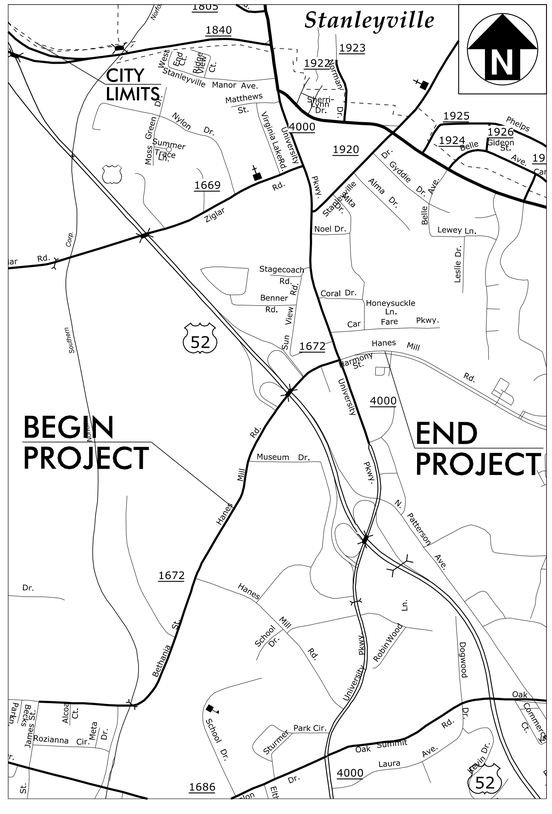
STATE OF NORTH CAROLINA
DIVISION OF HIGHWAYS

TRANSPORTATION MANAGEMENT PLAN

FORSYTH COUNTY



LOCATION: SR 1672 (HANES MILL ROAD) FROM MUSEUM DRIVE TO SR 4000 (UNIVERSITY PARKWAY) IN WINSTON-SALEM

INDEX OF SHEETS

SHEET NO.
TMP-1

U-2729

TIP PROJECT:

WORK ZONE SAFETY & MOBILITY
"from the MOUNTAINS to the COAST"

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604

NC LICENSE NO. F-0669

LORI D. STOUCHKO, PE
PRINCIPAL PROJECT ENGINEER

NCDOT CONTACTS:

CONNIE JAMES, PE
NCDOT DIVISION PROJECT ENGINEER

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

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

APPROVED: _____

DATE: _____

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-1A

PLANS PREPARED FOR THE NCDOT BY

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NC LICENSE NO. F-0669

ROADWAY STANDARD DRAWINGS

THE FOLLOWING ROADWAY STANDARDS AS SHOWN IN "ROADWAY STANDARD DRAWINGS" - N.C. DEPARTMENT OF TRANSPORTATION - RALEIGH, N.C., DATED JANUARY 2018 ARE APPLICABLE TO THIS PROJECT AND BY REFERENCE HEREBY ARE CONSIDERED A PART OF THESE PLANS:

STD. NO.	TITLE
1101.01	WORK ZONE 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	DRUMS
1135.01	CONES
1145.01	BARRICADES
1150.01	FLAGGING DEVICES
1160.01	TEMPORARY CRASH CUSHION
1165.01	TRUCK MOUNTED ATTENUATOR
1170.01	PORTABLE CONCRETE BARRIER
1180.01	SKINNY - DRUMS
1205.01	PAVEMENT MARKINGS - LINE TYPES AND OFFSETS
1205.02	PAVEMENT MARKINGS - TWO LANE AND MULTILANE ROADWAYS
1205.03	PAVEMENT MARKINGS - EXITS AND ENTRANCE RAMPS
1205.04	PAVEMENT MARKINGS - INTERSECTIONS
1205.05	PAVEMENT MARKINGS - TURN LANES
1205.06	PAVEMENT MARKINGS - LANE DROPS
1205.07	PAVEMENT MARKINGS - PEDESTRIAN CROSSWALKS
1205.08	PAVEMENT MARKINGS - SYMBOLS AND WORD MESSAGES
1205.09	PAVEMENT MARKINGS - PAINTED ISLANDS
1205.10	PAVEMENT MARKINGS - SCHOOL AREAS
1205.11	PAVEMENT MARKINGS - RAILROAD CROSSINGS
1205.12	PAVEMENT MARKINGS - BRIDGES
1205.13	PAVEMENT MARKINGS - LANE REDUCTIONS
1205.14	PAVEMENT MARKINGS - ROUNDABOUTS
1205.15	PAVEMENT MARKINGS - SUPERSTREETS
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
1264.01	OBJECT MARKERS - TYPES
1264.02	OBJECT MARKERS - INSTALLATION

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
- TEMPORARY PAVEMENT
- WEDGING

SIGNALS

EXISTING PROPOSED TEMPORARY (TEMP)

PAVEMENT MARKINGS

- EXISTING LINES
- TEMPORARY LINES

TRAFFIC CONTROL DEVICES

- BARRICADE (TYPE III)
- CONE
- DRUM
- TEMPORARY CRASH CUSHION
- FLASHING ARROW BOARD
- FLAGGER
- SKINNY DRUM
- TUBULAR MARKER
- 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

PAINT 4"

P1 WHITE EDGELINE
P2 WHITE SOLID LANE LINE
P3 10 FT. WHITE SKIP
P4 3 FT. - 9 FT./SP WHITE MINISKIP
P5 2 FT. - 6 FT./SP WHITE MINISKIP
P10 YELLOW EDGELINE
P11 YELLOW SINGLE CENTER
P12 10 FT. YELLOW SKIP
P13 YELLOW DOUBLE CENTER
P14 3 FT. - 9 FT./SP YELLOW MINISKIP

PAINT 6"

P20 WHITE EDGELINE
P21 WHITE SOLID LANE LINE
P22 10 FT. WHITE SKIP
P23 3 FT. - 9 FT./SP WHITE MINISKIP
P31 YELLOW SINGLE CENTER

COLD APPLIED (TYPE 4) 4"

C1 WHITE EDGELINE
C2 WHITE SOLID LANE LINE
C3 10 FT. WHITE SKIP
C4 3FT. - 9 FT./SP WHITE MINISKIP
C13 YELLOW DOUBLE CENTER

COLD APPLIED (TYPE 4) SYMBOLS AND CHARACTERS ON CONCRETE BRIDGE DECK

C70 LEFT TURN ARROW
C72 STRAIGHT ARROW

PAINT 8"

P40 WHITE GORELINE
P41 WHITE DIAGONAL
P42 YELLOW DIAGONAL
P43 WHITE SOLID LANE LINE
P44 3 FT. - 9 FT./SP WHITE MINISKIP
P46 WHITE CROSSWALK LINE

PAINT 12"

P50 WHITE GORELINE

PAINT 24"

P61 WHITE STOPBAR

PAINT SYMBOLS AND CHARACTERS

P70 LEFT TURN ARROW
P71 RIGHT TURN ARROW
P72 STRAIGHT ARROW
P73 COMBO STRAIGHT/LEFT
P74 COMBO STRAIGHT/RIGHT
P75 COMBO LEFT/RIGHT
P76 COMBO LEFT/RIGHT/STRAIGHT
P100 ALPHANUMERIC CHARACTER
P103 24" YIELD LINE TRIANGLE
P112 FISH-HOOK RIGHT/STRAIGHT ARROW
P116 FISH-HOOK W/CIRCLE LEFT ARROW
P117 FISH-HOOK W/ CIRCLE LEFT/STRAIGHT ARROW

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D STOUCHKO

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

ROADWAY STANDARD DRAWINGS & LEGEND

2/21/2023
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PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-1B

PLANS PREPARED FOR THE NCDOT BY:

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RALEIGH, NC 27604
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MANAGEMENT STRATEGIES

TRAFFIC MANAGEMENT STRATEGIES:

- LANE SHIFTS OR CLOSURES
- SHOULDER CLOSURES
- ONE-LANE, TWO WAY OPERATION (FLAGGING)
- RAMP CLOSURES / RELOCATION
- NIGHT WORK
- WORK HOUR RESTRICTIONS FOR PEAK TRAVEL
- PEDESTRIAN / BICYCLE ACCOMMODATIONS
- OFF-SITE DETOURS / USE OF ALTERNATIVE ROUTES
- LAW ENFORCEMENT
- TEMPORARY TRAFFIC SIGNALS
- SEQUENTIAL LIGHTING

GENERAL NOTES / LOCAL 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
US 52	MONDAY THRU SUNDAY 6:00 AM TO 8:00 PM
HANES MILL RD FROM BEGIN PROJECT LIMITS TO UNIVERSITY UNIVERSITY PARKWAY	MONDAY THRU SUNDAY 6:00 AM TO 8:00 PM
HANES MILL RD FROM UNIVERSITY PARKWAY TO END PROJECT LIMITS, AND UNIVERSITY PARKWAY	MONDAY THRU SUNDAY 6:00 AM TO 9:00 AM AND 4:00 PM TO 7:00 PM

B) DO NOT CLOSE OR NARROW TRAVEL LANES DURING HOLIDAYS AND SPECIAL EVENTS AS FOLLOWS:

ROAD NAME: ALL

HOLIDAY

1. FOR ANY UNEXPECTED OCCURRENCE THAT CREATES UNUSUALLY HIGH TRAFFIC VOLUMES, AS DIRECTED BY THE ENGINEER.
2. FOR NEW YEAR'S, BETWEEN THE HOURS OF 6:00 AM DECEMBER 31ST TO 8:00 PM JANUARY 2ND. IF NEW YEAR'S DAY IS ON A FRIDAY, SATURDAY, SUNDAY, OR MONDAY THEN UNTIL 8:00 PM THE FOLLOWING TUESDAY.
3. FOR EASTER, BETWEEN THE HOURS OF 6:00 AM THURSDAY AND 8:00 PM MONDAY.
4. FOR MEMORIAL DAY, BETWEEN THE HOURS OF 6:00 AM FRIDAY TO 8:00 PM TUESDAY.
5. FOR INDEPENDENCE DAY, BETWEEN THE HOURS OF 6:00 AM THE DAY BEFORE INDEPENDENCE DAY AND 8:00 PM THE DAY AFTER INDEPENDENCE DAY.

   IF INDEPENDENCE DAY IS ON A FRIDAY, SATURDAY, SUNDAY OR MONDAY THEN BETWEEN THE HOURS OF 6:00 AM THE THURSDAY BEFORE INDEPENDENCE DAY AND 8:00 PM THE TUESDAY AFTER INDEPENDENCE DAY.
6. FOR LABOR DAY, BETWEEN THE HOURS OF 6:00 AM FRIDAY AND 8:00 PM TUESDAY.
7. FOR THANKSGIVING DAY, BETWEEN THE HOURS OF 6:00 AM TUESDAY TO 8:00 PM MONDAY.
8. FOR CHRISTMAS, BETWEEN THE HOURS OF 6:00 AM THE FRIDAY BEFORE THE WEEK OF CHRISTMAS DAY AND 8:00 PM THE FOLLOWING TUESDAY AFTER THE WEEK OF CHRISTMAS.
9. FOR CAROLINA CLASSIC FAIR, BETWEEN THE HOURS OF 6:00 AM THE DAY BEFORE THE START OF THE CAROLINA CLASSIC FAIR AND 8:00 PM THE FOLLOWING DAY AFTER THE END OF THE CAROLINA CLASSIC FAIR.

   FOR WAKE FOREST UNIVERSITY EVENTS, OCCURING AT TRUIST FIELD AT WAKE FOREST UNIVERSITY BETWEEN 4 HOURS BEFORE THE START AND 4 HOURS AFTER THE END OF EACH EVENT

C) DO NOT STOP TRAFFIC AS FOLLOWS:

ROAD NAME	DAY AND TIME RESTRICTIONS	DURATION AND OPERATION
US 52	SUNDAY THRU MONDAY 6:00 AM TO 12:00 AM	30 MINUTES FOR HANGING GIRDER AND REMOVE EXISTING STRUCTURE
HANES MILL RD UNIVERSITY PWY	SUNDAY THRU MONDAY 6:00 AM TO 9:00 AM AND 4:00 PM TO 7:00 PM	15 MINUTES FOR TRAFFIC SHIFTS

D) 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

E) 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.

