

**This electronic collection of documents is provided
for the convenience of the user
and is Not a Certified Document –**

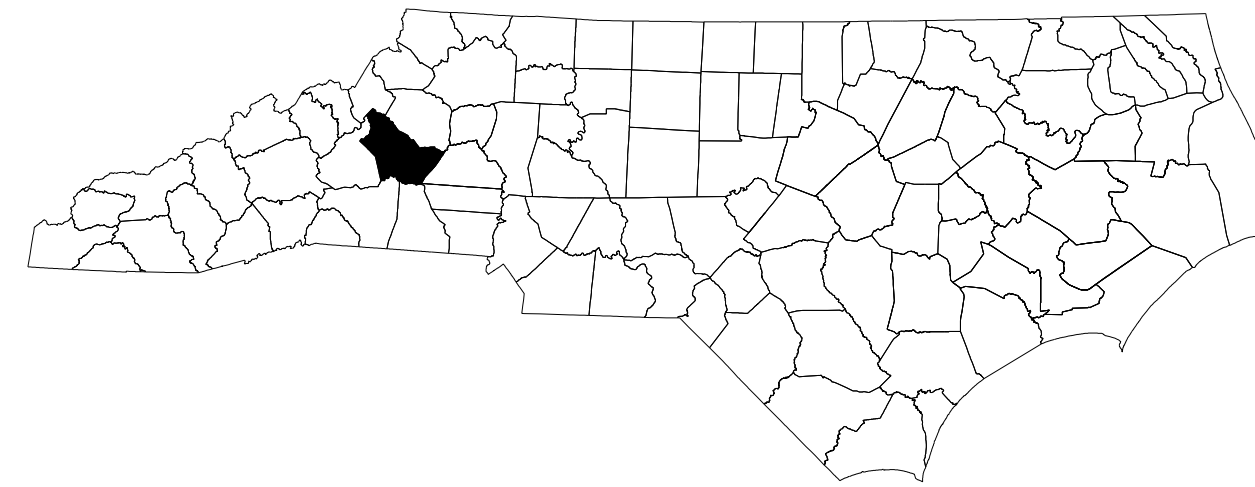
**The documents contained herein were originally issued
and sealed by the individuals whose names and license
numbers appear on each page, on the dates appearing
with their signature on that page.**

**This file or an individual page
shall not be considered a certified document.**

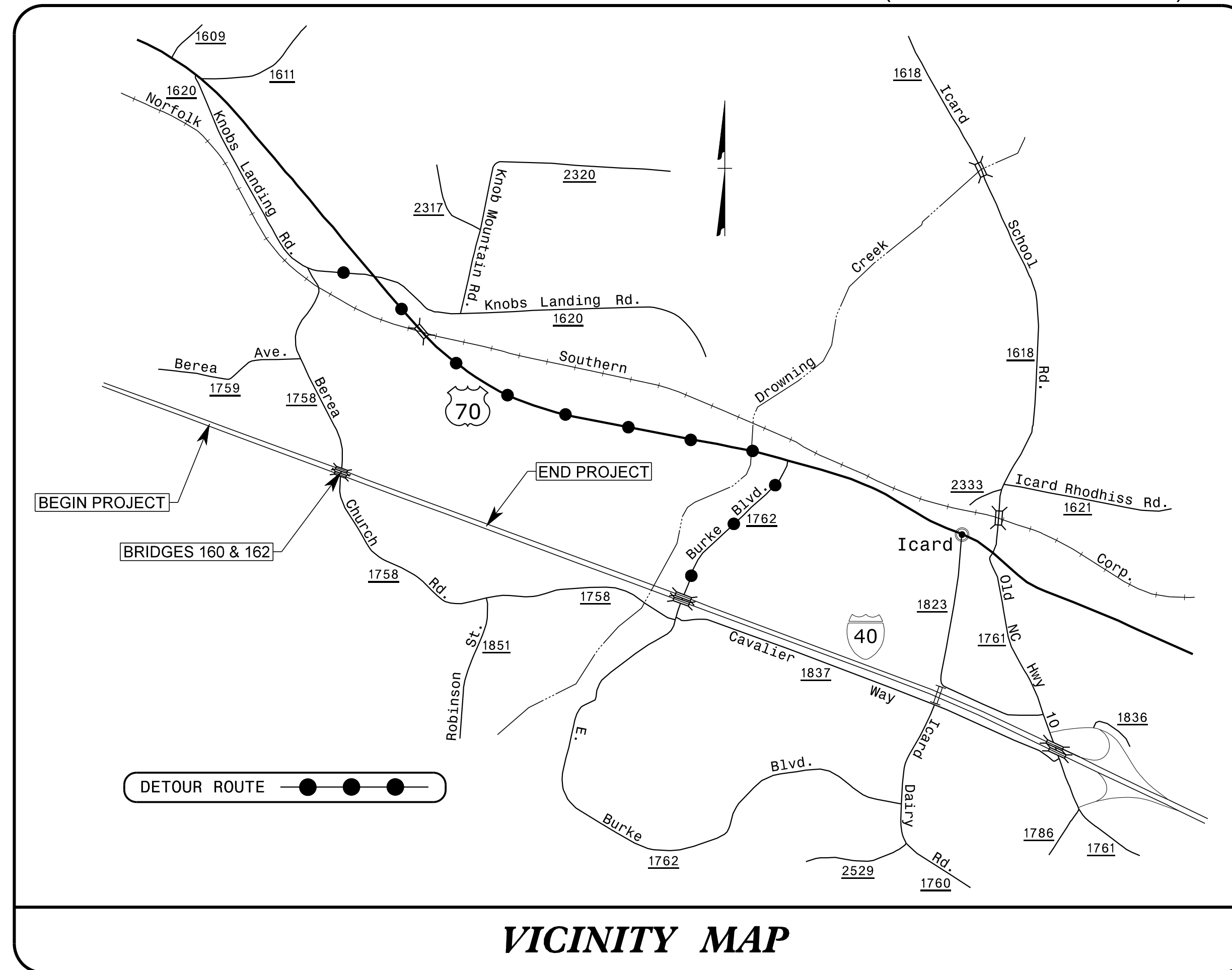
STATE OF NORTH CAROLINA
DIVISION OF HIGHWAYS

TRANSPORTATION MANAGEMENT PLAN

BURKE COUNTY



LOCATION: BRIDGES 160 & 162 ON I-40 OVER SR 1758 (BEREA CHURCH ROAD)



VICINITY MAP

INDEX OF SHEETS

SHEET NO.	TITLE
TMP-1	TITLE SHEET, VICINITY MAP, AND INDEX OF SHEETS
TMP-1A	LIST OF APPLICABLE ROADWAY STANDARD DRAWINGS, AND LEGEND
TMP-1B	TRANSPORTATION OPERATIONS PLAN: (MANAGEMENT STRATEGIES, GENERAL NOTES AND LOCAL NOTES)
TMP-2	TEMPORARY SHORING NOTES
TMP-2A	PORTABLE COCRETE BARRIER AT TEMPORARY SHORING LOCATIONS
TMP-2B	SPECIAL SIGN DESIGNS - BEREA CHURCH ROAD
TMP-2C	WORK ZONE "VARIABLE" SPEED LIMIT USING DIGITAL SPEED LIMIT SIGNS
TMP-2D	SEQUENTIAL FLASHING WARNING LIGHTS ON DRUMS IN TAPER
TMP-3	TEMPORARY TRAFFIC CONTROL PHASING
TMP-4	OFF-SITE DETOUR - BEREA CHURCH ROAD - SR 1758
TMP-5	PHASE I DETAILS
TMP-6	PHASE I DETAILS
TMP-6A	PHASE I - -DETEB- CROSS-SECTIONS
TMP-7	PHASE I DETAILS
TMP-8	PHASE I DETAILS
TMP-8A	PHASE I - -DETEB- CROSS-SECTIONS
TMP-9	PHASE II DETAILS
TMP-10	PHASE II DETAILS
TMP-10A	PHASE II - -LWBL- CROSS-SECTIONS
TMP-11	PHASE III DETAILS
TMP-12	PHASE III DETAILS
TMP-12A	PHASE III - -LEBL- CROSS-SECTIONS
TMP-13	PHASE IV DETAILS
TMP-14	PHASE IV DETAILS
TMP-14A	PHASE IV - -LEBL- AND -DETEB- CROSS-SECTIONS

SHEET NO.

TMP-1

B-4447

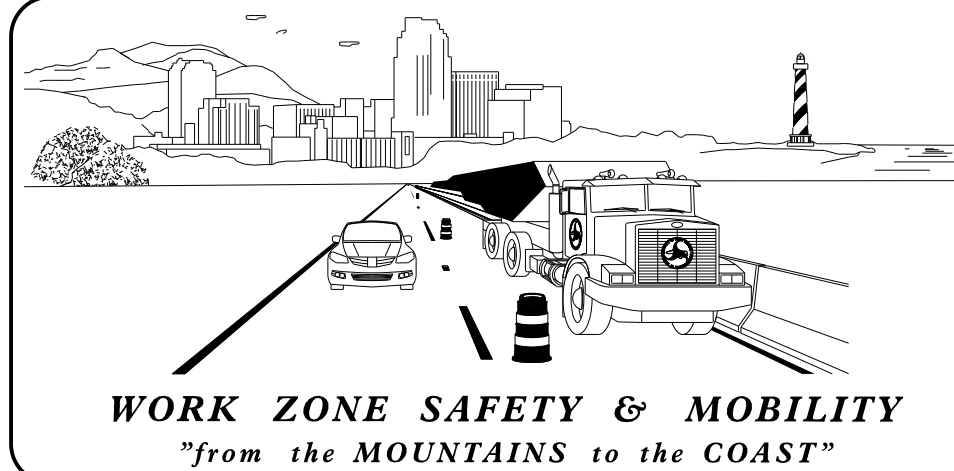
TIP PROJECT:

DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED

APPROVED: *Don A. Parker*

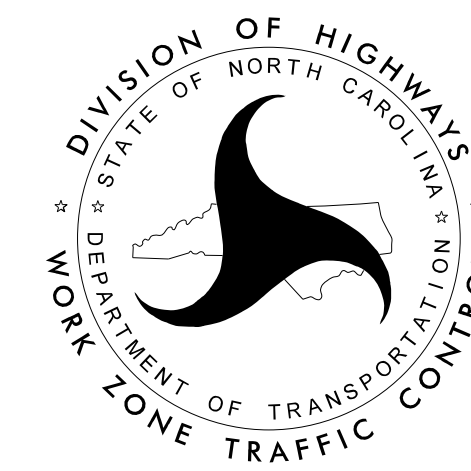
DATE: 4/26/2017

SEAL



N.C.D.O.T. WORK ZONE TRAFFIC CONTROL
1561 MAIL SERVICE CENTER (MSC) RALEIGH, NC 27699-1561
750 N. GREENFIELD PARKWAY, GARNER, NC 27529 (DELIVERY)
PHONE: (919) 773-2800 FAX: (919) 771-2745

J. E. HUMMER, P.E. STATE TRAFFIC MANAGEMENT ENGINEER
D. A. PARKER, P.E. TRAFFIC CONTROL PROJECT ENGINEER
VACANT TRAFFIC CONTROL PROJECT DESIGN ENGINEER
S. B. COATS TRAFFIC CONTROL DESIGN ENGINEER



ROADWAY STANDARD DRAWINGS

THE FOLLOWING ROADWAY STANDARDS AS SHOWN IN "ROADWAY STANDARD DRAWINGS" - PROJECT SERVICES UNIT - N.C. DEPARTMENT OF TRANSPORTATION - RALEIGH, N.C., DATED JANUARY 2012 ARE APPLICABLE TO THIS PROJECT AND BY REFERENCE HEREBY ARE CONSIDERED A PART OF THESE PLANS:

STD. NO.	TITLE
1101.01	WORK ZONE ADVANCE WARNING SIGNS
1101.02	TEMPORARY LANE CLOSURES
1101.03	TEMPORARY ROAD CLOSURES
1101.04	TEMPORARY SHOULDER CLOSURES
1101.05	WORK ZONE VEHICLE ACCESSES
1101.06	WARNING SIGNS FOR BLASTING ZONES
1101.11	TRAFFIC CONTROL DESIGN TABLES
1110.01	STATIONARY WORK ZONE SIGNS
1110.02	PORTABLE WORK ZONE SIGNS
1115.01	FLASHING ARROW BOARDS
1130.01	DRUM
1135.01	CONES
1145.01	BARRICADES
1150.01	FLAGGING DEVICES
1160.01	TEMPORARY CRASH CUSHION
1165.01	WORK VEHICLE LIGHTING SYSTEMS AND TMA DELINEATION
1170.01	POSITIVE PROTECTION
1205.01	PAVEMENT MARKINGS - LINE TYPES AND OFFSETS
1205.02	PAVEMENT MARKINGS - TWO-LANE AND MULTI-LANE ROADWAYS
1205.12	PAVEMENT MARKINGS - BRIDGES
1250.01	RAISED PAVEMENT MARKERS - INSTALLATION SPACING
1251.01	RAISED PAVEMENT MARKERS - PERMANENT AND TEMPORARY
1261.01	GUARDRAIL AND BARRIER DELINEATORS - INSTALLATION SPACING
1261.02	GUARDRAIL AND BARRIER DELINEATORS - TYPES AND MOUNTING
1262.01	GUARDRAIL END DELINEATION

LEGEND

GENERAL

- DIRECTION OF TRAFFIC FLOW
- DIRECTION OF PEDESTRIAN TRAFFIC FLOW
- EXIST. PVMT.
- NORTH ARROW
- PROPOSED PVMT.
- TEMP. SHORING (LOCATION PURPOSES ONLY)

- WORK AREA
- REMOVAL
- ONGOING CONSTRUCTION
- USER DEFINED (IF NEEDED)

SIGNALS

- EXISTING
- PROPOSED
- TEMPORARY

PAVEMENT MARKINGS

- EXISTING LINES
- TEMPORARY LINES

TRAFFIC CONTROL DEVICES

- BARRICADE (TYPE III)
- CONE
- DRUM
- SKINNY DRUM
- TUBULAR MARKER
- TEMPORARY CRASH CUSHION
- FLASHING ARROW BOARD
- FLAGGER
- LAW ENFORCEMENT
- TRUCK MOUNTED ATTENUATOR (TMA)
- CHANGEABLE MESSAGE SIGN

TEMPORARY SIGNING

- PORTABLE SIGN
- STATIONARY SIGN
- STATIONARY OR PORTABLE SIGN

PAVEMENT MARKERS

- CRYSTAL/CRYSTAL
- CRYSTAL/RED
- YELLOW/YELLOW

PAVEMENT MARKING SYMBOLS

- PAVEMENT MARKING SYMBOLS


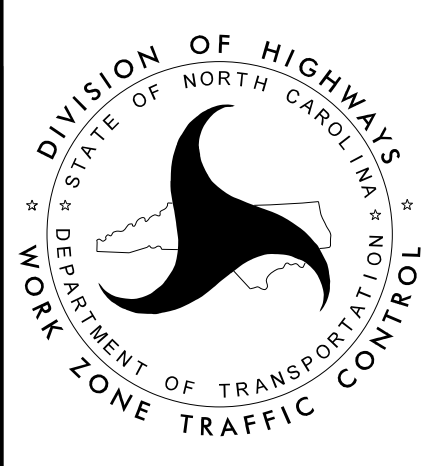
TEMPORARY PAVEMENT MARKING

- PA - WHITE EDGELINE (PAINT) - 4"
- PI - YELLOW DOUBLE CENTER (PAINT) - 4"

ALL TEMPORARY PAVEMENT MARKING LINES LISTED BELOW SHALL ADHERE TO THE WORK ZONE "PERFORMANCE" PAVEMENT MARKING SPECIFICATIONS.

- P6 - WHITE EDGELINE - 6"
- P7 - YELLOW EDGELINE - 6"
- PJ - 10 FT. WHITE SKIP - 6"
- PL - WHITE LANE LINE - 6"

4/26/2017 P:\p\Projects-B\B4447\TrafficControl\TCP\B4447_TC_GEN_TMP01A.dgn User:scodts

APPROVED: <i>Don A. Parker</i> <small>40048292621841D...</small> DATE: 4/26/2017 		<h3>ROADWAY STANDARD DRAWINGS & LEGEND</h3>
DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED		

PROJECT NOTES

MANAGEMENT STRATEGIES

B-4447 IS THE REPLACEMENT OF BRIDGES 160 AND 162 ON I-40 OVER BERA CHURCH ROAD (SR 1758).
 THE TRAFFIC MANAGEMENT STRATEGY CONSISTS OF FIRST CONSTRUCTING AN ON-SITE DETOUR FOR EASTBOUND TRAFFIC (PHASE I). ONCE EASTBOUND TRAFFIC IS SHIFTED ONTO THE DETOUR, MEDIAN CROSSOVERS ARE CONSTRUCTED (PHASE I) AND WESTBOUND TRAFFIC IS SHIFTED TO THE EXISTING EASTBOUND LANES ALLOWING FOR THE REMOVAL AND REPLACEMENT OF THE EXISTING WESTBOUND STRUCTURE (PHASE II).
 UPON COMPLETION, WESTBOUND TRAFFIC IS SHIFTED BACK TO THE WESTBOUND LANES ALLOWING FOR THE REMOVAL AND REPLACEMENT OF THE EASTBOUND STRUCTURE (PHASE III).
 UPON COMPLETION, EASTBOUND TRAFFIC IS SHIFTED BACK TO THE EASTBOUND LANES ALLOWING FOR REMOVAL OF THE EASTBOUND ON-SITE DETOUR (PHASE IV).
 THE CONTRACTOR IS ALLOWED TO CLOSE BERA CHURCH ROAD (SR 1758) DURING I-40 CONSTRUCTION.

TO MINIMIZE DELAY TO I-40 TRAFFIC, LANE CLOSURES SHALL ONLY BE PERMITTED AT NIGHT BETWEEN 8:00 PM AND THE FOLLOWING 6:00 AM. IN ADDITION MATERIAL DELIVERY FROM I-40 WILL ONLY BE PERMITTED DURING THIS SAME TIME PERIOD. PROJECT MATERIAL DELIVERIES TO CONSTRUCTION STAGING AREAS AND TO THE PROJECT SITE FROM -Y- LINES WILL NOT BE SUBJECT TO ANY TIME RESTRICTIONS.

A WORK ZONE VARIABLE SPEED LIMIT REDUCTION UTILIZING DIGITAL SPEED LIMIT SIGNS SHALL BE IMPLEMENTED DURING LANE CLOSURE OPERATIONS.

TO IMPROVE SPEED LIMIT COMPLIANCE, TEMPORARY SIGNING, TEMPORARY PAVEMENT MARKING AND DELINEATION OF THE INTERSTATE WORK ZONE THE FOLLOWING APPLICATIONS ARE INCLUDED IN THIS TRAFFIC MANAGEMENT PLAN:

- DIGITAL SPEED LIMIT SIGNS
- SEQUENTIAL FLASHING LIGHTS ON DRUMS IN MERGE TAPERS
- NEW HIGH VISIBILITY STATIONARY AND PORTABLE WORK ZONE SIGNS
- NEW HIGH VISIBILITY DRUMS
- MASKING OF EXISTING PAVEMENT MARKINGS
- WORK ZONE "PERFORMANCE" TEMPORARY PAVEMENT MARKINGS

GENERAL NOTES

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

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.

TIME RESTRICTIONS

- A) DO NOT CLOSE OR NARROW TRAVEL LANES AS FOLLOWS:
- | ROAD NAME | DAY AND TIME RESTRICTIONS |
|------------|--|
| I-40 (-L-) | MONDAY THRU SUNDAY
6:00 A.M. TO 8:00 P.M. |
- B) DO NOT CLOSE OR NARROW TRAVEL LANES DURING HOLIDAYS AND SPECIAL EVENTS AS FOLLOWS:
- | ROAD NAME | HOLIDAY |
|------------|---------|
| I-40 (-L-) | |
- FOR ANY UNEXPECTED OCCURRENCE THAT CREATES UNUSUALLY HIGH TRAFFIC VOLUMES, AS DIRECTED BY THE ENGINEER.
 - FOR NEW YEAR'S, BETWEEN THE HOURS OF 6:00 A.M. DECEMBER 31st TO 8:00 P.M. JANUARY 2ND. IF NEW YEAR'S DAY IS ON A FRIDAY, SATURDAY, SUNDAY, OR MONDAY THEN UNTIL 8:00 P.M. THE FOLLOWING TUESDAY.
 - FOR EASTER, BETWEEN THE HOURS OF 6:00 A.M. THURSDAY TO 8:00 P.M. MONDAY.
 - FOR MEMORIAL DAY, BETWEEN THE HOURS OF 6:00 A.M. FRIDAY TO 8:00 P.M. TUESDAY.
 - FOR INDEPENDENCE DAY, BETWEEN THE HOURS OF 6:00 A.M. THE DAY BEFORE INDEPENDENCE DAY AND 8:00 P.M. THE DAY AFTER INDEPENDENCE DAY.
 IF INDEPENDENCE DAY IS ON A FRIDAY, SATURDAY, SUNDAY OR MONDAY THEN BETWEEN THE HOURS OF 6:00 A.M. THE THURSDAY BEFORE INDEPENDENCE DAY AND 8:00 P.M. THE TUESDAY AFTER INDEPENDENCE DAY.
 - FOR LABOR DAY, BETWEEN THE HOURS OF 6:00 A.M. FRIDAY TO 8:00 P.M. TUESDAY.
 - FOR THANKSGIVING DAY, BETWEEN THE HOURS OF 6:00 A.M. TUESDAY TO 8:00 P.M. MONDAY.
 - FOR CHRISTMAS, BETWEEN THE HOURS OF 6:00 A.M. THE FRIDAY BEFORE THE WEEK OF CHRISTMAS DAY AND 8:00 P.M. THE FOLLOWING TUESDAY AFTER THE WEEK OF CHRISTMAS.
- C) DO NOT CONDUCT ANY HAULING OPERATIONS AGAINST THE FLOW OF TRAFFIC OF AN OPEN TRAVELWAY UNLESS THE HAULING OPERATION IS PROTECTED BY BARRIER OR GUARDRAIL OR AS DIRECTED BY THE ENGINEER.

LANE AND SHOULDER CLOSURE REQUIREMENTS

- D) REMOVE LANE CLOSURE DEVICES FROM THE LANE WHEN WORK IS NOT BEING PERFORMED BEHIND THE LANE CLOSURE OR WHEN A LANE CLOSURE IS NO LONGER NEEDED, OR AS DIRECTED BY THE ENGINEER.
- E) WHEN PERSONNEL AND/OR EQUIPMENT ARE WORKING WITHIN 15 FT OF AN AN OPEN TRAVEL LANE, CLOSE THE NEAREST OPEN SHOULDER USING ROADWAY STANDARD DRAWING NO. 1101.04 UNLESS THE WORK AREA IS PROTECTED BY BARRIER OR GUARDRAIL OR A LANE CLOSURE IS INSTALLED.
- F) WHEN PERSONNEL AND/OR EQUIPMENT ARE WORKING ON THE SHOULDER ADJACENT TO AN UNDIVIDED FACILITY AND WITHIN 5 FT OF AN OPEN TRAVEL LANE, CLOSE THE NEAREST OPEN TRAVEL LANE USING ROADWAY STANDARD DRAWING NO. 1101.02 UNLESS THE WORK AREA IS PROTECTED BY BARRIER OR GUARDRAIL.
 WHEN PERSONNEL AND/OR EQUIPMENT ARE WORKING ON THE SHOULDER ADJACENT TO A DIVIDED FACILITY AND WITHIN 10 FT OF AN OPEN TRAVEL LANE, CLOSE THE NEAREST OPEN TRAVEL LANE USING ROADWAY STANDARD DRAWING NO. 1101.02 UNLESS THE WORK AREA IS PROTECTED BY BARRIER OR GUARDRAIL.
- G) WHEN PERSONNEL AND/OR EQUIPMENT ARE WORKING WITHIN A LANE OF TRAVEL OF AN UNDIVIDED OR DIVIDED FACILITY, CLOSE THE LANE ACCORDING TO THE TRAFFIC CONTROL PLANS, ROADWAY STANDARD DRAWINGS OR AS DIRECTED BY THE ENGINEER. CONDUCT THE WORK SO THAT ALL PERSONNEL AND/OR EQUIPMENT REMAIN WITHIN THE CLOSED TRAVEL LANE.
- H) DO NOT WORK SIMULTANEOUSLY WITHIN 15 FT ON BOTH SIDES OF AN OPEN TRAVELWAY, RAMP OR LOOP WITHIN THE SAME LOCATION UNLESS PROTECTED WITH GUARDRAIL OR BARRIER.
- I) PROVIDE TRAFFIC CONTROL FOR APPROPRIATE LANE CLOSURES FOR SURVEYING DONE BY THE DEPARTMENT.

