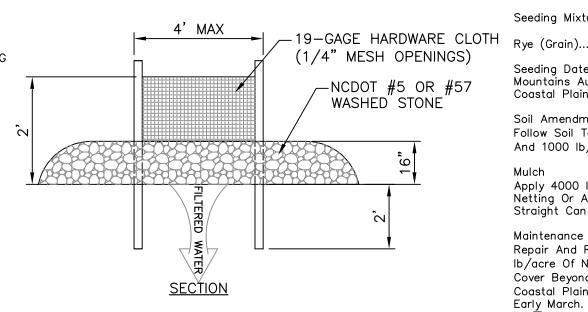
MAINTENANCE REQUIREMENTS:

REMOVE SEDIMENT DEPOSITS AS NECESSARY TO PROVIDE ADUQUATE STORAGE VOLUME FOR THE NEXT RAIN AND TO REDUCE PRESSURE ON THE FENCE. TAKE CARE TO AVOID UNDERMINING THE FENCE

DURING CLEANOUT. 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 STABLIZED.



PAGE 6.51.2 REV. 6/06 OF THE EROSION AND SEDIMENT CONTROL PLANNING AND DESIGN MANUAL.



(1) UNIFORMLY GRADE A SHALLOW DEPRESSION APPROACHING INLET. (2) DRIVE 5' STEEL POSTS 2' INTO THE GROUND SURROUNDING INLET, MAXIMUM OF 4' APART. (3) SURROUND POSTS WITH WIRE MESH HARDWARE CLOTH AND SECURE APPROPIATELY AT TOP, MIDDLE, AND BOTTOM. PLACE A 2' FLAP OF WIRE MESH UNDER GRAVEL

(4) PLACE CLEAN GRAVEL (NCDOT #5 OR #57 STONE) ON A 2:1 SLOPE WITH A HEIGHT OF 16" AND SMOOTH TO AN EVEN GRADE. (5) ONCE THE CONTRIBUTING AREA HAS BEEN STABILIZED, REMOVE ACCUMULATED SEDIMENT Annual Lespedeza (Kobe In Piedmont

AND ESTABLISH FINAL GRADING ELEVATIONS. (6) COMPACT THE AREA PROPERLY AND STABILIZE IT WITH GROUNDCOVER. MAINTENANCE REQUIREMENTS. INSPECT INLETS AT LEAST WEEKLY AND

AFTER EACH SIGNIFICANT (1/2 INCH OR GREATER) RAINFALL EVENT. CLEAR THE MESH WIRE OF ANY DEBRIS OR OTHER OBJECTS TO PROVIDE ADEQUATE FLOW FORSUBSEQUENT RAINS. TAKE CARE NOT TO DAMAGE OR UNDERCUT THE WIRE MESH DURING SEDIMENT REMOVAL. REPLACE STONE AS NEEDED.

FOR ANCHORING AS RECOMMENDED.

INLET CONTROL DEVICE - CLOTH & GRAVEL G

Seeding Mixture Species. Rate (lbs/acre) German Millet..

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 April 15 — Aug. 15

Follow Recommendations Of Soil Tests Or Apply 2000 lb/acre Ground Agricultural Limestone And 750 lb/acre 10-10-10 Fertilizer.

Apply 4000 lb/acre Straw. Anchor Straw By Tacking With Asphalt Netting Or A Mulch Anchoring Tool. A Disc With Blades Set Nearly Straight Can Be Used As A Mulch Anchoring Tool.

Refurtelize If Growth Is Not Fully Adequate. Re—Seed, Refertilize And Mulch Immediately Following Erosion Or Other Damage. Temporary Seeding Summer

Seeding Mixture Species. Rate (lbs/acre)

Seeding Dates Mountains Aug. 15 — Dec. 15

Coastal Plain And Piedmont Aug. 15 - Dec. 30

Soil Amendments Follow Soil Tests Or Apply 2000 lb/acre Ground Agricultural Limestone And 1000 lb/acre 10-10-10 Fertilizer.