F) WHEN PERSONNEL AND/OR EQUIPMENT ARE WORKING WITHIN 15 FT OF 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.

   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) DO NOT INSTALL MORE THAN ONE LANE CLOSURE IN ANY ONE DIRECTION ON SR 1672 OR SR 4000.

J) PROVIDE TRAFFIC CONTROL FOR APPROPRIATE LANE CLOSURES FOR SURVEYING DONE BY THE DEPARTMENT.

APPROVED: _____

DATE: _____

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

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

TRANSPORTATION MANAGEMENT PLAN

2/2/2023
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PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-1C

PLANS PREPARED FOR THE NCDOT BY:
MOTT MACDONALD
MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669

GENERAL NOTES / LOCAL NOTES CONTINUED

PAVEMENT EDGE DROP OFF REQUIREMENTS

K) 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.

L) DO NOT EXCEED A DIFFERENCE OF 2 INCHES IN ELEVATION BETWEEN OPEN LANES OF 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

M) NOTIFY THE ENGINEER THIRTY (30) CALENDAR DAYS PRIOR TO ANY TRAFFIC PATTERN ALTERATION.

SIGNING

N) 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.

O) 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.

P) 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.

Q) ENSURE ALL NECESSARY SIGNING IS IN PLACE PRIOR TO ALTERING ANY TRAFFIC PATTERN.

R) 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 BARRIER

S) 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.

T) 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

TRAFFIC CONTROL DEVICES

U) 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.

V) PLACE TYPE III BARRICADES, WITH "ROAD CLOSED" SIGN R11-2 ATTACHED, OF SUFFICIENT LENGTH TO CLOSE ENTIRE ROADWAY.

W) PLACE ADDITIONAL SETS OF THREE CHANNELIZING DEVICES DRUMS PERPENDICULAR TO THE EDGE OF TRAVELWAY ON 500 FT CENTERS WHEN UNOPENED LANES ARE CLOSED TO TRAFFIC.

PAVEMENT MARKINGS AND MARKERS

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

ROAD NAME	MARKING	MARKER
ALL	PAINT	TEMPORARY RAISED
BRIDGE	COLD APPLIED (TYPE 4)	

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.

BB) TRACE THE EXISTING AND PROPOSED MONOLITHIC ISLAND LOCATIONS WITH PROPER COLOR PAVEMENT MARKINGS PRIOR TO REMOVAL AND INSTALLATION. PLACE DRUMS TO DELINEATE ANY EXISTING AND PROPOSED MONOLITHIC ISLANDS AFTER REMOVAL AND BEFORE INSTALLATION.

MISCELLANEOUS

CC) LAW ENFORCEMENT MAY BE USED TO MAINTAIN TRAFFIC THROUGH THE WORK AREA AND/OR INTERSECTIONS AS DIRECTED BY THE ENGINEER.

DD) IN THE EVENT A TIE-IN CANNOT BE MADE IN ONE DAY'S TIME, BRING THE TIE-IN AREA TO AN APPROPRIATE ROADWAY ELEVATION AS DETERMINED BY THE ENGINEER. PLACE BLACK ON ORANGE "LOOSE GRAVEL" SIGNS (W8-7) AND BLACK ON ORANGE "PAVEMENT ENDS" SIGNS (W8-3) 200 FT AND 400 FT RESPECTIVELY IN ADVANCE OF THE UNEVEN AREAS. USE DRUMS TO DELINEATE THE EDGE OF ROADWAY ALONG UNPAVED AREAS.

EE) ALL CURB RAMP LOCATIONS SHALL BE DERIVED FROM STATIONING SHOWN ON PAVEMENT MARKING PLANS OR AS DIRECTED BY THE ENGINEER IN COORDINATION WITH THE SIGNING AND DELINEATION UNIT.

FF) CONTRACTOR SHALL MAINTAIN SIDEWALK ACCESS AT ALL TIMES AS STATED IN THE PHASING. CONTRACTOR SHALL BE RESPONSIBLE TO PROVIDE PEDESTRIAN TRANSPORT SERVICES, TEMPORARY SIDEWALKS (CONCRETE, ASPHALT, OR OTHER SUITABLE MATERIAL AS APPROVED BY THE ENGINEER) AT ALL LOCATIONS WHERE THE OPEN PEDESTRIAN TRAVELWAY HAS BEEN REMOVED FOR CONSTRUCTION OPERATIONS (UTILITIES, DRAINAGE, ETC.).

APPROVED: _____

DATE: _____

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

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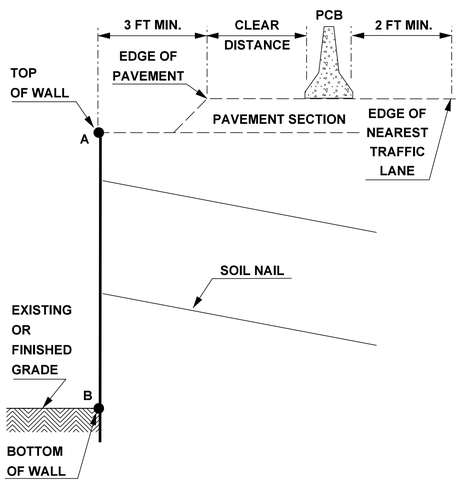
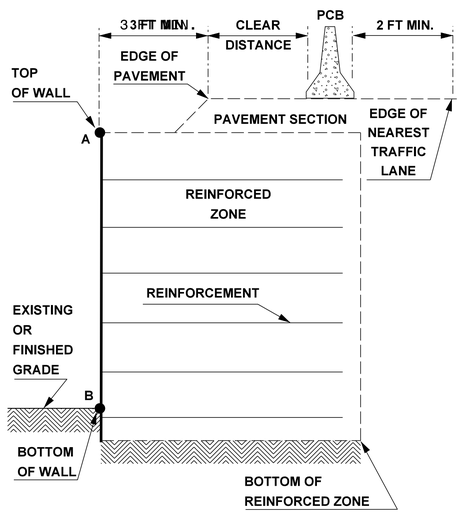
TRANSPORTATION MANAGEMENT PLAN

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-2

TEMPORARY SOIL NAIL WALL



TEMPORARY MSE WALL



NOTE: WALL OR SHORING HEIGHT = A-B

TEMPORARY SHORING

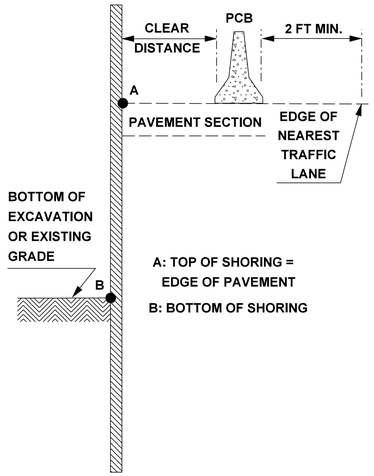


FIGURE A

NOTES

1- REFER TO THE TRAFFIC CONTROL PLANS FOR TEMPORARY SHORING LOCATIONS AND NOTES.

2- REFER TO THE "TEMPORARY SHORING" STANDARD PROVISION FOR INFORMATION ABOUT TEMPORARY SHORING AND PORTABLE CONCRETE BARRIER (PCB).

3- PCB IS REQUIRED IF TEMPORARY SHORING/WALL 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 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/WALLS 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- 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 OR APPROVED BY THE ENGINEER.

8- 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 THIS MINIMUM REQUIRED DISTANCE IS NOT AVAILABLE, CONTACT THE ENGINEER.

9- TABLE SHOWN IN FIGURE B IS BASED ON NCDOT RESEARCH PROJECT NO. 2005-010 WITH VEHICLE TYPE USED FOR NCHRP 350 CRASH TESTS.

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

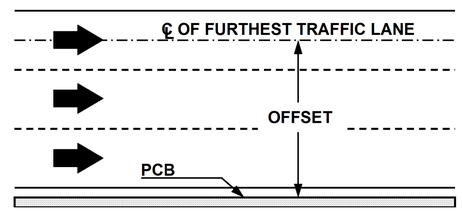


FIGURE B

APPROVED: _____

DATE: _____

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

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

PORTABLE CONCRETE BARRIER
AT
TEMPORARY SHORING LOCATIONS

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-2A

PLANS PREPARED FOR THE NCDOT BY:
MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669

1 TEMPORARY SHORING LOCATION No. 1

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

TEMPORARY SHORING IS REQUIRED FOR THE BRIDGE END BENT CONSTRUCTION FROM STA 32+53.2+/- -L-, 6.3' RT TO STA 33+19.5+/- -L-, 6.3' RT.

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

TEMPORARY SHORING FROM STA 32+53.2+/- -L-, 6.3' RT TO STA 33+19.5+/- -L-, 6.3' RT SHALL BE DESIGNED BY MSE WALL DESIGNER USING THE SOIL PARAMETERS IDENTIFIED IN THE MSE WALL PLANS. SUBMIT SHORING DESIGN WITH THE MSE WALL DESIGN PACKAGE FOR REVIEW.

WHEN BACKFILL FOR BRIDGE APPROACH FILLS OVERLAPS WITH THE REINFORCED ZONE OF TEMPORARY WALLS, USE SHORING BACKFILL OR BACKFILL MATERIAL REQUIRED FOR BRIDGE APPROACH FILLS, WHICHEVER IS BETTER, IN THE REINFORCED ZONE OF TEMPORARY WALLS.

2 TEMPORARY SHORING LOCATION No. 2

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

TEMPORARY SHORING IS REQUIRED FOR THE BRIDGE END BENT CONSTRUCTION FROM STA 32+64.9+/- -L-, 11.4' RT TO STA 33+18.9+/- -L-, 12.8' RT.

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 32+64.9+/- -L-, 11.4' RT TO STA 33+18.9+/- -L-, 12.8' RT FOR THE FOLLOWING ASSUMED SOIL PARAMETERS AND GROUNDWATER ELEVATION:

UNIT WEIGHT (γ) = 120 LB/CF
FRICTION ANGLE (ϕ) = 30 DEGREES
COHESION (c) = 0 LB/SF
GROUNDWATER ELEVATION = 865 FT

DO NOT USE A TEMPORARY WALL FOR TEMPORARY SHORING FROM STA 32+64.9+/- -L-, 11.4' RT TO STA 33+18.9+/- -L-, 12.8' RT.

AT THE CONTRACTOR'S OPTION, USE STANDARD TEMPORARY SHORING FOR TEMPORARY SHORING FROM STA 32+64.9+/- -L-, 11.4' RT TO STA 33+18.9+/- -L-, 12.8' RT. SEE STANDARD DETAIL NO. 1801.01 FOR STANDARD TEMPORARY SHORING.

IT MAY BE PREFERRED TO USE A TEMPORARY SOIL NAIL WALL FOR TEMPORARY SHORING FROM STA 32+64.9+/- -L-, 11.4' RT TO STA 33+18.9+/- -L-, 12.8' RT. FOR TEMPORARY SOIL NAIL WALLS, SEE TEMPORARY SOIL NAIL WALLS PROVISION.

3 TEMPORARY SHORING LOCATION No. 3

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

TEMPORARY SHORING IS REQUIRED FOR THE BRIDGE END BENT CONSTRUCTION FROM STA 35+20.5+/- -L-, 6.3' RT TO STA 35+77.9+/- -L-, 5.4' RT.

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

TEMPORARY SHORING FROM STA 35+20.5+/- -L-, 6.3' RT TO STA 35+77.9+/- -L-, 5.4' RT SHALL BE DESIGNED BY MSE WALL DESIGNER USING THE SOIL PARAMETERS IDENTIFIED IN THE MSE WALL PLANS. SUBMIT SHORING DESIGN WITH THE MSE WALL DESIGN PACKAGE FOR REVIEW.