PAVEMENT EDGE DROP OFF REQUIREMENTS

- J) BACKFILL AT A 6:1 SLOPE UP TO THE EDGE AND ELEVATION OF EXISTING PAVEMENT IN AREAS ADJACENT TO AN OPENED TRAVEL LANE THAT HAS AN EDGE OF PAVEMENT DROP-OFF AS FOLLOWS:
 BACKFILL DROP-OFFS THAT EXCEED 2 INCHES ON ROADWAYS WITH POSTED SPEED LIMITS OF 45 MPH OR GREATER.
 BACKFILL DROP-OFFS THAT EXCEED 3 INCHES ON ROADWAYS WITH POSTED SPEED LIMITS LESS THAN 45 MPH.
 BACKFILL WITH SUITABLE COMPACTED MATERIAL, AS APPROVED BY THE ENGINEER, AT NO EXPENSE TO THE DEPARTMENT.
- K) DO NOT EXCEED A DIFFERENCE OF 2 INCHES IN ELEVATION BETWEEN OPEN LANES TRAFFIC FOR NOMINAL LIFTS OF 1.5 INCHES. INSTALL ADVANCE WARNING "UNEVEN LANES" SIGNS (W8-11) 350 FT. IN ADVANCE AND A MINIMUM OF EVERY HALF MILE THROUGHOUT THE UNEVEN AREA.

TRAFFIC PATTERN ALTERATIONS

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

SIGNING

- M) INSTALL ADVANCE WORK ZONE WARNING SIGNS WHEN WORK IS WITHIN 40 FT FROM THE EDGE OF TRAVEL LANE AND NO MORE THAN THREE (3) DAYS PRIOR TO THE BEGINNING OF CONSTRUCTION.
- N) PROVIDE SIGNING AND DEVICES REQUIRED TO CLOSE THE ROAD ACCORDING TO THE ROADWAY STANDARD DRAWINGS AND TRAFFIC CONTROL PLANS.
 PROVIDE SIGNING REQUIRED FOR THE OFF-SITE DETOUR ROUTE AS SHOWN IN THE TRAFFIC CONTROL PLANS.
- O) COVER OR REMOVE ALL SIGNS AND DEVICES REQUIRED TO CLOSE THE ROAD WHEN ROAD CLOSURE IS NOT IN OPERATION.
 COVER OR REMOVE ALL SIGNS REQUIRED FOR THE OFF-SITE DETOUR WHEN THE DETOUR IS NOT IN OPERATION.
- P) ENSURE ALL NECESSARY SIGNING IS IN PLACE PRIOR TO ALTERING ANY TRAFFIC PATTERN.

TRAFFIC BARRIER

- Q) INSTALL TEMPORARY BARRIER ACCORDING TO THE TRANSPORTATION MANAGEMENT PLANS A MAXIMUM OF TWO (2) WEEKS PRIOR TO BEGINNING WORK IN ANY LOCATION. ONCE TEMPORARY BARRIER IS INSTALLED AT ANY LOCATION PROCEED IN A CONTINUOUS MANNER TO COMPLETE THE PROPOSED WORK IN THAT LOCATION UNLESS OTHERWISE STATED IN THE TRANSPORTATION MANAGEMENT PLANS OR AS DIRECTED BY THE ENGINEER.

DO NOT PLACE BARRIER DIRECTLY ON ANY SURFACE OTHER THAN ASPHALT OR CONCRETE.

ONCE TEMPORARY BARRIER IS INSTALLED AT ANY LOCATION AND NO WORK IS PERFORMED BEHIND THE TEMPORARY BARRIER FOR A PERIOD LONGER THAN TWO (2) MONTHS, REMOVE / RESET TEMPORARY BARRIER AT NO COST TO THE DEPARTMENT UNLESS OTHERWISE STATED IN THE TRANSPORTATION MANAGEMENT PLANS, TEMPORARY BARRIER IS PROTECTING A HAZARD, OR AS DIRECTED BY THE ENGINEER.

INSTALL TEMPORARY BARRIER WITH THE TRAFFIC FLOW BEGINNING WITH THE UPSTREAM SIDE OF TRAFFIC. REMOVE TEMPORARY BARRIER AGAINST THE TRAFFIC FLOW BEGINNING WITH THE DOWNSTREAM SIDE OF TRAFFIC. INSTALL AND SPACE DRUMS NO GREATER THAN TWICE THE POSTED SPEED LIMIT (MPH) TO CLOSE OR KEEP THE SECTION OF THE ROADWAY CLOSED UNTIL THE TEMPORARY BARRIER CAN BE PLACED OR AFTER THE TEMPORARY BARRIER IS REMOVED.

- R) PROTECT THE APPROACH END OF MOVABLE/PORTABLE CONCRETE BARRIER AT ALL TIMES DURING THE INSTALLATION AND REMOVAL OF THE BARRIER BY EITHER A TRUCK MOUNTED ATTENUATOR (MAXIMUM 72 HOURS) OR A TEMPORARY CRASH CUSHION.

PROTECT THE APPROACH END OF MOVABLE/PORTABLE CONCRETE BARRIER FROM ONCOMING TRAFFIC AT ALL TIMES BY A TEMPORARY CRASH CUSHION UNLESS THE APPROACH END OF MOVABLE/PORTABLE CONCRETE BARRIER IS OFFSET FROM ONCOMING TRAFFIC AS FOLLOWS OR AS SHOWN IN THE PLANS: (SEE ALSO 1101.05)

POSTED SPEED LIMIT	MINIMUM OFFSET
40 OR LESS	15 FT
45 - 50	20 FT
55	25 FT
60 MPH or HIGHER	30 FT

- S) INSTALL BLACK ON ORANGE "DIP" SIGNS (W8-2) AND/OR "BUMP" SIGNS (W8-1) 350 FT. IN ADVANCE OF THE UNEVEN AREA, OR AS DIRECTED BY THE ENGINEER.

TRAFFIC CONTROL DEVICES

- T) WHEN LANE CLOSURES ARE NOT IN EFFECT SPACE CHANNELIZING DEVICES IN WORK AREAS NO GREATER IN FEET THAN TWICE THE POSTED SPEED LIMIT (MPH) EXCEPT, 10 FT ON-CENTER IN RADII, AND 3 FT OFF THE EDGE OF AN OPEN TRAVELWAY. REFER TO STANDARD SPECIFICATIONS FOR ROADS AND STRUCTURES SECTIONS 1130 (DRUMS), 1135 (CONES) AND 1180 (SKINNY DRUMS) FOR ADDITIONAL REQUIREMENTS.
- U) REFER TO HIGH VISIBILITY DEVICES SPECIAL PROVISION FOR DRUMS, STATIONARY WORK ZONE SIGNS, AND PORTABLE WORK ZONE SIGNS USED ON I-40.
- V) SKINNY DRUMS SHALL NOT BE USED ON I-40 FOR ANY TRAFFIC CONTROL SET-UP, INCLUDING LANE CLOSURES OCCURRING AT NIGHT.
- W) PLACE TYPE III BARRICADES, WITH "ROAD CLOSED" SIGN R11-2 ATTACHED, OF SUFFICIENT LENGTH TO CLOSE ENTIRE ROADWAY.

PAVEMENT MARKINGS AND MARKERS

- X) INSTALL TEMPORARY PAVEMENT MARKINGS AND TEMPORARY PAVEMENT MARKERS ON INTERIM LAYERS OF PAVEMENT AS FOLLOWS:

ROAD NAME	MARKING	MARKER
I-40 (-L-)	WORK ZONE "PERFORMANCE" MARKINGS (SEE SPECIAL PROVISIONS)	TEMPORARY
SR 1758 (-Y-)	PAINT	TEMPORARY

- Y) PLACE ONE APPLICATION OF PAINT FOR TEMPORARY TRAFFIC PATTERNS. PLACE A SECOND APPLICATION OF PAINT SIX (6) MONTHS AFTER THE INITIAL APPLICATION AND EVERY SIX MONTHS AS DIRECTED BY THE ENGINEER.
- Z) TIE PROPOSED PAVEMENT MARKING LINES TO EXISTING PAVEMENT MARKING LINES.
- AA) REMOVE/REPLACE ANY CONFLICTING/DAMAGED PAVEMENT MARKINGS AND MARKERS BY THE END OF EACH DAY'S OPERATION.

LOCAL NOTES

LOCAL NOTE 1 - VARIABLE SPEED REDUCTION USING DSLS

DURING LANE CLOSURE OPERATIONS AND IF PROPERLY ORDINANCED, REDUCE THE SPEED LIMIT DISPLAYED ON THE DIGITAL SPEED LIMIT SIGNS TO 55. WHEN THE LANE CLOSURE IS REMOVED, RESTORE THE DISPLAY OF 65 IN ACCORDANCE WITH TMP-2C.

LOCAL NOTE 2 - MATERIAL DELIVERY USING I-40

TO PREVENT IMPEDING TRAFFIC FLOW ON I-40, ALL PROJECT MATERIAL DELIVERIES FROM I-40 WILL BE PROHIBITED DURING THE TIMES SPECIFIED IN GENERAL NOTE A. HAUL VEHICLES ATTEMPTING INGRESS/EGRESS TO/FROM I-40 WILL BE REQUIRED TO DO SO BEHIND A LANE CLOSURE UNLESS ALLOWED OTHERWISE BY THE ENGINEER.

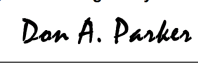
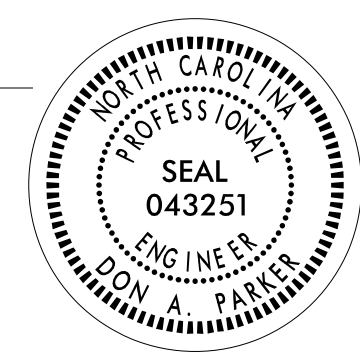
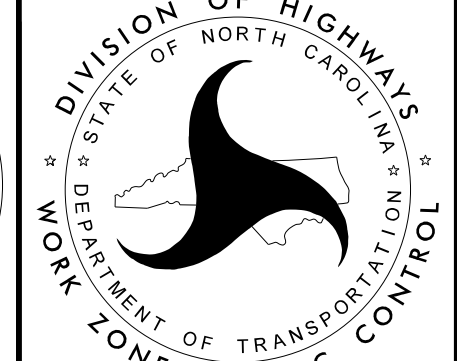
PROJECT MATERIAL DELIVERIES TO CONSTRUCTION STAGING AREAS AND TO THE PROJECT SITE FROM -Y- LINE WILL NOT BE SUBJECT TO ANY TIME RESTRICTIONS.

LOCAL NOTE 3 - PATTERN MASKING AND PERFORMANCE PAVEMENT MARKINGS

PRIOR TO MAKING TRAFFIC PATTERN CHANGES AND INSTALLATION OF TEMPORARY PAVEMENT MARKINGS ON I-40, MASK ALL CONFLICTING PAVEMENT MARKINGS IN ACCORDANCE WITH THE WORK ZONE TRAFFIC "PATTERN MASKING" SPECIAL PROVISION. INSTALL ALL TEMPORARY PAVEMENT MARKINGS FOR TEMPORARY TRAFFIC PATTERNS IN ACCORDANCE WITH THE WORK ZONE "PERFORMANCE" PAVEMENT MARKINGS SPECIAL PROVISION.

LOCAL NOTE 4 - CONTINUOUS WEEKEND LANE CLOSURES

THE CONTINUOUS WEEKEND OPERATIONS FOR FULL DEPTH INSIDE SHOULDER CONSTRUCTION, AND TYING IN AND SHIFTING TRAFFIC ONTO THE DETOURS AND FOR TAKING TRAFFIC FROM THE DETOURS BACK TO THE MAINLINE SHALL REQUIRE 2 ADDITIONAL CMS BOARDS IN ADVANCE OF THE LANE CLOSURE TO WARN OF QUEUING AND THE POTENTIAL FOR STOPPED TRAFFIC. INITIALLY INSTALL A CMS 4 MILES IN ADVANCE OF THE LANE CLOSURE WITH THE FOLLOWING MESSAGE: (1) SLOW MOVING TRAFFIC (2) 2 MILES AHEAD. INSTALL A SECOND CMS 3 MILES IN ADVANCE OF THE LANE CLOSURE WITH THE FOLLOWING MESSAGE: (1) SLOW TRAFFIC AHEAD, (2) BE PREPARED TO STOP. THE CONTRACTOR SHALL MONITOR BACK UP AND ADJUST CMS LOCATION AND MESSAGING AS NECESSARY.

APPROVED:  DATE: 4/26/2017			<h2 style="margin: 0;">TRANSPORTATION OPERATIONS PLAN</h2>
DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED			

TEMPORARY SHORING NOTES

SHORING LOCATION NO.1

FOR TEMPORARY SHORING AND POSITIVE PROTECTION FOR TEMPORARY SHORING, SEE PLANS AND TEMPORARY SHORING PROVISION.

BEFORE BEGINNING TEMPORARY SHORING DESIGN OR CONSTRUCTION, SURVEY EXISTING GROUND ELEVATIONS IN THE VICINITY OF SHORING LOCATIONS TO DETERMINE ACTUAL SHORING HEIGHTS.

DESIGN TEMPORARY SHORING FROM STA. 19+00+/- -L-, 90.6' RT. TO STA. 21+75+/- -L-, 108.7' RT. FOR THE FOLLOWING ASSUMED SOIL PARAMETERS:

UNIT WEIGHT (γ) = 120 LB/CF
 FRICTION ANGLE (ϕ) = 30 DEGREES
 COHESION (c) = 0 LB/SF

LIMITED SUBSURFACE INFORMATION IS AVAILABLE IN THE VICINITY OF TEMPORARY SHORING FROM STA. 19+00+/- -L-, 90.6' RT. TO STA. 21+75+/- -L-, 108.7' RT. THE INFORMATION PROVIDED FOR TEMPORARY SHORING DESIGN WAS ASSUMED AND MAY NOT BE APPLICABLE TO THE ACTUAL SITE CONDITIONS ENCOUNTERED DURING CONSTRUCTION.

IT MAY BE PREFERRED TO USE A TEMPORARY SOIL NAIL WALL FOR TEMPORARY SHORING FROM STA. 19+00+/- -L-, 90.6' RT. TO STA. 21+75+/- -L-, 108.7' RT. FOR TEMPORARY SOIL NAIL WALLS, SEE TEMPORARY SOIL NAIL WALLS PROVISION.

PRIOR TO COMPLETING THE PERMANENT FILL SLOPE AT TEMPORARY SHORING NO.1, REMOVE THE TOP 2 FT. TO 3 FT. OF TEMPORARY SHORING AND INCORPORATE THE REMAINDER TEMPORARY SHORING INTO THE FILL SLOPE.

SHORING LOCATION NO.2

FOR TEMPORARY SHORING AND POSITIVE PROTECTION FOR TEMPORARY SHORING, SEE PLANS AND TEMPORARY SHORING PROVISION.

BEFORE BEGINNING TEMPORARY SHORING DESIGN OR CONSTRUCTION, SURVEY EXISTING GROUND ELEVATIONS IN THE VICINITY OF SHORING LOCATIONS TO DETERMINE ACTUAL SHORING HEIGHTS.

DESIGN TEMPORARY SHORING FROM STA. 23+00+/- -L-, 124.5' RT. TO STA. 25+90+/- -L-, 125.4' RT. FOR THE FOLLOWING ASSUMED SOIL PARAMETERS:

UNIT WEIGHT (γ) = 120 LB/CF
 FRICTION ANGLE (ϕ) = 30 DEGREES
 COHESION (c) = 0 LB/SF

LIMITED SUBSURFACE INFORMATION IS AVAILABLE IN THE VICINITY OF TEMPORARY SHORING FROM STA. 23+00+/- -L-, 124.5' RT. TO STA. 25+90+/- -L-, 125.4' RT. THE INFORMATION PROVIDED FOR TEMPORARY SHORING DESIGN WAS ASSUMED AND MAY NOT BE APPLICABLE TO THE ACTUAL SITE CONDITIONS ENCOUNTERED DURING CONSTRUCTION.

AT THE CONTRACTOR'S OPTION, USE A STANDARD TEMPORARY SHORING FOR TEMPORARY SHORING FROM STA. 23+00+/- -L-, 124.5' RT. TO STA. 25+90+/- -L-, 125.4' RT. SEE STANDARD DRAWING NO. 1801.02 FOR STANDARD TEMPORARY WALLS.

SHORING LOCATION NO.3

FOR TEMPORARY SHORING AND POSITIVE PROTECTION FOR TEMPORARY SHORING, SEE PLANS AND TEMPORARY SHORING PROVISION.

BEFORE BEGINNING TEMPORARY SHORING DESIGN OR CONSTRUCTION, SURVEY EXISTING GROUND ELEVATIONS IN THE VICINITY OF SHORING LOCATIONS TO DETERMINE ACTUAL SHORING HEIGHTS.

DESIGN TEMPORARY SHORING FROM STA. 24+99+/- -LWBL-, 35' RT. TO STA. 25+35+/- -LWBL-, 35' RT. FOR THE FOLLOWING ASSUMED SOIL PARAMETERS:

UNIT WEIGHT (γ) = 120 LB/CF
 FRICTION ANGLE (ϕ) = 30 DEGREES
 COHESION (c) = 0 LB/SF

LIMITED SUBSURFACE INFORMATION IS AVAILABLE IN THE VICINITY OF TEMPORARY SHORING FROM STA. 24+99+/- -LWBL-, 35' RT. TO STA. 25+35+/- -LWBL-, 35' RT. THE INFORMATION PROVIDED FOR TEMPORARY SHORING DESIGN WAS ASSUMED AND MAY NOT BE APPLICABLE TO THE ACTUAL SITE CONDITIONS ENCOUNTERED DURING CONSTRUCTION.

AT THE CONTRACTOR'S OPTION, USE STANDARD TEMPORARY SHORING FOR TEMPORARY SHORING FROM STA. 24+99+/- -LWBL-, 35' RT. TO STA. 25+35+/- -LWBL-, 35' RT. SEE STANDARD DRAWING NO. 1801.02 FOR STANDARD TEMPORARY WALLS.

SHORING LOCATION NO.4

FOR TEMPORARY SHORING AND POSITIVE PROTECTION FOR TEMPORARY SHORING, SEE PLANS AND TEMPORARY SHORING PROVISION.

BEFORE BEGINNING TEMPORARY SHORING DESIGN OR CONSTRUCTION, SURVEY EXISTING GROUND ELEVATIONS IN THE VICINITY OF SHORING LOCATIONS TO DETERMINE ACTUAL SHORING HEIGHTS.

DESIGN TEMPORARY SHORING FROM STA. 26+29+/- -LWBL-, 35' RT. TO STA. 26+64+/- -LWBL-, 35' RT. FOR THE FOLLOWING ASSUMED SOIL PARAMETERS:

UNIT WEIGHT (γ) = 120 LB/CF
 FRICTION ANGLE (ϕ) = 30 DEGREES
 COHESION (c) = 0 LB/SF

LIMITED SUBSURFACE INFORMATION IS AVAILABLE IN THE VICINITY OF TEMPORARY SHORING FROM STA. 26+29+/- -LWBL-, 35' RT. TO STA. 26+64+/- -LWBL-, 35' RT. THE INFORMATION PROVIDED FOR TEMPORARY SHORING DESIGN WAS ASSUMED AND MAY NOT BE APPLICABLE TO THE ACTUAL SITE CONDITIONS ENCOUNTERED DURING CONSTRUCTION.

AT THE CONTRACTOR'S OPTION, USE STANDARD TEMPORARY SHORING FOR TEMPORARY SHORING FROM STA. 26+29+/- -LWBL-, 35' RT. TO STA. 26+64+/- -LWBL-, 35' RT. SEE STANDARD DRAWING NO. 1801.02 FOR STANDARD TEMPORARY WALLS.

SHORING LOCATION NO.5

FOR TEMPORARY SHORING AND POSITIVE PROTECTION FOR TEMPORARY SHORING, SEE PLANS AND TEMPORARY SHORING PROVISION.

BEFORE BEGINNING TEMPORARY SHORING DESIGN OR CONSTRUCTION, SURVEY EXISTING GROUND ELEVATIONS IN THE VICINITY OF SHORING LOCATIONS TO DETERMINE ACTUAL SHORING HEIGHTS.

DESIGN TEMPORARY SHORING FROM STA. 25+12+/- -LEBL-, 34.6' RT. TO STA. 25+54+/- -LEBL-, 34.6' RT. FOR THE FOLLOWING ASSUMED SOIL PARAMETERS:

UNIT WEIGHT (γ) = 120 LB/CF
 FRICTION ANGLE (ϕ) = 30 DEGREES
 COHESION (c) = 0 LB/SF

LIMITED SUBSURFACE INFORMATION IS AVAILABLE IN THE VICINITY OF TEMPORARY SHORING FROM STA. 25+12+/- -LEBL-, 34.6' RT. TO STA. 25+54+/- -LEBL-, 34.6' RT. THE INFORMATION PROVIDED FOR TEMPORARY SHORING DESIGN WAS ASSUMED AND MAY NOT BE APPLICABLE TO THE ACTUAL SITE CONDITIONS ENCOUNTERED DURING CONSTRUCTION.

AT THE CONTRACTOR'S OPTION, USE STANDARD TEMPORARY SHORING FOR TEMPORARY SHORING FROM STA. 25+12+/- -LEBL-, 34.6' RT. TO STA. 25+54+/- -LEBL-, 34.6' RT. SEE STANDARD DRAWING NO. 1801.01 FOR STANDARD TEMPORARY SHORING.

SHORING LOCATION NO.6

FOR TEMPORARY SHORING AND POSITIVE PROTECTION FOR TEMPORARY SHORING, SEE PLANS AND TEMPORARY SHORING PROVISION.

BEFORE BEGINNING TEMPORARY SHORING DESIGN OR CONSTRUCTION, SURVEY EXISTING GROUND ELEVATIONS IN THE VICINITY OF SHORING LOCATIONS TO DETERMINE ACTUAL SHORING HEIGHTS.

DESIGN TEMPORARY SHORING FROM STA. 26+39+/- -LEBL-, 34.6' RT. TO STA. 26+77+/- -LEBL-, 34.6' RT. FOR THE FOLLOWING ASSUMED SOIL PARAMETERS:

UNIT WEIGHT (γ) = 120 LB/CF
 FRICTION ANGLE (ϕ) = 30 DEGREES
 COHESION (c) = 0 LB/SF

LIMITED SUBSURFACE INFORMATION IS AVAILABLE IN THE VICINITY OF TEMPORARY SHORING FROM STA. 26+39+/- -LEBL-, 34.6' RT. TO STA. 26+77+/- -LEBL-, 34.6' RT. THE INFORMATION PROVIDED FOR TEMPORARY SHORING DESIGN WAS ASSUMED AND MAY NOT BE APPLICABLE TO THE ACTUAL SITE CONDITIONS ENCOUNTERED DURING CONSTRUCTION.

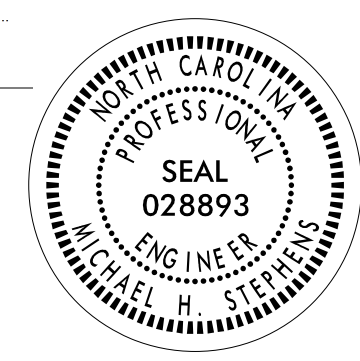
AT THE CONTRACTOR'S OPTION, USE STANDARD TEMPORARY SHORING FOR TEMPORARY SHORING FROM STA. 26+39+/- -LEBL-, 34.6' RT. TO STA. 26+77+/- -LEBL-, 34.6' RT. SEE STANDARD DRAWING NO. 1801.02 FOR STANDARD TEMPORARY WALLS.

SHORING LOCATION NO.	FROM STATION AND OFFSET	TO STATION AND OFFSET	ESTIMATED AVERAGE HEIGHT	ESTIMATED MAXIMUM HEIGHT	SHORING LOCATION TYPE
NO. 1	STA. 19+00+/- -L- 90.6 FT. RT.	STA. 21+75+/- -L- 108.7 FT. RT.	9 FT.	13 FT.	ROADWAY
NO. 2	STA. 23+00+/- -L- 124.5 FT. RT.	STA. 25+90+/- -L- 125.4 FT. RT.	21 FT.	36 FT.	ROADWAY
NO. 3	STA. 24+99+/- -LWBL- 35 FT. RT.	STA. 25+35+/- -LWBL- 35 FT. RT.	7 FT.	9 FT.	STRUCTURE
NO. 4	STA. 26+29+/- -LWBL- 35 FT. RT.	STA. 26+64+/- -LWBL- 35 FT. RT.	6 FT.	9 FT.	STRUCTURE
NO. 5	STA. 25+12+/- -LEBL- 34.6 FT. RT.	STA. 25+54+/- -LEBL- 34.6 FT. RT.	7 FT.	9 FT.	STRUCTURE
NO. 6	STA. 26+39+/- -LEBL- 34.6 FT. RT.	STA. 26+77+/- -LEBL- 34.6 FT. RT.	6 FT.	9 FT.	STRUCTURE

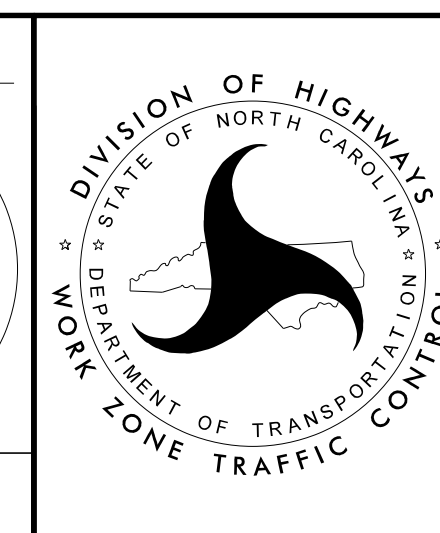
5/17/2017 P:\TIP\Projects-B\B4447\TrafficControl\TCP\B4447_TC_GEN_TMP02.dgn User:scodts

APPROVED: *Michael H. Stephens*
C447682092314CC...