Apply 4000 lb/acre Straw. Anchor Straw By Tacking With Asphalt Netting Or A Mulch Anchoring Tool. A Disc With Blades Set Nearly

Straight Can Be Used As A Mulch Anchoring Tool. Repair And Refertilize Damaged Area's Immediately. Topdress With 50

Ib/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.

Temporary Seeding Schedule For Fall.

Seeding Mixture Species. Rate (lbs/acre) Rve (Grain).

And Coastal Plain, Korean In Mountains. Omit Annual Lespedeza When Duration Of Temporary

Seeding Dates; Mountains Above 25000 ft = Feb. 15-May 15 Below 25000ft. = Feb 1 - May 1Piedmont = Jan 1 to May 1

Coastal Plain = Dec. 1 - Apr. 15

Cover Is Not To Extend Beyond June.

Follow Recommendations Of Soil Tests Or Apply 2000 lb/acre Ground Agricultural Limestone And 750 lb/acre 10-10-10 Fertilizer.

Apply 4000 lb/acre Straw. Anchor Straw By Tacking With Asphalt Netting, Or A Mulch Anchoring Tool. A Disc With Blades Set Nearly Straight Cab Be Used As A Mulch Anchoring Tool.

Refurtelize If Growth Is Not Fully Adequate. Re-Seed, Refertilize And Mulch Immediately Following Erosion Or Other Damage.

Temporary Seeding Schedule For Late Winter And Early Spring.

Disc the area to be seeded to a minimum depth of 4-6 inches. Remove all loose rock, roots, etc., leaving surface smooth and uniform. Apply lime and fertilizer evenly and incorporate into the top 4-6 inches of soil by disking or other suitable means. Operate machinery on the contour. Seed on a freshly prepared seedbed and cover the seed lightly by raking or chain dragging; then firm the surface with a roller or cultipacker to provide good seed contact.

July-August

Mulch all seeded areas immediately and anchor mulch. PLANTING DATES PLANTS & MIXTURES PLANTING RATES/ACRE Aug. 15—Oct. 15 Feb. 15—May Tall Fescue 80 - 150 lbs/acre Tall Fescue & 50 lbs/acre Feb. 15-Apr. 30 Sca Nov. 1—Feb. Unscar. Sericea Lespedeza

Sorghum-Sudan (Millet & Sorghum must be kept 10-12" max. height) Tall Fescue & 70 lbs/acre Nov.1-Jan. Ryegrain 25 lbs/acre (Keep annuals cut

60 lbs/acre

30 lbs/acre

Weeping Lovegrass 5 lbs/acre Nov.1-Jan. April 15-June 30 Common Bermudagrass 8-12 lbs/acre (hulled) 15-20 lbs/acre (unhulled)

<u> Seedbed Preparation & Soil Amendments</u>

Seeding Mixture Species. Rate (lbs/acre)

Tall Fescue.... Sericea Lespedeza.. Kobe Lespedeza..

Tall Fescue &

to 10-12")

Browntop Millet or

(1) After Aug. 15. Use Unscarified Sericea Seed.

(2) Where Periodic Mowing Is Planned Or A Neat Appearance Is Desired, Omit Sericea And Increase Kobe Lespedeza To 40lb/acre. (3) To Extend Spring Seeding Dates Into June, Add 15 lb/acre Hulled Bermudagrass. However, after Mid—april, It Is Preferable To Seed Temporary Cover.

Nurse Plants Between May 1 And Aug. 15, Add 10 lb/acre German Millet Or 15 lb/acre Sundagrass. Prior To May 1 Or After Aug. 15 Add 40 lb/acre

Rye (Grain). Possible

Fall: Aug. 25 — Sept. 15 Late Winter: Feb. 15 — Mar. 21 Aug. 20 — Oct. 25 Feb. 1 — Apr. 15 Fall Is The Best For Tall Fescue And Late Winter For Lespedeza. Overseeding Of Kobe Lespedeza Over Fall Seeded Tall Fescue Is Very Effective.