WHEN BACKFILL FOR BRIDGE APPROACH FILLS OVERLAPS WITH THE REINFORCED ZONE OF TEMPORARY WALLS, USE SHORING BACKFILL OR BACKFILL MATERIAL REQUIRED FOR BRIDGE APPROACH FILLS, WHICHEVER IS BETTER, IN THE REINFORCED ZONE OF TEMPORARY WALLS.

4 TEMPORARY SHORING LOCATION No. 4

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

TEMPORARY SHORING IS REQUIRED FOR THE BRIDGE END BENT CONSTRUCTION FROM STA 34+61.5+/- -L-, 11.4' RT TO STA 35+71.9+/- -L-, 9.7' RT.

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 32+64.9+/- -L-, 11.4' RT TO STA 33+18.9+/- -L-, 12.8' RT FOR THE FOLLOWING ASSUMED SOIL PARAMETERS AND GROUNDWATER ELEVATION:

UNIT WEIGHT (γ) = 120 LB/CF
FRICTION ANGLE (ϕ) = 30 DEGREES
COHESION (c) = 0 LB/SF
GROUNDWATER ELEVATION = 870 FT

DO NOT USE A TEMPORARY WALL FOR TEMPORARY SHORING FROM STA 32+64.9+/- -L-, 11.4' RT TO STA 33+18.9+/- -L-, 12.8' RT.

IT MAY BE PREFERRED TO USE A TEMPORARY SOIL NAIL WALL FOR TEMPORARY SHORING FROM STA 32+64.9+/- -L-, 11.4' RT TO STA 33+18.9+/- -L-, 12.8' RT. FOR TEMPORARY SOIL NAIL WALLS, SEE TEMPORARY SOIL NAIL WALLS PROVISION.

5 TEMPORARY SHORING LOCATION No. 5

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

TEMPORARY SHORING IS REQUIRED FOR THE BRIDGE INTERIOR BENT CONSTRUCTION FROM STA 65+55.5+/- -Y4-, 5.8' RT TO STA 66+14.6+/- -Y4-, 5.8' RT.

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 65+55.5+/- -Y4-, 5.8' RT TO STA 66+14.6+/- -Y4-, 5.8' RT FOR THE FOLLOWING ASSUMED SOIL PARAMETERS AND GROUNDWATER ELEVATION:

UNIT WEIGHT (γ) = 120 LB/CF
FRICTION ANGLE (ϕ) = 30 DEGREES
COHESION (c) = 0 LB/SF
GROUNDWATER ELEVATION = 865 FT

DO NOT USE A TEMPORARY WALL FOR TEMPORARY SHORING FROM STA 65+55.5+/- -Y4-, 5.8' RT TO STA 66+14.6+/- -Y4-, 5.8' RT.

AT THE CONTRACTOR'S OPTION, USE STANDARD TEMPORARY SHORING FOR TEMPORARY SHORING FROM STA 65+55.5+/- -Y4-, 5.8' RT TO STA 66+14.6+/- -Y4-, 5.8' RT. SEE STANDARD DETAIL NO. 1801.01 FOR STANDARD TEMPORARY SHORING.

6 TEMPORARY SHORING LOCATION No. 6

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

TEMPORARY SHORING IS REQUIRED FOR THE BRIDGE INTERIOR BENT CONSTRUCTION FROM STA 65+55.5+/- -Y4-, 5.8' LT TO STA 66+14.6+/- -Y4-, 5.8' LT.

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 65+55.5+/- -Y4-, 5.8' LT TO STA 66+14.6+/- -Y4-, 5.8' LT FOR THE FOLLOWING ASSUMED SOIL PARAMETERS AND GROUNDWATER ELEVATION:

UNIT WEIGHT (γ) = 120 LB/CF
FRICTION ANGLE (ϕ) = 30 DEGREES
COHESION (c) = 0 LB/SF
GROUNDWATER ELEVATION = 865 FT

DO NOT USE A TEMPORARY WALL FOR TEMPORARY SHORING FROM STA 65+55.5+/- -Y4-, 5.8' LT TO STA 66+14.6+/- -Y4-, 5.8' LT.

AT THE CONTRACTOR'S OPTION, USE STANDARD TEMPORARY SHORING FOR TEMPORARY SHORING FROM STA 65+55.5+/- -Y4-, 5.8' LT TO STA 66+14.6+/- -Y4-, 5.8' LT. SEE STANDARD DETAIL NO. 1801.01 FOR STANDARD TEMPORARY SHORING.

THE TEMPORARY SHORING NOTES SHOWN ON THIS SHEET WERE PROVIDED THROUGH A SEALED DOCUMENT FROM THE GEOTECHNICAL ENGINEERING UNIT. THE DOCUMENT WAS SUBMITTED TO THE WZTC SECTION ON MARCH 9, 2023 AND SEALED BY A PROFESSIONAL ENGINEER, SHIPING YANG, Ph.D., P.E. LICENSE #031361.

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D STOUCHKO

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

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

TEMPORARY SHORING NOTES

3/13/2023
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User:ST086227

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-2B

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669

7 TEMPORARY SHORING LOCATION No. 7

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

TEMPORARY SHORING IS REQUIRED FOR THE BRIDGE INTERIOR BENT CONSTRUCTION FROM STA 66+14.6+/- -Y4-, 5.8' RT TO STA 66+14.6+/- -Y4-, 5.8' LT.

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 66+14.6+/- -Y4-, 5.8' RT TO STA 66+14.6+/- -Y4-, 5.8' LT FOR THE FOLLOWING ASSUMED SOIL PARAMETERS AND GROUNDWATER ELEVATION:

UNIT WEIGHT (γ) = 120 LB/CF
FRICTION ANGLE (ϕ) = 30 DEGREES
COHESION (c) = 0 LB/SF
GROUNDWATER ELEVATION = 865 FT

DO NOT USE A TEMPORARY WALL FOR TEMPORARY SHORING FROM STA 66+14.6+/- -Y4-, 5.8' RT TO STA 66+14.6+/- -Y4-, 5.8' LT.

AT THE CONTRACTOR'S OPTION, USE STANDARD TEMPORARY SHORING FOR TEMPORARY SHORING FROM STA 66+14.6+/- -Y4-, 5.8' RT TO STA 66+14.6+/- -Y4-, 5.8' LT. SEE STANDARD DETAIL NO. 1801.01 FOR STANDARD TEMPORARY SHORING.

8 TEMPORARY SHORING LOCATION No. 8

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

TEMPORARY SHORING IS REQUIRED FOR THE BRIDGE INTERIOR BENT CONSTRUCTION FROM STA 65+49.3+/- -Y4-, 61.8' LT TO STA 66+05.8+/- -Y4-, 61.8' LT.

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 65+49.3+/- -Y4-, 61.8' LT TO STA 66+05.8+/- -Y4-, 61.8' LT FOR THE FOLLOWING ASSUMED SOIL PARAMETERS AND GROUNDWATER ELEVATION:

UNIT WEIGHT (γ) = 120 LB/CF
FRICTION ANGLE (ϕ) = 30 DEGREES
COHESION (c) = 0 LB/SF
GROUNDWATER ELEVATION = 865 FT

DO NOT USE A TEMPORARY WALL FOR TEMPORARY SHORING FROM STA 65+49.3+/- -Y4-, 61.8' LT TO STA 66+05.8+/- -Y4-, 61.8' LT.

AT THE CONTRACTOR'S OPTION, USE STANDARD TEMPORARY SHORING FOR TEMPORARY SHORING FROM STA 65+55.5+/- -Y4-, 5.8' LT TO STA 66+14.6+/- -Y4-, 5.8' LT. SEE STANDARD DETAIL NO. 1801.01 FOR STANDARD TEMPORARY SHORING.

9 TEMPORARY SHORING LOCATION No. 9

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

TEMPORARY SHORING IS REQUIRED FOR THE BRIDGE INTERIOR BENT CONSTRUCTION FROM STA 66+14.6+/- -Y4-, 5.8' RT TO STA 66+55.5+/- -Y4-, 5.8' RT.

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 66+14.6+/- -Y4-, 5.8' RT TO STA 66+55.5+/- -Y4-, 5.8' RT FOR THE FOLLOWING ASSUMED SOIL PARAMETERS AND GROUNDWATER ELEVATION:

UNIT WEIGHT (γ) = 120 LB/CF
FRICTION ANGLE (ϕ) = 30 DEGREES
COHESION (c) = 0 LB/SF
GROUNDWATER ELEVATION = 865 FT

DO NOT USE A TEMPORARY WALL FOR TEMPORARY SHORING FROM STA 66+14.6+/- -Y4-, 5.8' RT TO STA 66+55.5+/- -Y4-, 5.8' RT.

AT THE CONTRACTOR'S OPTION, USE STANDARD TEMPORARY SHORING FOR TEMPORARY SHORING FROM STA 66+14.6+/- -Y4-, 5.8' RT TO STA 66+55.5+/- -Y4-, 5.8' RT. SEE STANDARD DETAIL NO. 1801.01 FOR STANDARD TEMPORARY SHORING.

10 TEMPORARY SHORING LOCATION No. 10

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

TEMPORARY SHORING IS REQUIRED FOR THE BRIDGE INTERIOR BENT CONSTRUCTION FROM STA 66+14.6+/- -Y4-, 5.8' LT TO STA 66+55.5+/- -Y4-, 5.8' LT.

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 66+14.6+/- -Y4-, 5.8' LT TO STA 66+55.5+/- -Y4-, 5.8' LT FOR THE FOLLOWING ASSUMED SOIL PARAMETERS AND GROUNDWATER ELEVATION:

UNIT WEIGHT (γ) = 120 LB/CF
FRICTION ANGLE (ϕ) = 30 DEGREES
COHESION (c) = 0 LB/SF
GROUNDWATER ELEVATION = 865 FT

DO NOT USE A TEMPORARY WALL FOR TEMPORARY SHORING FROM STA 66+14.6+/- -Y4-, 5.8' LT TO STA 66+55.5+/- -Y4-, 5.8' LT.

AT THE CONTRACTOR'S OPTION, USE STANDARD TEMPORARY SHORING FOR TEMPORARY SHORING FROM STA 66+14.6+/- -Y4-, 5.8' LT TO STA 66+55.5+/- -Y4-, 5.8' LT. SEE STANDARD DETAIL NO. 1801.01 FOR STANDARD TEMPORARY SHORING.

11 TEMPORARY SHORING LOCATION No. 11

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

TEMPORARY SHORING IS REQUIRED FOR THE BRIDGE INTERIOR BENT CONSTRUCTION FROM STA 66+05.8+/- -Y4-, 61.8' LT TO STA 66+43.3+/- -Y4-, 61.8' LT.

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 66+05.8+/- -Y4-, 61.8' LT TO STA 66+43.3+/- -Y4-, 61.8' LT FOR THE FOLLOWING ASSUMED SOIL PARAMETERS AND GROUNDWATER ELEVATION:

UNIT WEIGHT (γ) = 120 LB/CF
FRICTION ANGLE (ϕ) = 30 DEGREES
COHESION (c) = 0 LB/SF
GROUNDWATER ELEVATION = 865 FT

DO NOT USE A TEMPORARY WALL FOR TEMPORARY SHORING FROM STA 66+05.8+/- -Y4-, 61.8' LT TO STA 66+43.3+/- -Y4-, 61.8' LT.

AT THE CONTRACTOR'S OPTION, USE STANDARD TEMPORARY SHORING FOR TEMPORARY SHORING FROM STA 66+05.8+/- -Y4-, 61.8' LT TO STA 66+43.3+/- -Y4-, 61.8' LT. SEE STANDARD DETAIL NO. 1801.01 FOR STANDARD TEMPORARY SHORING.