DATE: 5/17/2017



**DOCUMENT NOT CONSIDERED FINAL
 UNLESS ALL SIGNATURES COMPLETED**



TEMPORARY SHORING NOTES

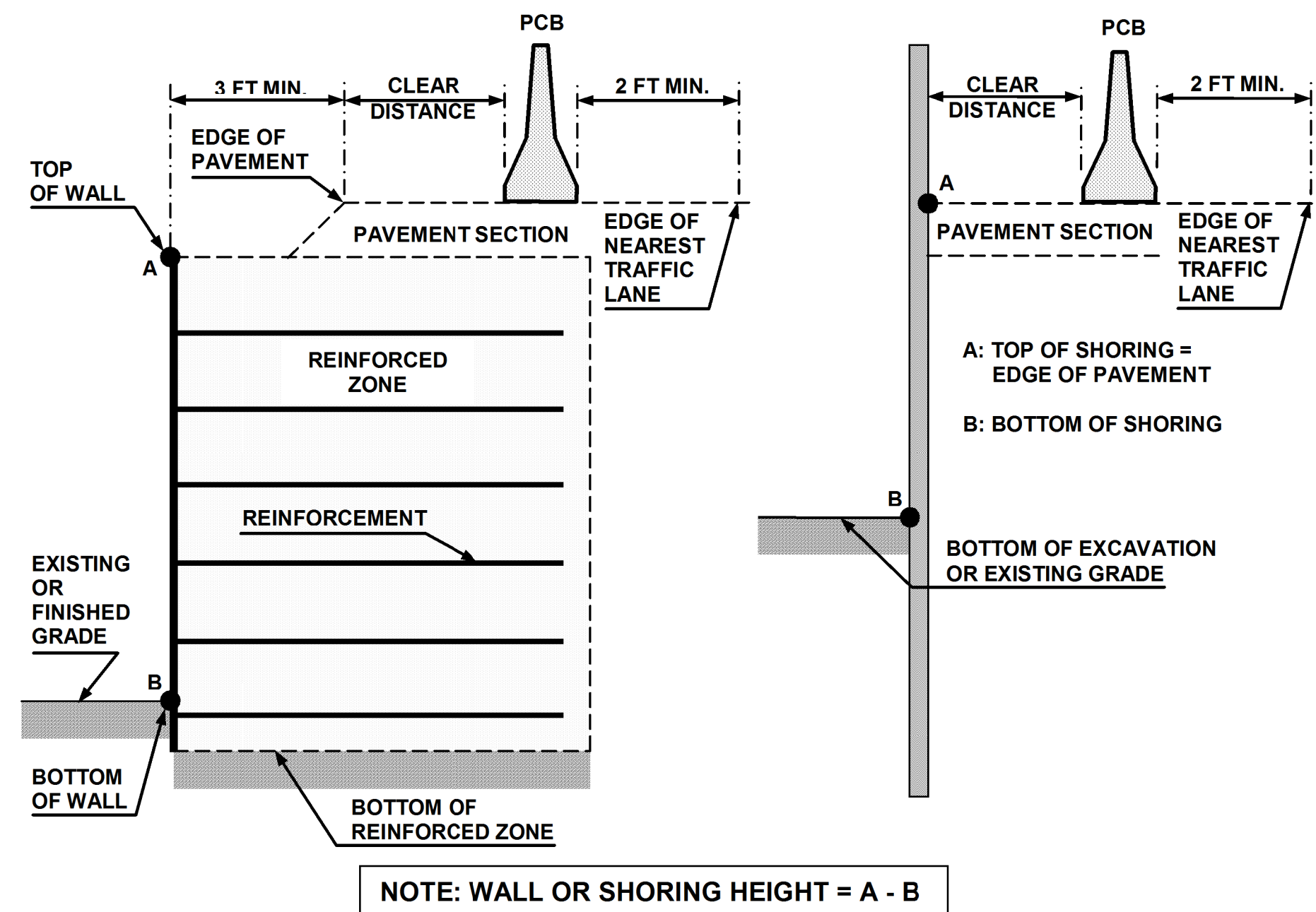


FIGURE A

NOTES

- 1- REFER TO THE TRAFFIC CONTROL PLANS FOR TEMPORARY SHORING LOCATIONS AND NOTES.
- 2- REFER TO THE "TEMPORARY SHORING" PROJECT SPECIAL PROVISION FOR INFORMATION ABOUT TEMPORARY SHORING AND PORTABLE CONCRETE BARRIER (PCB).
- 3- PCB IS REQUIRED IF TEMPORARY SHORING IS LOCATED WITHIN THE CLEAR ZONE IN ACCORDANCE WITH THE AASHTO ROADSIDE DESIGN GUIDE. DO NOT PLACE BARRIER DIRECTLY ON ANY SURFACE OTHER THAN ASPHALT OR CONCRETE. (CONTACT NCDOT PAVEMENT MANAGEMENT UNIT FOR APPLICABLE PAVEMENT DESIGN).
- 4- BASED ON THE CLEAR DISTANCE, OFFSET, DESIGN SPEED AND PAVEMENT TYPE, CHOOSE AN UNANCHORED OR ANCHORED PCB FROM THE TABLE SHOWN IN FIGURE B. CLEAR DISTANCE IS DEFINED AS SHOWN IN FIGURE A AND OFFSET IS DEFINED AS SHOWN IN FIGURE B.
- 5- AT THE CONTRACTOR'S OPTION OR IF THE MINIMUM REQUIRED CLEAR DISTANCE IS NOT AVAILABLE, SET PCB NEXT TO AND UP AGAINST THE TRAFFIC SIDE OF THE TEMPORARY SHORING EXCEPT FOR BARRIER ABOVE TEMPORARY WALLS. PCB WITH THE MINIMUM REQUIRED CLEAR DISTANCE IS REQUIRED ABOVE TEMPORARY WALLS.
- 6- USE NCDOT PORTABLE CONCRETE BARRIER (PCB) IN ACCORDANCE WITH ROADWAY STANDARD DRAWING NO. 1170.01 AND SECTION 1170 OF THE STANDARD SPECIFICATIONS.
- 7- PCB REQUIREMENTS FOR TEMPORARY WALLS APPLY TO TEMPORARY MECHANICALLY STABILIZED EARTH (MSE) WALLS AND TEMPORARY SOIL NAIL WALLS.
- 8- SET PCB WITH A MINIMUM HORIZONTAL DISTANCE OF 2 FT BETWEEN THE FRONT FACE OF THE BARRIER AND THE EDGE OF THE NEAREST TRAFFIC LANE AS SHOWN IN FIGURE A UNLESS OTHERWISE SHOWN IN THE PLANS AND OR AS APPROVED BY THE ENGINEER.
- 9- FOR PCB ABOVE AND BEHIND TEMPORARY WALLS, PROVIDE A MINIMUM DISTANCE OF 3 FT BETWEEN THE EDGE OF PAVEMENT AND THE WALL FACE AS SHOWN IN FIGURE A. IF THESE MINIMUM REQUIRED DISTANCES ARE NOT AVAILABLE, CONTACT THE ENGINEER.
- 10- TABLE SHOWN IN FIGURE B IS BASED ON NCDOT RESEARCH PROJECT NO. 2005-010 WITH VEHICLE TYPE USED FOR NCHRP 350 CRASH TESTS. BARRIER DEFLECTIONS AND RESULTING MINIMUM REQUIRED CLEAR DISTANCES MIGHT VARY SIGNIFICANTLY FOR LARGER HEAVIER VEHICLES, RUNS OF BARRIER LESS THAN 200 FT IN LENGTH AND WET OR DRY PAVEMENT.

MINIMUM REQUIRED CLEAR DISTANCE, inches

Barrier Type	Pavement Type	Offset * ft	Design Speed, mph					
			<30	31-40	41-50	51-60	61-70	71-80
Unanchored PCB	Asphalt	<8	24	26	29	32	36	40
		8-14	26	28	31	35	38	42
		14-20	27	29	34	36	39	43
		20-26	28	31	35	38	40	44
		26-32	29	32	36	39	42	45
		32-38	30	34	38	41	43	46
		38-44	31	34	41	43	45	48
		44-50	31	35	41	43	46	49
		50-56	32	36	42	44	47	50
	>56	32	36	42	45	47	51	
	Concrete	<8	17	18	21	22	25	26
		8-14	19	20	23	25	26	29
		14-20	22	22	24	26	28	31
		20-26	23	24	26	27	30	34
		26-32	24	25	27	28	32	35
		32-38	24	26	27	30	33	36
		38-44	25	26	28	30	34	37
		44-50	26	26	28	32	35	37
50-56		26	26	28	32	35	38	
>56	26	27	29	32	36	38		
Anchored PCB	Asphalt	All Offsets	24 for All Design Speeds					
Anchored PCB	Concrete (including bridge approach slabs)	All Offsets	12 for All Design Speeds					

* See Figure Below

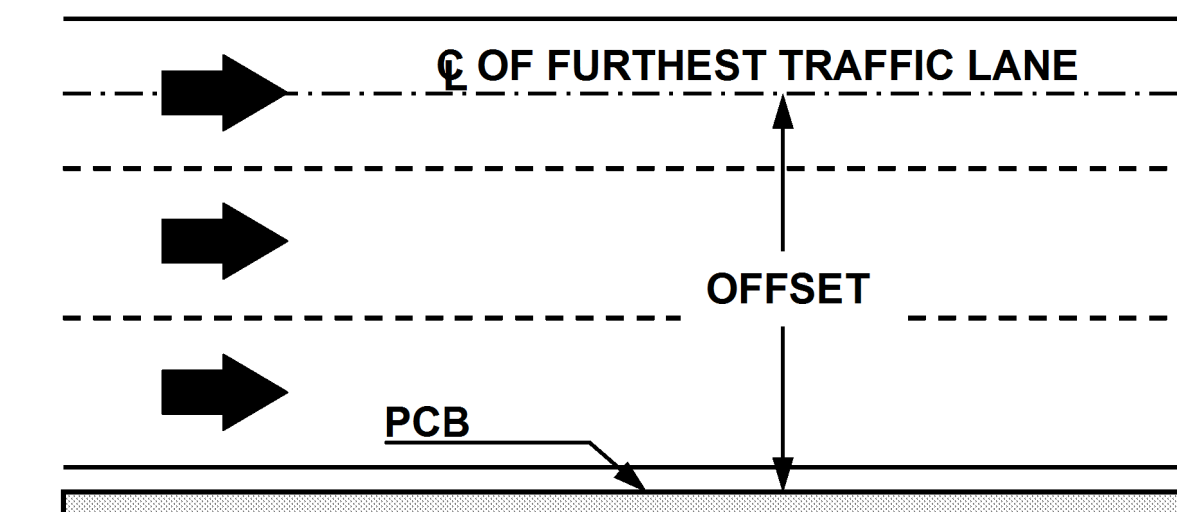
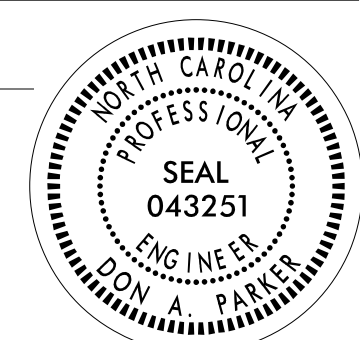



FIGURE B

APPROVED: <i>Don A. Parker</i> <small>40482802619410...</small> DATE: 4/26/2017 		PORTABLE CONCRETE BARRIER AT TEMPORARY SHORING LOCATIONS
DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED		

<p>SIGN NUMBER: SP16138 BACKG COLOR: Fluorescent Orange TYPE: STATIONARY COPY COLOR: Black</p> <p>QUANTITY: SEE PLANS</p> <p>SIGN WIDTH: 3'-0" HEIGHT: 2'-6" TOTAL AREA: 7.5 Sq.-Ft.</p> <p>BORDER TYPE: INSET RECESS: 0.5" WIDTH: 0.75" RADII: 1.88"</p> <p>NO. Z BARS: _____ LENGTH: _____</p> <p style="text-align: center;">USE NOTES: 1,2</p> <p>1. Legend and border shall be direct applied black non-reflective sheeting. 2. Background shall be NC GRADE B fluorescent orange retroreflective sheeting.</p>	<p>DESIGN BY: DHB CHECKED BY: KLJ DATE: May 04, 2016 PROJECT ID: B-4447 LOCATION: BURKE CO. DIV: 13</p>	<table border="1" style="width: 100%; text-align: center;"> <thead> <tr> <th>SYMBOL</th> <th>X</th> <th>Y</th> <th>WID</th> <th>HT</th> </tr> </thead> <tbody> <tr><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td></tr> </tbody> </table> <p style="text-align: center;">MAT'L: 0.080" (2.0 mm) ALUMINUM</p> <div style="text-align: center;"> <p style="text-align: left;">BORDER R=1.88" TH=0.75" IN=0.5"</p> <p style="text-align: right;">Spacing Factor is 1 unless specified otherwise</p> </div>	SYMBOL	X	Y	WID	HT																																																		
SYMBOL	X	Y	WID	HT																																																					

LETTER POSITIONS

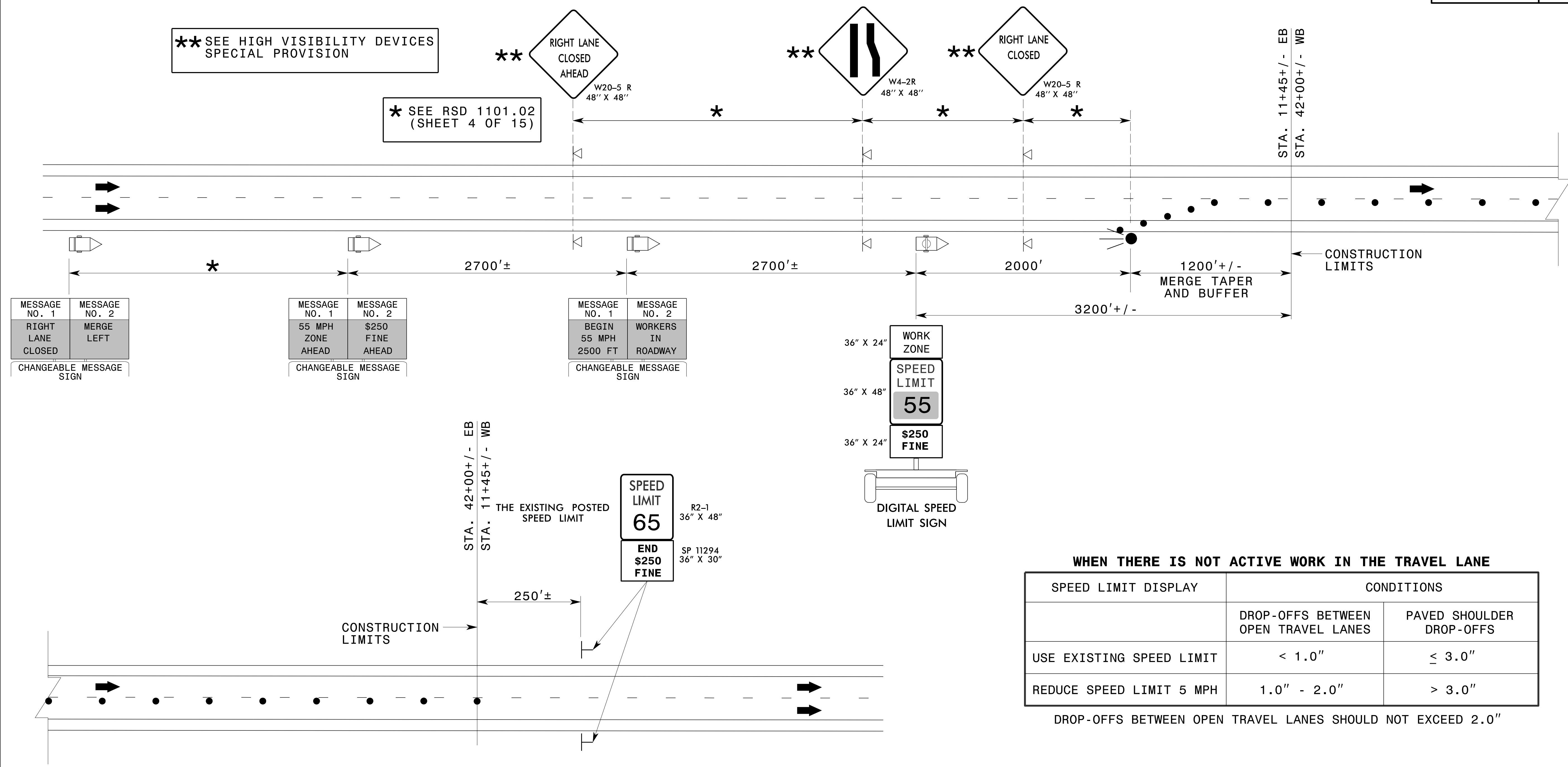
Letter spacings are to start of next letter

	B	E	R	E	A												Series/Size Text Length
	7.9	4.3	3.9	4.3	3.5	4.3	7.9										D 2000
																	20.2
																	D 2000
	5.1	4.5	4.6	4.6	4.1	4.5	3.4	5.1									25.8
																	D 2000
	9.6	4.2	4.2	5	3.4	9.6											16.8

FILENAME: Guidesign_English NORTH CAROLINA D.O.T. SIGN DETAIL

3/29/2017
P:\TIP\Projects-B\B4447\TrafficControl\TCP\B4447_TC_GEN.TMP02B.dgn
User:scodts

<p>APPROVED: <i>RENEE ROACH</i> <small>DocuSigned by: RENEE ROACH B3C6C8F7CF484D...</small></p> <p>DATE: 3/30/2017</p>		<p style="font-size: small;">DIVISION OF HIGHWAYS STATE OF NORTH CAROLINA DEPARTMENT OF TRANSPORTATION WORK ZONE TRAFFIC CONTROL</p>	<p>SPECIAL SIGN DESIGN BEREA CHURCH ROAD</p>
<p>DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED</p>			



WHEN THERE IS NOT ACTIVE WORK IN THE TRAVEL LANE

SPEED LIMIT DISPLAY	CONDITIONS	
	DROP-OFFS BETWEEN OPEN TRAVEL LANES	PAVED SHOULDER DROP-OFFS
USE EXISTING SPEED LIMIT	< 1.0"	≤ 3.0"
REDUCE SPEED LIMIT 5 MPH	1.0" - 2.0"	> 3.0"

DROP-OFFS BETWEEN OPEN TRAVEL LANES SHOULD NOT EXCEED 2.0"

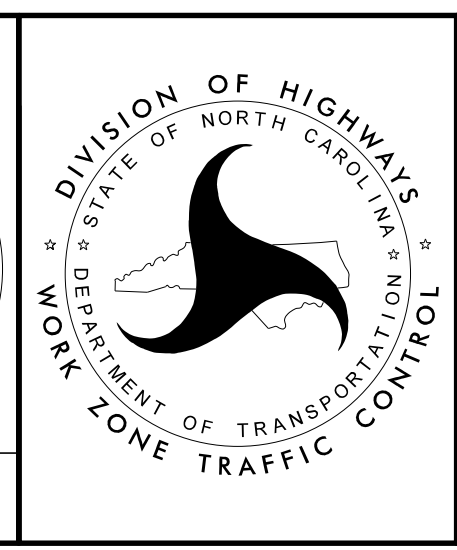
- NOTES**
- NCDOT HAS SOLE AUTHORITY OF THE SPEED LIMITS DISPLAYED ON THE DIGITAL SPEED LIMIT SIGNS.
 - THE WORK ZONE VARIABLE SPEED LIMIT AND THE \$250 SPEEDING PENALTY ARE SEPARATE ORDINANCES THAT MUST BE SIGNED BY THE STATE TRAFFIC ENGINEER TO BE VALID AND ENFORCEABLE. WITHOUT A SIGNED ORDINANCE, THE SPEED LIMIT ON A FACILITY SHALL REMAIN UNCHANGED.
 - THE SPEED LIMITS DISPLAYED WITHIN THE ACTIVE WORK AREA MAY VARY BETWEEN 55 MPH AND 65 MPH, DEPENDENT UPON ROAD WORK CONDITIONS. 55 MPH IS ONLY DISPLAYED DURING ACTIVE LANE CLOSURE OPERATIONS.
 - THE DIGITAL SPEED LIMIT SIGNS TAKE PRECEDENCE OVER EXISTING SPEED LIMIT SIGNS. ALL EXISTING SPEED LIMIT SIGNS SHALL BE COVERED.

APPROVED: *Don A. Parker*
400482802619410...

DATE: 4/26/2017

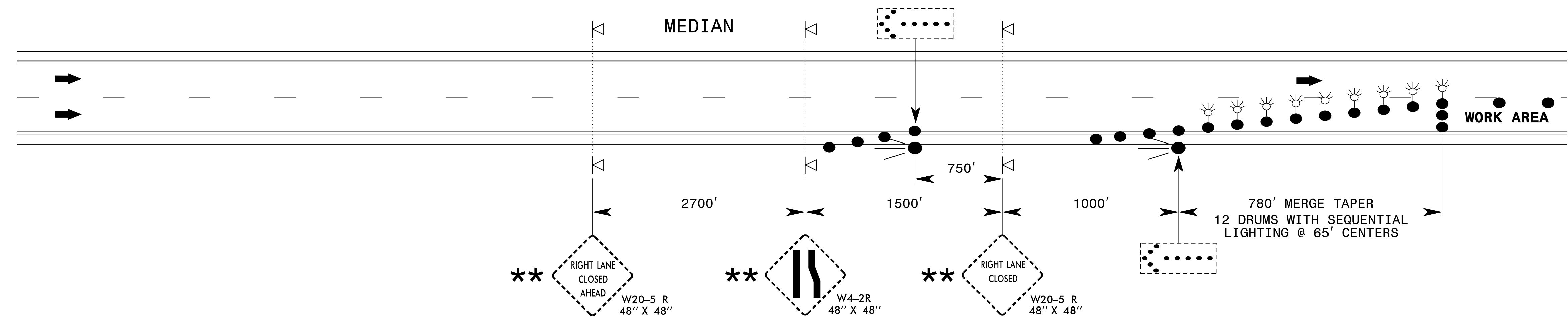
SEAL: 043251
 ENGINEER: DON A. PARKER

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED



WORK ZONE "VARIABLE" SPEED LIMIT USING DIGITAL SPEED LIMIT SIGNS

4/26/2017
 P:\TIP\Projects-B\B4447\TrafficControl\TCP\B4447_TC_GEN_TMP02C.dgn
 User:scodts



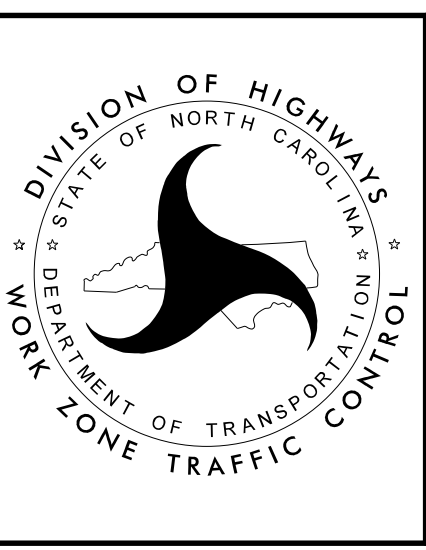
**** SEE HIGH VISIBILITY DEVICES SPECIAL PROVISION**

"SEQUENTIAL" LIGHTING ON DRUMS IN TAPER (SEE SPECIAL PROVISION)

4/26/2017
 P:\TIP\Projects-B\B4447\TrafficControl\TCP\B4447_TC_GEN_TMP02D.dgn
 User:scodts

APPROVED: *Don A. Parker*
 DATE: 4/26/2017

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED



SEQUENTIAL FLASHING WARNING LIGHTS ON DRUMS IN LANE CLOSURE TAPER

TEMPORARY TRAFFIC CONTROL PHASING

NOTE: BEFORE BEGINNING CONSTRUCTION THE CONTRACTOR SHALL PLACE ADVANCE WORK ZONE WARNING SIGNS ALONG -L- AND -Y- LINES, SEE RSD 1101.01 (SHEETS 1 OF 3) AND HIGH VISIBILITY DEVICES SPECIAL PROVISION.

PHASE I

STEP 1. USING RSD 1101.03 (SHEET 1 OF 9) AND TMP-4, CLOSE SR 1758 (BEREA CHURCH ROAD) FROM STA. 13+00+/- -Y- TO STA. 17+50+/- -Y-.

NOTE: CONTRACTOR MAY BEGIN -Y- LINE CONSTRUCTION AT ANY TIME.

