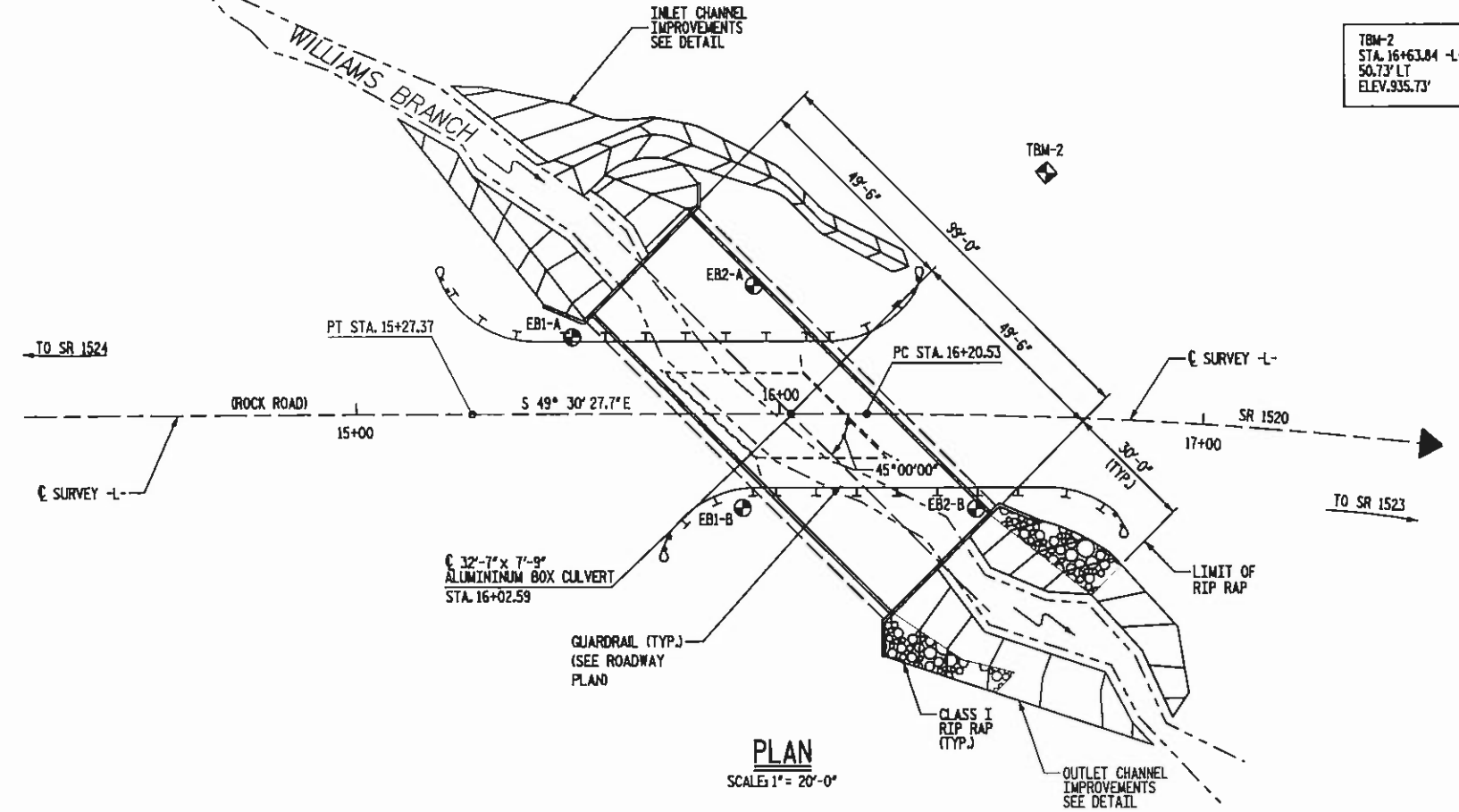




TBM-2
STA. 16+63.84 -L-
50.73' LT
ELEV. 935.73'

HYDRAULIC DATA

DESIGN DISCHARGE	= 620 CFS
FREQUENCY OF DESIGN FLOOD	= 25 YR.
DESIGN HIGH WATER ELEVATION	= 926.1
DRAINAGE AREA	= 1.0 SQ. MI.
BASIC DISCHARGE (Q100)	= 850 CFS
BASIC HIGH WATER ELEVATION	= 926.7

OVERTOPPING FLOOD DATA

OVERTOPPING DISCHARGE	= 1200 CFS+
FREQUENCY OF OVERTOPPING FLOOD	= 500 YR+
OVERTOPPING FLOOD ELEVATION	= 927.92

NOTES

THE QUANTITY OF RIP RAP TO BE PAID FOR WILL BE THE ACTUAL NUMBER OF TONS OF EACH CLASS OF RIP RAP WHICH HAS BEEN INCORPORATED INTO THE COMPLETED AND ACCEPTED WORK. THE RIP RAP WILL BE MEASURED BY BEING WEIGHED ON TRUCKS ON CERTIFIED PLATFORM SCALES OR OTHER CERTIFIED WEIGHING DEVICES. THE QUANTITY OF RIP RAP WILL BE PAID FOR AT THE CONTRACT UNIT PRICE PER TON PLAIN RIP RAP CLASS I (1'-6" THICK).

EXISTING BRIDGE SHALL BE REMOVED BY SAWING AND/OR NON-SHATTERING METHODS SUCH THAT DEBRIS WILL NOT FALL INTO THE WATER.

MAXIMUM DESIGN FILL IS 3.7'.
MINIMUM DESIGN FILL IS 1.4'.

ASSUMED LIVE LOAD - HL-93 OR ALTERNATE.

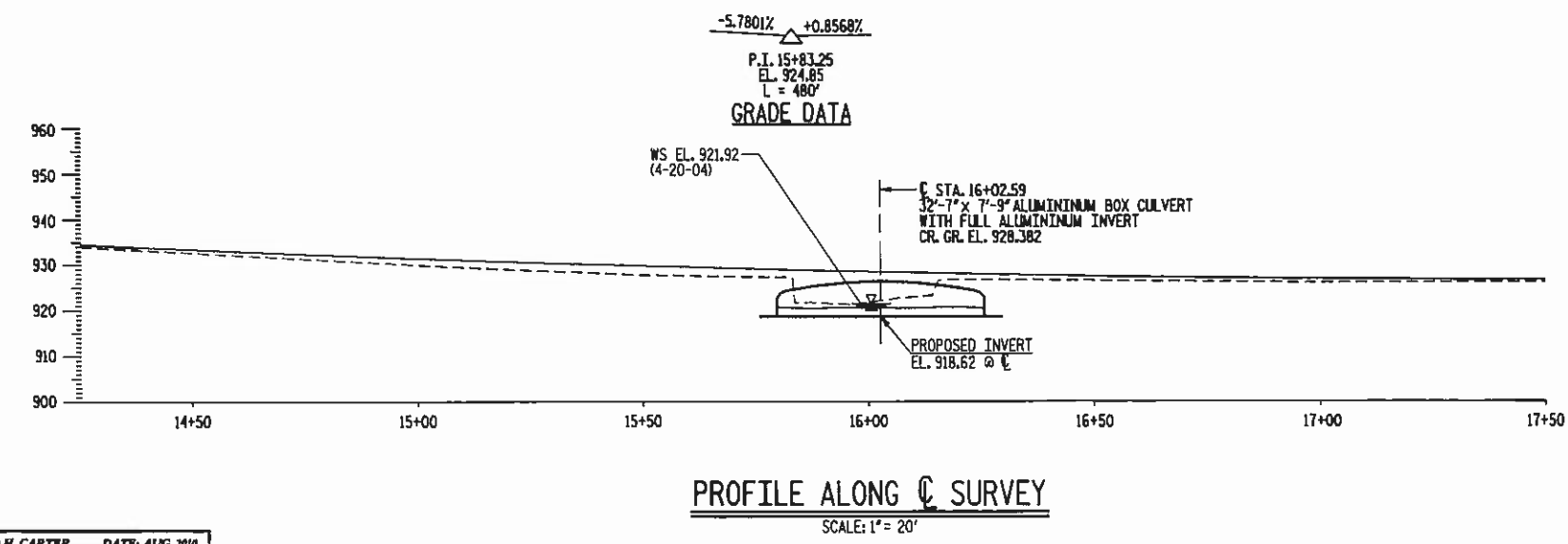
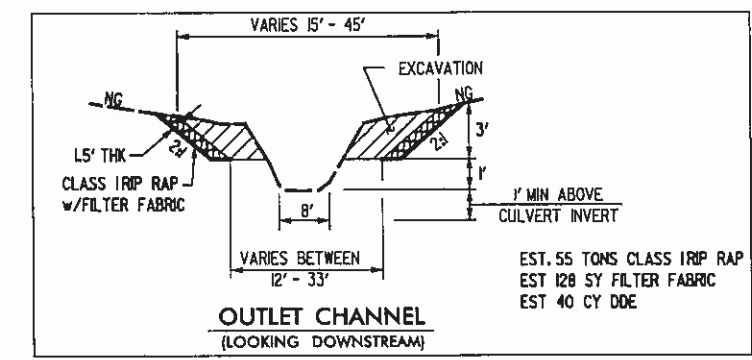
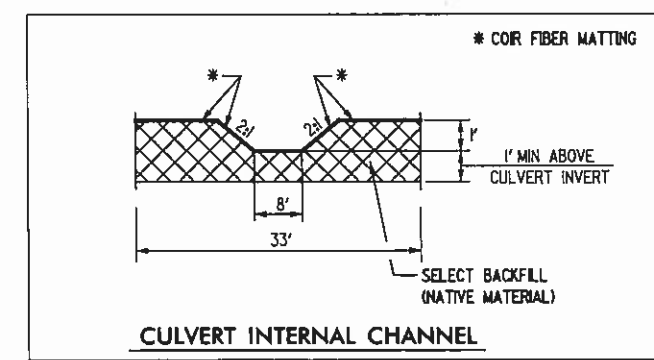
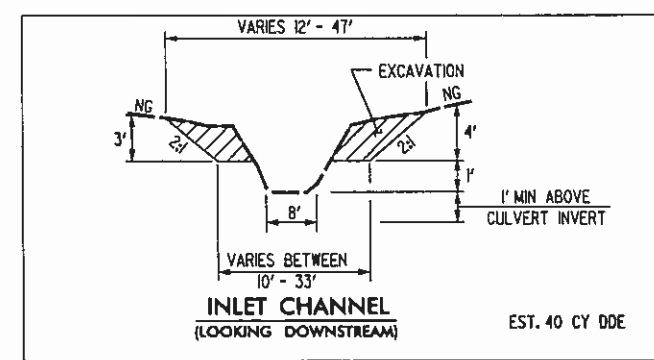
ALUMINUM BOX CULVERT TO BE DESIGNED BY A NORTH CAROLINA REGISTERED ENGINEER IN ACCORDANCE WITH APPLICABLE PORTIONS OF STANDARD SPECIFICATIONS FOR HIGHWAY BRIDGES ADOPTED BY AASHTO. CONSTRUCTION SHALL MEET THE APPLICABLE SECTIONS OF THE NORTH CAROLINA DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS FOR ROADS AND STRUCTURES.

NATIVE MATERIAL REMOVED FROM THE CHANNEL TO ALLOW FOR THE INSTALLATION OF THE CULVERT SHALL BE USED FOR BACKFILLING INSIDE THE CULVERT. SELECT BACKFILL AND COIR FIBER MATTING SHALL BE INCLUDED IN THE CONTRACT PRICE BID FOR "EXCAVATION AND EMBANKMENT".

ADT = 1200 VPD FOR YEAR 2035.