12 TEMPORARY SHORING LOCATION No. 12

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

TEMPORARY SHORING IS REQUIRED FOR THE ROADWAY CONSTRUCTION FROM STA 10+50+/- -Y1A-, 7' RT TO STA 12+70+/- -Y1A-, 7' RT.

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 10+50+/- -Y1A-, 7' RT TO STA 12+70+/- -Y1A-, 7' RT FOR THE FOLLOWING ASSUMED SOIL PARAMETERS AND GROUNDWATER ELEVATION:

UNIT WEIGHT (γ) = 120 LB/CF
FRICTION ANGLE (ϕ) = 30 DEGREES
COHESION (c) = 0 LB/SF
GROUNDWATER ELEVATION = 865 FT

AT THE CONTRACTOR'S OPTION, USE A STANDARD TEMPORARY WALL FOR TEMPORARY SHORING FROM STA 10+50+/- -Y1A-, 7' RT TO STA 12+70+/- -Y1A-, 7' RT. SEE GEOTECHNICAL STANDARD DETAIL NO. 1801.02 FOR STANDARD TEMPORARY WALLS.

THE TEMPORARY SHORING NOTES SHOWN ON THIS SHEET WERE PROVIDED THROUGH A SEALED DOCUMENT FROM THE GEOTECHNICAL ENGINEERING UNIT. THE DOCUMENT WAS SUBMITTED TO THE WZTC SECTION ON MARCH 9, 2023 AND SEALED BY A PROFESSIONAL ENGINEER, SHIPING YANG, Ph.D., P.E. LICENSE # 031361.

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

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

TEMPORARY SHORING NOTES

3/10/2023
G:\508350_DDC_I2\RC_U-2729\TrafficControl\Tcp\200_035_U-2729_TC_TMP_02B_Shoring_Notes.dgn
User:ST08227

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-2C

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669

1 R11-2 48″ x 30″ — ROAD CLOSED — W1-6L 48″ x 24″
TYPE III BARRICADE

2 R11-2 48″ x 30″ — ROAD CLOSED — DETOUR — M4-10R 48″ x 18″
TYPE III BARRICADE

3 END DETOUR — M4-8A 24″ X 18″

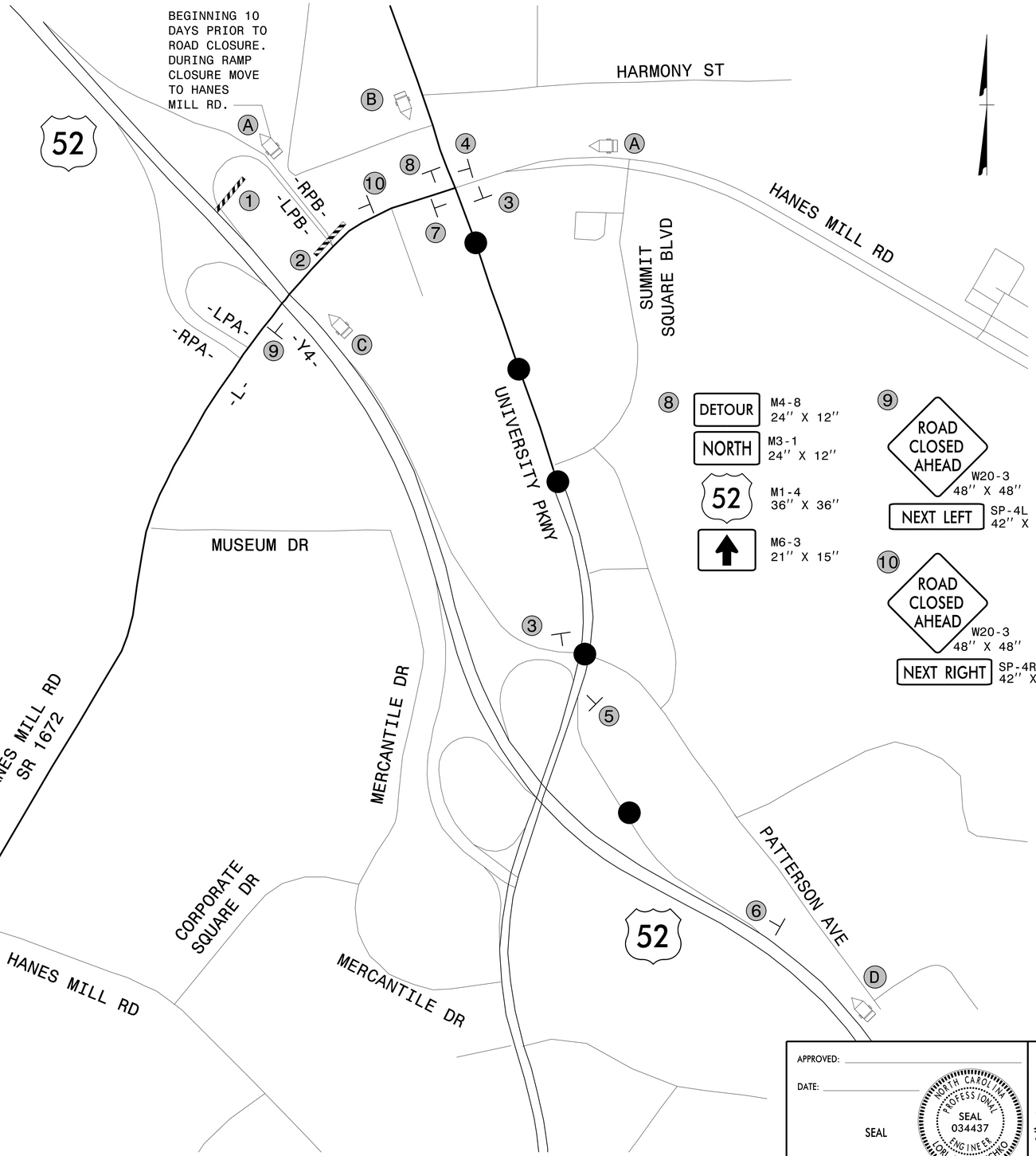
4 DETOUR M4-8 24″ X 12″
NORTH M3-1 24″ X 12″
52 M1-4 36″ X 36″
M6-1 L 21″ X 15″

5 HANES MILL RD SP-1 30″ X 24″
DETOUR M4-8 24″ X 12″
M6-1 21″ X 15″

SEE TMP-2E FOR SPECIAL SIGN DESIGN SP-1

6 HANES MILL RD SP-1 30″ X 24″
DETOUR M4-8 24″ X 12″
M6-2 21″ X 15″

7 DETOUR M4-8 24″ X 12″
NORTH M3-1 24″ X 12″
52 M1-4 36″ X 36″
M6-1 21″ X 15″



8 DETOUR M4-8 24″ X 12″
NORTH M3-1 24″ X 12″
52 M1-4 36″ X 36″
M6-3 21″ X 15″

9 ROAD CLOSED AHEAD — W20-3 48″ X 48″
NEXT LEFT SP-4L 42″ X 12″

10 ROAD CLOSED AHEAD — W20-3 48″ X 48″
NEXT RIGHT SP-4R 42″ X 12″

MESSAGES AND LOCATIONS OF CMS's AS DIRECTED BY ENGINEER

A

MESSAGE NO. 1	MESSAGE NO. 2
RAMP TO US 52 N	CLOSED STARTING (MONTH) (DAY)

CHANGEABLE MESSAGE SIGN — BEGINNING 7 DAYS PRIOR TO ROAD CLOSURE

MESSAGE NO. 1	MESSAGE NO. 2
RAMP TO US 52 N CLOSED	DETOUR NEXT LEFT

CHANGEABLE MESSAGE SIGN — DURING ROAD CLOSURE

B

MESSAGE NO. 1	MESSAGE NO. 2
RAMP TO US 52 N CLOSED	DETOUR KEEP STRAIGHT

CHANGEABLE MESSAGE SIGN — DURING ROAD CLOSURE

C

MESSAGE NO. 1	MESSAGE NO. 2
EXIT 116 TO HANES MILL RD	CLOSED STARTING (MONTH) (DAY)

CHANGEABLE MESSAGE SIGN — BEGINNING 7 DAYS PRIOR TO ROAD CLOSURE

MESSAGE NO. 1	MESSAGE NO. 2
EXIT 116 CLOSED	

CHANGEABLE MESSAGE SIGN — DURING ROAD CLOSURE

D

MESSAGE NO. 1	MESSAGE NO. 2
EXIT 116 CLOSED AHEAD	DETOUR EXIT 115A

CHANGEABLE MESSAGE SIGN — DURING ROAD CLOSURE

APPROVED: _____

DATE: _____

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER JOHN D. STOUCHKO

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

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

TEMPORARY TRAFFIC CONTROL DETOUR US 52 NB RAMP CLOSURE

3/14/2023
G:\308350_DDCJ2\RC_U-2729\TrafficControl\Tcp\200_040_U-2729_TC_TMP_02C_US_52_NB_Ramp_Closure.dgn
User:STO86227

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-2D

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669

1 R11-2 48″ x 30″ — ROAD CLOSED / DETOUR — M4-10L 48″ x 18″
TYPE III BARRICADE

2 R11-2 48″ x 30″ — ROAD CLOSED / DETOUR — M4-10R 48″ x 18″
TYPE III BARRICADE

3 END DETOUR — M4-8A 24″ X 18″

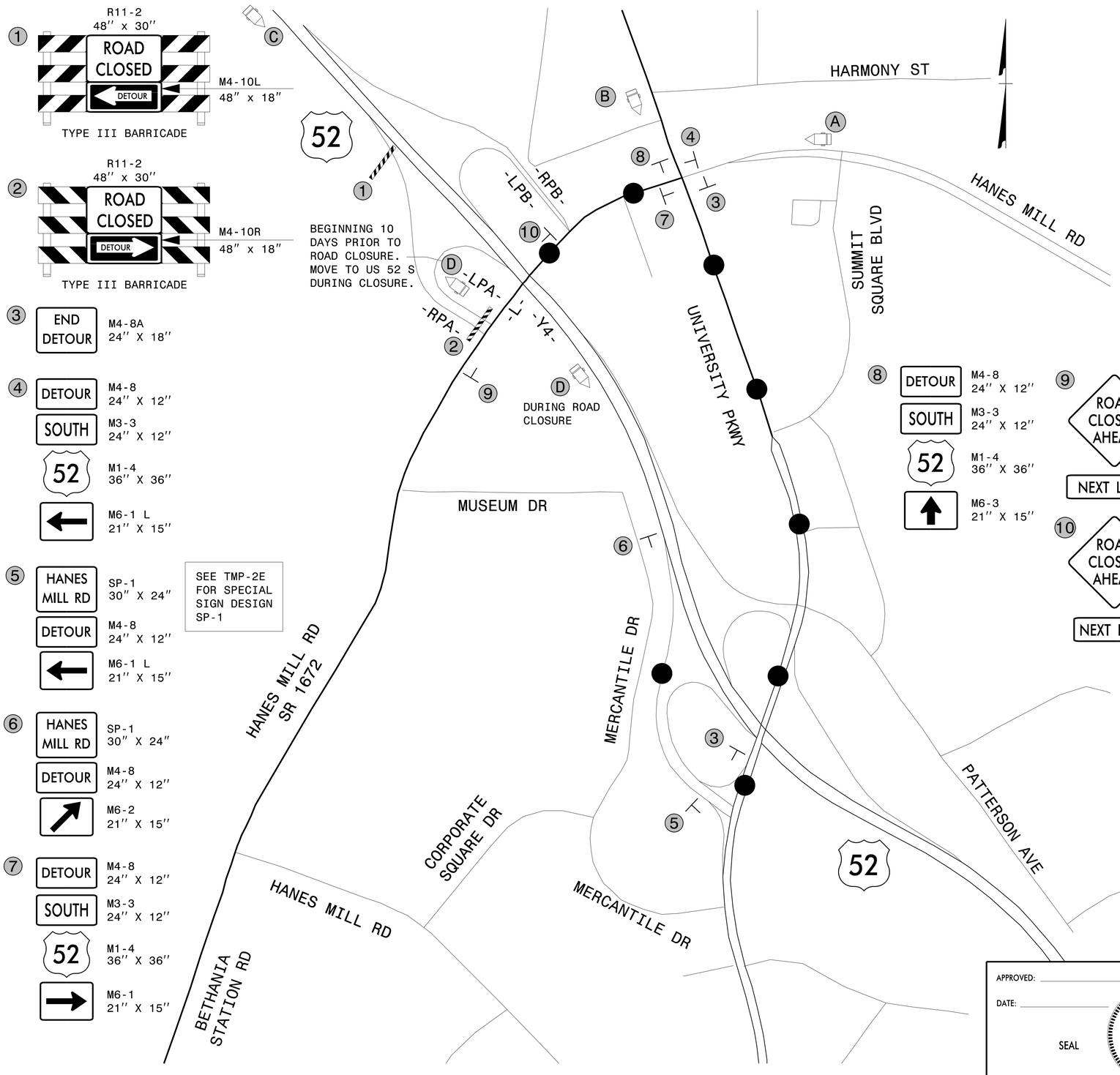
4 DETOUR — M4-8 24″ X 12″
SOUTH — M3-3 24″ X 12″
52 — M1-4 36″ X 36″
← — M6-1 L 21″ X 15″