STEP 2. USING RSD 1101.02 (SHEET 4 OF 15), PLACE PORTABLE CONCRETE AS FOLLOWS (SEE TMP-5 AND TMP-6):

- STA. 14+10+/- -LEBL- TO STA. 23+00+/- -LEBL-
- STA. 29+60+/- -LEBL- TO STA. 38+00+/- -LEBL-

STEP 3. USING RSD 1101.02 (SHEET 4 OF 15), CONSTRUCT -DETEB- INCLUDING, TEMPORARY BRIDGE, DRAINAGE, GUARDRAIL, TEMPORARY SHORING, UP TO EXISTING EDGE OF SHOULDER ELEVATIONS AS FOLLOWS (SEE CONSTRUCTION PLANS AND TMP-5, TMP-6, TMP-6A, AND LOCAL NOTES 1 AND 2):

- STA. 15+09+/- -DETEB- TO STA. 37+26+/- -DETEB-
- STA. 15+50+/- -LEBL-(RT) TO STA. 22+00+/- -LEBL-(RT)
- STA. 30+50+/- -LEBL-(RT) TO STA. 36+50+/- -LEBL-(RT)

COMPLETE THE WORK OF PHASE I, STEP 4 BETWEEN 8:00 P.M. FRIDAY AND 6:00 A.M. THE FOLLOWING MONDAY MORNING. (SEE INTERMEDIATE CONTRACT TIME AND LIQUIDATED DAMAGES)

STEP 4. INSTALL AND ACTIVATE QUEUE WARNING MESSAGE BOARDS (SEE LOCAL NOTE 4)

- USING RSD 1101.02 (SHEET 4 OF 15) CLOSE THE OUTSIDE EB LANE OF I-40. MASK AND TIE IN THE OUTSIDE LANE OF -DETEB- AND INSTALL TEMPORARY "PERFORMANCE" SKIP LINE AND WHITE EDGELINE.

- USING RSD 1101.03 (SHEET 9 OF 9) PACE TRAFFIC IN A MANNER THAT ALLOWS REVERSAL OF RSD 1101.02 (SHEET 4 OF 15) TO CLOSE THE INSIDE EB LANE OF I-40 AND SHIFT TRAFFIC TO THE OUTSIDE LANE OF -DETEB-.

- MASK AND TIE IN THE INSIDE LANE OF -DETEB- AND INSTALL TEMPORARY "PERFORMANCE" YELLOW EDGELINE. REMOVE THE LANE CLOSURE AND OPEN -DETEB- TO 2 LANE TRAFFIC.

STEP 5. USING RSD 1101.02 (SHEET 4 OF 15) AND LOCAL NOTE 1, REMOVE EXISTING DOUBLE FACE GUARDRAIL FROM STA. 11+50 +/- -DETEB- STA. 22+00 +/- -DETEB-.

PLACE TEMPORARY PAVEMENT FOR PCB FROM STA. 11+50 +/- -DETEB- TO STA. 12+60 +/- -DETEB-. (SEE TMP-7)

STEP 6. USING RSD 1101.02 (SHEET 4 OF 15), PLACE PORTABLE CONCRETE AS FOLLOWS (SEE TMP-7 AND TMP-8):

- STA. 11+50+/- -DETEB- TO STA. 22+60+/- -DETEB-
- STA. 32+50+/- -DETEB- TO STA. 42+20+/- -DETEB-

STEP 7. USING RSD 1101.02 (SHEET 4 OF 15) AND LOCAL NOTE 1, REMOVE DOUBLE FACED GUARDRAIL IN THE MEDIAN FROM STA. 31+00+/- TO STA. 42+00 +/- AND INSTALL TEMPORARY ATTENUATORS AND UNITS.

COMPLETE THE WORK OF PHASE I, STEP 8 BETWEEN 8:00 P.M. FRIDAY AND 6:00 A.M. THE FOLLOWING MONDAY MORNING. (SEE INTERMEDIATE CONTRACT TIME AND LIQUIDATED DAMAGES)

STEP 8. INSTALL AND ACTIVATE QUEUE WARNING MESSAGE BOARDS (SEE LOCAL NOTE 4)

- USING RSD 1101.02 (SHEET 4 OF 15) AND LOCAL NOTE 1, CLOSE THE INSIDE WB LANE OF I-40. CONSTRUCT THE WB INSIDE FULL DEPTH PAVED SHOULDER UP TO THE EDGE AND ELEVATION OF EXISTING PAVEMENT IN THE FOLLOWING LOCATIONS:

- STA. 15+50+/- -LWBL-(RT) TO STA. 17+40+/- -LWBL-(RT)
- STA. 34+30+/- -LWBL-(RT) TO STA. 36+50+/- -LWBL-(RT)

STEP 9. USING RSD 1101.02 (SHEET 4 OF 15) CONSTRUCT WB MEDIAN CROSSOVERS INCLUDING DRAINAGE AND GUARDRAIL AS FOLLOWS: (SEE CONSTRUCTION PLANS, TMP-7 AND 8, AND LOCAL NOTE 1)

- STA. 11+46 +/- -DETWB- TO STA. 22+11 +/- -DETWB-
- STA. 30+07 +/- -DETWB- TO STA. 41+75 +/- -DETWB-

COMPLETE THE WORK OF PHASE I, STEP 10 BETWEEN 8:00 P.M. FRIDAY AND 6:00 A.M. THE FOLLOWING MONDAY MORNING. (SEE INTERMEDIATE CONTRACT TIME AND LIQUIDATED DAMAGES)

STEP 10. INSTALL AND ACTIVATE QUEUE WARNING MESSAGE BOARDS (SEE LOCAL NOTE 4)

- USING RSD 1101.02 (SHEET 4 OF 15) AND LOCAL NOTE 1, CLOSE THE INSIDE WB LANE OF I-40. MASK AND TIE IN THE INSIDE LANE OF -DETWB- AND INSTALL TEMPORARY "PERFORMANCE" SKIP LINE AND WHITE EDGELINE.

- USING RSD 1101.03 (SHEET 9 OF 9) PACE TRAFFIC IN A MANNER THAT ALLOWS REVERSAL OF RSD 1101.02 (SHEET 4 OF 15) TO CLOSE THE OUTSIDE WB LANE OF I-40 AND SHIFT TRAFFIC TO THE INSIDE LANE OF -DETWB-.

MASK AND TIE IN THE OUTSIDE LANE OF -DETWB- AND INSTALL TEMPORARY "PERFORMANCE" YELLOW EDGELINE. REMOVE THE LANE CLOSURE AND OPEN -DETWB- TO 2 LANE TRAFFIC.

PHASE II

STEP 1. AWAY FROM TRAFFIC, CONSTRUCT -LWBL-, INCLUDING BRIDGE, SHORING, APPROACHES, DRAINAGE, GUARDRAIL, AND EXISTING BRIDGE REMOVAL, UP TO BUT NOT INCLUDING THE FINAL LAYER OF SURFACE COURSE (SEE CONSTRUCTION PLANS, TMP-9, TMP-10, AND TMP-10A):

- STA. 19+75+/- -LWBL- TO STA. 32+50+/- -LWBL-

- AWAY FROM TRAFFIC AND USING RSD 1101.02 (SHEET 4 OF 15), WIDEN -LWBL- UP TO BUT NOT INCLUDING THE FINAL LAYER OF SURFACE COURSE AS FOLLOWS (SEE CONSTRUCTION PLANS, TMP-9, AND TMP-10):

- STA. 15+50+/- -LWBL-(LT) TO STA. 19+75+/- -LWBL-(LT)
- STA. 32+50+/- -LWBL-(LT) TO STA. 36+50+/- -LWBL-(LT)

STEP 2. AWAY FROM TRAFFIC AND USING RSD 1101.02 (SHEET 4 OF 15), PAVE/ WEDGE -LWBL- UP TO BUT NOT INCLUDING THE FINAL LAYER OF SURFACE COURSE (SEE CONSTRUCTION PLANS, TMP-9 AND TMP-10):

- STA. 17+40+/- -LWBL- TO STA. 19+75+/- -LWBL-
- STA. 32+50+/- -LWBL- TO STA. 34+30+/- -LWBL-

PHASE III

STEP 1. AWAY FROM TRAFFIC, PLACE WORK ZONE "PERFORMANCE" PAVEMENT MARKINGS AND MARKERS AS FOLLOWS (SEE TMP-11, TMP-12, AND SPECIAL PROVISION):

- STA. 17+40+/- -LWBL- TO STA. 34+30+/- -LWBL-

COMPLETE THE WORK OF PHASE III, STEP 2 BETWEEN 8:00 P.M. FRIDAY AND 6:00 A.M. THE FOLLOWING MONDAY MORNING. (SEE INTERMEDIATE CONTRACT TIME AND LIQUIDATED DAMAGES)

STEP 2. INSTALL AND ACTIVATE QUEUE WARNING MESSAGE BOARDS (SEE LOCAL NOTE 4)

- USING RSD 1101.02 (SHEET 4 OF 15) AND LOCAL NOTE 1, CLOSE THE OUTSIDE WB LANE OF -DETWB-.

PAVE/WEDGE THE INSIDE WB LANE AS FOLLOWS:

- STA. 15+50 +/- -LWBL- TO STA. 17+40 +/- -LWBL-
- STA. 34+30 +/- -LWBL- TO STA. 36+50 +/- -LWBL-

MASK AND TIE IN THE OUTSIDE LANE OF -LWBL- AND INSTALL TEMPORARY "PERFORMANCE" SKIP LINE AND WHITE EDGELINE.

- USING RSD 1101.03 (SHEET 9 OF 9) PACE TRAFFIC IN A MANNER THAT ALLOWS REVERSAL OF RSD 1101.02 (SHEET 4 OF 15) TO CLOSE THE INSIDE WB LANE OF -DETWB- AND SHIFT TRAFFIC TO THE OUTSIDE LANE OF -LWBL-.

MASK AND TIE IN THE INSIDE LANE OF -LWBL- AND INSTALL TEMPORARY "PERFORMANCE" YELLOW EDGELINE. REMOVE THE LANE CLOSURE AND OPEN -LWBL- TO 2 LANE TRAFFIC.

STEP 3. AWAY FROM TRAFFIC, CONSTRUCT -LEBL-, INCLUDING BRIDGE, SHORING, APPROACHES, DRAINAGE, GUARDRAIL, AND EXISTING BRIDGE REMOVAL, UP TO BUT NOT INCLUDING THE FINAL LAYER OF SURFACE COURSE (SEE CONSTRUCTION PLANS, TMP-11, TMP-12, AND TMP-12A):

- STA. 22+00+/- -LEBL- TO STA. 30+50+/- -LEBL-

- AWAY FROM TRAFFIC AND USING RSD 1101.02 (SHEET 4 OF 15), PAVE/ WEDGE -LEBL- UP TO BUT NOT INCLUDING THE FINAL LAYER OF SURFACE COURSE (SEE CONSTRUCTION PLANS, TMP-11 AND TMP-12):

- STA. 20+00+/- -LEBL- TO STA. 22+00+/- -LEBL-
- STA. 30+50+/- -LEBL- TO STA. 32+00+/- -LEBL-

STEP 4. USING RSD 1101.02 (SHEET 4 OF 15), REMOVE CROSS-OVERS, (SEE TMP-11, TMP-12, GENERAL NOTE J, AND LOCAL NOTE 1).

- UNCOVER AND COMPLETE MEDIAN DRAINAGE AS SHOWN ON TMP-11 AND TMP-12.

PHASE IV

STEP 1. AWAY FROM TRAFFIC, PLACE WORK ZONE "PERFORMANCE" PAVEMENT MARKINGS AND MARKERS AS FOLLOWS (SEE TMP-13, TMP-14, AND SPECIAL PROVISION):

- STA. 22+00+/- -LEBL- TO STA. 30+50+/- -LEBL-

COMPLETE THE WORK OF PHASE IV, STEP 2 BETWEEN 8:00 P.M. FRIDAY AND 6:00 A.M. THE FOLLOWING MONDAY MORNING. (SEE INTERMEDIATE CONTRACT TIME AND LIQUIDATED DAMAGES)

STEP 2. INSTALL AND ACTIVATE QUEUE WARNING MESSAGE BOARDS (SEE LOCAL NOTE 4)

- USING RSD 1101.02 (SHEET 4 OF 15) AND LOCAL NOTE 1, CLOSE THE INSIDE LANE OF -DETEB-.

PAVE/WEDGE THE INSIDE EB LANE AS FOLLOWS:

- STA. 15+50 +/- -LEBL- TO STA. 20+00 +/- -LEBL-
- STA. 32+00 +/- -LEBL- TO STA. 36+50 +/- -LWBL-

MASK AND TIE IN THE INSIDE LANE OF -LEBL- AND INSTALL TEMPORARY "PERFORMANCE" SKIP LINE AND WHITE EDGELINE.

- USING RSD 1101.03 (SHEET 9 OF 9) PACE TRAFFIC IN A MANNER THAT ALLOWS REVERSAL OF RSD 1101.02 (SHEET 4 OF 15) TO CLOSE THE OUTSIDE LANE OF -DETWB- AND SHIFT TRAFFIC TO THE INSIDE LANE OF -LEBL-.

PAVE/WEDGE THE OUTSIDE EB LANE AS FOLLOWS:

- STA. 15+50 +/- -LEBL- TO STA. 20+00 +/- -LEBL-
- STA. 32+00 +/- -LEBL- TO STA. 36+50 +/- -LWBL-

MASK AND TIE IN THE OUTSIDE LANE OF -LEBL- AND INSTALL TEMPORARY "PERFORMANCE" YELLOW EDGELINE. REMOVE THE LANE CLOSURE AND OPEN -LEBL- TO 2 LANE TRAFFIC.

STEP 3. USING RSD 1101.02 (SHEET 4 OF 15) AND LOCAL NOTE 1, PLACE PORTABLE CONCRETE BARRIER AS FOLLOWS (SEE TMP-13 AND TMP-14):

- STA. 14+10+/- -LEBL- TO STA. 23+00+/- -LEBL-
- STA. 29+60+/- -LEBL- TO STA. 38+00+/- -LEBL-

STEP 4. AWAY FROM TRAFFIC AND USING RSD 1101.02 (SHEET 4 OF 15) AND LOCAL NOTE 1, COMPLETE -LEBL- SIDE SLOPES, REMOVE TEMPORARY SHORING, AND REMOVE TEMPORARY BRIDGE (SEE CONSTRUCTION PLANS, TMP-13, TMP-14, AND TMP-14A).

STEP 5. USING RSD 1101.02 (SHEET 4 OF 15) AND LOCAL NOTE 1, REMOVE PORTABLE CONCRETE BARRIER AS FOLLOWS (SEE TMP-13 AND TMP-14):

- STA. 14+10+/- -LEBL- TO STA. 23+00+/- -LEBL-
- STA. 29+60+/- -LEBL- TO STA. 38+00+/- -LEBL-

STEP 6. AWAY FROM TRAFFIC, COMPLETE -Y- UP TO BUT NOT INCLUDING THE FINAL LAYER OF SURFACE COURSE (SEE CONSTRUCTION PLANS AND TMP-13):

- STA. 14+31+/- -Y- TO STA. 17+02+/- -Y-

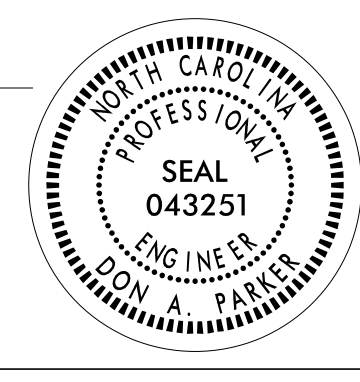
STEP 7. AWAY FROM TRAFFIC AND USING RSD 1101.02 (SHEET 1 AND 4 OF 15), PAVE THE FINAL LAYER OF SURFACE COURSE THROUGHOUT PROJECT LIMITS.

- PLACE FINAL PAVEMENT MARKINGS AND MARKERS (SEE FINAL PAVEMENT MARKING PLAN).

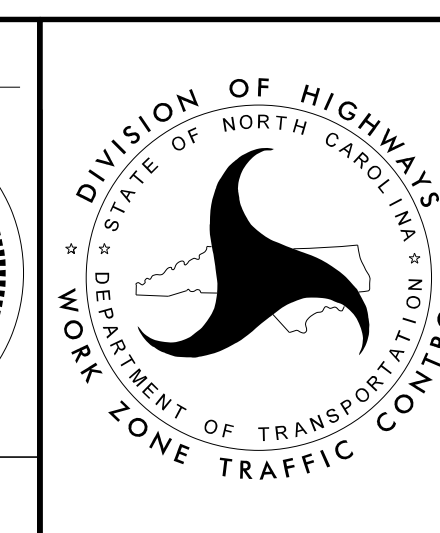
- REMOVE ALL TRAFFIC CONTROL DEVICES AND SIGNAGE FROM I-40 (WBL), I-40 (EBL), AND SR 1758 (BEREA CHURCH ROAD).

APPROVED: *Don A. Parker*
0048282618410

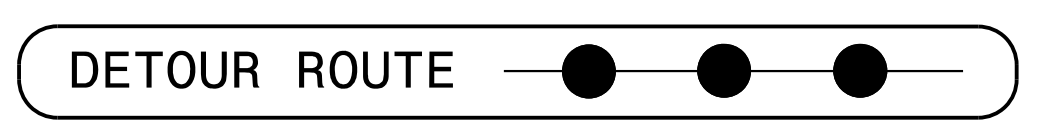
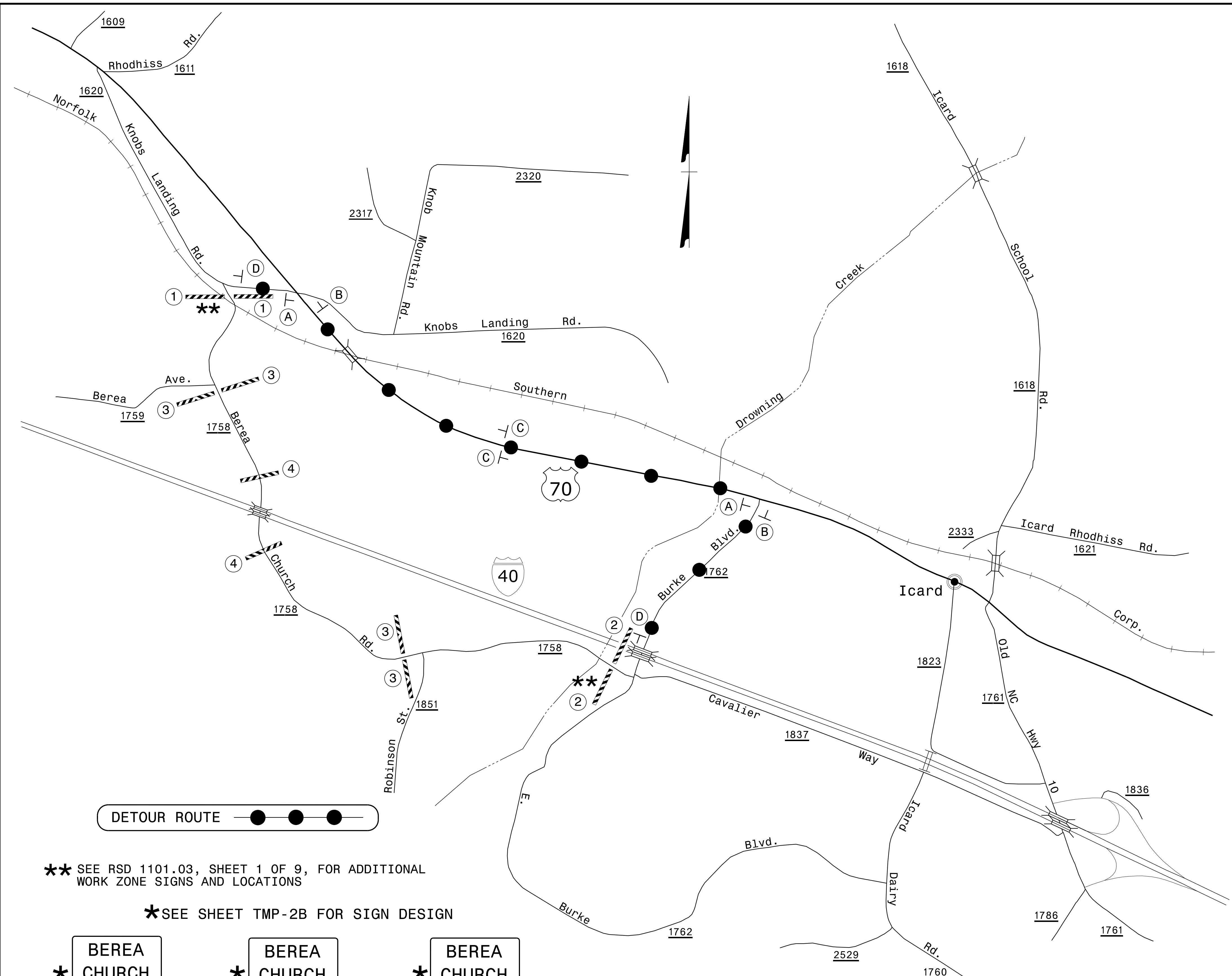
DATE: 4/26/2017



**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**

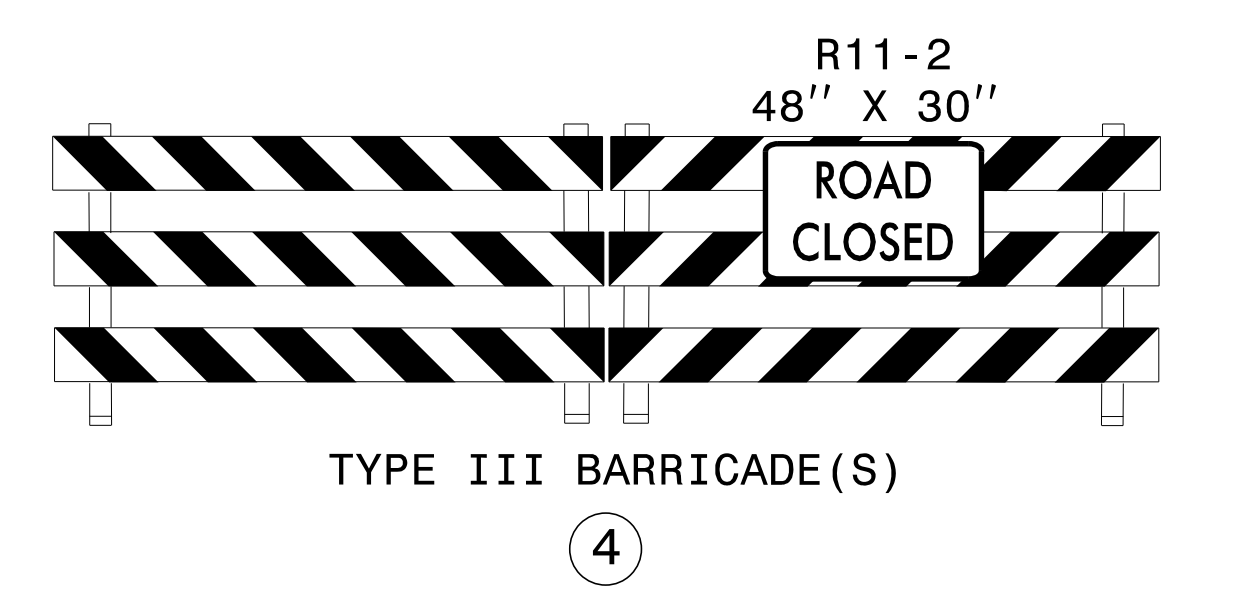
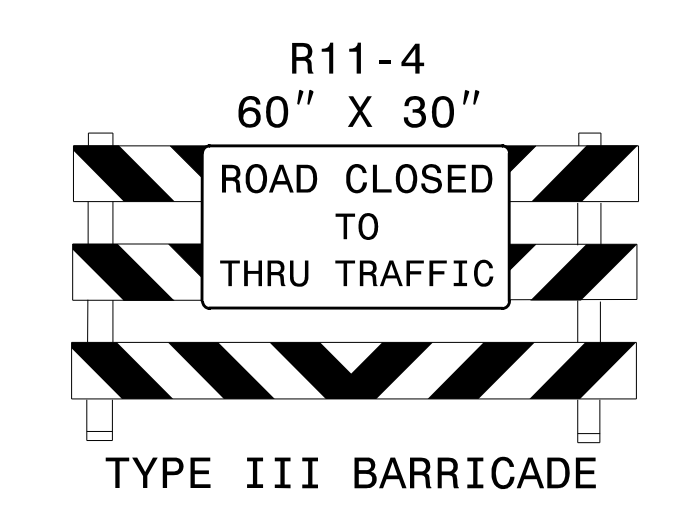
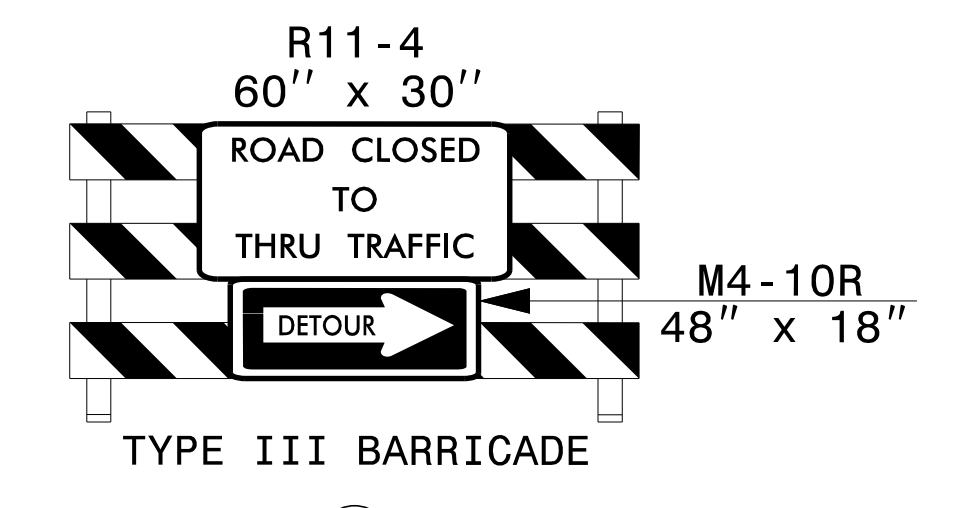
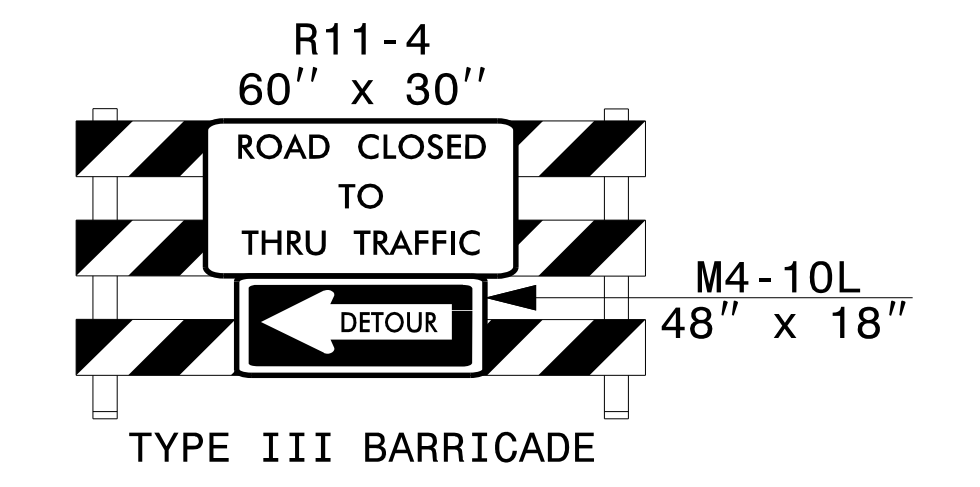
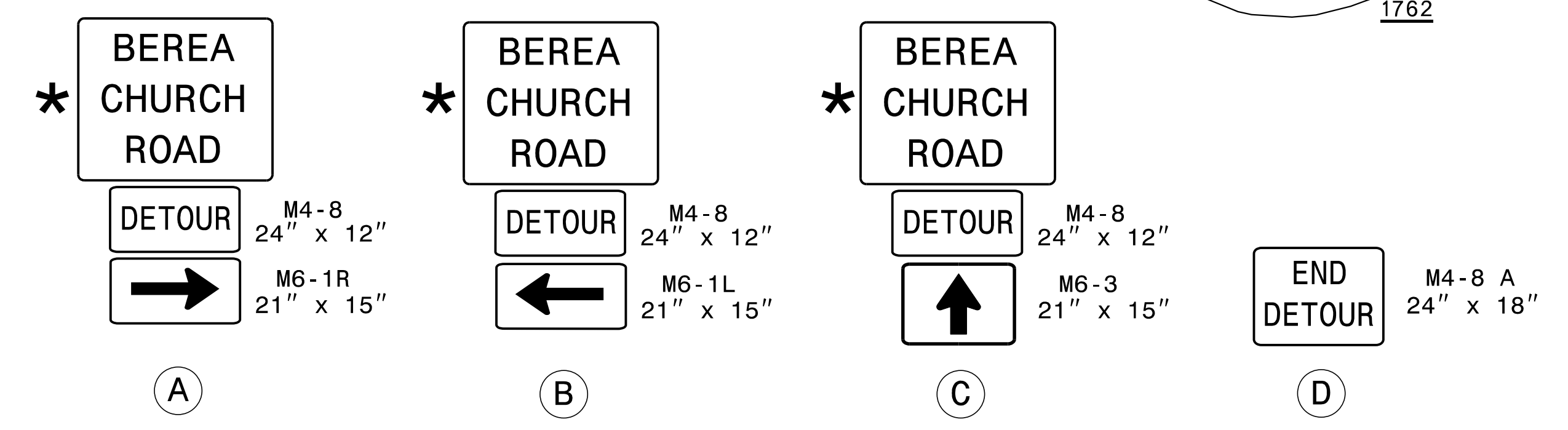