DESCRIPTION OF EXISTING BRIDGE

1 SPAN @ 32'-0" CONSISTING OF 3.5" ASPHALT WEARING SURFACE ON 4" x 8" TIMBER FLOOR ON STEEL I-BEAMS; ON MASONRY ABUTMENTS; 19'-5" CLEAR ROADWAY

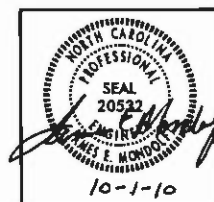


PROJECT NO. 33604
COUNTY: RUTHERFORD
STATION: 16+02.59
REPLACES BRIDGE NO. 217

STATE OF NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION
RALEIGH

BRIDGE NO. 217 ON SR 1520 OVER
TRIBUTARY TO CATHYS CREEK

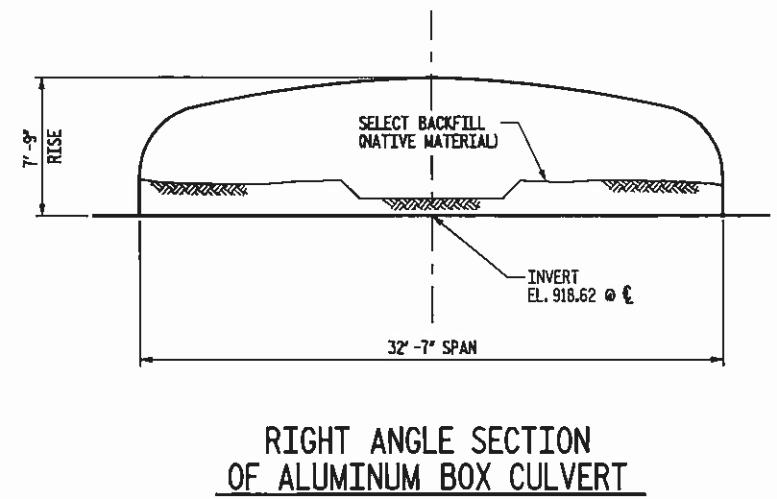
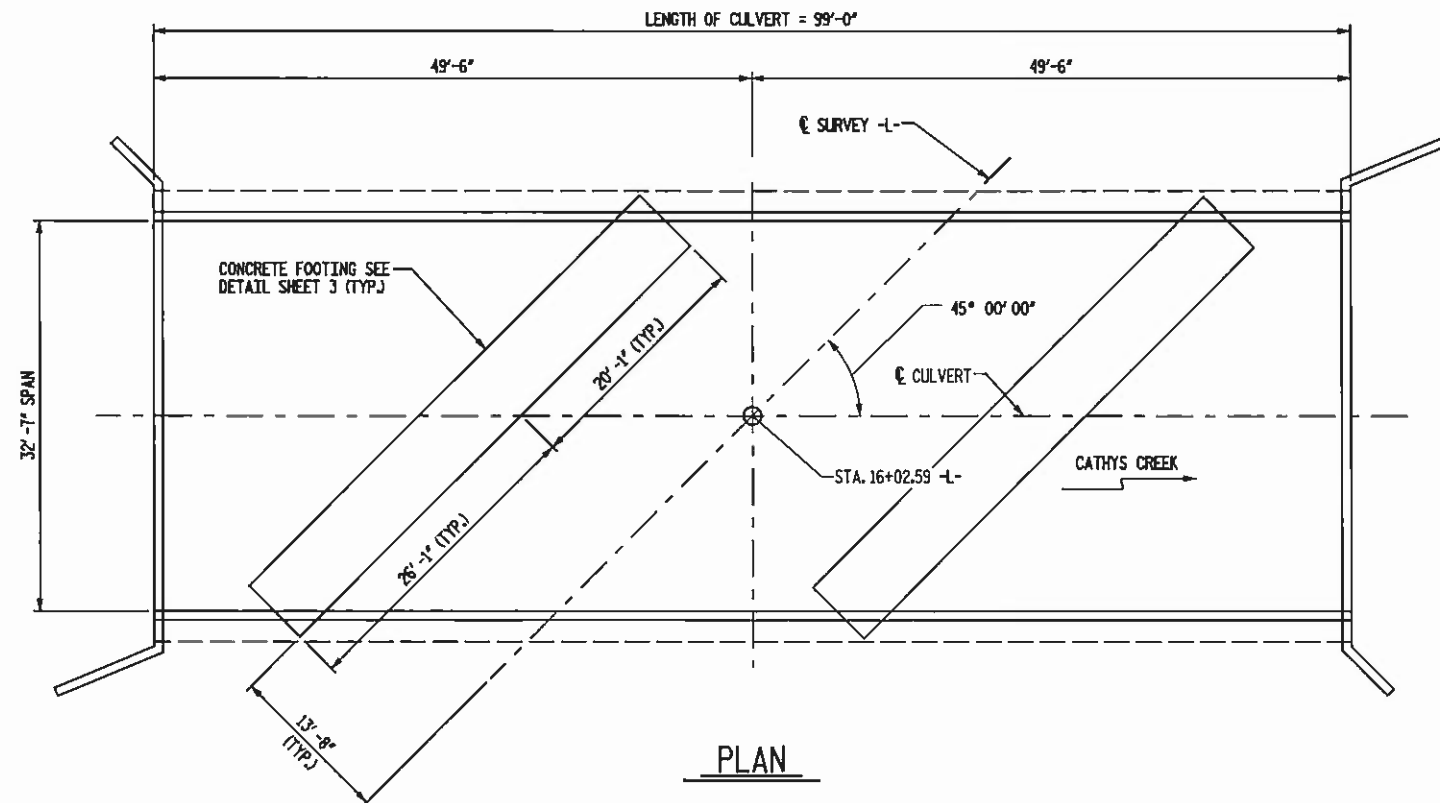
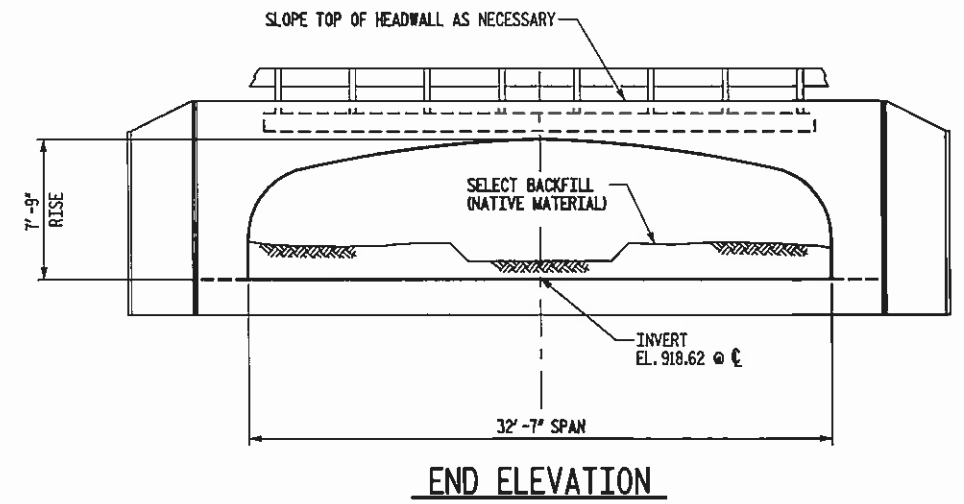
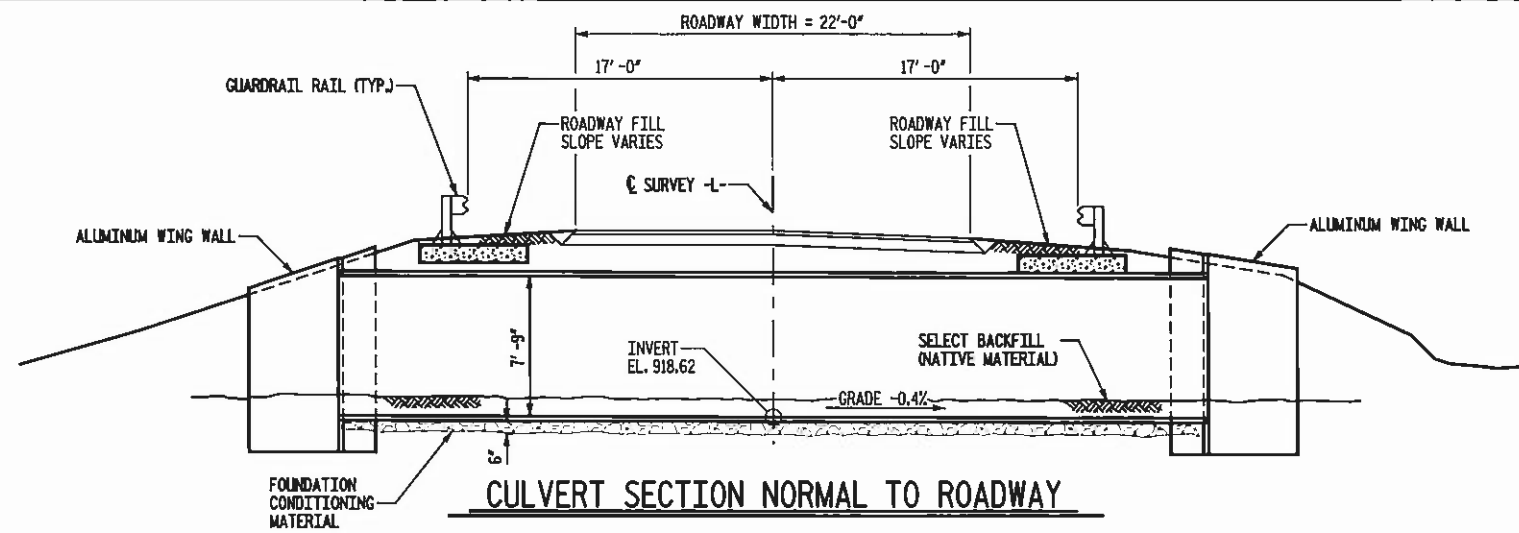
Florence & Hutcheson
CONSULTING ENGINEERS
5121 Kingsway Way, Suite 100 Raleigh, NC 27607
NC License No. F-0268



REVISIONS

NO.	BY	DATE	NO.	BY	DATE
1			2		
2			3		
3			4		

TOTAL SHEETS: 17

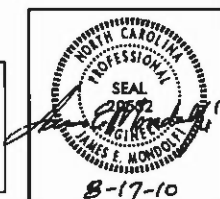


PROFILE ALONG CULVERT

PROJECT NO. 33604
COUNTY: RUTHERFORD
STATION: 16 + 02.59
REPLACES BRIDGE NO. 217

STATE OF NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION
RALEIGH

32'-7" X 7'-9"
ALUMINUM BOX
CULVERT



REVISIONS						SHEET NO.
NO.	BY	DATE	NO.	BY	DATE	
1			3			2
2			4			17

DRAWN BY: D.H. CARTER DATE: AUG. 2010
CHECKED BY: J.E. MONDOLFF DATE: AUG. 2010



2" CLR. (TYP.)

92 - #7 A1 @ 6" CTS. (TOP & BOTT.) = 45' - 6"

6' - 0"

5' - 8"

45' - 10"

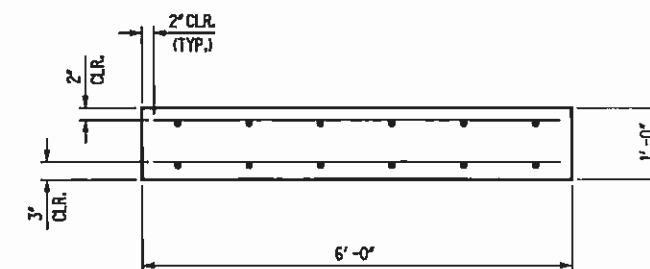
46' - 2"

2" CLR. (TYP.)

6 - #5 B1 @ 12" CTS. (TOP & BOTT.)