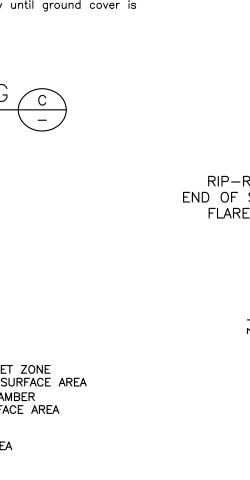
Apply Lime And Fertilizer According To Soil tests Or Apply 4000 lb/acre Ground Agricultural Limestone And 1000 lb/acre 10-10-10

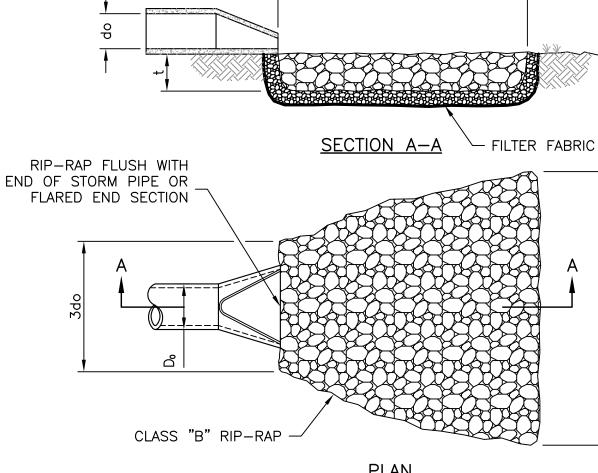
Apply 4000 lb/acre Straw. Anchor Straw By Tacking With Asphalt Netting Or A Mulch Anchoring Tool. A Disc With Blades Set Nearly Straight Can Be Used As A Mulch Anchoring Tool.

Refurtelize In The Second Year Unless Growth Is Fully Adequate. May Be Mowed Once Or Twice A Year, But Mowing Is Not Necessary. Reseed,

<u>Gentle Slopes, Average Soil, Low Maintenence</u>

Fertilize, And Mulch Damaged Area's Immediately. Permanent Seeding





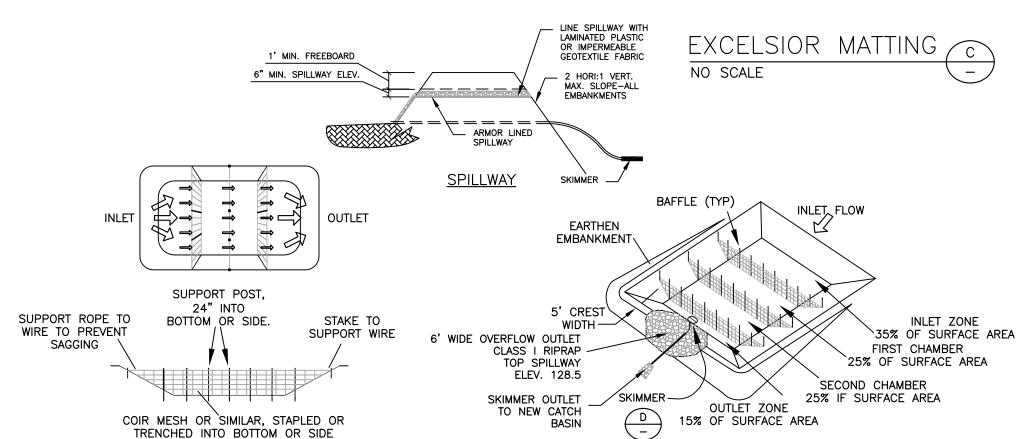
SITE AREA TABILIZATION STABILIZATION TIME FRAME EXCEPTIONS DESCRIPTION TIME **FRAME** Perimeter dikes, 7 Days swales, ditches None and slopes High Quality 7 Days Water (HQW) Zones lf Slopes Are 10' Or Less In Slopes Steeper Length And Are Not Steeper Than 3:1 Than 2:1, 14 Days Are Allowed Slopes 3:1 or 7-Days For Slopes Greater 14 Days Flatter Than 50-Feet In Length All Other Areas None (Except For Perimeters 14 Days With Slopes And HQW Zones) Flatter Than 4: "Extensions of time may be approved by the permitting authority pased on weather or other site—specific conditions that make compliance impracticable." (Section II.B(2)(b)) EC Manual