TEMPORARY TRAFFIC CONTROL PHASING



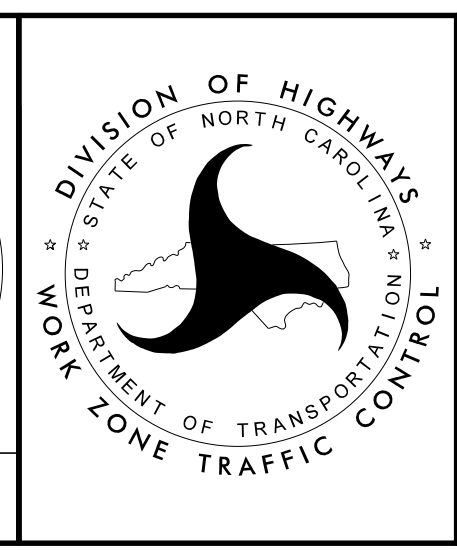
** SEE RSD 1101.03, SHEET 1 OF 9, FOR ADDITIONAL WORK ZONE SIGNS AND LOCATIONS

*SEE SHEET TMP-2B FOR SIGN DESIGN



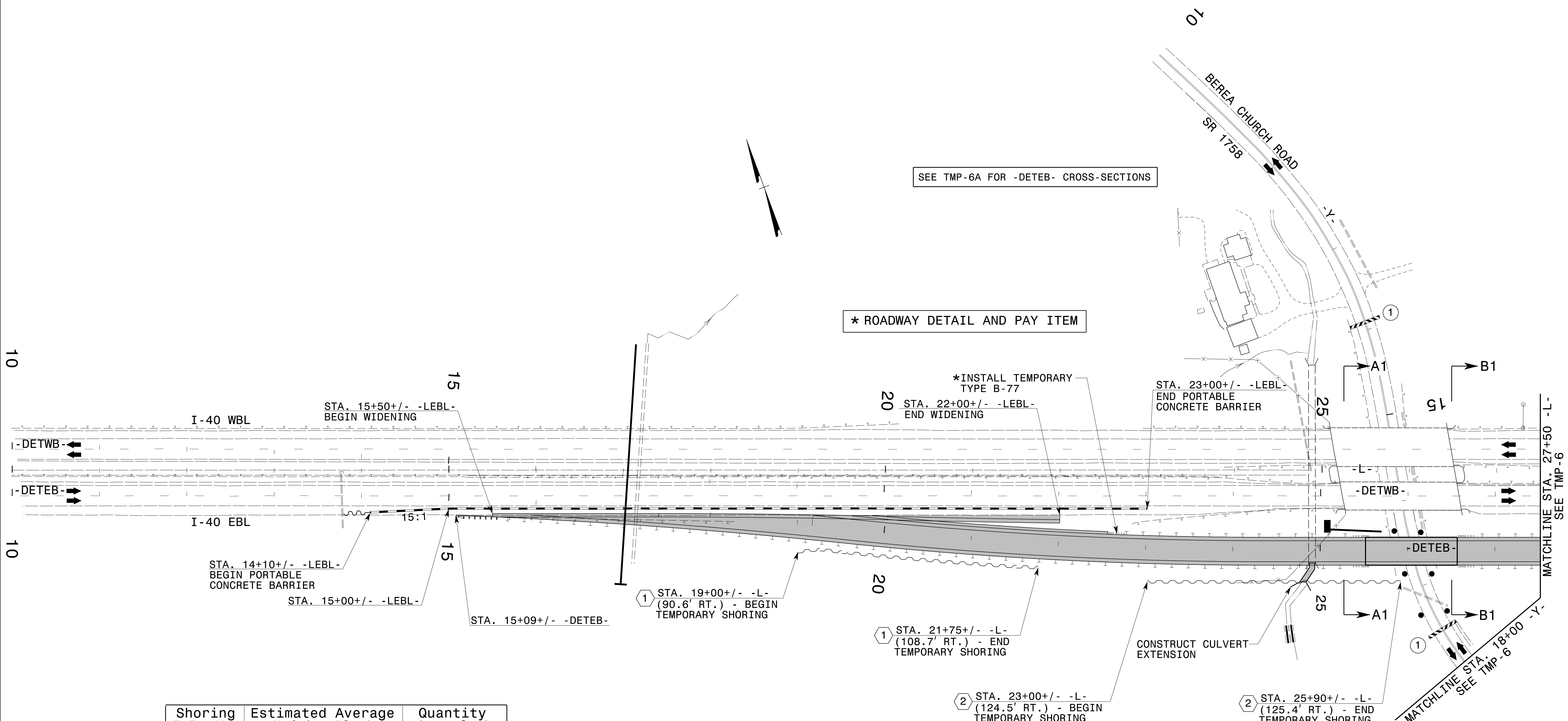
APPROVED: *Don A. Parker*
4042826219410...
 DATE: 4/26/2017

**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**



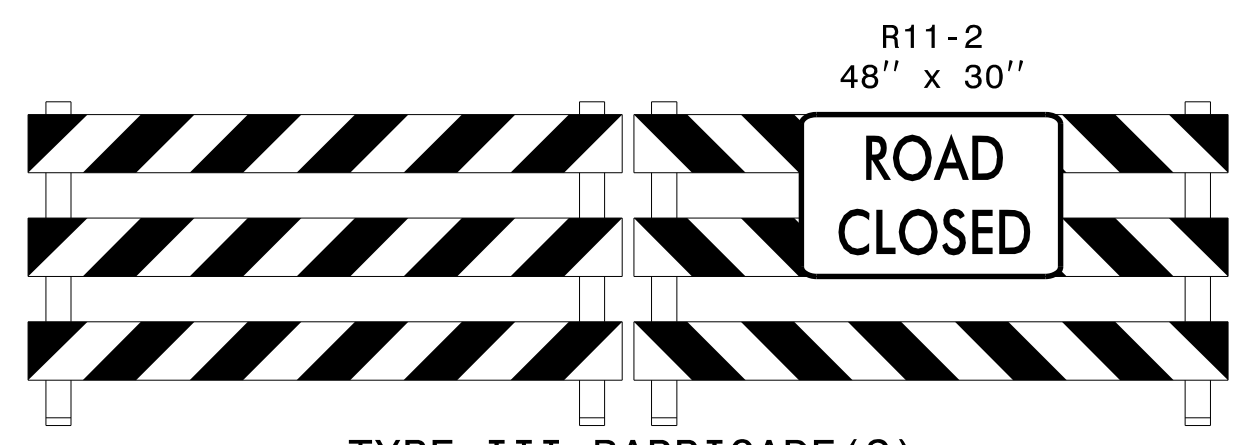
**PHASE I
OFF-SITE DETOUR
BEREA CHURCH ROAD
SR 1758
(-Y-)**

4/26/2017
 P:\TIP\Projects-B\B4447\TrafficControl\TCP\B4447_TC_PHL_TMP04.dgn
 User:scodts



Shoring I.D. No.	Estimated Average Height (ft.)	Quantity (sq. ft.)
①	9 FT.	2,475 SQ. FT.
②	21 FT.	6,090 SQ. FT.

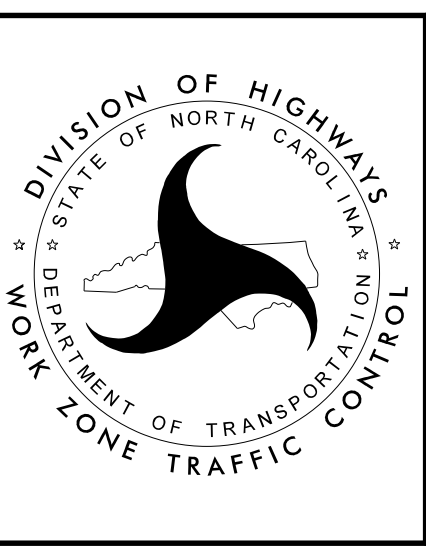
SEE TMP-4 FOR OFF-SITE DETOUR



TYPE III BARRICADE(S)
①

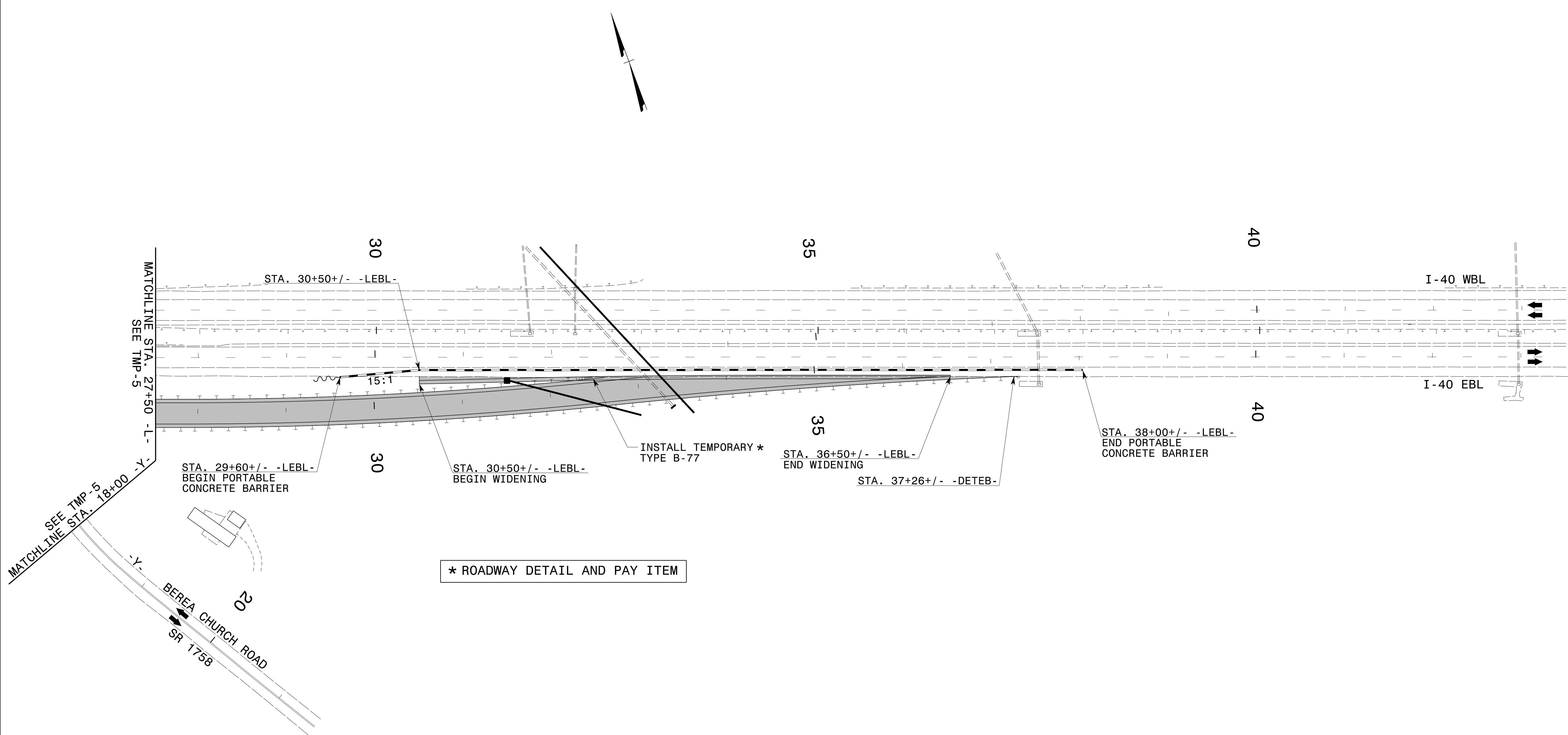
APPROVED: *Don A. Parker*
DATE: 4/26/2017

**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**



**PHASE I DETAILS
STEP 3**

4/26/2017 P:\TIP\Projects-B\B4447\TrafficControl\TCP\B4447_TC_Phi_TMP05.dgn User:scodts



MATCHLINE STA. 27+50 - L-
SEE TMP-5

MATCHLINE STA. 18+00 - Y-
SEE TMP-5

STA. 29+60+/- -LEBL-
BEGIN PORTABLE
CONCRETE BARRIER

STA. 30+50+/- -LEBL-
BEGIN WIDENING

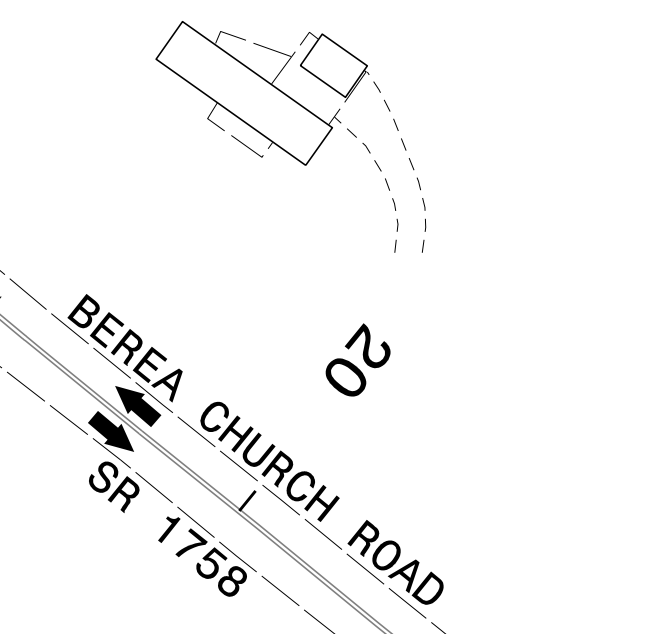
INSTALL TEMPORARY *
TYPE B-77

STA. 36+50+/- -LEBL-
END WIDENING

STA. 37+26+/- -DETEB-

STA. 38+00+/- -LEBL-
END PORTABLE
CONCRETE BARRIER

* ROADWAY DETAIL AND PAY ITEM

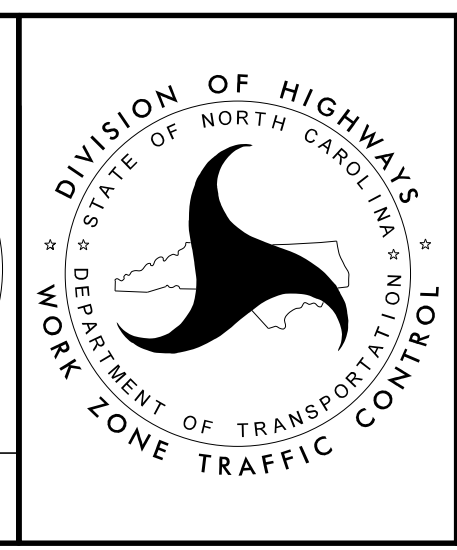


4/26/2017
 P:\TIP\Projects-B\B4447\TrafficControl\TCP\B4447_TC_PHL_TMP06.dgn
 User:scodts

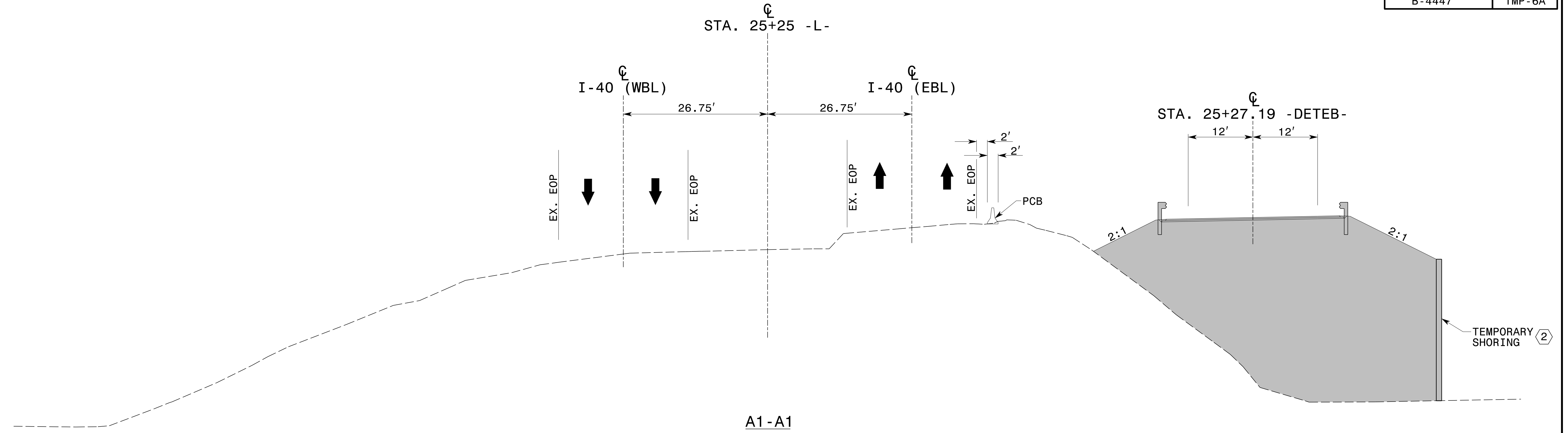
APPROVED: *Don A. Parker*
400482802618410...

DATE: 4/26/2017

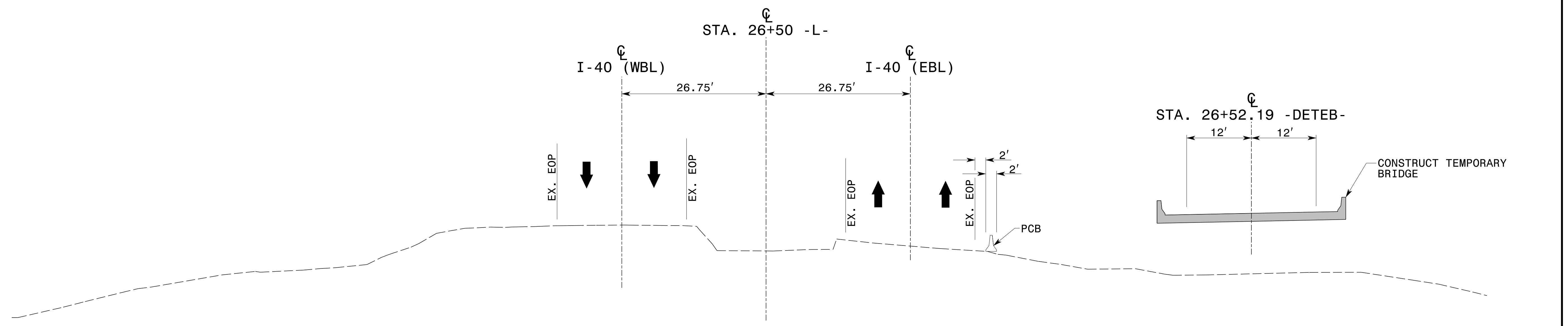
**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**



**PHASE I DETAILS
STEP 3**



A1-A1

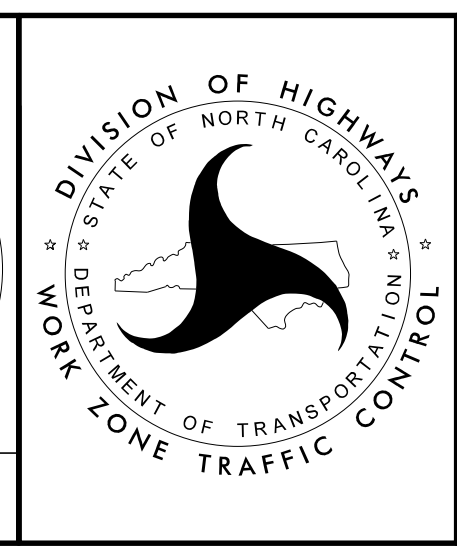


B1-B1

4/26/2017
 P:\TIP\Projects-B\B4447\TrafficControl\TCP\B4447_TC_Phi_TMP06A.dgn
 User:scodts

APPROVED: *Don A. Parker*
 DATE: 4/26/2017

**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**



**PHASE I
-DETEB-
CROSS-SECTIONS
STEP 3**

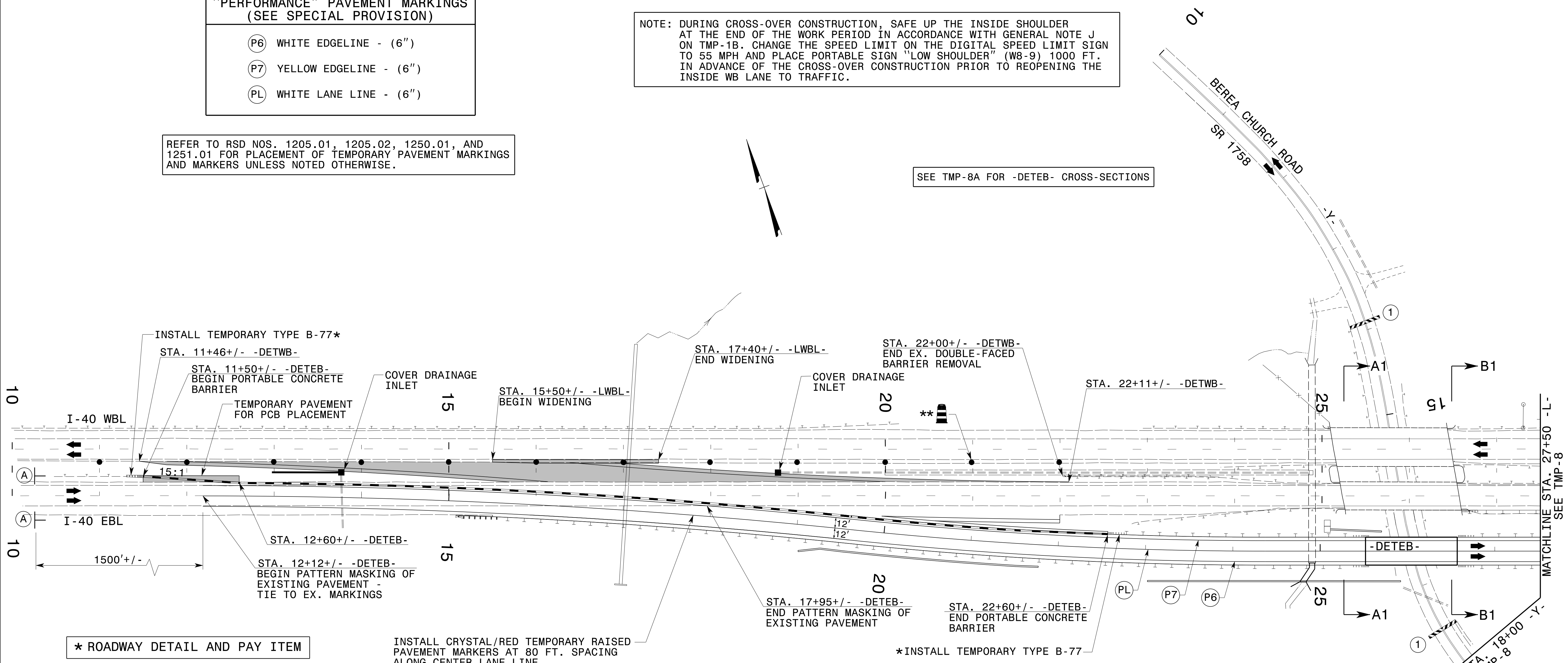
**TEMPORARY WORK ZONE
"PERFORMANCE" PAVEMENT MARKINGS
(SEE SPECIAL PROVISION)**

- (P6) WHITE EDGELINE - (6")
- (P7) YELLOW EDGELINE - (6")
- (PL) WHITE LANE LINE - (6")

NOTE: DURING CROSS-OVER CONSTRUCTION, SAFE UP THE INSIDE SHOULDER AT THE END OF THE WORK PERIOD IN ACCORDANCE WITH GENERAL NOTE J ON TMP-1B. CHANGE THE SPEED LIMIT ON THE DIGITAL SPEED LIMIT SIGN TO 55 MPH AND PLACE PORTABLE SIGN "LOW SHOULDER" (W8-9) 1000 FT. IN ADVANCE OF THE CROSS-OVER CONSTRUCTION PRIOR TO REOPENING THE INSIDE WB LANE TO TRAFFIC.