5 HANES MILL RD — SP-1 30″ X 24″
DETOUR — M4-8 24″ X 12″
← — M6-1 L 21″ X 15″

SEE TMP-2E FOR SPECIAL SIGN DESIGN SP-1

6 HANES MILL RD — SP-1 30″ X 24″
DETOUR — M4-8 24″ X 12″
↗ — M6-2 21″ X 15″

7 DETOUR — M4-8 24″ X 12″
SOUTH — M3-3 24″ X 12″
52 — M1-4 36″ X 36″
→ — M6-1 21″ X 15″



8 DETOUR — M4-8 24″ X 12″
SOUTH — M3-3 24″ X 12″
52 — M1-4 36″ X 36″
↑ — M6-3 21″ X 15″

9 ROAD CLOSED AHEAD — W20-3 48″ X 48″
NEXT LEFT — SP-4L 42″ X 12″

10 ROAD CLOSED AHEAD — W20-3 48″ X 48″
NEXT RIGHT — SP-4R 42″ X 12″

MESSAGES AND LOCATIONS OF CMS'S AS DIRECTED BY ENGINEER

A — CHANGEABLE MESSAGE SIGN — DURING ROAD CLOSURE

MESSAGE NO. 1	MESSAGE NO. 2
RAMP TO US 52 S CLOSED	DETOUR NEXT LEFT

B — CHANGEABLE MESSAGE SIGN — DURING ROAD CLOSURE

MESSAGE NO. 1	MESSAGE NO. 2
RAMP TO US 52 S CLOSED	DETOUR KEEP STRAIGHT

C — CHANGEABLE MESSAGE SIGN — BEGINNING 7 DAYS PRIOR TO ROAD CLOSURE

MESSAGE NO. 1	MESSAGE NO. 2
EXIT 116 TO HANES MILL RD	CLOSED STARTING (MONTH) (DAY)

CHANGEABLE MESSAGE SIGN — DURING ROAD CLOSURE

MESSAGE NO. 1	MESSAGE NO. 2
EXIT 116 CLOSED AHEAD	DETOUR EXIT 115

D — CHANGEABLE MESSAGE SIGN — BEGINNING 7 DAYS PRIOR TO ROAD CLOSURE US 52 S ENTRANCE RAMP

MESSAGE NO. 1	MESSAGE NO. 2
ENTRANCE RAMP US 52 S	CLOSED STARTING (MONTH) (DAY)

CHANGEABLE MESSAGE SIGN — DURING ROAD CLOSURE US 52 S

MESSAGE NO. 1	MESSAGE NO. 2
EXIT 115 TO HANES MILL RD	THIS EXIT

APPROVED: _____

DATE: _____

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

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

TEMPORARY TRAFFIC CONTROL DETOUR US 52 SB RAMP CLOSURE

2/21/2023
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User:ST086227

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-2E

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669

SIGN NUMBER: SP-1
TYPE: STATIONARY
QUANTITY: SEE PLANS

SIGN WIDTH: 2'-6"
HEIGHT: 2'-0"
TOTAL AREA: 5.0 Sq.Ft.

BORDER TYPE: INSET
RECESS: 0.38"
WIDTH: 0.63"
RADII: 1.5"

NO. Z BARS:
LENGTH:

BACKG COLOR: Fluorescent Orange
COPY COLOR: Black

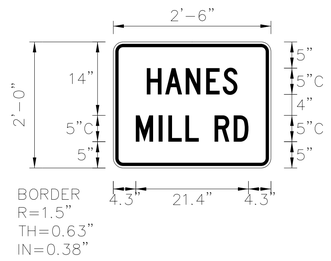
SYMBOL	X	Y	WID	HT

MAT'L: 0.080" (2.0 mm) ALUMINUM

USE NOTES: 1,2

1. Legend and border shall be direct applied black non-reflective sheeting.
2. Background shall be NC GRADE B fluorescent orange retroreflective sheeting.

DESIGN BY: S COLEMAN
CHECKED BY: D BISSETTE
Nov 17, 2021
PROJECT ID: U-2729
LOCATION: WINSTON-SALEM
DIV: 9



Spacing Factor is 1 unless specified otherwise

LETTER POSITIONS

Letter spacings are to start of next letter

																										Series/Size Text Length
		H	A	N	E	S																				C 2000
	6.4	3.5	3.9	3.9	3.2	2.8	6.4																			17.3
		M	I	L	L		R	D																		C 2000
	4.3	4.4	1.8	3.3	2.6	3	3.6	2.8	4.3																	21.4

FILENAME: WZTC Sign Designs

NORTH CAROLINA D.O.T. SIGN DETAIL

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

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

TEMPORARY TRAFFIC CONTROL SPECIAL SIGN DESIGN

2/2/2023
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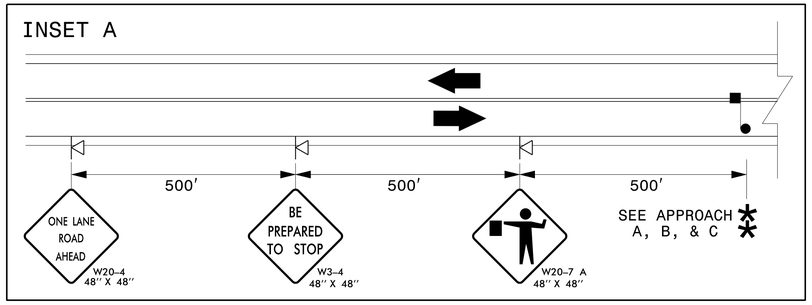
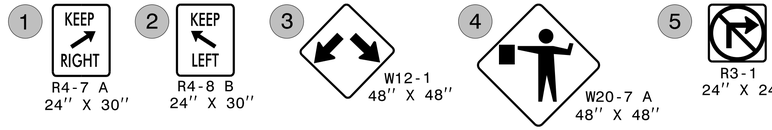
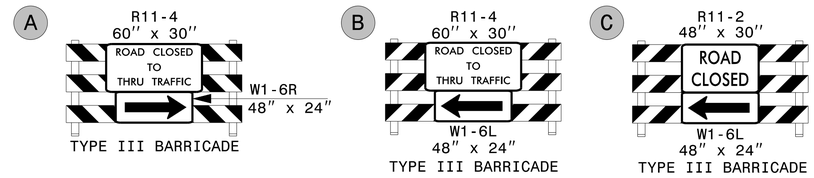
User:ST086227

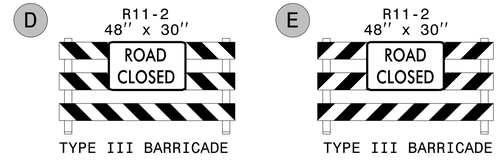
PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-2F

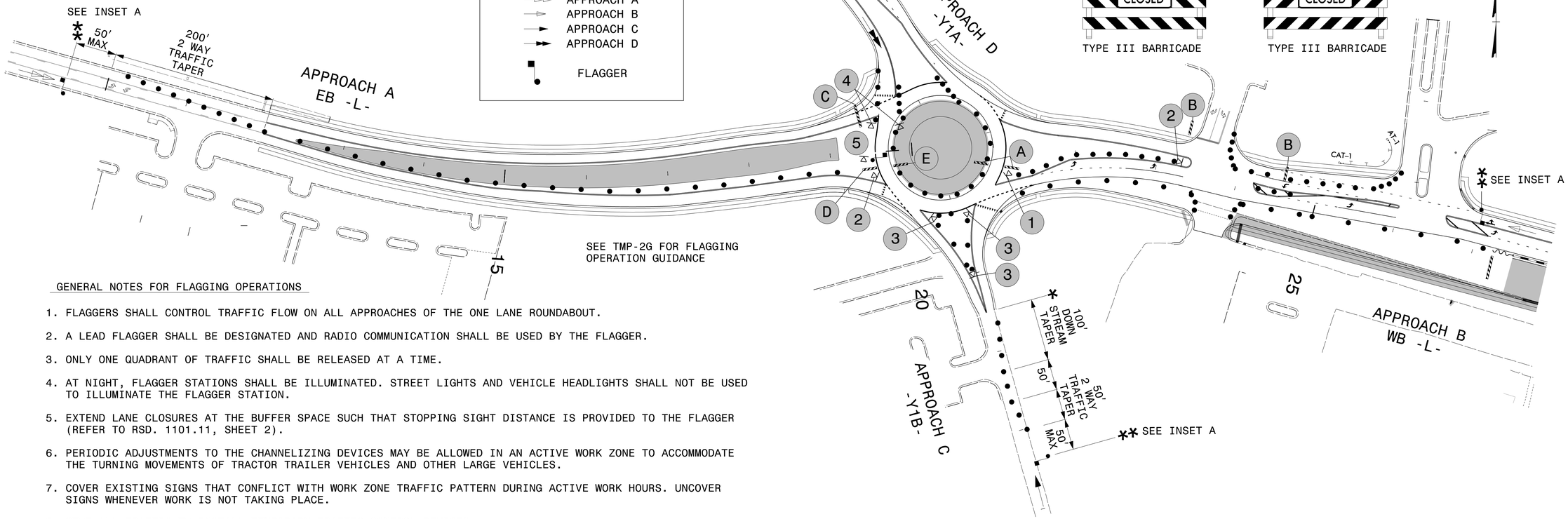
PLANS PREPARED FOR THE NCDOT BY:
MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669