GROUND STABILIZATION REQUIREMENTS

<u>PLAN</u>												
APRON NO.	Channel (C) or			DIMEN	STONE WEIGHT RANGES (Ibs)							
	Apron (A)	do (in)	3do (ft)	w (ft)	t (in)	La (ft)	d50 (in)	MIN. – MAX.	75% RANGE			
RRA-1	А	15	3.75	3.75	6.75	5	3	3-20	6			
RRA-2	А	12	3.75	3.75	6.75	10	3	3-20	6			
RRA-3	А	12	3.75	3.75	6.75	10	3	3-20	6			
NOTE: d50 = MEDIAN STONE DIAMETER												

THE STRUCTURE SHALL BE MAINTAINED AND IS TO BE INSPECTED AFTER HEAVY RAINS TO SEE IF ANY EROSION AROUND OR BELOW THE RIP RAP HAS TAKEN PLACE OR IF STONES HAVE BEEN DISLODGED. IMMEDIATELY MAKE ALL NEEDED REPAIRS TO PREVENT FURTHER DAMAGE.

RIP-RAP APRON OUTLET PROTECTION (H NO SCALE (PIPE OUTLET TO FLAT AREA)



<u> MAINTENANCE REQUIREMENTS-SEDIMENT TRAP:</u> ISPECT TEMPORARY SEDIMENT TRAPS AT LEAST WEEKLY AND AFTER EACH SIGNIFICANT (1/2") R GREATER RAINFALL. REMOVE SEDIMENT AND RESTORE THE TRAP TO ITS ORIGINAL DIMENSIONS WHEN THE SEDIMENT HAS ACCUMULATED TO ONE—HALF THE DESIGN DEPTH OF THE RAP. PLACE THE SEDIMENT THAT IS REMOVED IN THE DESIGNATED DISPOSAL AREA AND REPLACE THE CONTAMINATED PART OF THE GRAVEL FACING THAT IS IMPAIRED BY SEDIMENT. CHECK THE STRUCTURE FOR DAMAGE FROM EROSION OR PIPING. PERIODICALLY CHECK THE DEPTH OF THE SPILLWAY TO ENSURE IT IS A MINIMUM OF 1.5 FT BELOW THE LOW POINT OF THE EMBANKMENT. IMMEDIATELY FILL ANY SETTLEMENT OF THE EMBANKMENT TO SLIGHTLY ABOVE DESIGN GRADE. ANY RIP RAP DISPLACED FROM THE SPILLWAY MUST BE REPLACED MMEDIATELY. AFTER ALL SEDIMENT PRODUCING AREAS HAVE BEEN PERMANENTLY STABILIZED REMOVED THE STRUCTURE AND ALL UNSTABLE SEDIMENT. SMOOTH THE AREA TO BLEND WITH THE ADJOINING AREAS AND STABILIZE PROPERLY. CHECK THE FABRIC LINED SPILLWAY FOR

DAMAGE AND MAKE REQUIRED REPAIRS WITH FABRIC THAT SPANS THE FULL WIDTH OF THE

MAINTENANCE REQUIREMENTS-BAFFLES INSPECT BAFFLES AT LEAST ONCE A WEEK AND AFTER EACH RAINFALL. MAKE ANY REQUIRED REPAIRS IMMEDIATELY. BE SURE TO MAINTAIN ACCESS TO THE BAFFLES. SHOULD THE FABRIC OF A BAFFLE COLLAPSE, TEAR, DECOMPOSE, OR BECOME INEFFECTIVE, REPLACE IT

REMOVE SEDIMENT DEPOSITS WHEN IT REACHES HALF FULL TO PROVIDE ADEQUATE STORAGE VOLUME FOR THE NEXT RAIN AND TO REDUCE PRESSURE ON THE BAFFLES, TAKE CARE TO AVOID DAMAGING THE BAFFLES DURING CLEANOUT. SEDIMENT DEPTH SHOULD NEVER EXCEED HALF THE DESIGNED STRORAGE DEPTH. AFTER THE CONTRIBUTING DRAINAGE AREA HAS BEEN PROPERLY STABLIZED, REMOVE ALL BAFFLE MATERIALS AND UNSTABLE SEDIMENT DEPOSITS, BRING THE AREA TO GRADE, AND STABILIZE IT.