REFER TO RSD NOS. 1205.01, 1205.02, 1250.01, AND 1251.01 FOR PLACEMENT OF TEMPORARY PAVEMENT MARKINGS AND MARKERS UNLESS NOTED OTHERWISE.

SEE TMP-8A FOR -DETEB- CROSS-SECTIONS

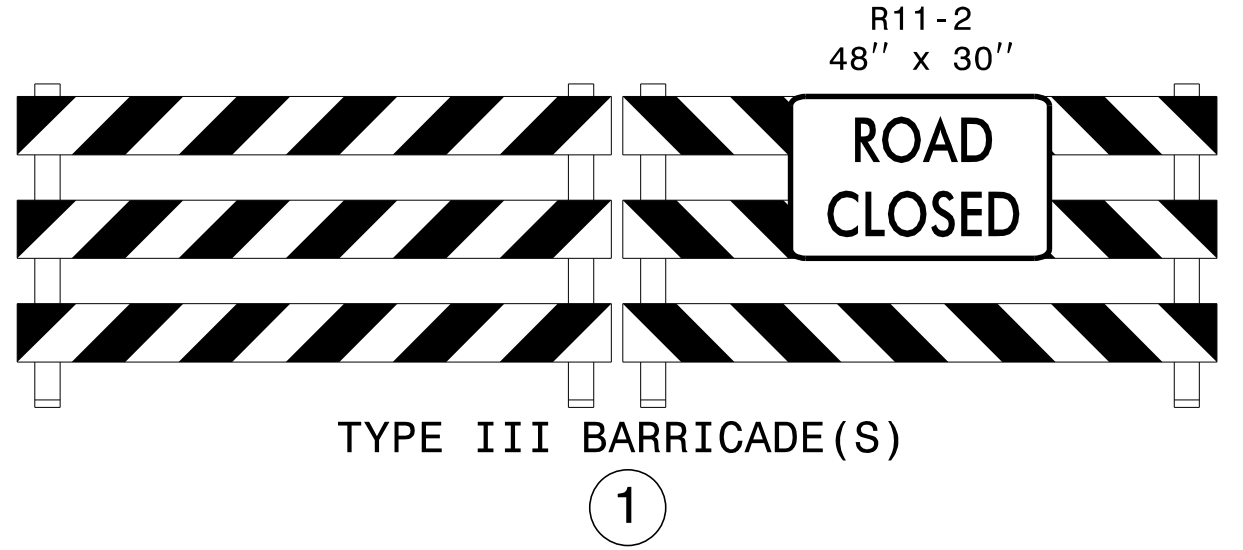
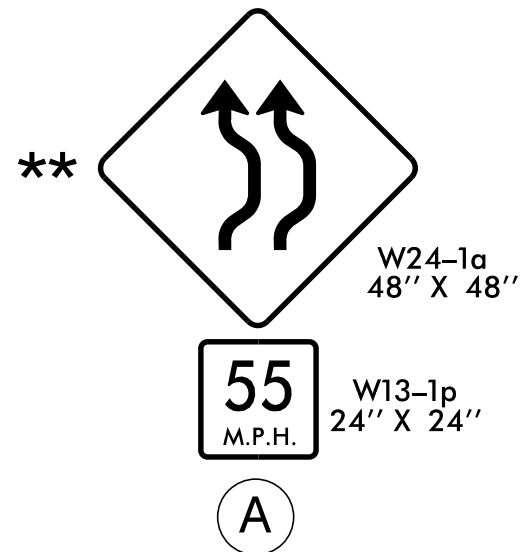


* ROADWAY DETAIL AND PAY ITEM

INSTALL CRYSTAL/RED TEMPORARY RAISED PAVEMENT MARKERS AT 80 FT. SPACING ALONG CENTER LANE LINE

*INSTALL TEMPORARY TYPE B-77

** SEE HIGH VISIBILITY DEVICES SPECIAL PROVISION

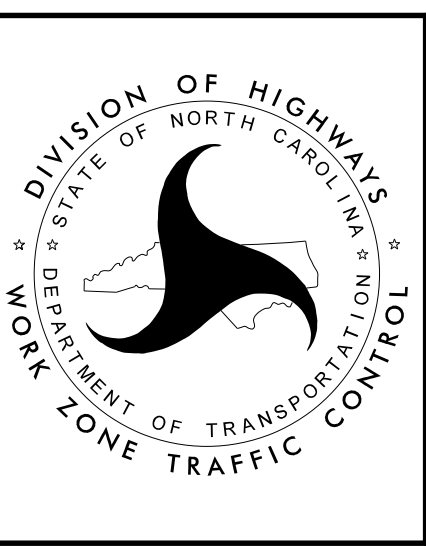


4/26/2017 P:\TIP\Projects-B\B4447\TrafficControl\TCP\B4447_TC_Ph2_TMP07.dgn User:scodts

APPROVED: *Don A. Parker*
DATE: 4/26/2017

Professional Engineer Seal: DON A. PARKER, ENGINEER, SEAL 043251, NORTH CAROLINA PROFESSIONAL ENGINEERS

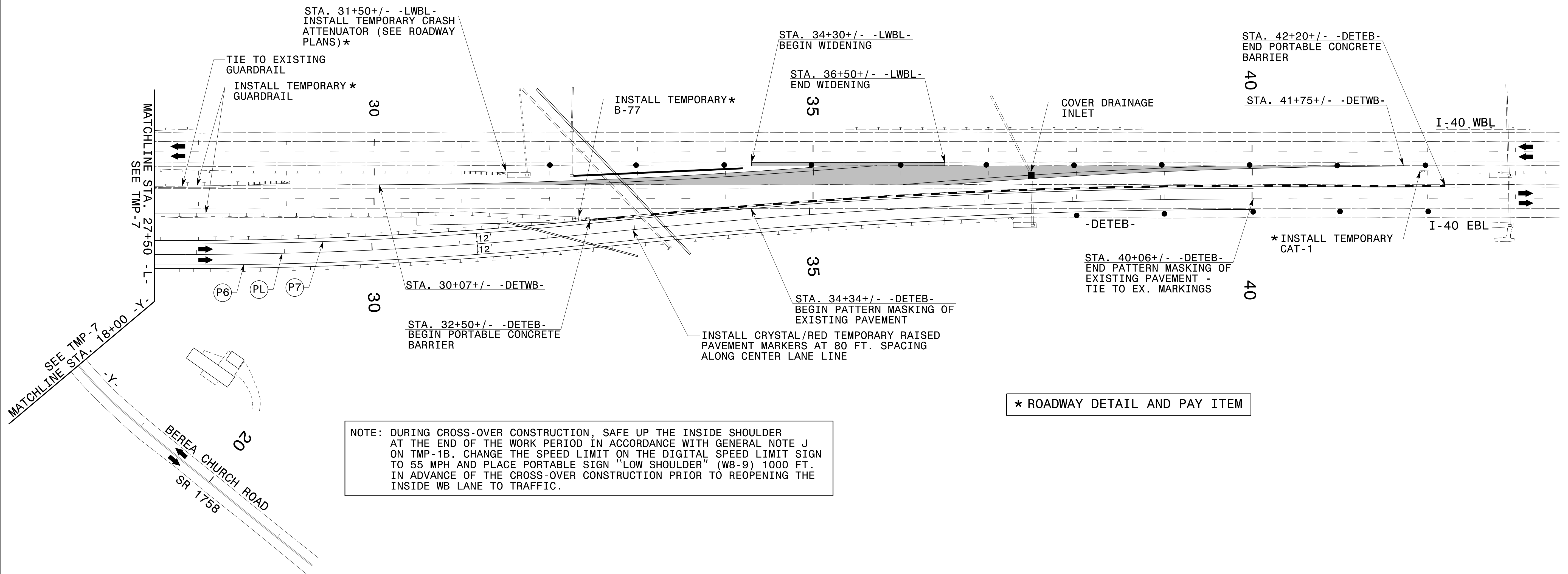
DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED



**PHASE I DETAILS
STEP 6**

TEMPORARY WORK ZONE "PERFORMANCE" PAVEMENT MARKINGS (SEE SPECIAL PROVISION)	
(P6)	WHITE EDGELINE - (6")
(P7)	YELLOW EDGELINE - (6")
(PL)	WHITE LANE LINE - (6")

REFER TO RSD NOS. 1205.01, 1205.02, 1250.01, AND 1251.01 FOR PLACEMENT OF TEMPORARY PAVEMENT MARKINGS AND MARKERS UNLESS NOTED OTHERWISE.



NOTE: DURING CROSS-OVER CONSTRUCTION, SAFE UP THE INSIDE SHOULDER AT THE END OF THE WORK PERIOD IN ACCORDANCE WITH GENERAL NOTE J ON TMP-1B. CHANGE THE SPEED LIMIT ON THE DIGITAL SPEED LIMIT SIGN TO 55 MPH AND PLACE PORTABLE SIGN "LOW SHOULDER" (W8-9) 1000 FT. IN ADVANCE OF THE CROSS-OVER CONSTRUCTION PRIOR TO REOPENING THE INSIDE WB LANE TO TRAFFIC.

* ROADWAY DETAIL AND PAY ITEM

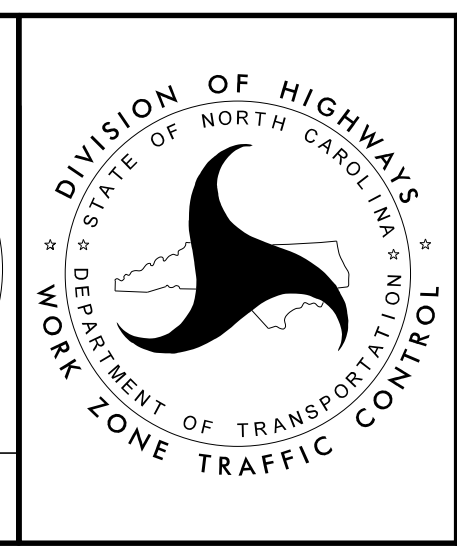
4/26/2017 P:\TIP\Projects-B\B4447\TrafficControl\TCP\B4447_TC_Ph2_TMP08.dgn User:scodts

APPROVED: *Don A. Parker*
40482802618410

DATE: 4/26/2017

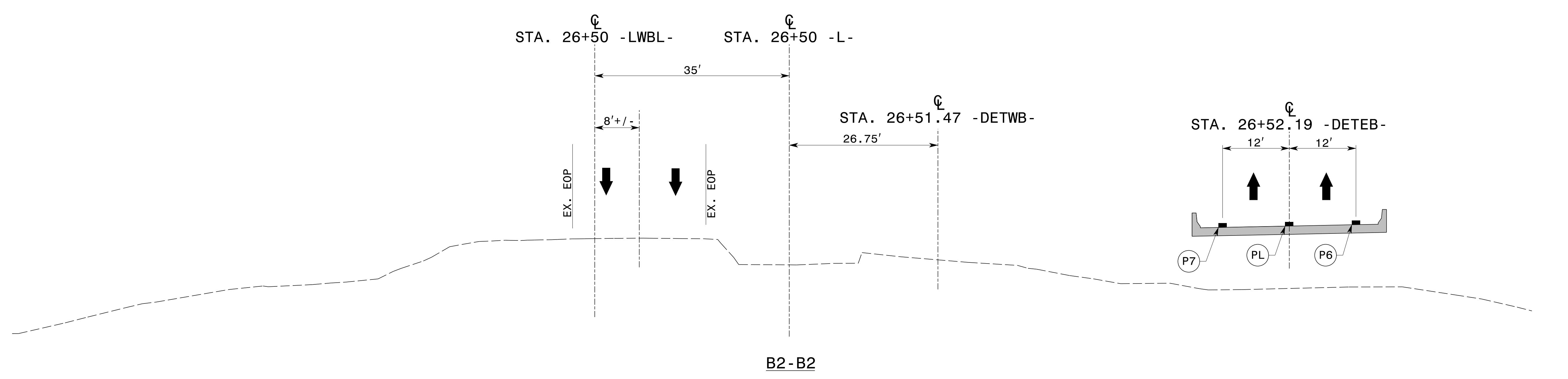
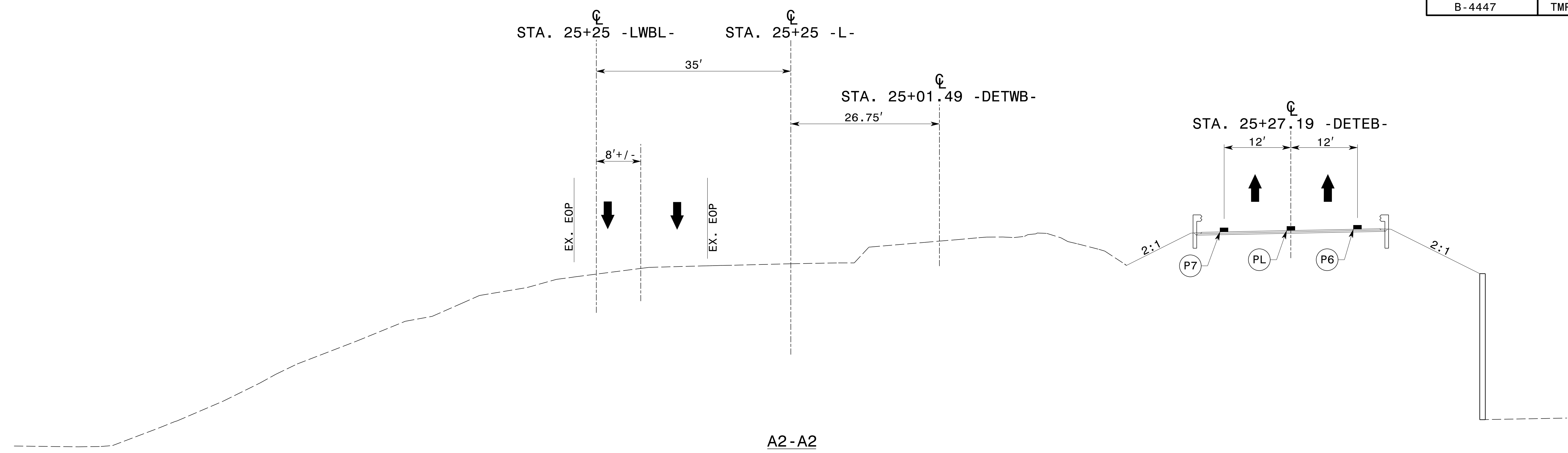
SEAL
 043251
 ENGINEER
 DON A. PARKER

**DOCUMENT NOT CONSIDERED FINAL
 UNLESS ALL SIGNATURES COMPLETED**

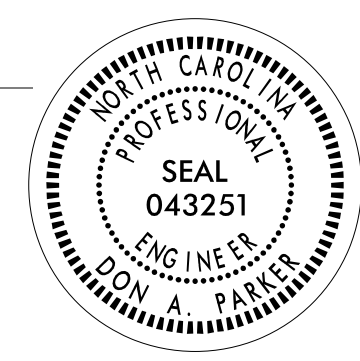


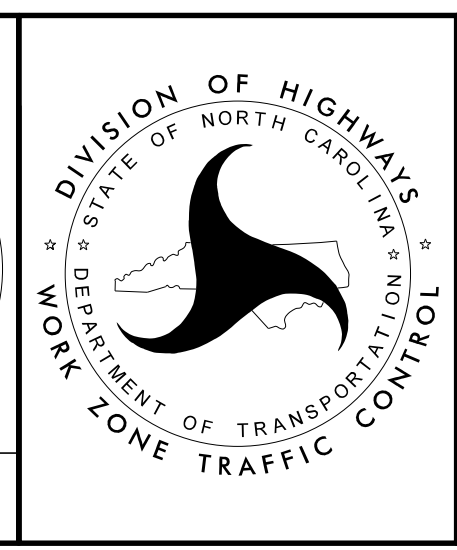
**PHASE I DETAILS
 STEP 6**

DEPARTMENT OF TRANSPORTATION & INFRASTRUCTURE
 DIVISION OF HIGHWAYS
 STATE OF NORTH CAROLINA
 WORK ZONE TRAFFIC CONTROL



4/26/2017
 P:\TIP\Projects-B\B4447\TrafficControl\TCP\B4447_TC_Ph2_TMP8A.dgn
 User:scodts

APPROVED: *Don A. Parker*
 DATE: 4/26/2017

**DOCUMENT NOT CONSIDERED FINAL
 UNLESS ALL SIGNATURES COMPLETED**

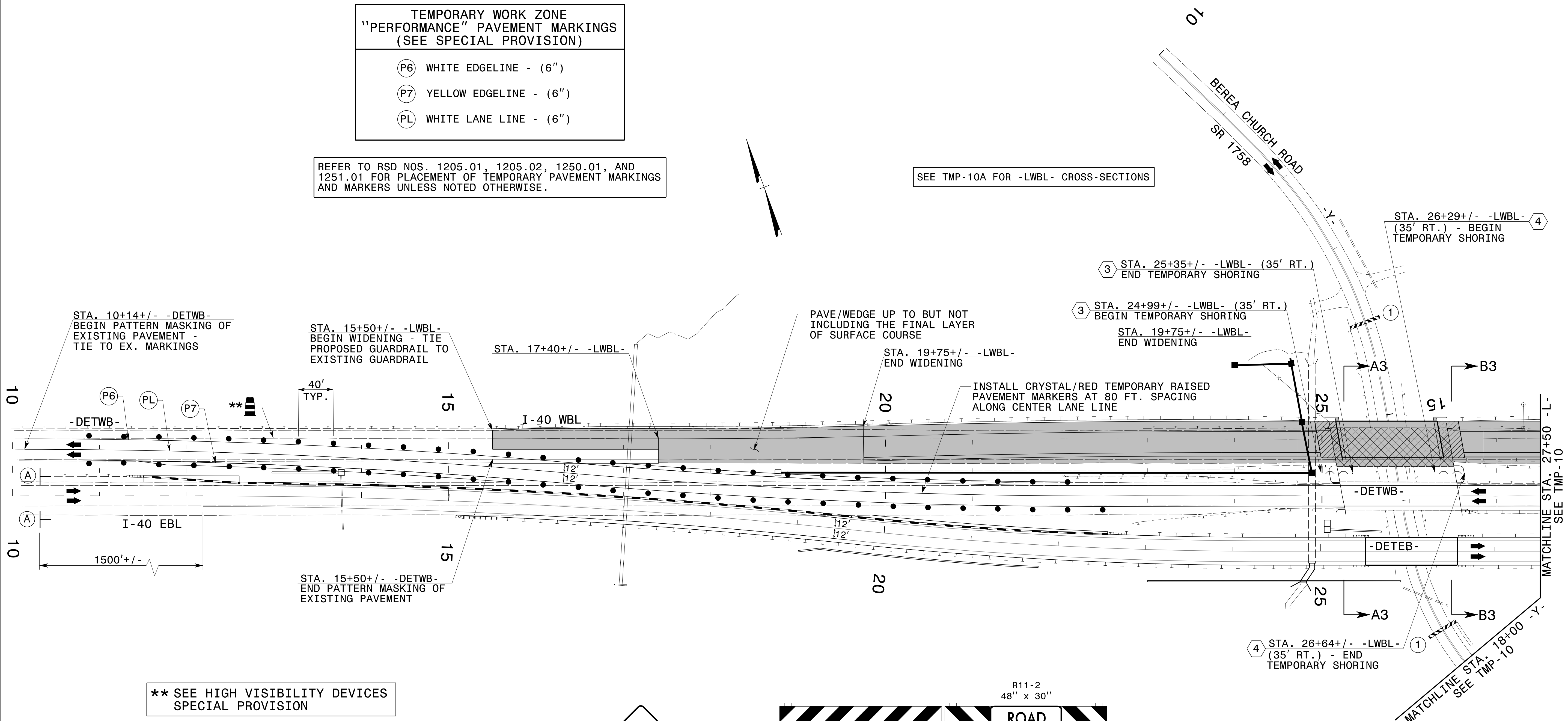


**PHASE I
 -DETEB-
 CROSS-SECTIONS
 STEP 6**

TEMPORARY WORK ZONE "PERFORMANCE" PAVEMENT MARKINGS (SEE SPECIAL PROVISION)	
(P6)	WHITE EDGELINE - (6")
(P7)	YELLOW EDGELINE - (6")
(PL)	WHITE LANE LINE - (6")

REFER TO RSD NOS. 1205.01, 1205.02, 1250.01, AND 1251.01 FOR PLACEMENT OF TEMPORARY PAVEMENT MARKINGS AND MARKERS UNLESS NOTED OTHERWISE.

SEE TMP-10A FOR -LWBL- CROSS-SECTIONS



STA. 10+14+/- -DETWB-
BEGIN PATTERN MASKING OF
EXISTING PAVEMENT -
TIE TO EX. MARKINGS

STA. 15+50+/- -LWBL-
BEGIN WIDENING - TIE
PROPOSED GUARDRAIL TO
EXISTING GUARDRAIL

STA. 17+40+/- -LWBL-

PAVE/WEDGE UP TO BUT NOT
INCLUDING THE FINAL LAYER
OF SURFACE COURSE

STA. 19+75+/- -LWBL-
END WIDENING

(3) STA. 25+35+/- -LWBL- (35' RT.)
END TEMPORARY SHORING

(3) STA. 24+99+/- -LWBL- (35' RT.)
BEGIN TEMPORARY SHORING

STA. 19+75+/- -LWBL-
END WIDENING

INSTALL CRYSTAL/RED TEMPORARY RAISED
PAVEMENT MARKERS AT 80 FT. SPACING
ALONG CENTER LANE LINE

STA. 26+29+/- -LWBL- (4)
(35' RT.) - BEGIN
TEMPORARY SHORING

10
10
1500'+/-
I-40 EBL

STA. 15+50+/- -DETWB-
END PATTERN MASKING OF
EXISTING PAVEMENT

15
15

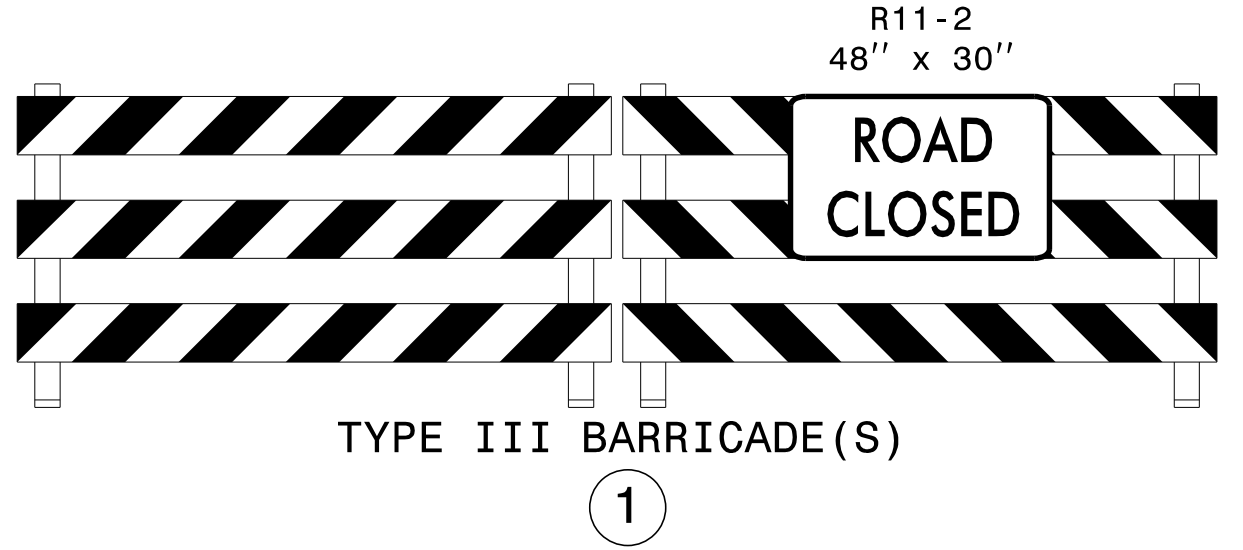
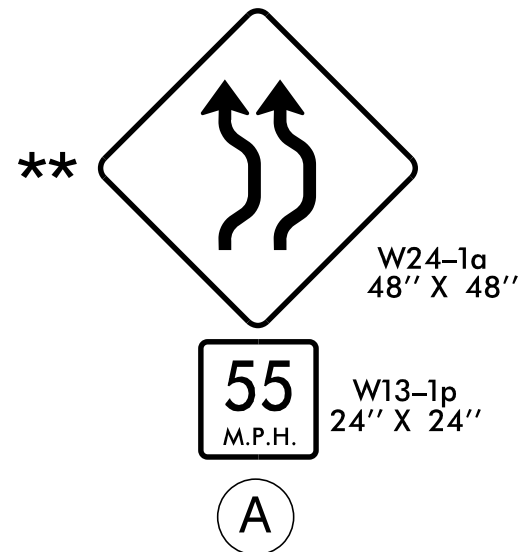
20
20

25
25

MATCHLINE STA. 27+50 -L-
SEE TMP-10

MATCHLINE STA. 18+00 -Y-
SEE TMP-10

** SEE HIGH VISIBILITY DEVICES
SPECIAL PROVISION



Shoring I.D. No.	Estimated Average Height (ft.)	Quantity (sq. ft.)
(3)	7 FT.	252 SQ. FT.
(4)	6 FT.	210 SQ. FT.