6" (TYP.)

FOOTING PLAN



SECTION B-B

1' - 2 1/2" (TYP.)

7 SPACES @ 6' - 3" = 43' - 9"

W6 X 8.5 STEEL POST (TYP.)

FOR GUARDRAIL ASSEMBLY SEE STD. 862.03, SHT 9 OF 9

1' - 0"

46' - 2"

BOTTOM FOOTING ELEV. VARIES

A

END ELEVATION

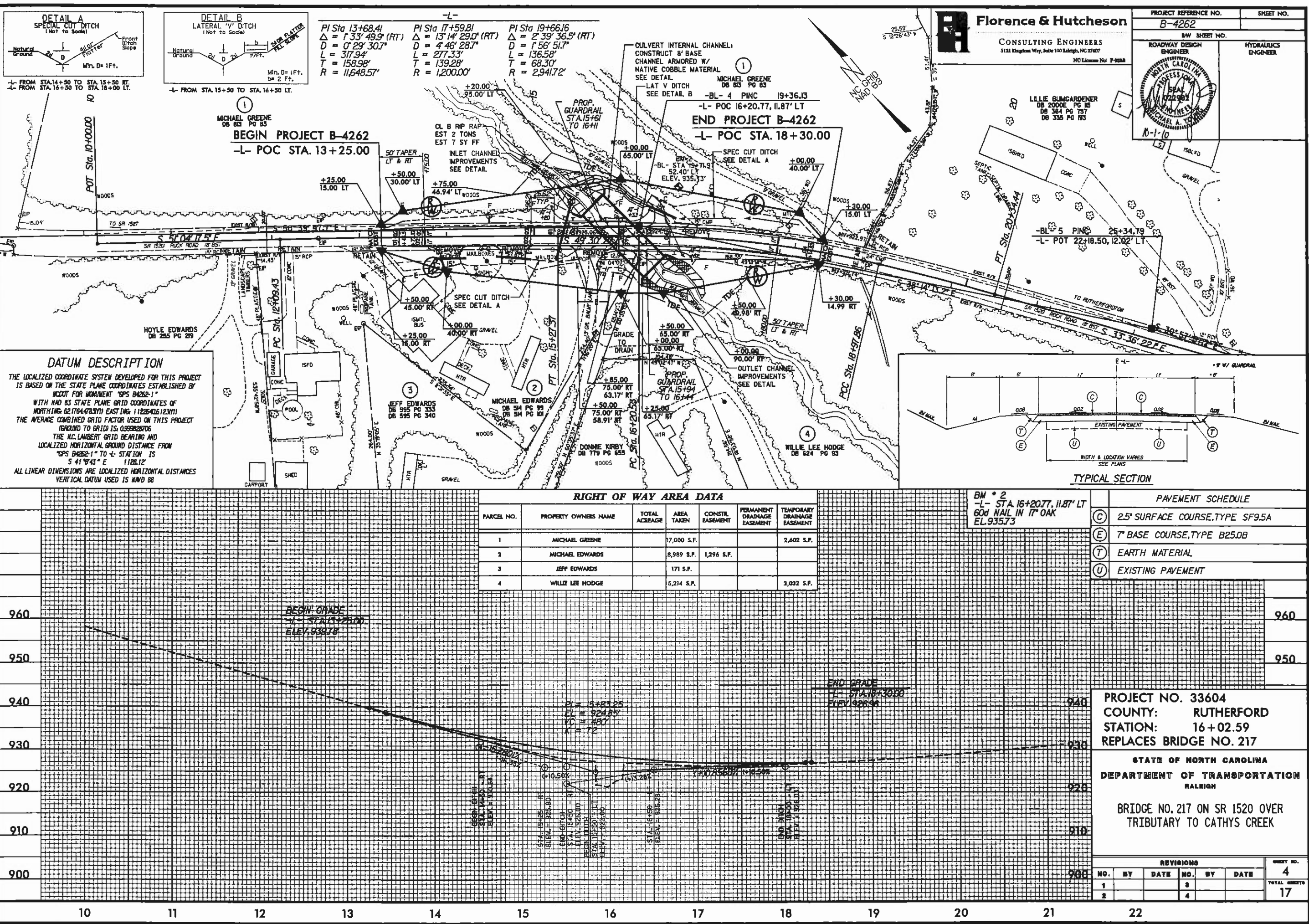
A circular professional seal for James F. Mondo, a North Carolina Professional Engineer. The seal contains the text "NORTH CAROLINA PROFESSIONAL ENGINEER SEAL" around the top and "JAMES F. MONDO, P.E." around the bottom. In the center, the number "28379" is stamped. The seal is signed with a cursive signature and dated "8-17-10" at the bottom.

STATE OF NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION
RALEIGH

REVISIONS						QUANTITY NO.
NO.	BY	DATE	NO.	BY	DATE	
1			3			3
2			4			17

B-17/99

10/12/2010
R:\Roadway\Projects\B4262.Rdy.psd.dgn
Florence & Hutcheson



DATUM DESCRIPTION
THE LOCALIZED COORDINATE SYSTEM DEVELOPED FOR THIS PROJECT IS BASED ON THE STATE PLANE COORDINATES ESTABLISHED BY NC DOT FOR MONUMENT "SPS B4262-1" WITH NAD 83 STATE PLANE GRID COORDINATES OF NORTHING: 621764.473 (M) EASTING: 1122640.612 (M). THE AVERAGE COMBINED GRID FACTOR USED ON THIS PROJECT (GROUND TO GRID) IS: 0.999228706. THE N.C. LAMBERT GRID BEARING AND LOCALIZED HORIZONTAL GROUND DISTANCE FROM "SPS B4262-1" TO L- STATION 12 IS: S 41° 43' E 1128.12'. ALL LINEAR DIMENSIONS ARE LOCALIZED HORIZONTAL DISTANCES. VERTICAL DATUM USED IS NAVD 88.

RIGHT OF WAY AREA DATA					
PARCEL NO.	PROPERTY OWNERS NAME	TOTAL ACRES	AREA TAKEN	CONSTR. EASEMENT	PERMANENT DRAINAGE EASEMENT
1	MICHAEL GREENE	17,000 S.F.			2,602 S.F.
2	MICHAEL EDWARDS	8,989 S.F.	1,296 S.F.		
3	JEFF EDWARDS	171 S.F.			
4	WILLIE LEE HODGE	5,214 S.F.			2,032 S.F.

PAVEMENT SCHEDULE	
(C)	2.5" SURFACE COURSE, TYPE SF9.5A
(E)	7" BASE COURSE, TYPE B25.0B
(T)	EARTH MATERIAL
(U)	EXISTING PAVEMENT

PROJECT NO. 33604
COUNTY: RUTHERFORD
STATION: 16+02.59
REPLACES BRIDGE NO. 217

STATE OF NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION
RALEIGH

BRIDGE NO. 217 ON SR 1520 OVER
TRIBUTARY TO CATHYS CREEK

REVISIONS					
NO.	BY	DATE	NO.	BY	DATE
1			3		
2			4		

4
17

ROADWAY STANDARD DRAWINGS

THE FOLLOWING ROADWAY STANDARDS AS APPEAR IN "ROADWAY STANDARD DRAWINGS"- ROADWAY DESIGN UNIT-N.C. DEPARTMENT OF TRANSPORTATION-RALEIGH, N.C., DATED JULY 2006 ARE APPLICABLE TO THIS PROJECT AND BY REFERENCE HEREBY ARE CONSIDERED A PART OF THESE PLANS:

STD. NO.	TITLE
1101.03	TEMPORARY ROAD CLOSURES
1101.04	TEMPORARY SHOULDER CLOSURES
1145.01	BARRICADES
1205.01	PAVEMENT MARKINGS - LINE TYPES & OFFSETS
1205.02	PAVEMENT MARKINGS - 2 LANE & MULTILANE ROADWAYS
1281.01	GUARDRAIL & BARRIER DELINEATOR SPACING
1281.02	GUARDRAIL & BARRIER DELINEATOR TYPES
1282.01	GUARDRAIL END DELINEATION

GENERAL NOTES

ADAPT THE TRAFFIC CONTROL PLANS, WHEN DIRECTED BY THE ENGINEER, TO MEET FIELD CONDITIONS TO PROVIDE SAFE AND EFFICIENT TRAFFIC MOVEMENT. CHANGES MAY BE REQUIRED WHEN PHYSICAL DIMENSIONS IN THE DETAIL DRAWINGS, STANDARD DETAILS AND ROADWAY DETAILS ARE NOT ATTAINABLE, OR RESULT IN DUPLICATE, OR UNDESIRED OVERLAPPING OF DEVICES. MODIFICATION MAY INCLUDE: MOVING, SUPPLEMENTING, COVERING OR REMOVAL OF DEVICES.

THE FOLLOWING GENERAL NOTES APPLY AT ALL TIMES FOR THE DURATION OF THE CONSTRUCTION PROJECT, EXCEPT WHEN OTHERWISE NOTED IN THE PLAN, OR DIRECTED BY THE ENGINEER.

TRAFFIC PATTERN ALTERATIONS

- A) NOTIFY THE ENGINEER TWENTY ONE (21) CALENDAR DAYS PRIOR TO ANY TRAFFIC PATTERN ALTERATION.

SIGNING

- B) STATE FORCES WILL BE RESPONSIBLE FOR PERMANENT SIGNING.
C) STATE FORCES WILL BE RESPONSIBLE FOR DETOUR SIGNING OFF THE PROJECT LIMITS.
D) STATE FORCES WILL COVER OR REMOVE ALL DETOUR SIGNS OFF THE PROJECT LIMITS WHEN A DETOUR IS NOT IN OPERATION.
E) ENSURE ALL NECESSARY SIGNING IS IN PLACE PRIOR TO ALTERING ANY TRAFFIC PATTERN.

TRAFFIC CONTROL DEVICES

- F) PLACE TYPE III BARRICADES, WITH "ROAD CLOSED" SIGN R11-2 ATTACHED, OF SUFFICIENT LENGTH TO CLOSE ENTIRE ROADWAY. STAGGER OR OVERLAP BARRICADES TO ALLOW FOR INGRESS OR EGRESS.

PAVEMENT MARKINGS AND MARKERS

- G) INSTALL PAVEMENT MARKINGS AND PAVEMENT MARKERS ON THE FINAL SURFACE AS FOLLOWS:

ROAD NAME	MARKING
1. SR 1520 (ROCK RD.)	THERMOPLASTIC

- H) TIE PROPOSED PAVEMENT MARKING LINES TO EXISTING PAVEMENT MARKING LINES.

PHASE I

- STEP 1: - USING ROADWAY STANDARD DRAWING NUMBER 1101.04, SHEET 1 OF 1, INSTALL ALL DETOUR SIGNING KEEPING SIGNS COVERED (SEE SHEET 6).

WORKING IN A CONTINUOUS MANNER, COMPLETE THE FOLLOWING WORK IN PHASE I, STEP 2.

- STEP 2: - USING ROADWAY STANDARD DRAWING NUMBER 1101.03, SHEET 1 OF 9, CLOSE SR 1520 (ROCK RD.) TO TRAFFIC, UNCOVER ALL DETOUR SIGNING AND SHIFT TRAFFIC TO DETOUR (SEE SHEET 6).

- STEP 3: - DISMANTLE AND REMOVE EXISTING BRIDGE NUMBER 217.

- STEP 4: - CONSTRUCT PROPOSED STRUCTURE, APPROACH ROADWAY TIE-INS, AND ASSOCIATED ITEMS.

- STEP 5: - PLACE FINAL PAVEMENT MARKINGS (THERMOPLASTIC) ON SR 1520 (ROCK RD.).

WORKING IN A CONTINUOUS MANNER, COMPLETE THE FOLLOWING WORK IN PHASE I, STEP 6.