ı		SEDIMENT BASIN SCHEDULE														
	BASIN NO.	DRAINAGE AREA (AC.)	DISTURBED AREA (AC.)	Q10 (CFS)	REQ.'D TRAP VOL. (CU. FT.)	REQ.'D SURFACE AREA (SQ. FT.)	SIDE SLOPES FT/FT	WEIR LENGTH (FT.)	DESIGN SURFACE ELEV.	DESIGN SURFACE AREA (SF)	DESIGN BASE ELEV.	DESIGN BASE AREA (SF)	OF BERM	DESIGN VOLUME (CF)	SKIMMER SIZE (IN.)	DESIGN ORIFICI DIA. (IN
١	SB-1	1.26	1.26	4.21	2,268	1,473	2:1	N/A	701.50	1,512	699.5	920	702.5±	2,432	1.5	1.0
- 1																

SKIMMER BASIN DETAIL (E)

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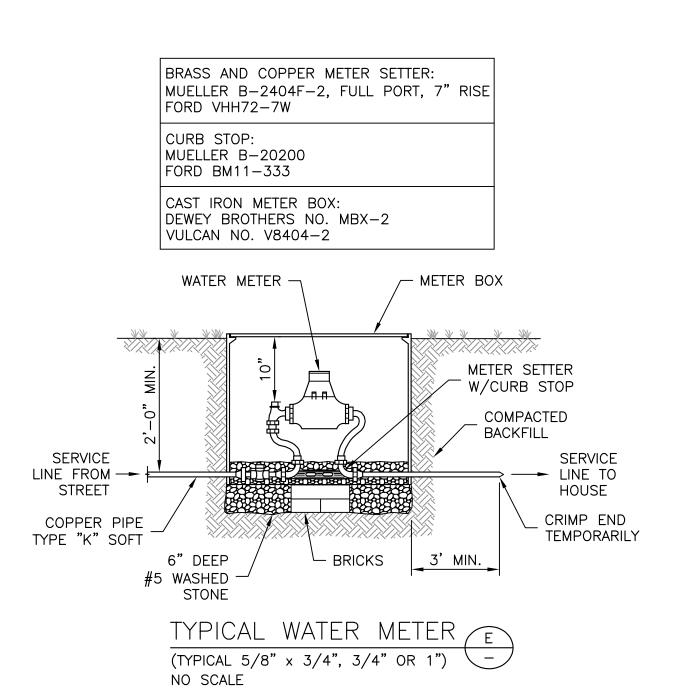
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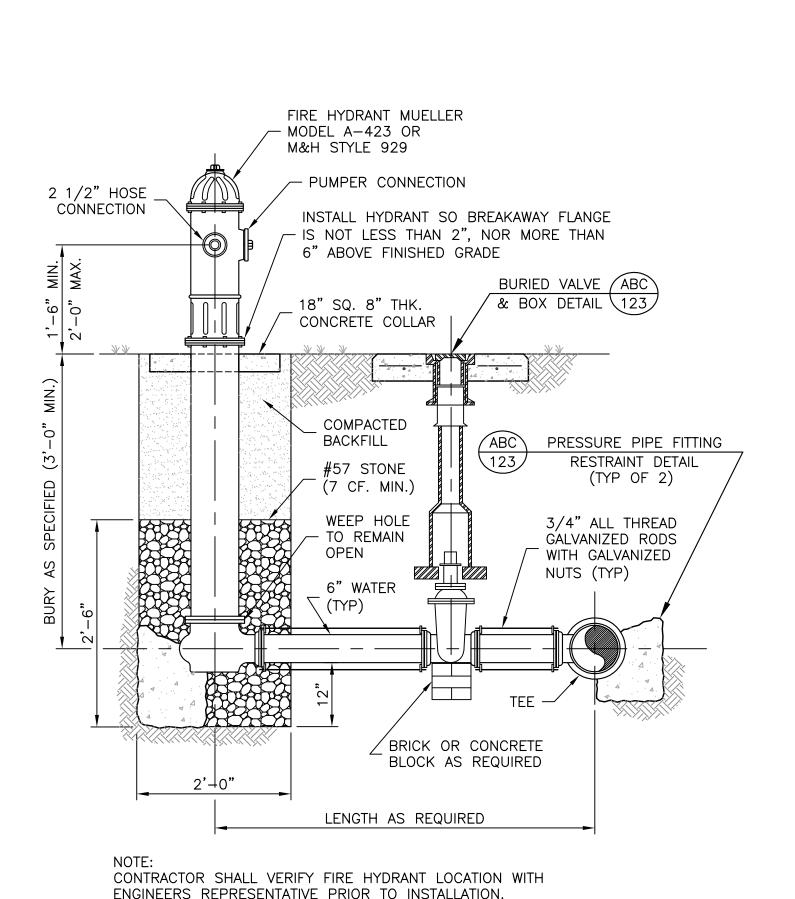
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PROJECT NUMBER 15-PB-LPC DESIGNED BY JWW DRAWN BY JWW CHECKED BY JWW AS SHOWN DATE 4-30-15 OF