4/26/2017
P:\TIP\Projects-B\B4447\Traffic\TrafficControl\TCP\B4447_TC_Ph2_TMP09.dgn
User:scodts

APPROVED: *Don A. Parker*
DATE: 4/26/2017

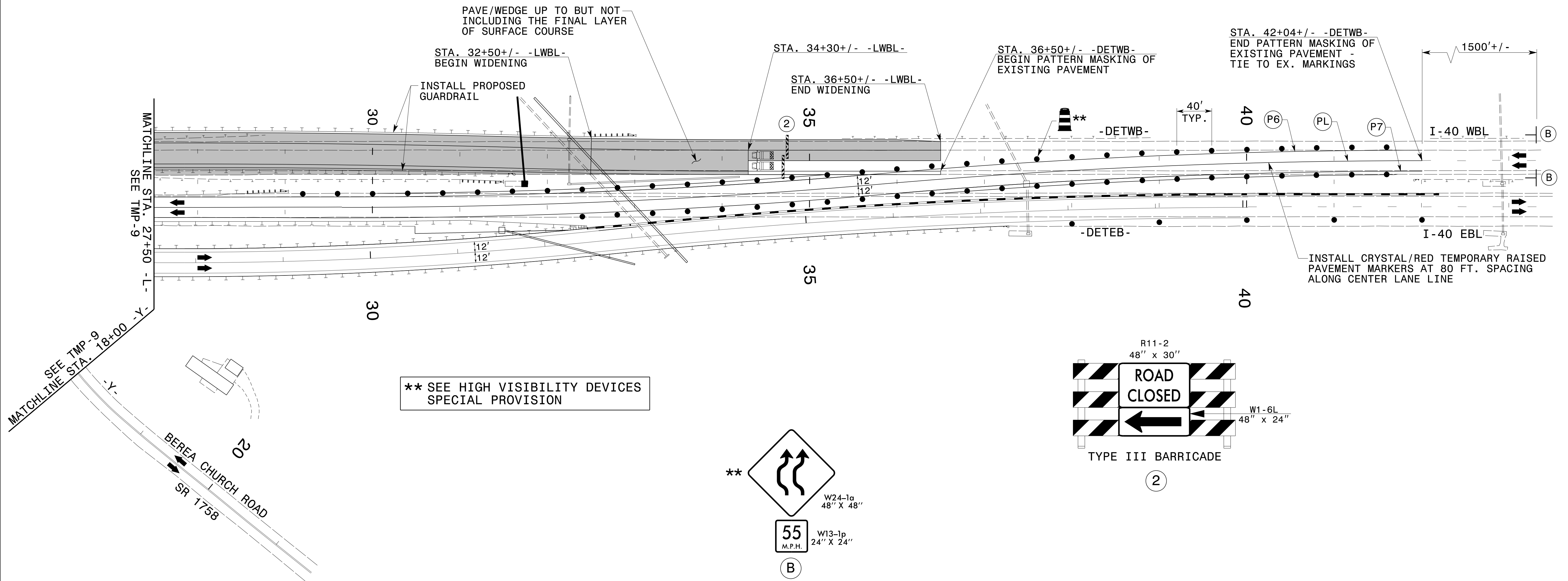
**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**





PHASE II DETAILS

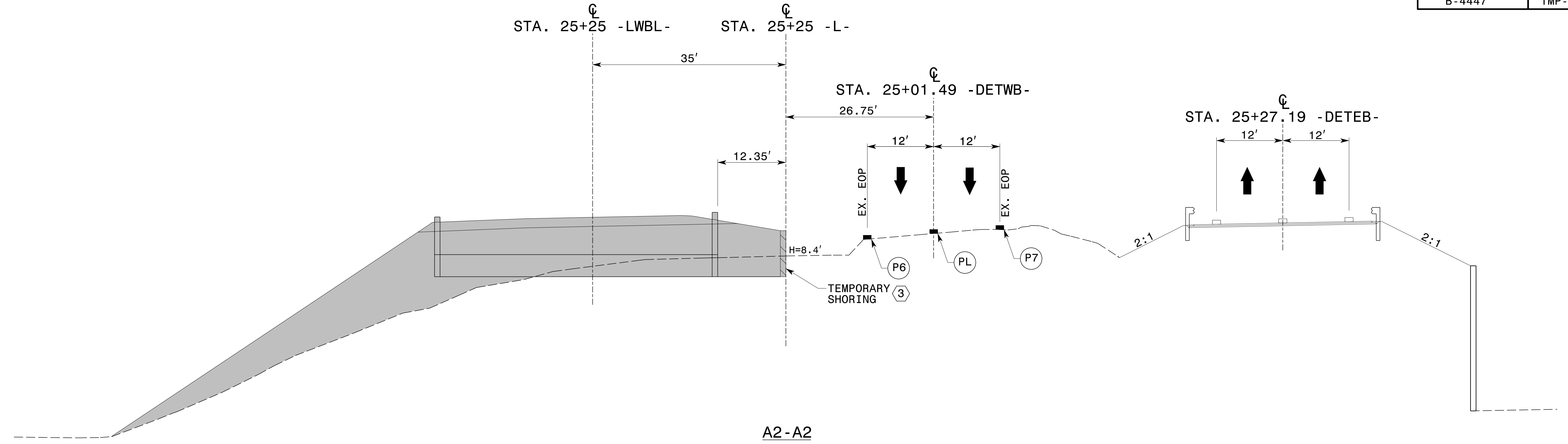
TEMPORARY WORK ZONE "PERFORMANCE" PAVEMENT MARKINGS (SEE SPECIAL PROVISION)	
(P6)	WHITE EDGELINE - (6")
(P7)	YELLOW EDGELINE - (6")
(PL)	WHITE LANE LINE - (6")

REFER TO RSD NOS. 1205.01, 1205.02, 1250.01, AND 1251.01 FOR PLACEMENT OF TEMPORARY PAVEMENT MARKINGS AND MARKERS UNLESS NOTED OTHERWISE.

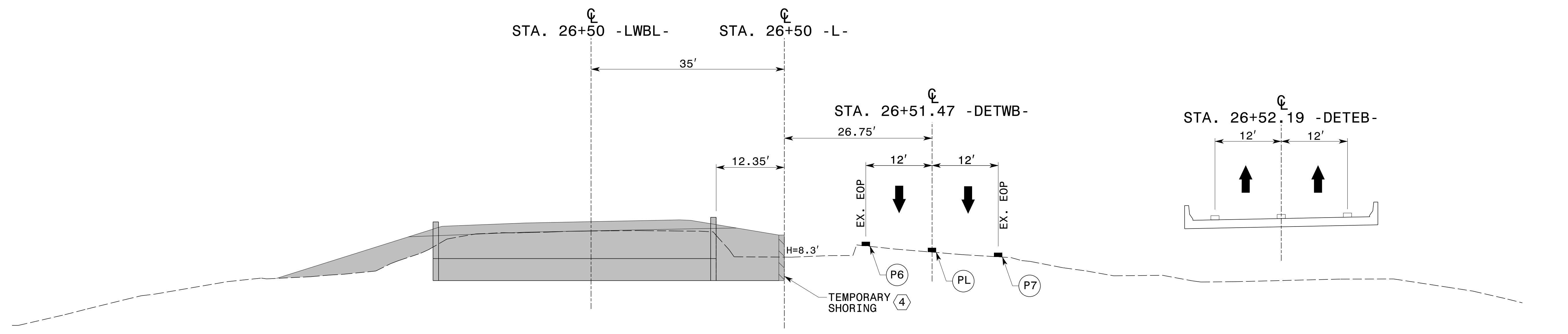


4/26/2017
 P:\TIP\Projects-B\B4447\TrafficControl\TCP\B4447_TC_Ph2_TMP10.dgn
 User:scodts

APPROVED: <i>Don A. Parker</i> <small>4048282618410</small> DATE: 4/26/2017 		<h2 style="text-align: center;">PHASE II DETAILS</h2>
DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED		

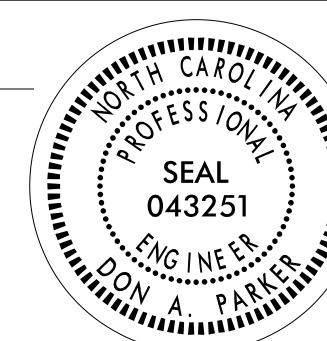


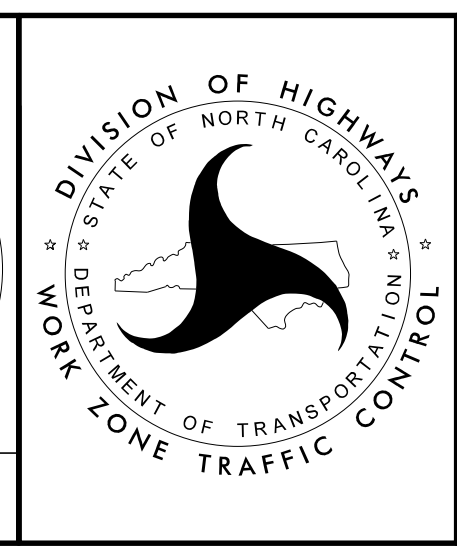
A2-A2



B2-B2

4/26/2017
 P:\TIP\Projects-B\B4447\TrafficControl\TCP\B4447_TC_Ph2_TMP10A.dgn
 User:scodts

APPROVED: *Don A. Parker*
 DATE: 4/26/2017

**DOCUMENT NOT CONSIDERED FINAL
 UNLESS ALL SIGNATURES COMPLETED**



**PHASE II
 -LWBL-
 CROSS-SECTIONS**

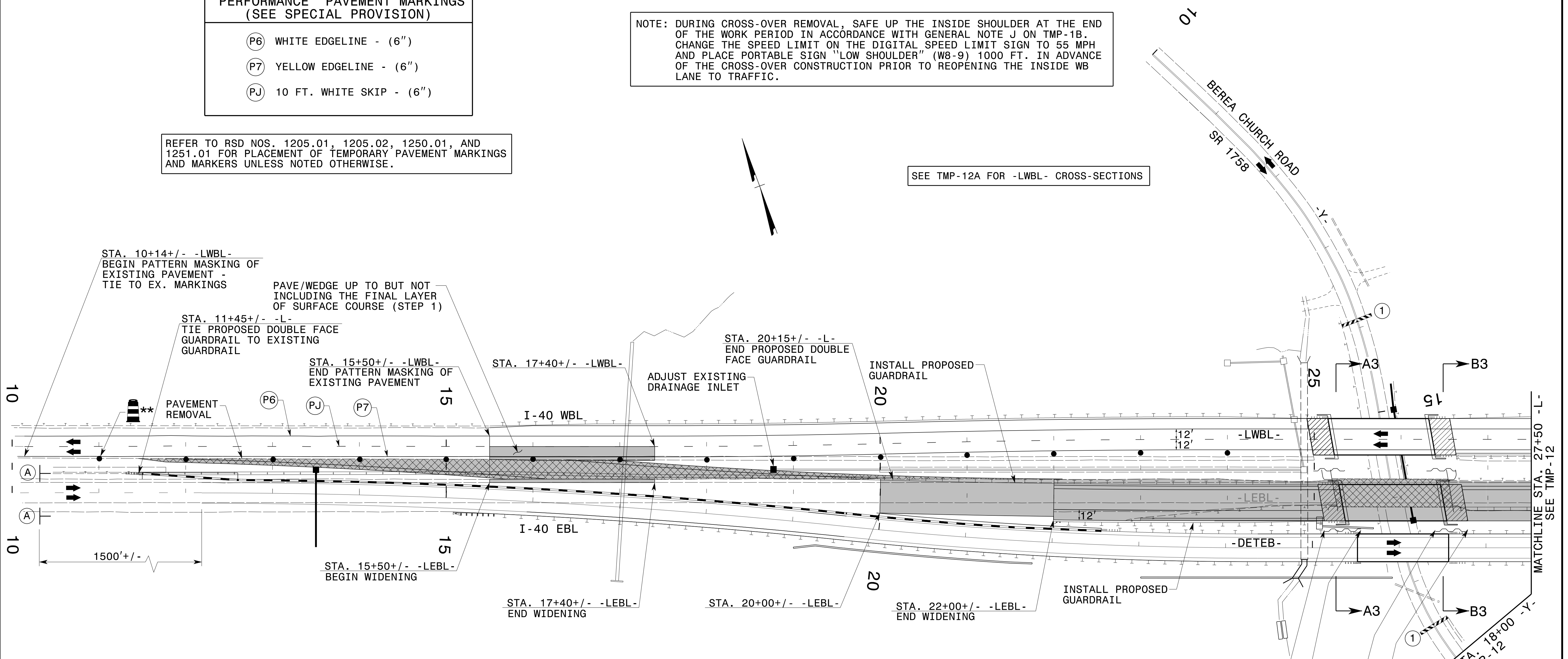
**TEMPORARY WORK ZONE
"PERFORMANCE" PAVEMENT MARKINGS
(SEE SPECIAL PROVISION)**

- (P6) WHITE EDGELINE - (6")
- (P7) YELLOW EDGELINE - (6")
- (PJ) 10 FT. WHITE SKIP - (6")

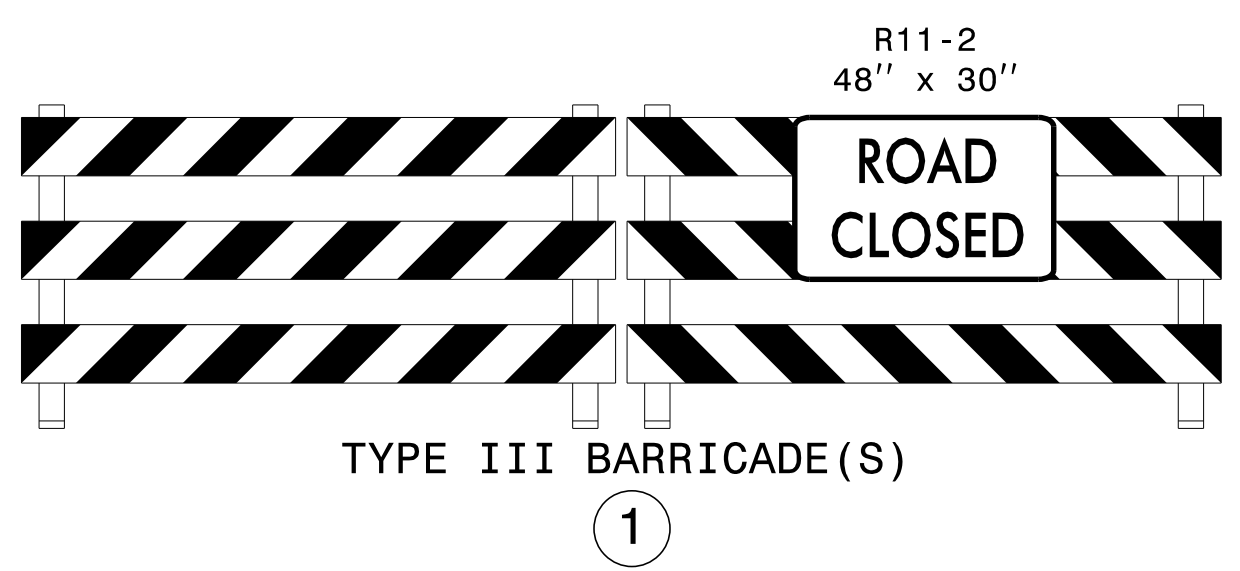
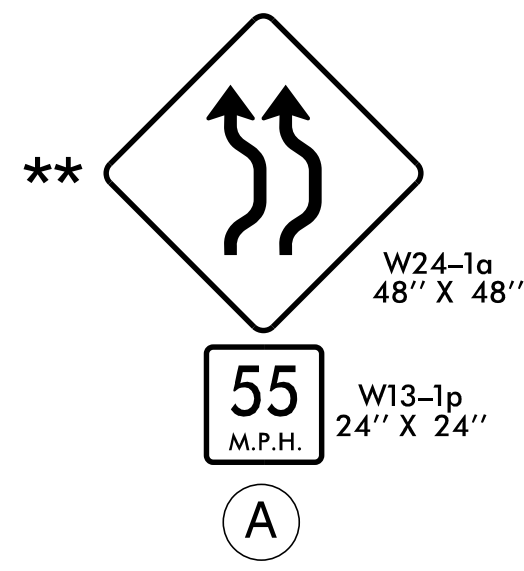
NOTE: DURING CROSS-OVER REMOVAL, SAFE UP THE INSIDE SHOULDER AT THE END OF THE WORK PERIOD IN ACCORDANCE WITH GENERAL NOTE J ON TMP-1B. CHANGE THE SPEED LIMIT ON THE DIGITAL SPEED LIMIT SIGN TO 55 MPH AND PLACE PORTABLE SIGN "LOW SHOULDER" (W8-9) 1000 FT. IN ADVANCE OF THE CROSS-OVER CONSTRUCTION PRIOR TO REOPENING THE INSIDE WB LANE TO TRAFFIC.

REFER TO RSD NOS. 1205.01, 1205.02, 1250.01, AND 1251.01 FOR PLACEMENT OF TEMPORARY PAVEMENT MARKINGS AND MARKERS UNLESS NOTED OTHERWISE.

SEE TMP-12A FOR -LWBL- CROSS-SECTIONS



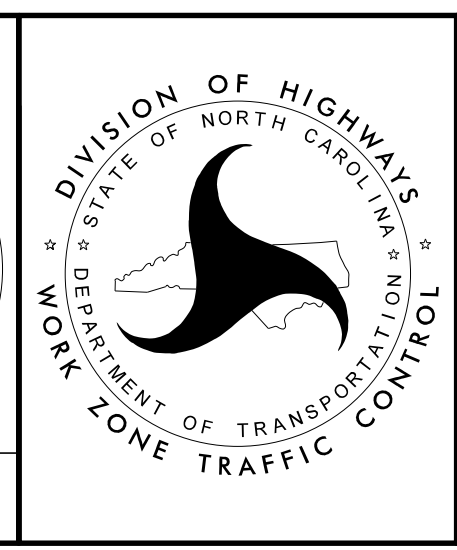
** SEE HIGH VISIBILITY DEVICES SPECIAL PROVISION



Shoring I.D. No.	Estimated Average Height (ft.)	Quantity (sq. ft.)
(5)	7 FT.	294 SQ. FT.
(6)	6 FT.	228 SQ. FT.

APPROVED: *Don A. Parker*
DATE: 4/26/2017

**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**



PHASE III DETAILS

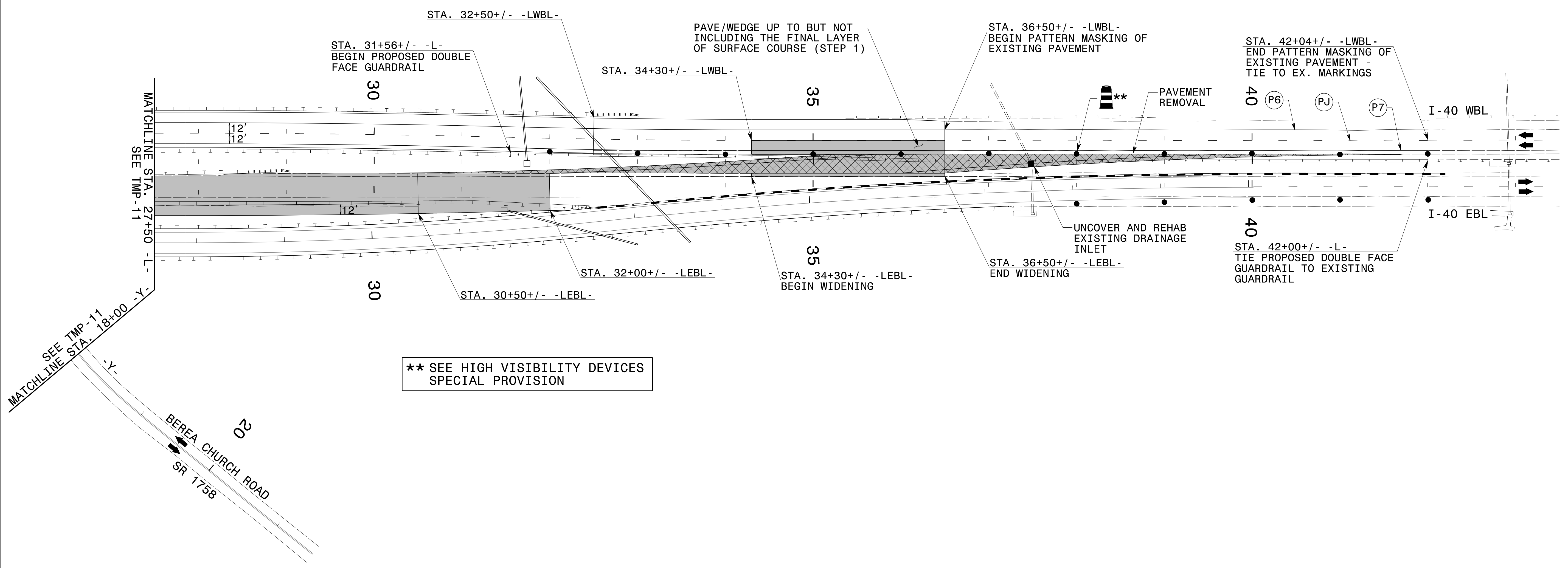
4/26/2017 P:\TIP\Projects-B\B4447\Traffic\TrafficControl\TCP\B4447_TC_Ph3_TMP11.dgn User:scodts

NOTE: DURING CROSS-OVER REMOVAL, SAFE UP THE INSIDE SHOULDER AT THE END OF THE WORK PERIOD IN ACCORDANCE WITH GENERAL NOTE J ON TMP-1B. CHANGE THE SPEED LIMIT ON THE DIGITAL SPEED LIMIT SIGN TO 55 MPH AND PLACE PORTABLE SIGN "LOW SHOULDER" (W8-9) 1000 FT. IN ADVANCE OF THE CROSS-OVER CONSTRUCTION PRIOR TO REOPENING THE INSIDE WB LANE TO TRAFFIC.

TEMPORARY WORK ZONE
"PERFORMANCE" PAVEMENT MARKINGS
(SEE SPECIAL PROVISION)

- (P6) WHITE EDGELINE - (6")
- (P7) YELLOW EDGELINE - (6")
- (PJ) 10 FT. WHITE SKIP - (6")

REFER TO RSD NOS. 1205.01, 1205.02, 1250.01, AND 1251.01 FOR PLACEMENT OF TEMPORARY PAVEMENT MARKINGS AND MARKERS UNLESS NOTED OTHERWISE.