- STEP 6: - USING ROADWAY STANDARD DRAWING NUMBER 1101.04, SHEET 1 OF 1, REMOVE ALL DETOUR SIGNING, ALL TRAFFIC CONTROL DEVICES AND OPEN SR 1520 (ROCK RD.) TO TRAFFIC.

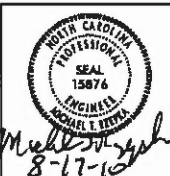
FINAL PAV'T MARKING SCHEDULE

SYMBOL	DESCRIPTION	QUANTITY BREAKDOWN	PAY ITEM	TOTAL QUANTITY
PAVEMENT MARKING LINES				
TA	WHITE EDGELINE	1,010 LF	THERMOPLASTIC (4", 90mils)	
			TOTAL	1,010 LF
TI	YELLOW DOUBLE CENTER LINE	1,010 LF	THERMOPLASTIC (4", 120mils)	
			TOTAL	1,010 LF

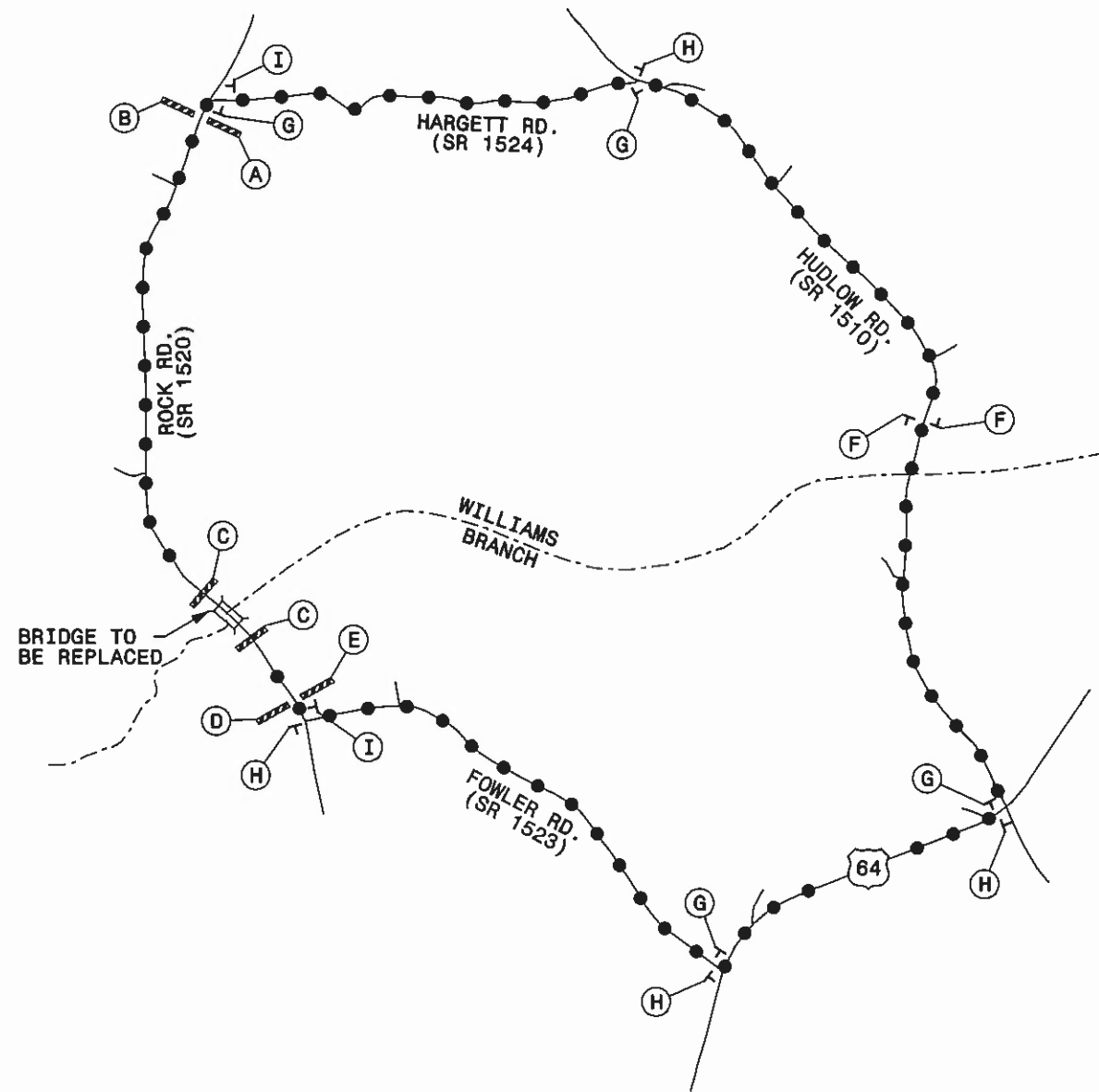
PROJECT NO. 33604
COUNTY: RUTHERFORD
STATION: 16+02.59
REPLACES BRIDGE NO. 217

STATE OF NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION
RALEIGH

BRIDGE NO.217 ON SR 1520 OVER
TRIBUTARY TO CATHYS CREEK



REVISIONS						SHEET NO. 5
NO.	BY	DATE	NO.	BY	DATE	
1			3			TOTAL SHEETS 17
2			4			



SIGN NUMBER: name		BACKG COLOR: Green		DESIGN BY: DESIGNED		CHECKED BY: CHECKED		STD #: 68TH	
TYPE: D		COPY COLOR: White		PROJECT ID: ID		DIV: DIV		DATE: Mar 17, 2009	
QUANTITY: 1		SYMBOL		X		Y		WID	
SIGN WIDTH: 4'-0"		HEIGHT: 1'-6"		TOTAL AREA: 6.0 Sq.Ft.		BORDER TYPE: FLUSH		RECESS: 0"	
WIDTH: 0.75"		RADIUS: 3"		NO. Z BARS: 1		LENGTH: 1		MATERIAL: 0.063" (1.6 mm) ALUMINUM	
								0.080" (2.0 mm) ALUMINUM	
								0.125" (3.2 mm) ALUMINUM	

USE NOTES:

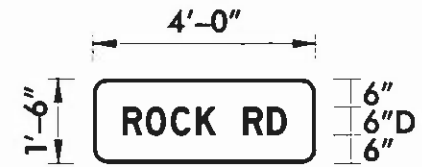
- Legend and border shall be direct applied Type III reflective sheeting.
- Legend and border shall be direct applied non-reflective sheeting.
- Shields shall be Type III reflective sheeting on 0.032" (0.8mm) aluminum and demountable.
- Background shall be Type III reflective sheeting.
- Background shall be Type I reflective sheeting.
- Center arrow(s) vertically on sign.
- Bottom panel shall be yellow Type III sheeting. Legend shall be direct applied black non-reflective sheeting. Yellow panel is:

LETTER POSITIONS

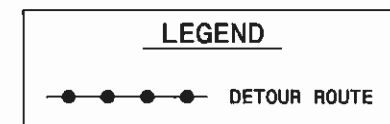
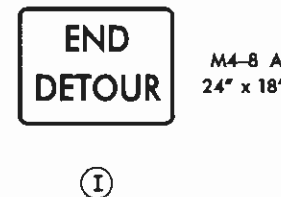
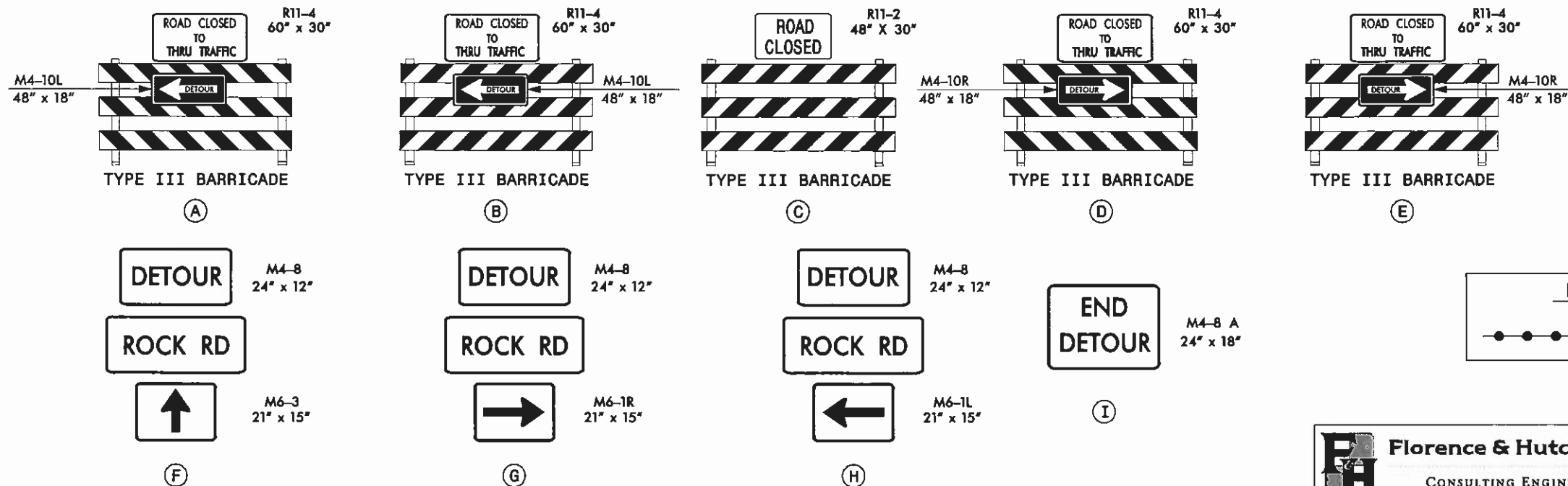
Letter spacings are to start of next letter

Letter	Spacing	Letter	Spacing	Letter	Spacing	Letter	Spacing	Letter	Spacing
R	6.4	O	8.5	C	8.4	K	4.2	N	8.1
D	8.1	I	4.1	G	6.4				

Spacing Factor is 1 unless specified otherwise



BORDER
R=3"
TH=0.75"

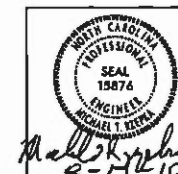


PROJECT NO. 33604
COUNTY: RUTHERFORD
STATION: 16 + 02.59
REPLACES BRIDGE NO. 217

STATE OF NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION
RALEIGH

BRIDGE NO. 217 ON SR 1520 OVER
TRIBUTARY TO CATHYS CREEK

Florence & Hutcheson
CONSULTING ENGINEERS
5131 Klugekay Way, Suite 100 Raleigh, NC 27607
NC License No. P-0258



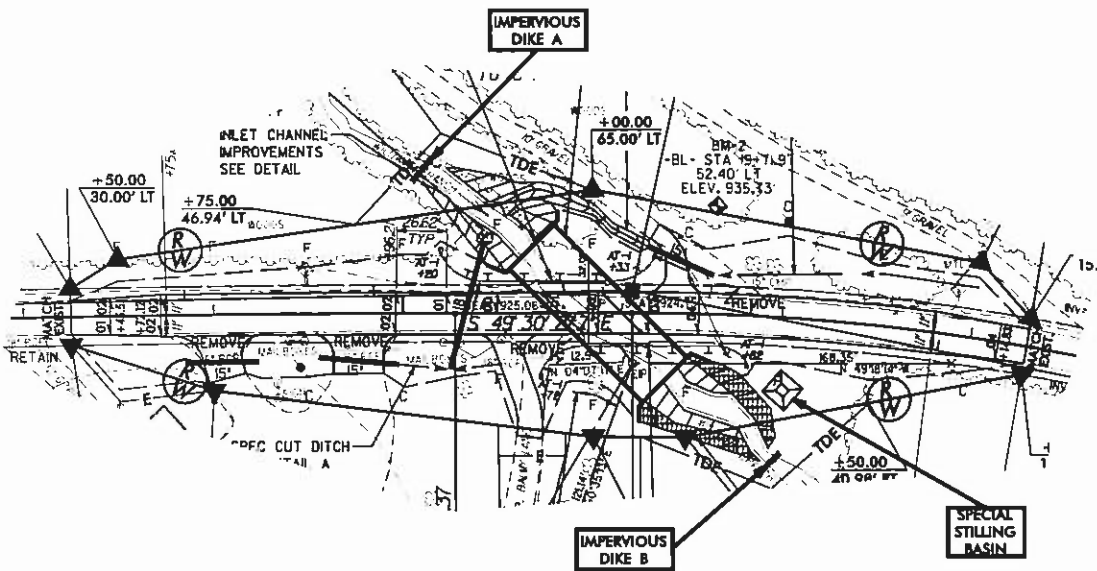
REVISIONS						SHEET NO.
NO.	BY	DATE	NO.	BY	DATE	
1			2			6
2			4			17