IAL CENTEF L DETAILS UNTY, NC

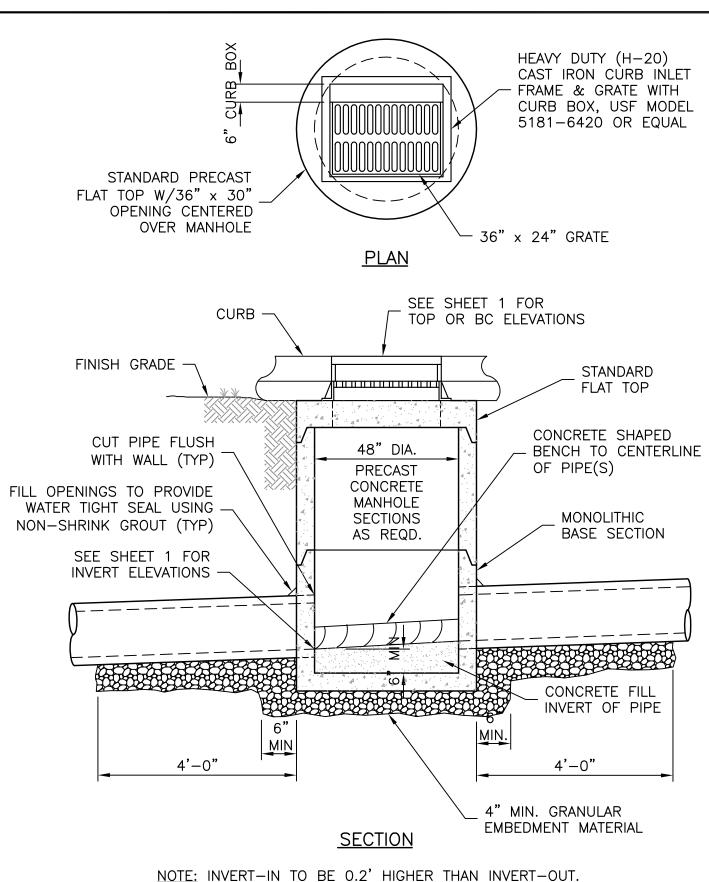
LEWIS PROFESSIONAL EROSION CONTROL ROCKINGHAM COUN