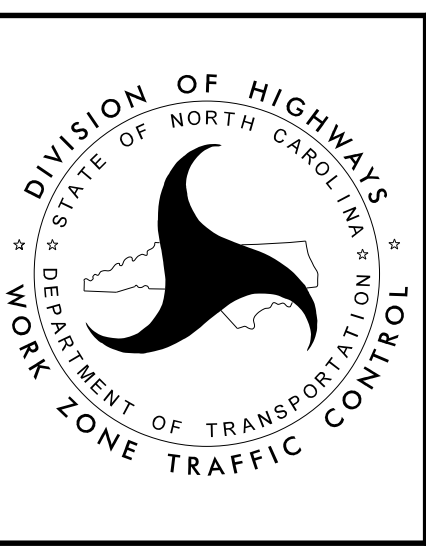


** SEE HIGH VISIBILITY DEVICES
SPECIAL PROVISION

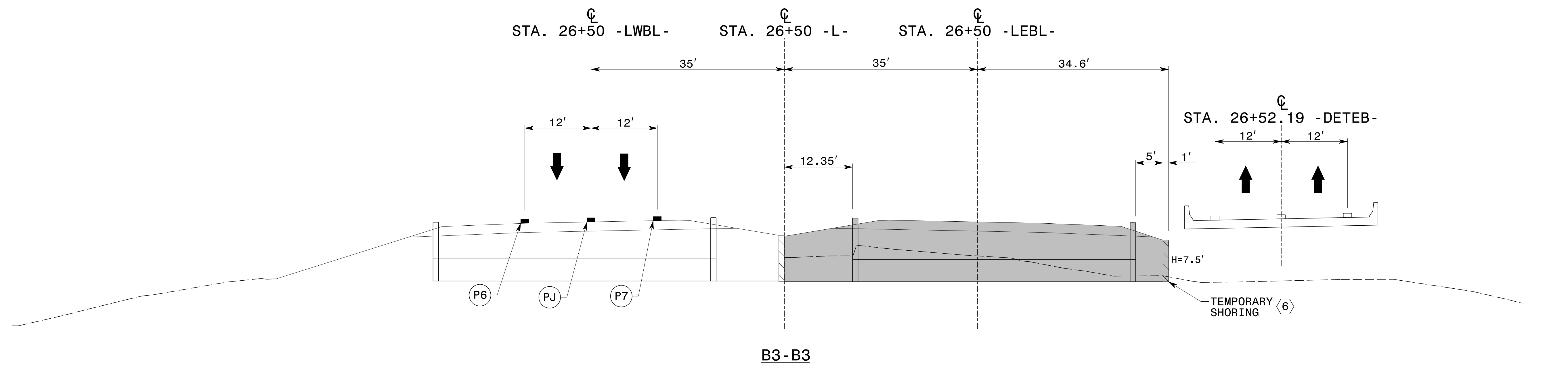
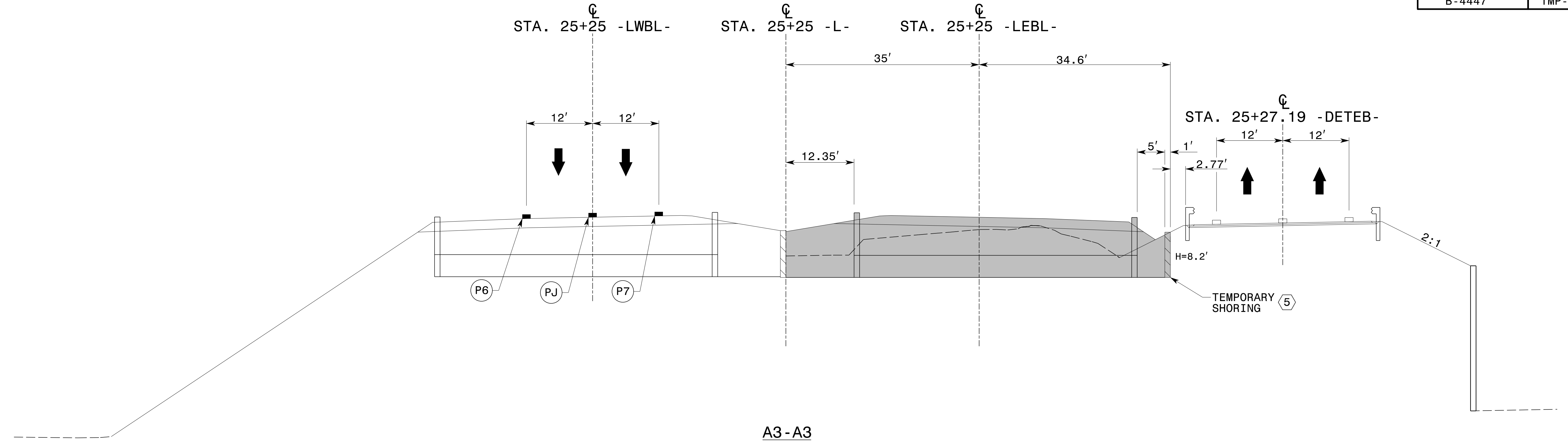
4/26/2017
P:\TIP\Projects-B\B4447\TrafficControl\TCP\B4447_TC_Ph3_TMP12.dgn
User:scodts

APPROVED: *Don A. Parker*
DATE: 4/26/2017

**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**



PHASE III DETAILS

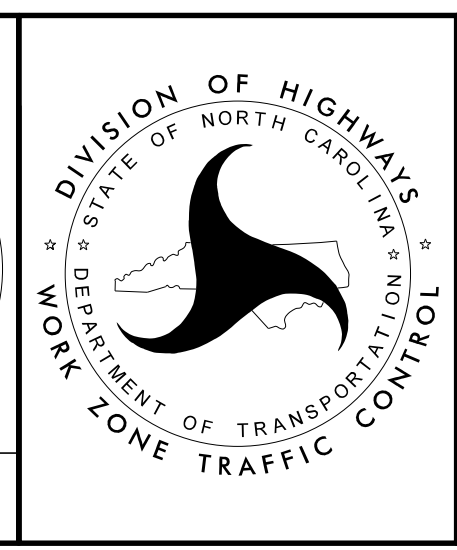


4/26/2017
 P:\TIP\Projects-B\B4447\Traffic\TrafficControl\TCP\B4447_TC_Ph3_TMP12A.dgn
 User:scodts

APPROVED: *Don A. Parker*
400482802618410...

DATE: 4/26/2017

**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**



**PHASE III
-LEBL-
CROSS-SECTIONS**

**TEMPORARY WORK ZONE
"PERFORMANCE" PAVEMENT MARKINGS
(SEE SPECIAL PROVISION)**

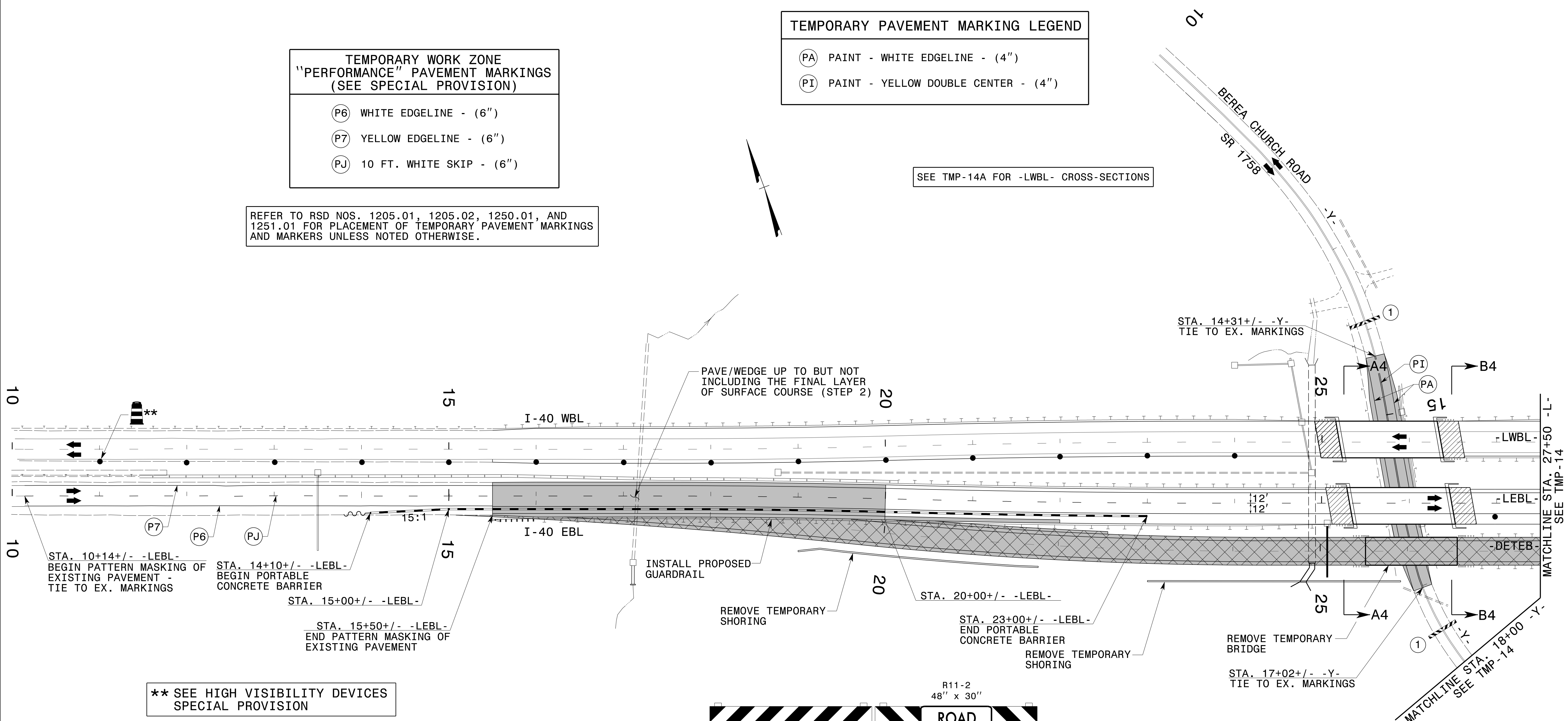
(P6) WHITE EDGELINE - (6")
(P7) YELLOW EDGELINE - (6")
(PJ) 10 FT. WHITE SKIP - (6")

REFER TO RSD NOS. 1205.01, 1205.02, 1250.01, AND 1251.01 FOR PLACEMENT OF TEMPORARY PAVEMENT MARKINGS AND MARKERS UNLESS NOTED OTHERWISE.

TEMPORARY PAVEMENT MARKING LEGEND

(PA) PAINT - WHITE EDGELINE - (4")
(PI) PAINT - YELLOW DOUBLE CENTER - (4")

SEE TMP-14A FOR -LWBL- CROSS-SECTIONS



STA. 10+14+/- -LEBL-
BEGIN PATTERN MASKING OF
EXISTING PAVEMENT -
TIE TO EX. MARKINGS

STA. 14+10+/- -LEBL-
BEGIN PORTABLE
CONCRETE BARRIER

STA. 15+00+/- -LEBL-

STA. 15+50+/- -LEBL-
END PATTERN MASKING OF
EXISTING PAVEMENT

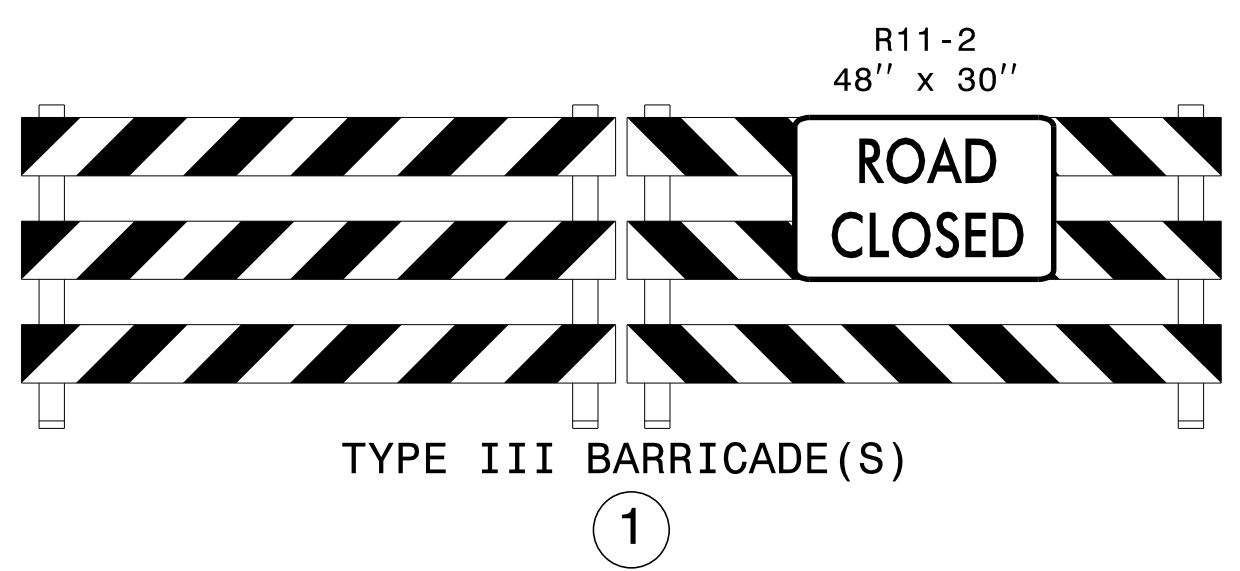
INSTALL PROPOSED
GUARDRAIL

REMOVE TEMPORARY
SHORING

STA. 20+00+/- -LEBL-
STA. 23+00+/- -LEBL-
END PORTABLE
CONCRETE BARRIER
REMOVE TEMPORARY
SHORING

REMOVE TEMPORARY
BRIDGE
STA. 17+02+/- -Y-
TIE TO EX. MARKINGS

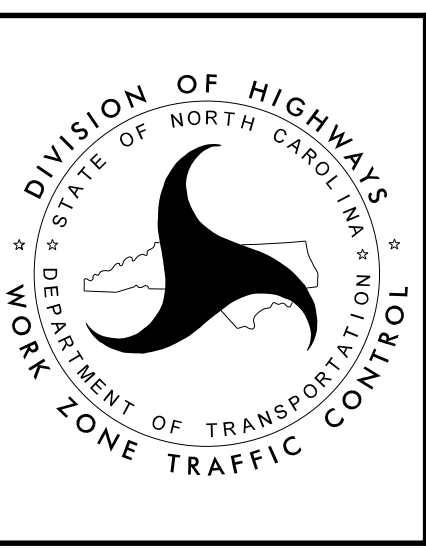
**** SEE HIGH VISIBILITY DEVICES
SPECIAL PROVISION**



APPROVED: *Don A. Parker*
DATE: 4/26/2017

SEAL
043251
ENGINEER
DON A. PARKER

**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**

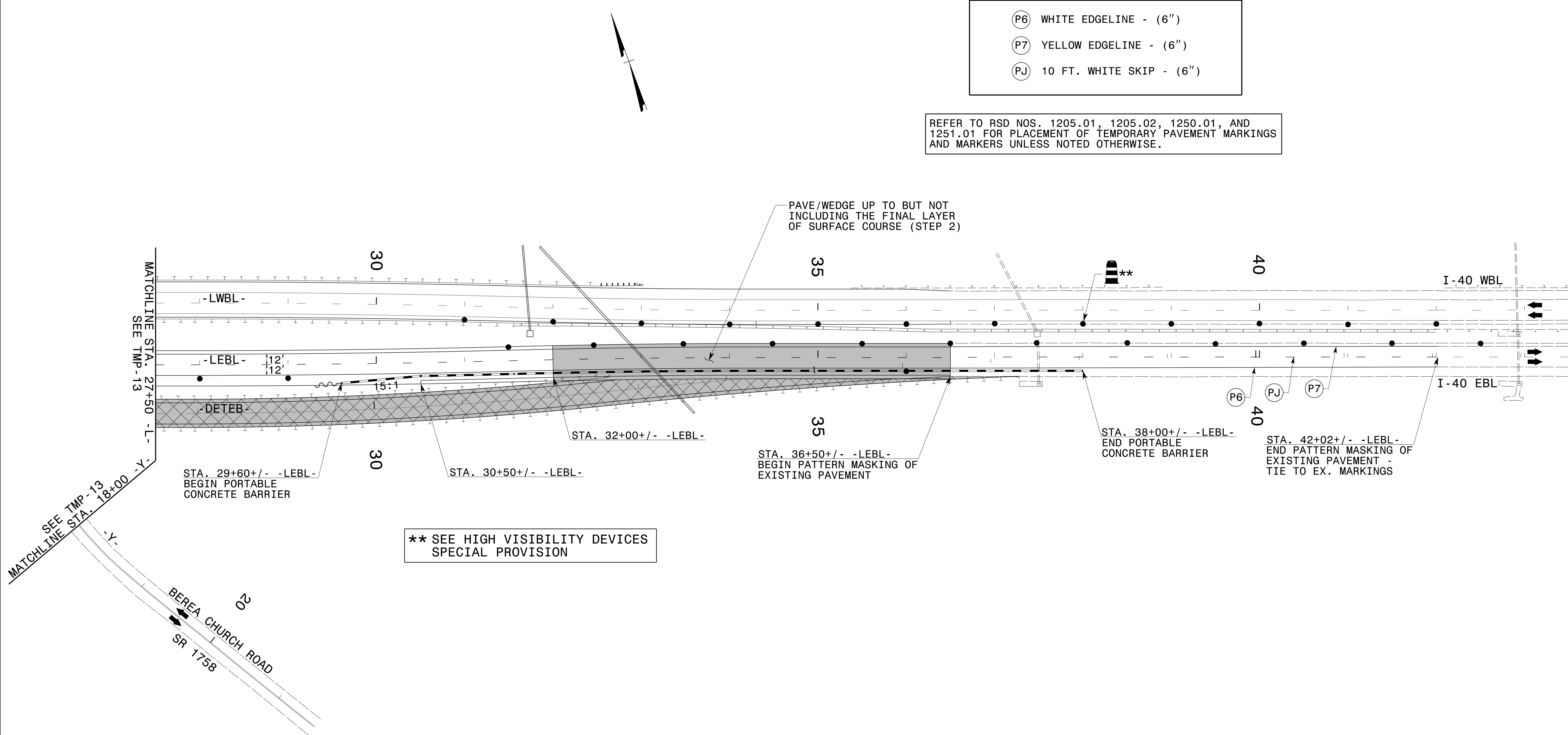


PHASE IV DETAILS

4/26/2017
P:\TIP\Projects-B\B4447\TrafficControl\TCP\B4447_TC_Ph4_TMP13.dgn
User:scodts

TEMPORARY WORK ZONE "PERFORMANCE" PAVEMENT MARKINGS (SEE SPECIAL PROVISION)	
(P6)	WHITE EDGELINE - (6")
(P7)	YELLOW EDGELINE - (6")
(PJ)	10 FT. WHITE SKIP - (6")

REFER TO RSD NOS. 1205.01, 1205.02, 1250.01, AND 1251.01 FOR PLACEMENT OF TEMPORARY PAVEMENT MARKINGS AND MARKERS UNLESS NOTED OTHERWISE.



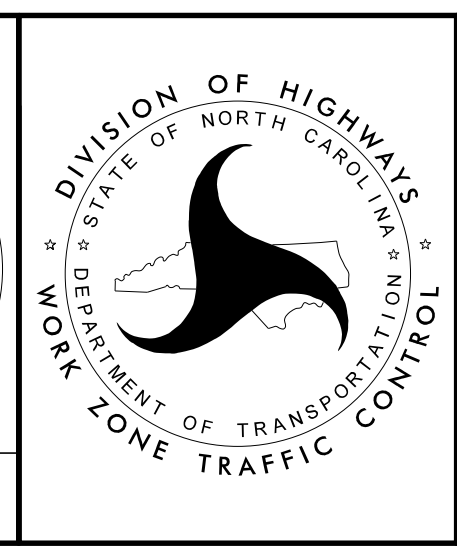
** SEE HIGH VISIBILITY DEVICES
SPECIAL PROVISION

4/26/2017
 P:\TIP\Projects-B\B4447\TrafficControl\TCP\B4447_TC_P44_TMP14.dgn
 User:scodts

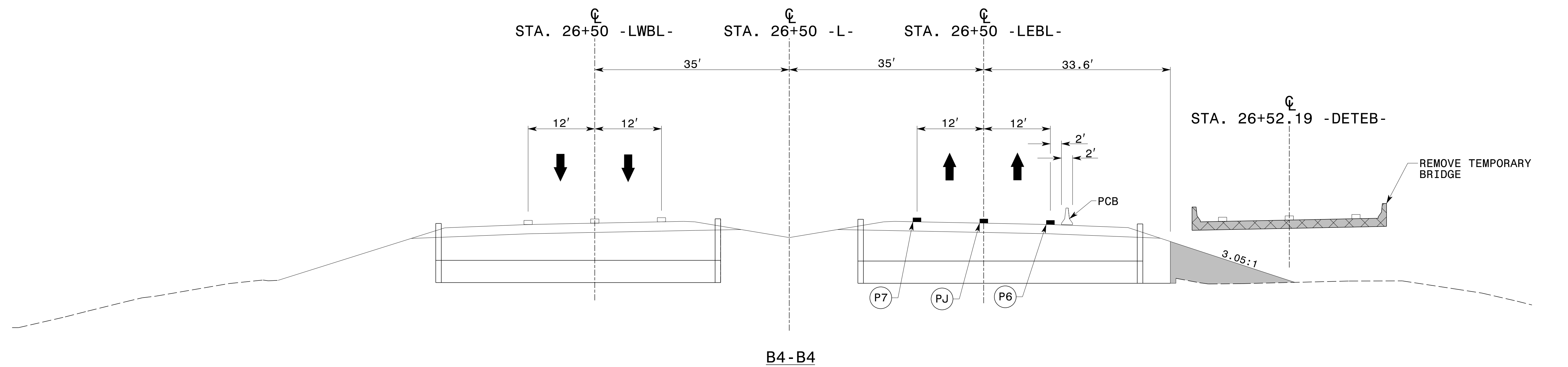
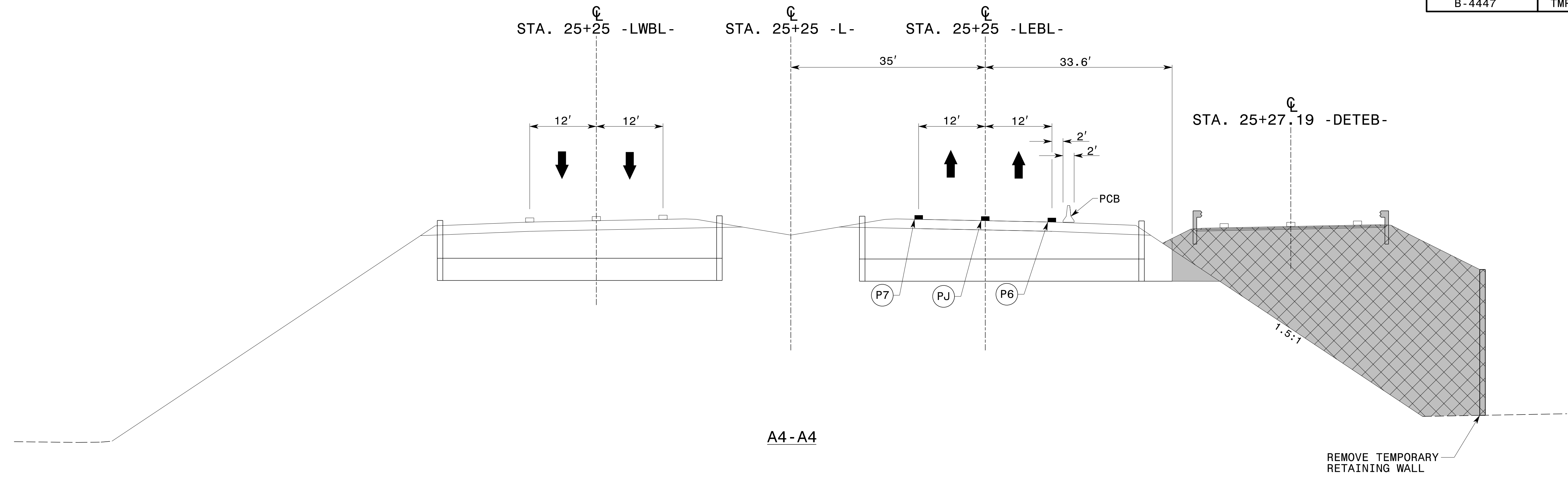
APPROVED: *Don A. Parker*
40048282618410...

DATE: 4/26/2017

**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**



PHASE IV DETAILS

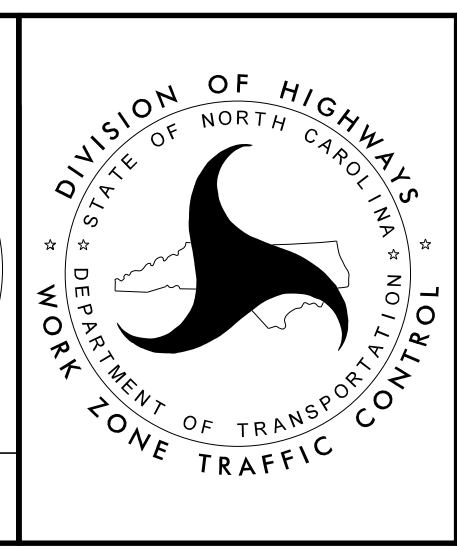


4/26/2017
 P:\TIP\Projects-B\B4447\Traffic\TrafficControl\TCP\B4447_TC_Ph4_TMP14A.dgn
 User:scodts

APPROVED: *Don A. Parker*
40482802618410...

DATE: 4/26/2017

**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**



**PHASE IV
 -LEBL- AND -DETEB-
 CROSS-SECTIONS**