DRAWN BY: B. L. MARIOTTE DATE: AUG. 2010
CHECKED BY: M. Y. RZEPPA DATE: AUG. 2010

CULVERT CONSTRUCTION SEQUENCE STA. 16+02 -L-

PROJECT REFERENCE NO.	SHEET NO.
B-4262	7
B/W SHEET NO.	
ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER

1. SET UP BYPASS PUMP AND TEMPORARY PIPING ACCORDING TO THE NCDOT "BEST MANAGEMENT PRACTICES FOR CONSTRUCTION AND MAINTENANCE ACTIVITIES" MANUAL.
2. CONSTRUCT IMPERVIOUS DIKES A AND B.
3. UTILIZE SPECIAL STILLING BASIN AS STILLING BASIN DURING PUMPING OPERATIONS.
4. CONSTRUCT PROPOSED CULVERT AND COMPLETE ANY REMAINING NECESSARY UPSTREAM/DOWNSTREAM CHANNEL IMPROVEMENTS.
5. UPON COMPLETION OF CONSTRUCTION, REMOVE IMPERVIOUS DIKES A AND B, BYPASS PUMP, AND TEMPORARY PIPE. COMPLETE ROADWAY.

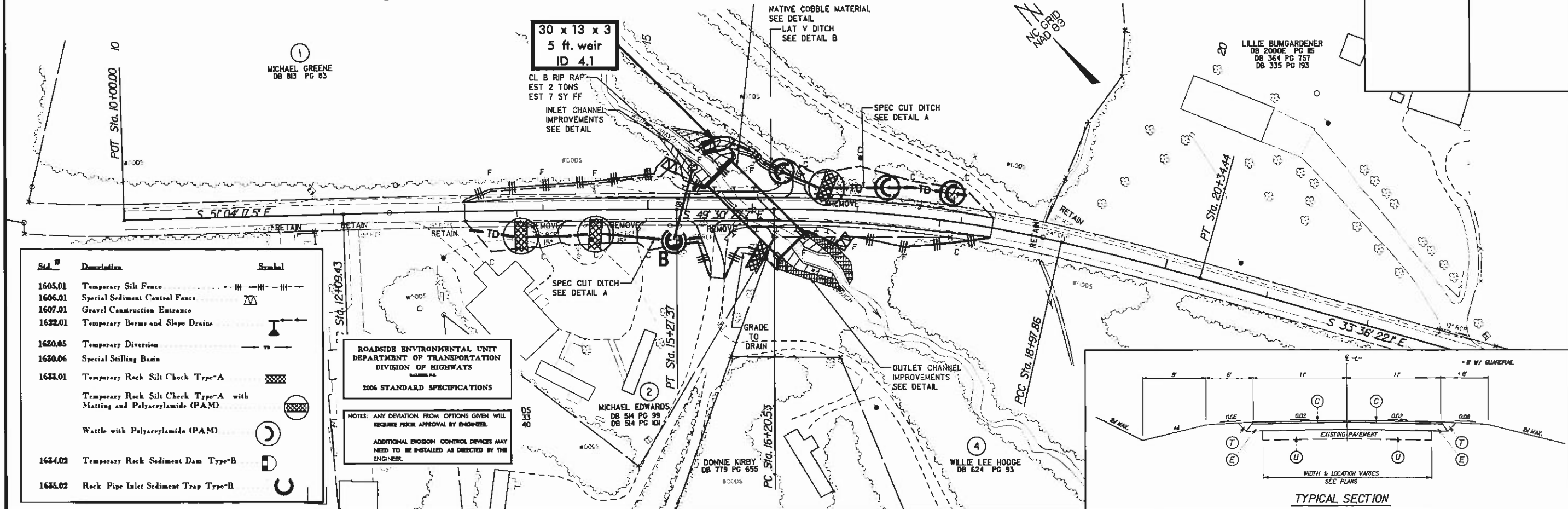


ROADSIDE ENVIRONMENTAL UNIT
DEPARTMENT OF TRANSPORTATION
DIVISION OF HIGHWAYS
TALLAHASSEE, FL
2006 STANDARD SPECIFICATIONS

EROSION CONTROL PLAN AND
DETAILS ARE PROVIDED BY
THE NCDOT ROADSIDE
ENVIRONMENTAL UNIT

NOTES: ANY DEVIATION FROM OPTIONS GIVEN WILL
REQUIRE PRIOR APPROVAL BY ENGINEER.
ADDITIONAL EROSION CONTROL DEVICES MAY
NEED TO BE INSTALLED AS DIRECTED BY THE
ENGINEER.

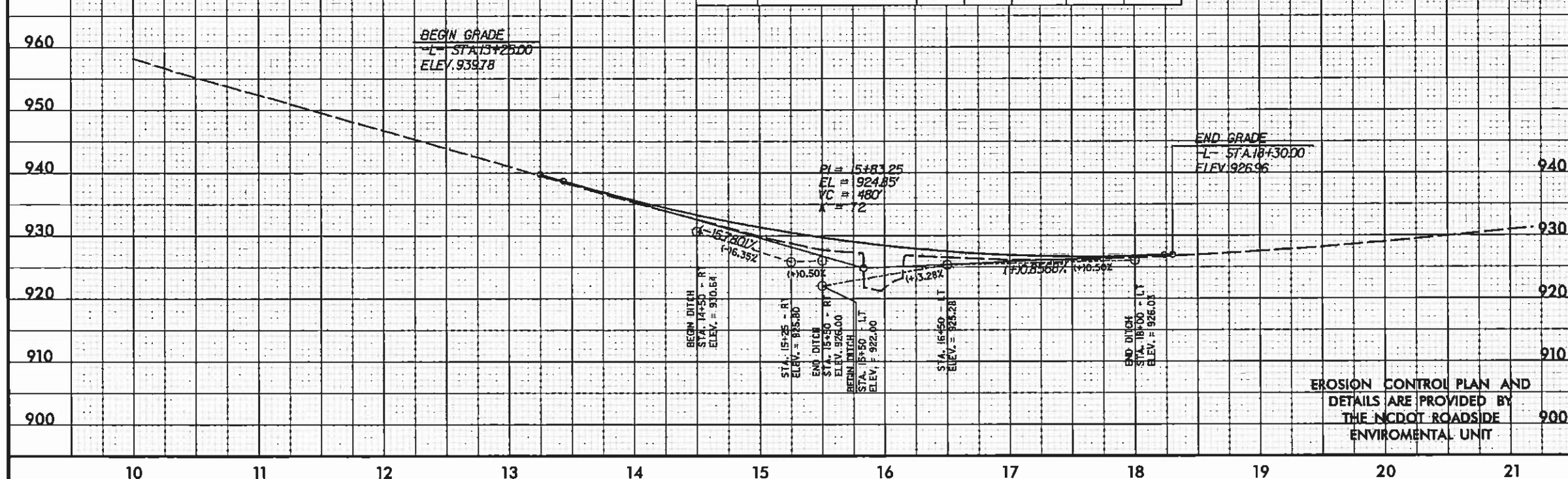
PROJECT REFERENCE NO.	SHEET NO.
B-4262	
RAW SHEET NO.	
ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER



RIGHT OF WAY AREA DATA						
PARCEL NO.	PROPERTY OWNERS NAME	TOTAL ACREAGE	AREA TAKEN	CONSTR. EASEMENT	PERMANENT DRAINAGE EASEMENT	TEMPORARY DRAINAGE EASEMENT
1	MICHAEL GREENE		07,000 S.F.			2,602 S.F.
2	MICHAEL EDWARDS		6,989 S.F.	1,296 S.F.		
3	JEFF EDWARDS		171 S.F.			
4	WILLIE LEE HODGE		5,214 S.F.			2,032 S.F.

BM * 2
-L- STA. 16+20.77, 11.87' LT
60d NAIL IN 17" OAK
EL 935.73

	PAVEMENT SCHEDULE
(C)	2.5" SURFACE COURSE, TYPE SF9.5A
(E)	7" BASE COURSE, TYPE B25.0B
(T)	EARTH MATERIAL
(U)	EXISTING PAVEMENT



PROJECT NO. 33604
COUNTY: RUTHERFORD
STATION: 16 + 02.59
REPLACES BRIDGE NO. 217

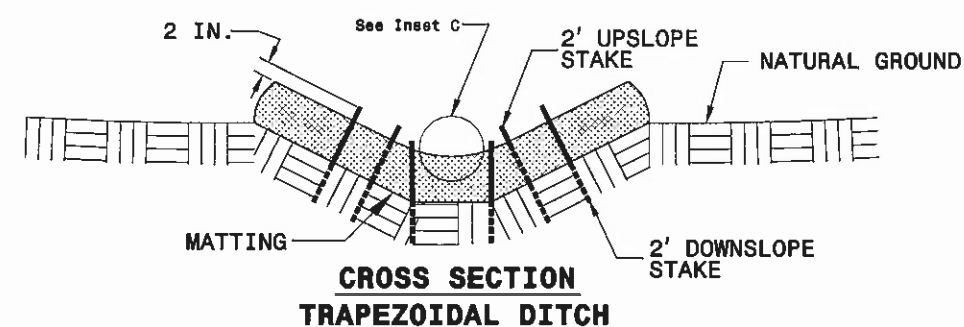
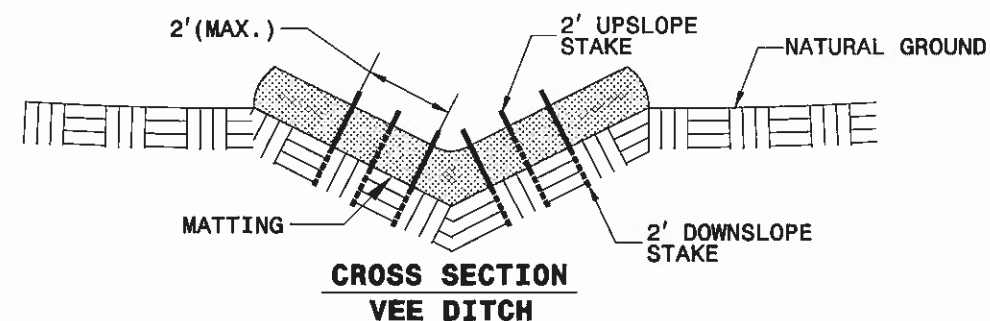
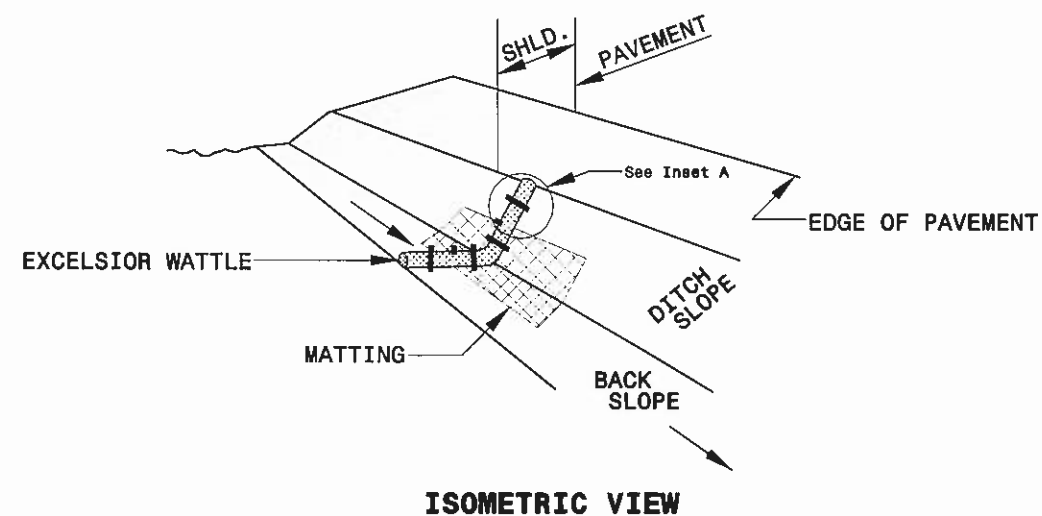
STATE OF NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION
RALEIGH