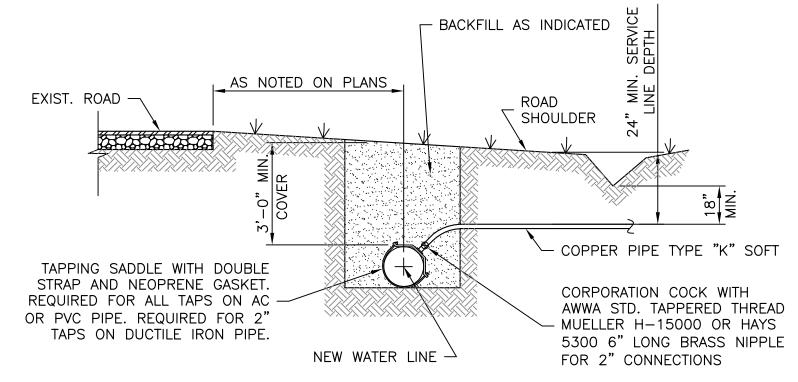
FIRE HYDRANT INSTALLATION /H

NO SCALE

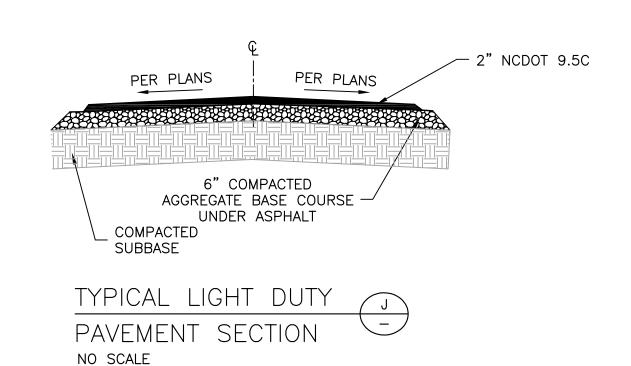


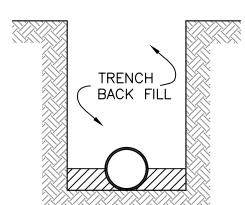
CURB INLET CATCH BASIN C

NO SCALE



TYPICAL WATER SERVICE CONNECTION F
USING TAPPING SADDLE
NO SCALE

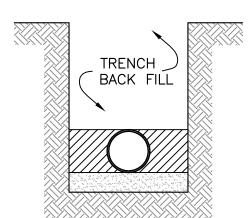




AYING CONDITION:

DESCRIPTION:
FLAT BOTTOM TRENCH; BACK FILL JOB EXCAVATED
MATERIAL TO CENTERLINE OF PIPE AT 95%
STANDARD PROCTOR, AASHTO T-99.

PROJECT USE:
ALL DUCTILE IRON WATER LINE OR FORCE MAIN.
ALL RCP STORM WATER PIPE

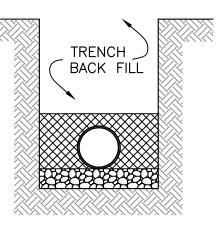


LAYING CONDITION: TYPE 3

DESCRIPTION:
PIPE BEDDED IN 4 INCHES MINIMUM JOB
EXCAVATED MATERIAL; JOB EXCAVATED MATERIAL
COMPACTED TO TOP OF PIPE AT 95% STANDARD
PROCTOR, AASHTO T-99.

PROJECT USE:
ALL DUCTILE IRON SEWER LINE. ALL 4" SEWER SERVICE LATERALS.