GENERAL NOTES FOR FLAGGING OPERATIONS

1. FLAGGERS SHALL CONTROL TRAFFIC FLOW ON ALL APPROACHES OF THE ONE LANE ROUNDABOUT.
2. A LEAD FLAGGER SHALL BE DESIGNATED AND RADIO COMMUNICATION SHALL BE USED BY THE FLAGGER.
3. ONLY ONE QUADRANT OF TRAFFIC SHALL BE RELEASED AT A TIME.
4. AT NIGHT, FLAGGER STATIONS SHALL BE ILLUMINATED. STREET LIGHTS AND VEHICLE HEADLIGHTS SHALL NOT BE USED TO ILLUMINATE THE FLAGGER STATION.
5. EXTEND LANE CLOSURES AT THE BUFFER SPACE SUCH THAT STOPPING SIGHT DISTANCE IS PROVIDED TO THE FLAGGER (REFER TO RSD. 1101.11, SHEET 2).
6. PERIODIC ADJUSTMENTS TO THE CHANNELIZING DEVICES MAY BE ALLOWED IN AN ACTIVE WORK ZONE TO ACCOMMODATE THE TURNING MOVEMENTS OF TRACTOR TRAILER VEHICLES AND OTHER LARGE VEHICLES.
7. COVER EXISTING SIGNS THAT CONFLICT WITH WORK ZONE TRAFFIC PATTERN DURING ACTIVE WORK HOURS. UNCOVER SIGNS WHENEVER WORK IS NOT TAKING PLACE.
8. STOP ALL TRAFFIC TO INSTALL TEMPORARY TRAFFIC CONTROL DEVICES.
9. INSTALL LANE CLOSURES WITH THE TRAFFIC FLOW, BEGINNING WITH DEVICES ON THE UPSTREAM SIDE OF TRAFFIC.
10. REMOVE LANE CLOSURES AGAINST THE TRAFFIC FLOW, BEGINNING WITH DEVICES ON THE DOWNSTREAM SIDE OF TRAFFIC.
11. PLACE DRUMS THRU THE WORK AREA AT THE MAXIMUM SPACING OF 40′. PLACE DRUMS AT A MAXIMUM SPACING OF 10′ ON CENTER AT TAPERS AND CIRCLE CIRCULATION OPENINGS.
12. DRUMS OR SKINNY DRUMS MAY BE USED IN LIEU OF CONES. REFER TO RSD. 1180.01 FOR SKINNY DRUM REQUIREMENTS.
13. A SUPPLEMENTAL FLAGGER MAY BE USED WITHIN THE CIRCULATORY ROADWAY FOR ADDITIONAL GUIDANCE FOR TRAFFIC AS NEEDED AND/OR AS DIRECTED BY ENGINEER.
14. FLAGGING OPERATIONS MAY NOT BE NECESSARY WHEN WORKING ON THE SHOULDERS OR IN THE ISLAND OF THE ROUNDABOUT. IF A DRIVING LANE(S) WIDTH OF AT LEAST 10 FEET CAN BE MAINTAINED WHILE SHOULDER WORK ON AN APPROACH IS BEING CONDUCTED, THE DRIVING LANE(S) MAY REMAIN OPEN TO TRAFFIC. ROAD WORK AHEAD, SHOULDER WORK AHEAD AND/OR SHOULDER CLOSED SIGNS SHOULD BE USED WHERE APPLICABLE, ALONG THE LANE OR SHOULDER TAPERS AND WORK AREA DELINEATION.
15. REFER TO THE CURRENT MUTCD FOR FLAGGER CONTROL, REQUIREMENTS, AND PROCEDURES.

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

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

TEMPORARY TRAFFIC CONTROL ROUNDABOUT FLAGGING OPERATION

2/21/2023
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User:ST086227

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-2G

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669

APPROACH A
EB -L-

APPROACH A
FLAGGER PANEL - SLOW

APPROACH D
-Y1A-

APPROACH C
-Y1B-

APPROACH B
WB -L-

APPROACH B
FLAGGER PANEL - SLOW

APPROACH A
EB -L-

APPROACH D
-Y1A-

APPROACH C
-Y1B-

APPROACH B
WB -L-

APPROACH C
FLAGGER PANEL - SLOW

APPROACH A
EB -L-

APPROACH D
-Y1A-

APPROACH C
-Y1B-

APPROACH B
WB -L-

APPROACH D
FLAGGER PANEL - SLOW

APPROACH A
EB -L-

APPROACH D
-Y1A-

APPROACH C
-Y1B-

APPROACH B
WB -L-

TRAFFIC FLOW ARROWS
- APPROACH A
- APPROACH B
- APPROACH C
- APPROACH D
- FLAGGER

SEE SHEET TMP-2F FOR TEMPORARY SIGNING, FLAGGER LOCATION, AND GENERAL NOTES

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

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

TEMPORARY TRAFFIC CONTROL ROUNDABOUT FLAGGING OPERATION

3/13/2023
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User:ST086227

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-3

PLANS PREPARED FOR THE NCDOT BY:
MOTT MACDONALD
MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669

NOTES:

INSTALL WORK ZONE ADVANCE WARNING SIGNS USING SHEETS TMP-4, TMP-7, TMP-9, TMP-12, TMP-13, TMP-14 AND RSD 1101.01 SHEETS 1, 2 AND 3 OF 3 PRIOR TO BEGINNING ANY WORK.

MAINTAIN VEHICULAR ACCESS TO ALL RESIDENCES AND BUSINESSES DURING THE LIFE OF THE CONTRACT UNLESS OTHERWISE NOTED IN THE PHASING OR DIRECTED BY THE ENGINEER.

COMPLETE ANY PROPOSED OR TEMPORARY WIDENING IN SUCH A MANNER THAT NO PONDING OF WATER WILL OCCUR WITHIN THE TRAVEL LANE.

COMPLETE PAVING UP TO, BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE, UNTIL STATED TO PLACE FINAL LAYER IN WRITTEN PHASING OR AS DIRECTED BY ENGINEER.

FOR ALL SHOULDER CLOSURES, SEE 1101.04. WHEN PORTABLE CONCRETE BARRIER (PCB) IS PRESENT ON SHOULDERS, PLACE SHOULDER CLOSURE SIGNS IN ADVANCE OF PCB.

PLACE TEMPORARY PAVEMENT MARKING EDGELINE AT LOCATIONS WHERE EXISTING CURB AND GUTTER IS REMOVED DURING WIDENING OF ROADWAY

USE RSD 1101.03, SHEET 9 OF 9 FOR NIGHT TIME SHORT TERM ROAD CLOSURES.

USE RSD 1101.02, SHEETS 11 AND 12 OF, AS NEEDED FOR PAVEMENT MARKING OPERATIONS.

WHERE THE CONSTRUCTION OF PROPOSED DRAINAGE IS REQUIRED ACROSS EXISTING SIDEWALK, CLOSE EXISTING SIDEWALK USING ADA COMPLIANT CHANNELIZATION DEVICES AND PROVIDE PEDESTRIAN TRANSPORT SERVICE DURING THE DURATION OF THE WORK, REPAIR EXISTING SIDEWALK AND OPEN TO PEDESTRIAN TRAFFIC.

USE TEMPORARY PEDESTRIAN CHANNELIZATION DEVICES AND TEMPORARY CHANNELIZATION DEVICE SIGNING AS SHOWN IN THE TEMPORARY TRAFFIC CONTROL PLANS TO MAINTAIN CLOSURE OF PROPOSED SIDEWALK. SECTIONS OF PROPOSED SIDEWALKS MAY BE OPENED TO PEDESTRIAN TRAFFIC UPON COMPLETION AS DIRECTED BY ENGINEER WHERE PEDESTRIAN TRAFFIC WILL NOT BE DIRECTED INTO PROPOSED CONSTRUCTION.

PHASE I

STEP 1

USING RSD 1101.02, SHEETS 4, 9 AND 10 OF 14 AS NEEDED, CONSTRUCT TEMPORARY PAVEMENT ON THE OUTSIDE SHOULDER OF US 52 NB EXIT LANE (-Y4-) FROM STA 64+74+/- TO STA 66+25+/- AS SHOWN ON TMP-6 (4′ WIDE FROM EXISTING EOT)

USING TMP-6, RSD 1101.02, SHEETS 1 AND 2 OF 14 AND FLAGGERS AS NEEDED:
* CONSTRUCT TEMPORARY PAVEMENT ON THE LEFT SIDE OF EXISTING -L- FROM STA 31+64+/- TO THE EXISTING BRIDGE DECK AND PLACE TEMPORARY ANCHORED PCB AND CRASH CUSHION AS SHOWN USING A TEMPORARY ATTACHEMENT TO THE EXISTING BRIDGE RAIL
* CONSTRUCT TEMPORARY PAVEMENT ON THE LEFT SIDE OF EXISTING -L- FROM THE EXISTING BRIDGE DECK TO STA 36+80+/- AND PLACE TEMPORARY ANCHORED PCB AND CRASH CUSHION AS SHOWN USING A TEMPORARY ATTACHEMENT TO THE EXISTING BRIDGE RAIL
* REPLACE EXISTING EDGELINE ON THE LEFT SIDE OF EXISTING -L- AND ON EXISTING -LPB- WITH TEMPORARY PAVEMENT EDGELINE AS SHOWN ON TMP-6

USING RSD 1101.02, SHEETS 4 AND 9 OF 14, EXTEND EXISTING GUARDRAIL ON THE OUTSIDE SHOULDER OF US 52 SB TO THE SAME END LOCATION AS THE PROPOSED GUARDRAIL AS SHOWN ON TMP-6 SPACING GUARDRAIL TO AVOID GAS LINE

STEP 2

USING RSD 1101.02, SHEETS 4 AND 10 OF 14, PLACE TEMPORARY PCB AND CRASH CUSHIONS ON THE OUTSIDE SHOULDER OF US 52 NB AS SHOWN ON TMP-6

STEP 3

BEHIND BARRIER AND GUARDRAIL, BEGIN CONSTRUCTION OF THE FOLLOWING:
* LEFT SIDE OF -L- FROM STA 31+33+/- TO END BENT 1 USING TEMPORARY SHORING AS NEEDED TO MAINTAIN EXISTING TRAFFIC ON EXISTING -L-
* STAGE 1 OF BENT 2 USING TEMPORARY SHORING AS NEEDED TO MAINTAIN EXISTING TRAFFIC ON -Y4-
* LEFT SIDE OF -L- FROM END BENT 2 TO STA 36+05+/- USING TEMPORARY SHORING AS NEEDED TO MAINTAIN EXISTING TRAFFIC ON EXISTING -L-

STEP 4

USING RSD 1101.02, SHEETS 4, 9 AND 10 OF 14 AS NEEDED, PLACE TEMPORARY PAVEMENT MARKINGS ON -Y4- AS SHOWN ON TMP-4 THRU TMP-7 AND SHIFT TRAFFIC TO NEW TEMPORARY PATTERN ON -Y4-

STEP 5

USING RSD 1101.02, SHEET 4 OF 14 AS NEEDED:
* CONSTRUCT 5′ OF THE PROPOSED INSIDE SHOULDER OF US 52 SB ON -Y4- FROM STA 64+49+/- TO STA 67+66+/- AS SHOWN ON TMP-6
* CONSTRUCT 4′ OF THE PROPOSED INSIDE SHOULDER OF US 52 NB ON -Y4- FROM STA 64+48+/- TO STA 67+60+/- AS SHOWN ON TMP-6
* REMOVE AND REPLACE EXISTING INSIDE SHOULDER OF US 52 SB ON -Y4- FROM STA 61+00+/- TO STA 64+49+/- AND FROM STA 67+66+/- TO STA 72+55+/- AS SHOWN ON TMP-6 AND TMP-7
* REMOVE AND REPLACE EXISTING INSIDE SHOULDER OF US 52 NB ON -Y4- FROM STA 61+00+/- TO STA 64+48+/- AND FROM STA 67+60/- TO STA 72+55+/- AS SHOWN ON TMP-6 AND TMP-7

STEP 6

USING RSD 1101.02, SHEET 4 OF 14 AS NEEDED, PLACE TEMPORARY PCB AND CRASH CUSIONS ON THE INSIDE SHOULDERS OF US 52 (-Y4-) AS SHOWN ON TMP-8 (NOTE: MAINTAIN A FLAT AND EVEN SURFACE FOR A CLEAR DISTANCE OF 3.5′ BEHIND TEMPORARY PCB)

STEP 7

BEHIND BARRIER:
* REMOVE EXISTING GUARDRAIL IN THE CENTER MEDIAN AS SHOWN ON ROADWAY PLANS AND PLACE A TEMPORARY GREU ON THE INSIDE SHOULDER OF NB US 52 (TMP-8)
* BEGIN STAGE 1 CONSTRUCTION OF BENT 1 USING TEMPORARY SHORING AS NEEDED TO MAINTAIN EXISTING TRAFFIC ON SB AND NB US 52 (-Y4-) (TMP-8)