BRIDGE NO. 217 ON SR 1520 OVER
TRIBUTARY TO CATHYS CREEK

REVISIONS						SHEET NO. 8
NO.	BY	DATE	NO.	BY	DATE	
1			3			TOTAL SHEETS 17
2			4			

PROJECT REFERENCE NO.	SHEET NO.
B-4262	
RDW SHEET NO.	
ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER

WATTLE WITH POLYACRYLAMIDE (PAM) DETAIL



NOTES:

USE MINIMUM 12 IN. DIAMETER EXCELSIOR WATTLE.

USE 2 FT. WOODEN STAKES WITH A 2 IN. BY 2 IN. NOMINAL CROSS SECTION.

ONLY INSTALL WATTLE(S) TO A HEIGHT IN DITCH SO FLOW WILL NOT WASH AROUND WATTLE AND SCOUR DITCH SLOPES AND AS DIRECTED.

INSTALL A MINIMUM OF 2 UPSLOPE STAKES AND 4 DOWNSLOPE STAKES AT AN ANGLE TO WEDGE WATTLE TO BOTTOM OF DITCH.

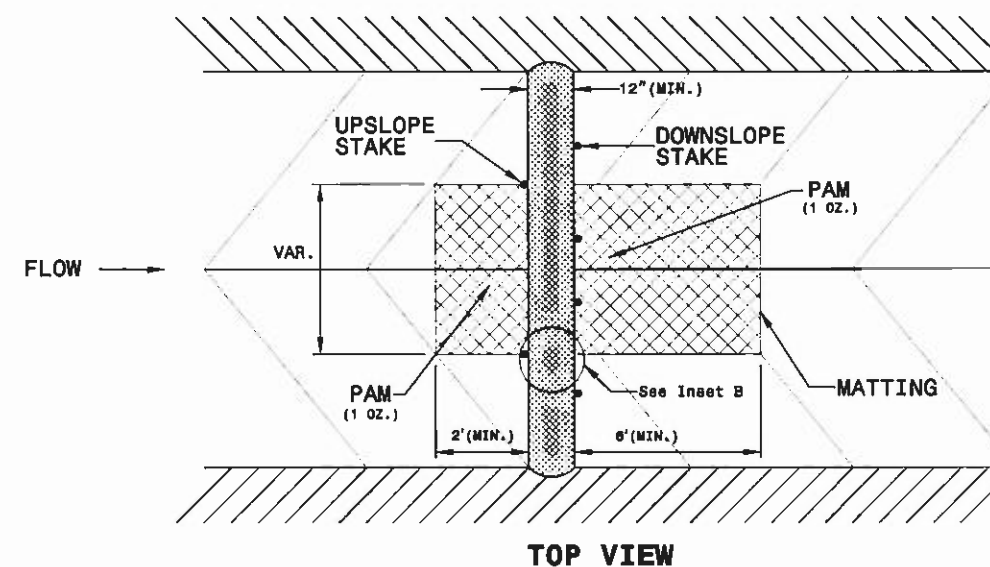
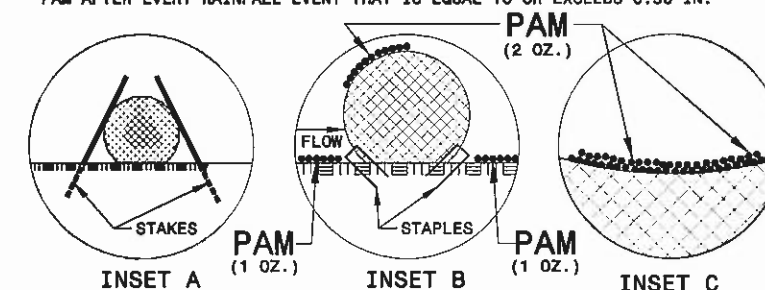
PROVIDE STAPLES MADE OF 0.125 IN. DIAMETER STEEL WIRE FORMED INTO A U SHAPE NOT LESS THAN 12" IN LENGTH.

INSTALL STAPLES APPROXIMATELY EVERY 1 LINEAR FOOT ON BOTH SIDES OF WATTLE AND AT EACH END TO SECURE IT TO THE SOIL.

INSTALL MATTING IN ACCORDANCE WITH SECTION 1831 OF THE STANDARD SPECIFICATIONS.

PRIOR TO POLYACRYLAMIDE (PAM) APPLICATION, OBTAIN A SOIL SAMPLE FROM PROJECT LOCATION, AND FROM OFFSITE MATERIAL, AND ANALYZE FOR APPROPRIATE PAM FLOCCULANT TO BE APPLIED TO EACH WATTLE.

INITIALLY APPLY 2 OUNCES OF ANIONIC OR NEUTRALLY CHARGED PAM OVER WATTLE WHERE WATER WILL FLOW AND 1 OUNCE OF PAM ON MATTING ON EACH SIDE OF WATTLE. REAPPLY PAM AFTER EVERY RAINFALL EVENT THAT IS EQUAL TO OR EXCEEDS 0.50 IN.



EROSION CONTROL PLAN AND
DETAILS ARE PROVIDED BY
THE NCDOT ROADSIDE
ENVIRONMENTAL UNIT

PROJECT NO. 33604
COUNTY: RUTHERFORD
STATION: 16+02.59
REPLACES BRIDGE NO. 217

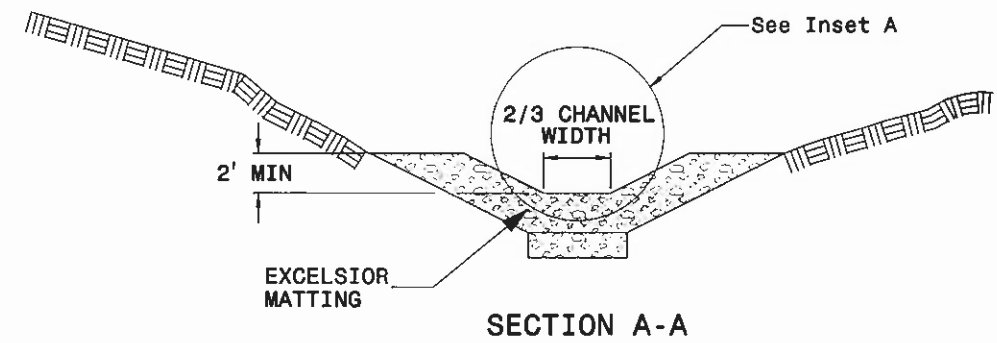
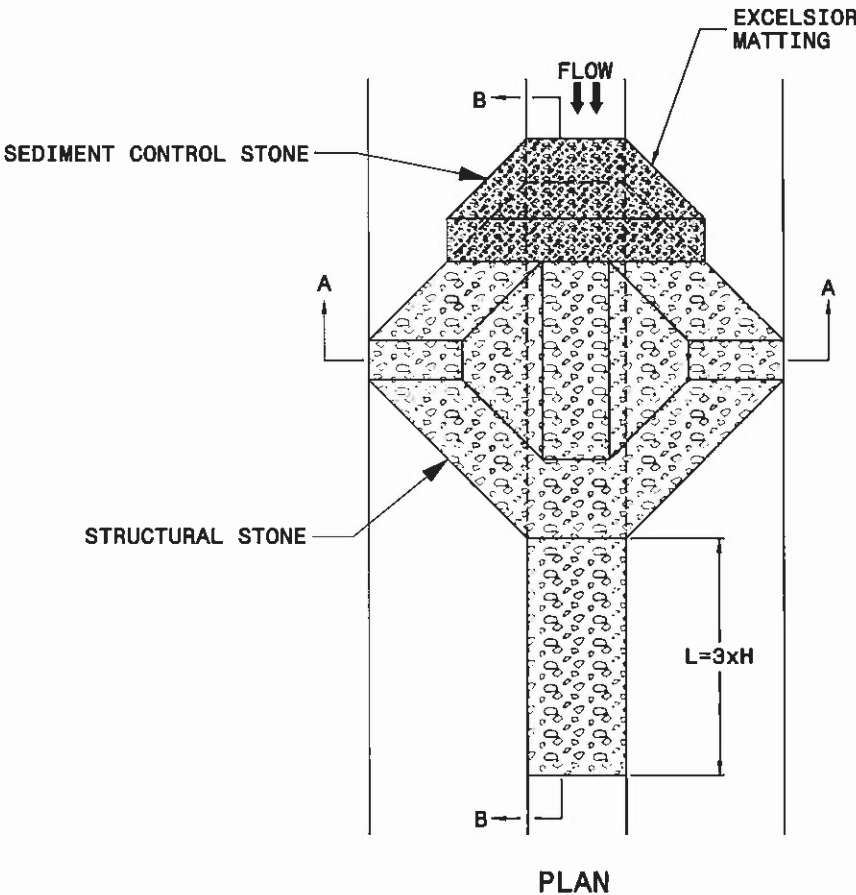
STATE OF NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION
RALEIGH

BRIDGE NO. 217 ON SR 1520 OVER
TRIBUTARY TO CATHYS CREEK

REVISIONS						SHEET NO.
NO.	BY	DATE	NO.	BY	DATE	9
1			3			
2			4			
TOTAL SHEETS						17

PROJECT REFERENCE NO.	SHEET NO.
B-4262	
ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER

TEMPORARY ROCK SILT CHECK TYPE 'A' WITH EXCELSIOR MATTING AND POLYACRYLAMIDE (PAM)

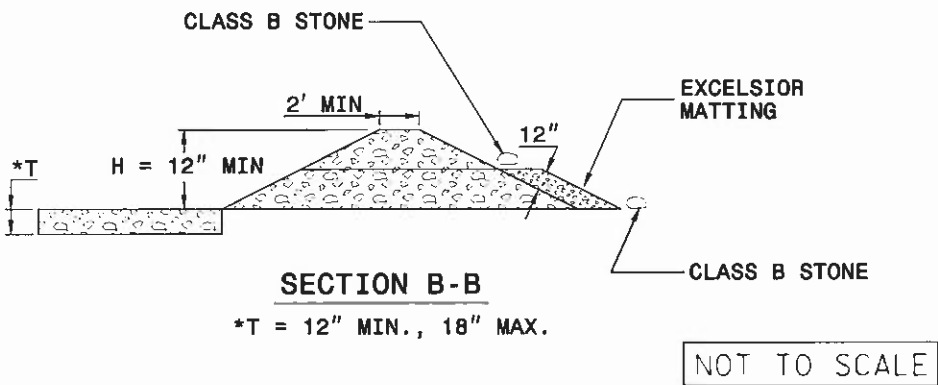
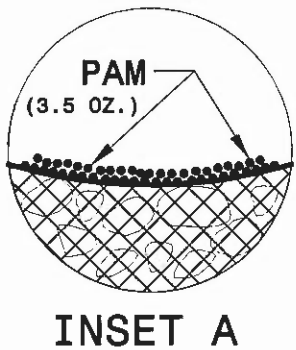


NOTES

USE EXCELSIOR FOR MATTING MATERIAL AND ANCHOR MATTING SECTION AT TOP AND BOTTOM WITH CLASS B STONE.