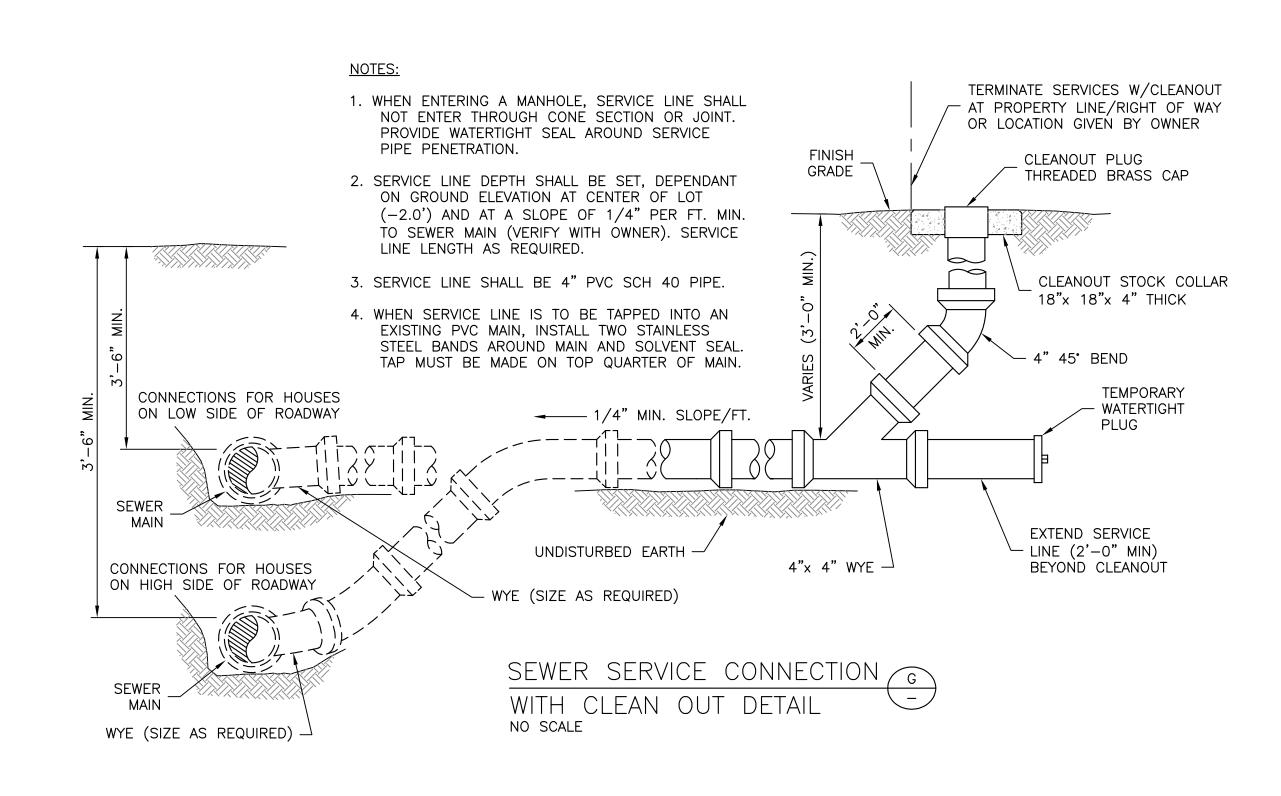
LAYING CONDITION: TYPE 4

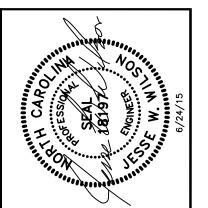


PIPE BEDDED IN 4 INCHES MINIMUM SAND, GRANULAR MATERIAL, OR GRAVEL TO DEPTH OF 1/8 OF PIPE DIA(4-INCHES MIN); SELECT JOB EXCAVATED MATERIAL COMPACTED TO 4 INCHES ABOVE TOP OF PIPE AT 95% STANDARD PROCTOR, AASHTO T-99.

PROJECT USE: ALL PVC WATER LINE AND PVC FORCE MAIN.

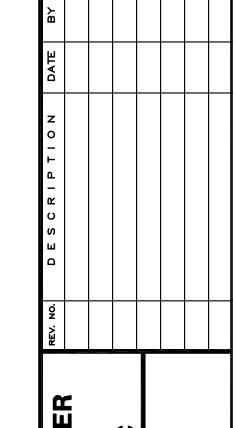
PIPE EMBEDMENT DETAILS D
NO SCALE





107 EAST DAWIS STREE SMITHFIELD, NC 27577 (336) 308-9613





LEWIS PROFESSIONAL CENTE
MISCELLANEOUS DETAILS
ROCKINGHAM COUNTY, NC
FOR:
PAUL BRIGGS, AIA
LEXINGTON, NC

PROJECT NUMBER
15-PB-LPC

DESIGNED BY
JWW

DRAWN BY
JWW

CHECKED BY
JWW

SCALE
AS SHOWN

DATE
4-30-15

OF