USING SHORT TERM ROAD CLOSURES AS NEEDED TO HANG GIRDERS, BEGIN CONSTRUCTION OF STAGE 1 BRIDGE DECK

PHASE II

STEP 1:

USING RSD 1101.02, SHEET 1, 2 AND 3 OF 14, SHEETS TMP-9, TMP-11, TMP-12, FLAGGERS AND LAW ENFORCEMENT AS NEEDED, BEGIN INSTALLATIONT OF TEMPORARY SIGNALS (SEE SIGNAL PLANS) AND COVER HEADS AS NEEDED AT THE FOLLOWING:
- 09-0699T1 AT THE INTERSECTION OF -L- AND -Y1A-/-Y1B- (TMP-9)
- 09-1105T1 AT THE INTERSECTION OF -L- AND -LPB-/-RPB-/-Y5- (TMP-11)
- 09-0557T1 AT THE INTERSECTION OF -L- AND -Y6A-/-Y6B- (TMP-12)

STEP 2:

USING RSD 1101.02, SHEET 1, 2 AND 3 OF 14, SHEETS TMP-9 THRU TMP-14, FLAGGERS AND LAW ENFORCEMENT AS NEEDED:
* PLACE TEMPORARY PAVEMENT MARKINGS ON -L-, -Y2-, -RPA, -Y5-, -Y6A-, AND -Y6B-
* REMOVE CONFLICTING EXISTING PAVEMENT MARKINGS
* COMPLETE INSTALLATION OF TEMPORARY SIGNALS (SEE SIGNAL PLANS) AT THE FOLLOWING:
  - 09-0699T1 AT THE INTERSECTION OF -L- AND -Y1A-/-Y1B- (TMP-9)
  - 09-1105T1 AT THE INTERSECTION OF -L- AND -LPB-/-RPB-/-Y5- (TMP-11)
  - 09-0557T1 AT THE INTERSECTION OF -L- AND -Y6A-/-Y6B- (TMP-12)
* SHIFT TRAFFIC TO NEW TEMPORARY PATTERN

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

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

TEMPORARY TRAFFIC CONTROL PHASING

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-3A

PLANS PREPARED FOR THE NCDOT BY:
MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669

STEP 3:

USING RSD 1101.02, SHEETS 1 AND 2 OF 14, AND FLAGGERS AS NEEDED, BEGIN CONSTRUCTION OF THE FOLLOWING:
* RIGHT SIDE OF -L- FROM STA 12+00+/- TO -RDBT- INCLUDING WEDGING OF THE EXISTING ROADWAY AS NEEDED TO MAINTAIN EXISTING TRAFFIC (TMP-9)
* RIGHT SIDE OF -L- FROM -RDBT- TO STA 23+63+/- INCLUDING WEDGING OF THE EXISTING ROADWAY AS NEEDED TO MAINTAIN EXISTING TRAFFIC (TMP-9)
* -RDBT- ON RIGHT SIDE OF EXISTING HANES MILL RD (-L-) AS SHOWN ON TMP-9
* TEMPORARY PAVEMENT BETWEEN EXISTING HANES MILL RD AND -RDBT- ON EACH SIDE OF EXISTING MUSEUM RD (-Y1B-) (AT CENTER ISLAND OF PROPOSED -RDBT-)AS SHOWN ON TMP-9
* -Y1B- FROM -L- TO STA 11+50+/- (TMP-9)
* TEMPORARY PAVEMENT ON THE RIGHT SIDE OF EXISTING -Y1A- AS SHOWN ON TMP-9
* LEFT SIDE OF -L- FROM 23+81+/- TO STA 29+51+/- (TMP-9 AND TMP-10)
* -Y2- INCLUDING MEDIAN ISLAND FROM 11+26+/- TO -L- (TMP-10)
* LEFT SIDE OF -Y5- FROM -L- TO STA 11+76+/- (TMP-11)
* LEFT SIDE OF -L- FROM STA 36+05+/- TO STA 36+50+/-
* RIGHT SIDE OF -L- FROM -Y5- TO STA 40+88+/- (TMP-11 AND TMP-12)

USING RSD 1101.02, SHEET 3 OF 14, AS NEEDED, BEGIN CONSTRUCTION OF THE FOLLOWING:
* RIGHT SIDE OF -L- FROM STA 40+88+/- TO STA 52+50+/- (TMP-12 AND TMP-13)
* -Y6B- FROM -L- TO STA 13+30+/- (TMP-12)
* INSTALLATION OF METAL POLES FOR FINAL SIGNAL AT THE INTERSECTION OF -L- AND -Y6A-/-Y6B- (SEE TEMPORARY SIGNAL 09-0557T4 AND SIGNAL PLANS FOR LOCATION OF PROPOSED FINAL METAL POLES)
* CURB AND GUTTER ON LEFT SIDE OF -Y6A- FROM HARMONY ST TO STA 17+27+/- (TMP-12 AND TMP-14)

STEP 4

USING RSD 1101.02, SHEET 3 OF 14, PERFORM THE FOLLOWING:

A. PLACE TEMPORARY ADA COMPLIANT PEDESTRIAN CHANNELIZATION ON THE RIGHT SIDE OF EXISTING SIDEWALK ON THE RIGHT SIDE OF -Y6A- (TMP-12 AND TMP-14)

B. AWAY FROM TRAFFIC, BEGIN CONSTRUCTION OF PROPOSED RETAINING WALL, SIDEWALK, CURB AND GUTTER ON THE RIGHT SIDE OF -Y6A- FROM SUNBURST CIRCLE TO -L- AS SHOWN ON TMP-12 AND TMP-14

BEGIN CONSTRUCTION OF THE LEFT SIDE OF -L- FROM STA 42+76+/- TO -L- 43+70+/- AS SHOWN ON TMP-12 (NOTE: MAINTAIN EXISTING SIDEWALK AND CURB RAMP)

C. CLOSE EXISTING SIDEWALK ON THE RIGHT SIDE OF -Y6A- FROM STA 11+00+/- TO SUNBURST CIRCLE AND PROVIDE PEDESTRIAN TRANSPORTATION SERVICE. (SEE SPECIAL PROVISIONS)

D. CONSTRUCT RIGHT SIDE OF -Y6A- FROM STA 11+00+/- TO SUNBURST CIRCLE AS SHOWN ON TMP-14

E. OPEN PROPOSED SIDEWALK ON THE RIGHT SIDE OF -Y6A- FROM STA 11+00+/- TO SUNBURST CIRCLE

F. COMPLETE CONSTRUCTION OF PROPOSED RETAINING WALL, SIDEWALK, CURB AND GUTTER, AND 6′ OF PROPOSED PAVEMENT ON THE RIGHT SIDE OF -Y6A- FROM SUNBURST CIRCLE TO -L- AS SHOWN ON TMP-12, TMP-14, AND TMP-12B

COMPLETE CONSTRUCTION OF THE PROPOSED SIDEWALK, CURB AND GUTTER ON THE LEFT SIDE OF -L- FROM STA 42+76+/- TO STA 43+70+/- AS SHOWN ON TMP-12 AND TMP-12B

G. CLOSE EXISTING SIDEWALK ON THE RIGHT SIDE OF -Y6A- FROM SUNBURST CIRCLE TO -L- AND PLACE PEDESTRIAN TRAFFIC ON PROPOSED SIDEWALK AS SHOWN ON TMP-12B (NOTE: PLACE ADA COMPLIANT PEDESTRIAN CHANNELIZATION AT -L- STA 43+70+/-)

H. CONSTRUCT PAVEMENT WIDENING ON THE RIGHT SIDE OF -Y6A- FROM SUNBURST CIRCLE TO -L- INCLUDING WIDENING ON THE LEFT SIDE OF -L- FROM STA 43+50+/- TO -Y6A- (TMP-12B)

STEP 5

USING RSD 1101.02, SHEETS 1 AND 2 OF 14, AND FLAGGERS AS NEEDED, COMPLETE CONSTRUCTION OF THE FOLLOWING:
* RIGHT SIDE OF -L- FROM STA 12+00+/- TO -RDBT- INCLUDING WEDGING OF THE EXISTING ROADWAY AS NEEDED TO MAINTAIN EXISTING TRAFFIC (TMP-9)
* RIGHT SIDE OF -L- FROM -RDBT- TO STA 23+63+/- INCLUDING WEDGING OF THE EXISTING ROADWAY AS NEEDED TO MAINTAIN EXISTING TRAFFIC (TMP-9)
* -RDBT- ON RIGHT SIDE OF EXISTING HANES MILL RD (-L-) AS SHOWN ON TMP-9
* TEMPORARY PAVEMENT BETWEEN EXISTING HANES MILL RD AND -RDBT- AS SHOWN ON TMP-9
* -Y1B- FROM -L- TO STA 11+50+/- (TMP-9)
* TEMPORARY PAVEMENT ON THE RIGHT SIDE OF -Y1A- AS SHOWN ON TMP-9
* LEFT SIDE OF -Y5- FROM -L- TO STA 11+76+/- (TMP-11)
* RIGHT SIDE OF -L- FROM STA -Y5- TO STA 40+88+/- (TMP-11 AND TMP-12)

USING RSD 1101.02, SHEET 3 OF 14, AS NEEDED, COMPLETE CONSTRUCTION OF THE FOLLOWING:
* RIGHT SIDE OF -L- FROM STA 40+88+/- TO STA 52+50+/- (TMP-12 AND TMP-13)
* -Y6B- FROM -L- TO STA 13+30+/- (TMP-12)

PHASE III

STEP 1

USING RSD 1101.02, SHEETS 1, 2 AND 3 OF 14, FLAGGERS AND LAW ENFORCEMENT AS NEEDED:
* PLACE TEMPORARY PAVEMENT MARKING ON -L-, -Y1A-, -Y1B-, -Y5-, -Y6A- AND -Y6B- AS SHOWN ON TMP-15 THRU TMP-19
* MODIFY AND ACTIVATE THE FOLLOWING TEMPORARY SIGNALS FOR PHASE III TEMPORARY TRAFFIC PATTERN:
  - 09-0699T2 AT THE INTERSECTION OF -L- AND -Y1A-/-Y1B- (TMP-15)
  - 09-1105T2 AT THE INTERSECTION OF -L- AND -LPB-/-RPB-/-Y5- (TMP-16)
  - 09-0557T2 AT THE INTERSECTION OF -L- AND -Y6A-/-Y6B- (TMP-17)
* SHIFT TRAFFIC TO NEW TEMPORARY PHASE III PATTERN
* CLOSE PRIVATE DRIVEWAY RAMP AT THE INTERSECTION OF -L- AND -Y1A- USING TYPE III BARRICADES AND BARRICADE MOUNTED SIGNS (TMP-15)

OPEN PROPOSED SIDEWALK AT THE FOLLOWING:
* RIGHT SIDE OF -L- STA 12+00+/- TO 23+63+/- (TMP-15)
* RIGHT SIDE OF -L- FROM -Y5- TO SUMMIT SQUARE BLVD (TMP-16, TMP-17 AND TMP-18)

CLOSE EXISTING SIDEWALK ON THE LEFT SIDE OF -L- FROM -Y6A- TO EXISTING BUS STOP AND DETOUR PEDESTRIAN THRU TRAFFIC TO THE RIGHT SIDE OF -L- FROM -Y6B- TO SUMMIT SQUARE BLVD (TMP-17 AND TMP-18) (NOTE: MAINTAIN EXISTING PEDESTRIAN TRAFFIC FROM SUMMIT SQUARE BLVD TO EXISTING BUS STOP)

STEP 2

USING RSD 1101.02, SHEETS 1 AND 2 OF 14, AND FLAGGERS AS NEEDED, BEGIN CONSTRUCTION OF THE FOLLOWING:
* LEFT SIDE OF -L- FROM STA 12+00+/- TO STA 19+34+/-. (TMP-15)
* LEFT SIDE OF -L- FROM -RDBT- TO STA 23+81+/-. (TMP-15)
* LEFT SIDE OF -L- FROM STA 38+30+/- TO STA 42+76+/- (TMP-16 AND TMP-17)