PRIOR TO POLYACRYLAMIDE (PAM) APPLICATION, OBTAIN A SOIL SAMPLE FROM PROJECT LOCATION, AND FROM OFFSITE MATERIAL, AND ANALYZE FOR APPROPRIATE PAM FLOCCULANT TO BE APPLIED TO EACH ROCK SILT CHECK.

INITIALLY APPLY 3.5 OUNCES OF POLYACRYLAMIDE (PAM) TO TOP OF MATTING SECTION AND AFTER EVERY RAINFALL EVENT THAT EQUALS OR EXCEEDS 0.50 INCHES.



EROSION CONTROL PLAN AND DETAILS ARE PROVIDED BY THE NCDOT ROADSIDE ENVIROMENTAL UNIT

PROJECT NO. 33604
COUNTY: RUTHERFORD
STATION: 16+02.59
REPLACES BRIDGE NO. 217

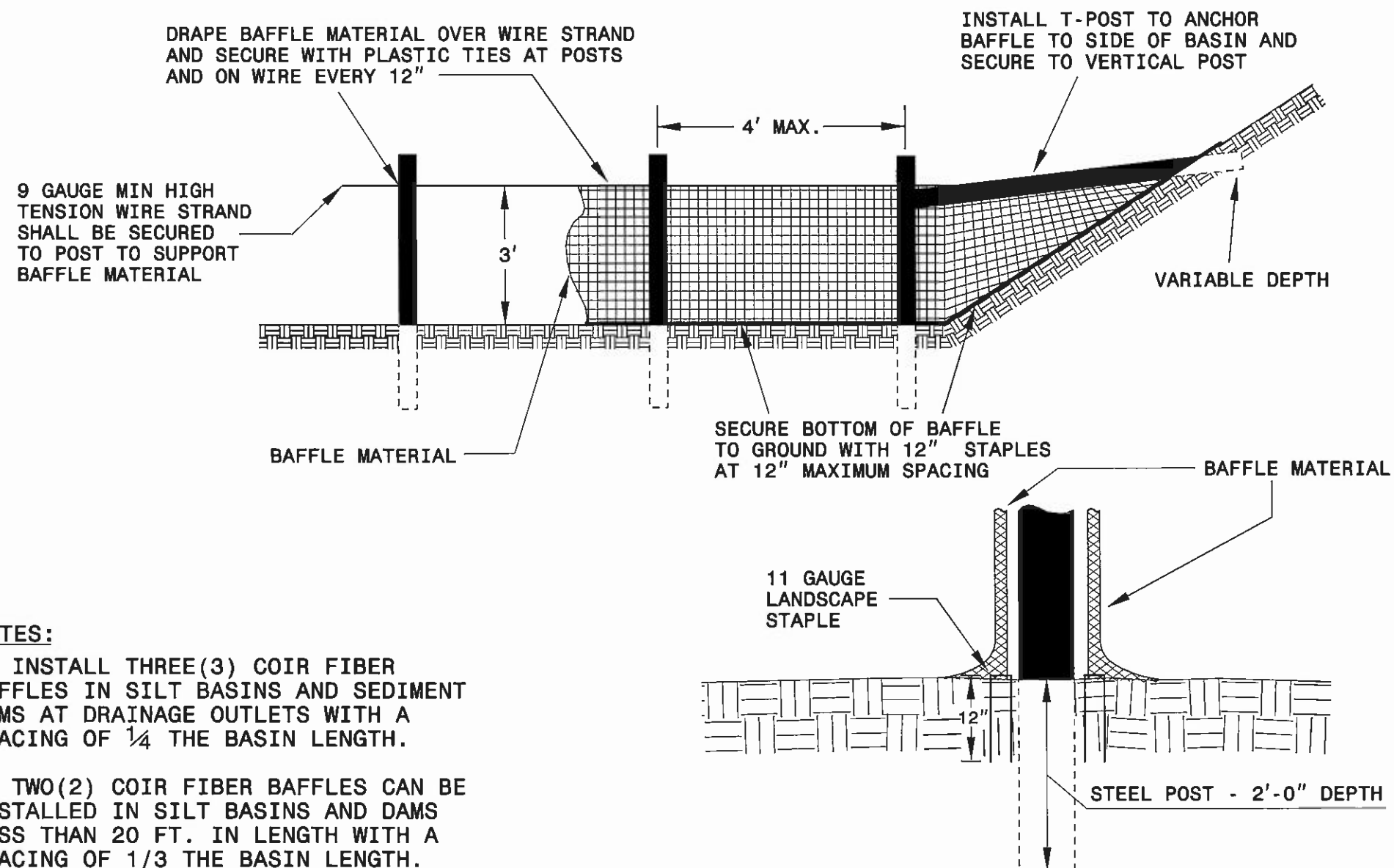
STATE OF NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION
RALPHIGH

BRIDGE NO. 217 ON SR 1520 OVER TRIBUTARY TO CATHYS CREEK

REVISIONS						SHEET NO.
NO.	BY	DATE	NO.	BY	DATE	10
1			3			TOTAL SHEETS
2			4			17

PROJECT REFERENCE NO.	SHEET NO.
B-4262	
RDW SHEET NO.	HYDRAULICS ENGINEER
ROADWAY DESIGN ENGINEER	

COIR FIBER BAFFLE DETAIL



NOTES:

1. INSTALL THREE(3) COIR FIBER BAFFLES IN SILT BASINS AND SEDIMENT DAMS AT DRAINAGE OUTLETS WITH A SPACING OF $\frac{1}{4}$ THE BASIN LENGTH.
2. TWO(2) COIR FIBER BAFFLES CAN BE INSTALLED IN SILT BASINS AND DAMS LESS THAN 20 FT. IN LENGTH WITH A SPACING OF $\frac{1}{3}$ THE BASIN LENGTH.
3. TOP HEIGHT OF COIR FIBER BAFFLES SHALL NOT BE BELOW BASE OF EMERGENCY SPILLWAY ELEVATION.

EROSION CONTROL PLAN AND
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PROJECT NO. 33604
COUNTY: RUTHERFORD
STATION: 16+02.59
REPLACES BRIDGE NO. 217

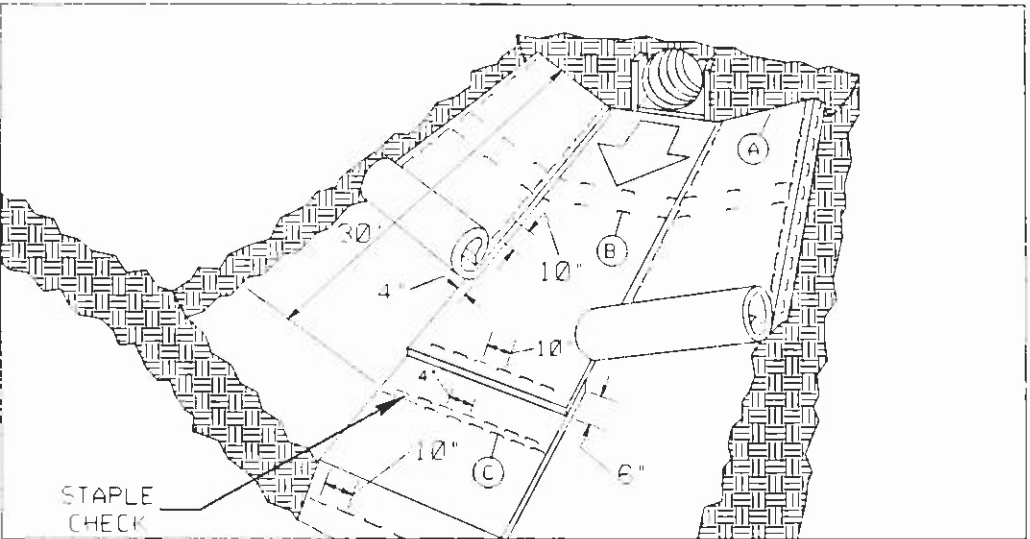
STATE OF NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION
RALEIGH

BRIDGE NO. 217 ON SR 1520 OVER
TRIBUTARY TO CATHYS CREEK

REVISIONS						SHEET NO.
NO.	BY	DATE	NO.	BY	DATE	11
1			3			TOTAL SHEETS
2			4			17

MATting INSTALLATION DETAIL

PROJECT REFERENCE NO.	SHEET NO.
B-4262	
RAW SHEET NO.	
ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER



MATting IN DITCHES

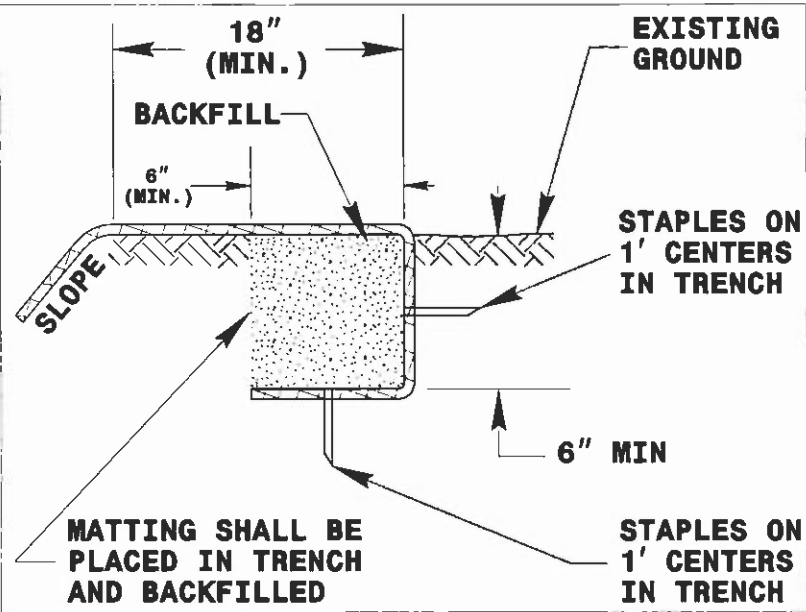
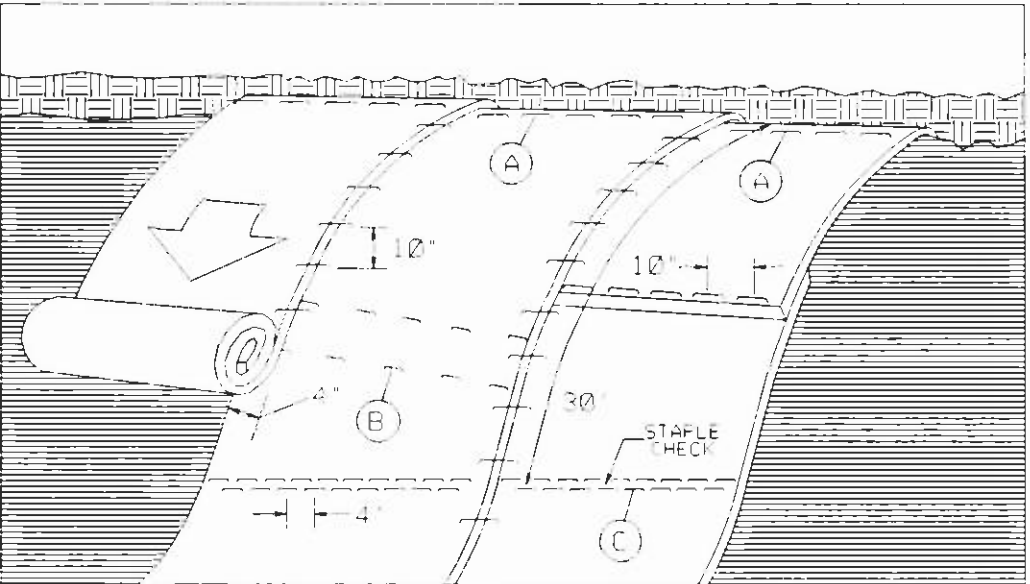


DIAGRAM (A)



MATting ON SLOPES

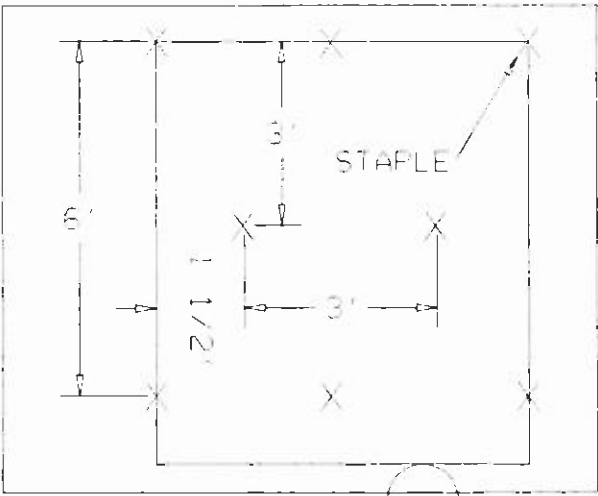


DIAGRAM B

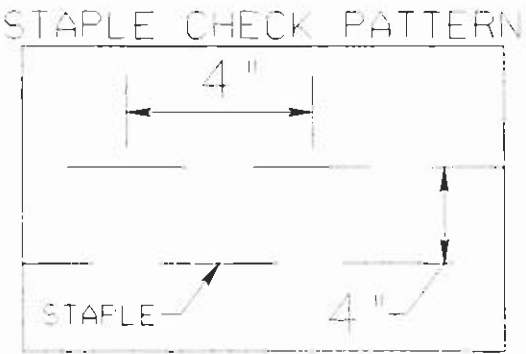


DIAGRAM (C)

NOTES:

THIS DETAIL APPLIES TO STRAW, EXCELSIOR, AND PERMANENT SOIL REINFORCEMENT MAT (PSRM) INSTALLATION.

STAPLES SHALL BE NO. 11 GAUGE STEEL WIRE FORMED INTO A "U" SHAPE WITH A MINIMUM THROAT WIDTH OF 1 INCH AND NOT LESS THAN 6 INCHES IN LENGTH.

NOT TO SCALE

EROSION CONTROL PLAN AND
DETAILS ARE PROVIDED BY
THE NCDOT ROADSIDE
ENVIRONMENTAL UNIT

PROJECT NO. 33604
COUNTY: RUTHERFORD
STATION: 16+02.59
REPLACES BRIDGE NO. 217

STATE OF NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION
RALEIGH

BRIDGE NO. 217 ON SR 1520 OVER
TRIBUTARY TO CATHYS CREEK

REVISIONS						SHEET NO.
NO.	BY	DATE	NO.	BY	DATE	
1			3			12
2			4			17

EROSION CONTROL PLAN AND
DETAILS ARE PROVIDED BY
THE NCDOT ROADSIDE
ENVIROMENTAL UNIT

PROJECT REFERENCE NO.	SHEET NO.
B-4262	13
ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER

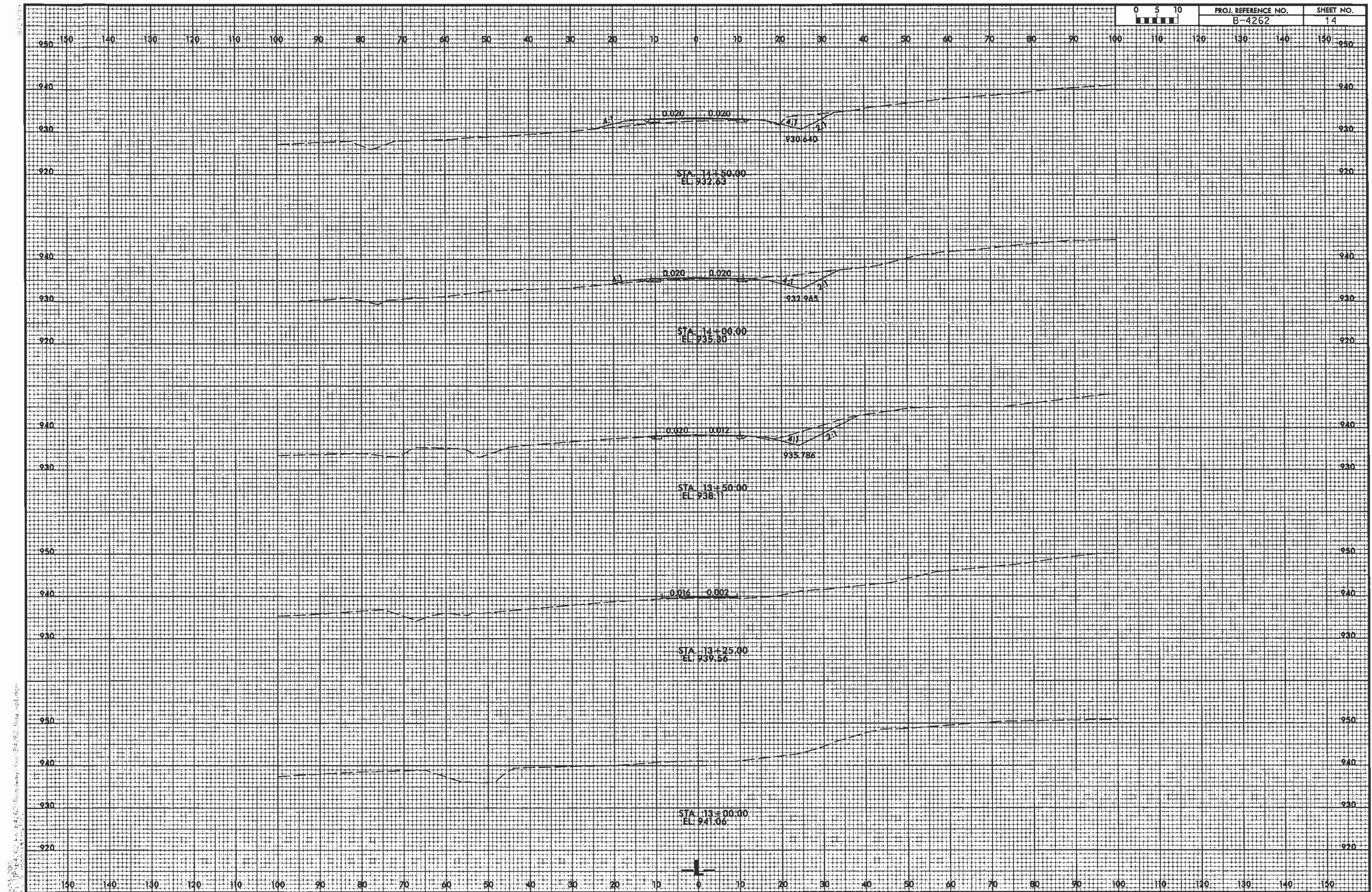
SOIL STABILIZATION SUMMARY SHEET

PERMANENT SOIL REINFORCEMENT MAT

[illegible]

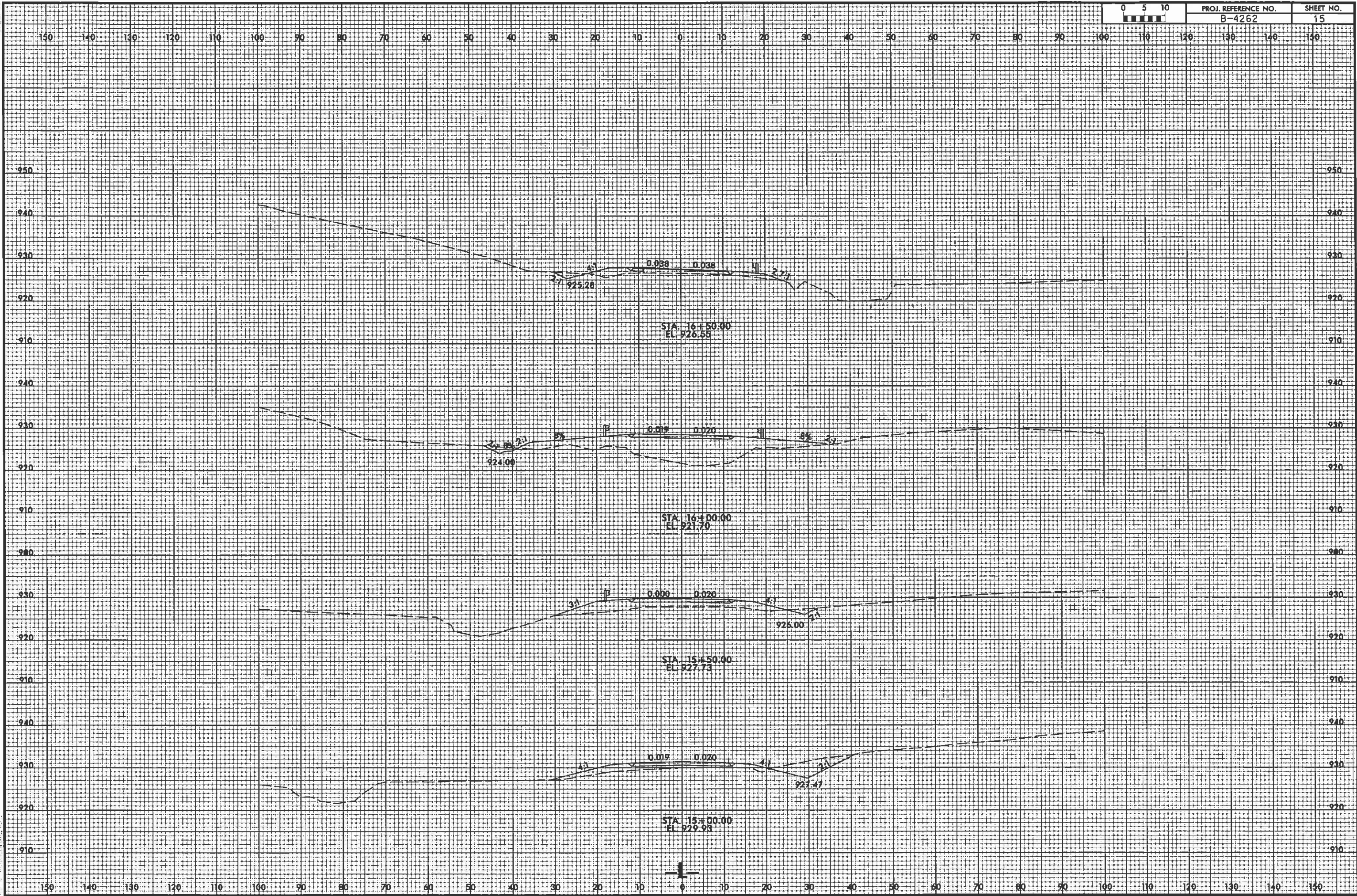
PERMANENT SOIL REINFORCEMENT MAT

[illegible]





PROJ. REFERENCE NO.	SHEET NO.
B-4262	15



1:1
1/4" = 10' (Horizontal)
1/8" = 10' (Vertical)