USING RSD 1101.02, SHEET 3 OF 14, CONSTRUCT THE FOLLOWING:
* LEFT SIDE OF -L- PROPOSED SIDEWALK, CURB AND GUTTER AND A MINIMUM OF 6′ OF PROPOSED PAVEMENT FROM STA 44+74+/- TO STA 47+65+/- AS SHOWN ON TMP-17
* LEFT SIDE OF -L- FROM STA 47+65+/- TO STA 51+00+/- AS SHOWN ON TMP-17 AND TMP-18
* REMOVE EXISTING MONOLITHIC ISLAND, BEGIN PROPOSED DRAINAGE IN CENTER MEDIAN, AND REPAIR EXISTING PAVEMENT FROM STA 51+80+/- TO STA 52+50+/- (TMP-18)
* LEFT SIDE WIDENING OF -Y6A- FROM STA 11+46+/- TO -L- INCLUDING -L- FROM -Y6A- TO STA 44+74+/-(TMP-17 AND TMP-19)

STEP 3

A. PLACE TEMPORARY PCB AND CRASH CUSHIONS ON THE LEFT SIDE OF -Y1A- AS SHOWN ON TMP-15

B. USING RSD 1101.02, SHEETS 1 AND 2 OF 14 AND FLAGGERS AS NEEDED:
   * CONSTRUCT THE LEFT SIDE OF -Y1A-, -RDBT- FROM -Y1A- TO -L-, AND TEMPORARY PAVEMENT AS SHOWN ON TMP-15 USING TEMPORARY SHORING AS NEEDED TO MAINTAIN EXISTING TRAFFIC, WEDGING EXISTING ROADWAY AS NEEDED TO TRANSITION TRAFFIC TO PHASE IV TRAFFIC PATTERN AT THE INTERSECTION OF -L- AND -Y1A-/-Y1B-
   * COMPLETE CONSTRUCTION OF THE LEFT SIDE OF -L- FROM -RDBT- TO STA 23+81+/- AS SHOWN ON TMP-15
   * COMPLETE CONSTRUCTION OF THE LEFT SIDE OF -L- FROM STA 23+81+/-TO -Y2- AND THE RIGHT SIDE OF -Y2- AS SHOWN ON TMP-15 AND TMP-16
   * COMPLETE CONSTRUCTION OF THE CENTER ISLAND OF -Y2- (TMP-16)

   USING RSD 1101.02, SHEET 3 OF 14, COMPLETE CONSTRUCTION OF THE LEFT SIDE OF -Y6A- FROM STA 11+46+/- TO -L- AS SHOWN ON TMP-17 AND TMP-19 (SEE ALSO TMP-22)

C. AWAY FROM TRAFFIC PLACE TEMPORARY ANCHORED PCB AND CRASH CUSHIONS ON -Y1A- AS SHOWN ON TMP-20

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL ENGINEER SEAL 034437 LORI D. STOUCHKO

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

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

TEMPORARY TRAFFIC CONTROL PHASING

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-3B

PLANS PREPARED FOR THE NCDOT BY:
MOTT MACDONALD
MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669

PHASE IV

STEP 1

USING RSD 1101.02, SHEETS 1, AND 2 OF 14, FLAGGERS AND LAW ENFORCEMENT AS NEEDED:
* PLACE TEMPORARY PAVEMENT MARKINGS ON -L- FROM THE INTERSECTION OF -L- AND -Y1A-/-Y1B- TO -Y2- AS SHOWN ON TMP-20 AND TMP-21
* PLACE TEMPORARY PAVEMENT MARKINGS ON -Y1A- AND -Y1B- AS SHOWN ON TMP-20
* MODIFY AND ACTIVATE THE TEMPORARY SIGNAL 09-0699T3 AT THE INTERSECTION OF -L- AND -Y1A-/-Y1B-
* SHIFT TRAFFIC TO PHASE IV TRAFFIC PATTERN

USING RSD 1101.02, SHEET 3 OF 14, AND LAW ENFORCEMENT AS NEEDED:
* PLACE TEMPORARY PAVEMENT MARKINGS ON -L- FROM THE INTERSECTION OF -L- AND -Y6A-/-Y6B- TO SUMMIT SQUARE BLVD AS SHOWN ON TMP-22 AND TMP-23
* MODIFY AND ACTIVATE THE TEMPORARY SIGNAL 09-0557T3 AT THE INTERSECTION OF -L- AND -Y6A-/-Y6B-
* SHIFT TRAFFIC TO PHASE IV TRAFFIC PATTERN

OPEN PROPOSED SIDEWALK ON THE LEFT SIDE OF -L- FROM -Y6A- TO SUMMIT SQUARE BLVD

PLACE AND COVER TEMPORARY TRAFFIC CONTROL SIGNING FOR CLOSURE OF -LPB- AND -RPB- USING RSD 1101.03, SHEETS 1, AND 2 OF 9 AND TMP-21 AND TMP-2C

STEP 2

BEHIND BARRIER AND AWAY FROM TRAFFIC, BEGIN CONSTRUCTION AS SHOWN ON TMP-20 OF THE FOLLOWING:
* RIGHT SIDE OF -Y1A- FROM STA 9+50+/- TO -RDBT-
* -RDBT- FROM -L- STA 19+34+/- TO -Y1A-

USING RSD 1101.02, SHEET 3 OF 14 AS NEEDED, BEGIN CONSTRUCTION OF THE LEFT SIDE OF PROPOSED PAVEMENT ON THE LEFT SIDE OF -L- FROM -Y6A- TO STA 47+65+/- AS SHOWN ON TMP-22

NOTE: COORDINATE WITH ENGINEER CONSTRUCTION OF PHASE IV STEP 3

STEP 3:

A. CLOSE EXISTING SIDEWALK ON THE LEFT SIDE OF -L- FROM STA 51+00+/- TO SUMMIT SQUARE BLD AND DETOUR PEDESTRIAN TRAFFIC THE RIGHT SIDE OF -L-
B. USING RSD 1101.02, SHEET 3 OF 14 AS NEEDED, CONSTRUCT THE LEFT SIDE OF -L- FROM STA 51+00+/- TO STA 52+50+/- AS SHOWN ON TMP-23
C. OPEN PROPOSED SIDEWALK ON THE LEFT SIDE OF -L- FROM STA 51+00+/- TO SUMMIT SQUARE BLD

COMPLETE THE REQUIREMENTS OF PHASE IV, STEP 4 THROUGH PHASE IV, STEP 6 IN 30 DAYS. (SEE INTERMEDIATE CONTRACT TIME AND LIQUIDATED DAMAGES.)

STEP 4

USING RSD 1101.02 SHEETS 1, 2 AND 3 OF 14, FLAGGERS AND LAW ENFORCEMENT AS NEEDED:
* MODIFY AND ACTIVATE TEMPORARY SIGNAL 09-1105T3 AT THE INTERSECTION OF -L- AND -LPB-/-RPB-/-Y5- (TMP-21)
* UNCOVER DETOUR SIGNS (TMP-21 AND TMP-2C)
* PLACE TYPE III BARRICADES AS SHOWN ON TMP-21 AND TMP-2C TO CLOSE RAMPS -LPB- AND -RPB-
* CLOSE -LPB- AND -RPB- AND DETOUR EXISTING TRAFFIC
* PLACE TEMPORARY PAVEMENT MARKING EDGELINE ON THE LEFT SIDE OF -L- AT RAMPS -LPB- AND -RPB- (TMP-21)

STEP 5

USING RSD 1101.02 SHEETS 1 AND 2 OF 14 AND FLAGGERS AS NEEDED:
* CONSTRUCT -L- FROM STA 36+50+/- TO STA 38+30+/- INCLUDING WEDGING ON EXISTING -L- TO MAINTAIN EXISTING TRAFFIC. (TMP-21)
* COMPLETE CONSTRUCTION OF -L- FROM STA 38+30+/- TO STA 40+00+/- AS SHOWN ON TMP-21 AND TMP-22

AWAY FROM TRAFFIC, CONSTRUCT -LPB- AND -RPB- (TMP-21)

AWAY FROM TRAFFIC, BEGIN CONSTRUCTION OF FINAL SIGNAL POLES FOR TEMPORARY SIGNAL 09-1105T6 (SEE TMP-31 AND SIGNAL PLANS)

STEP 6

USING RSD 1101.02, SHEETS 1 AND 2 OF 14 AND LAW ENFORCEMENT AS NEEDED, COMPLETE THE FOLLOWING: (TMP-21A)
* MODIFY AND ACTIVATE TEMPORARY SIGNAL 09-1105T4 AT THE INTERSECTION OF -L- AND -LPB-/-RPB-/-Y5- (TMP-21A) (SEE SIGNAL PLANS)
* PLACE TEMPORARY PAVEMENT MARKINGS ON -L-, -LPB- AND -RPB- AS SHOWN IN TMP-21A
* PLACE TRAFFIC INTO NEW TEMPORARY PATTERN ON -L-. -LPB- AND RPB-
* REMOVE/COVER TRAFFIC CONTROL DEVICES FOR TEMPORARY DETOUR

STEP 7

USING RSD 1101.02, SHEETS 1, 2 AND 3 OF 14, COMPLETE CONSTRUCTION OF THE FOLLOWING:
* LEFT SIDE OF -L- FROM STA 12+00+/- TO -RDBT- AS SHOWN ON TMP-20
* RIGHT SIDE OF -Y1A- FROM STA 9+50+/- TO -RDBT- AS SHOWN ON TMP-20
* -RDBT- FROM -L- TO -Y1A- AS SHOWN ON TMP-20
* LEFT SIDE OF -Y2- (TMP-21)
* LEFT SIDE OF -L- FROM -Y2- TO STA 29+51+/- (TMP-21)
* LEFT SIDE OF -L- FROM STA 31+33+/- TO 36+50+/- AS SHOWN ON TMP-17 INCLUDING PROPOSED STAGE 1 OF STRUCTURE AND APPROACH SLABS USING SHORT TERM ROAD CLOSURES ON -Y4- TO HANG GIRDERS OVER US 52
* LEFT SIDE OF -L- FROM STA 40+00+/- TO STA 42+76+/- (TMP-22)
* LEFT SIDE OF -L- FROM STA 44+74+/- TO STA 47+65+/- (TMP-22)

STEP 8

PLACE AND COVER TEMPORARY TRAFFIC CONTROL SIGNING FOR CLOSURE OF -LPA- AND -RPA- USING RSD 1101.03, SHEETS 1, AND 2 OF 9 AND TMP-21A AND TMP-2D

COMPLETE THE REQUIREMENTS OF PHASE IV, STEP 9 THROUGH PHASE IV, STEP 11 IN 30 DAYS. (SEE INTERMEDIATE CONTRACT TIME AND LIQUIDATED DAMAGES.)

STEP 9

USING RSD 1101.02 SHEETS 1, 2 AND 3 OF 14, TMP-21A, TMP-2D FLAGGERS AND LAW ENFORCEMENT AS NEEDED:
* UNCOVER DETOUR SIGNS FOR THE CLOSURE OF -LPA- AND -RPA-
* PLACE TYPE III BARRICADES AS SHOWN ON TMP-21A AND TMP-2D
* CLOSE RAMPS -LPA- AND -RPA- AND PLACE TRAFFIC INTO TEMPORARY DETOUR.
* PLACE TEMPORARY PAVEMENT MARKING EDGELINE ON THE LEFT SIDE OF -L- AT RAMPS -LPA- AND -RPA- (TMP-21A)

STEP 10

USING RSD 1101.02 SHEETS 1 AND 2 OF 14 AND LAW ENFORCEMENT AS NEEDED, CONSTRUCT -L- FROM FROM STA 29+51+/- TO STA 31+33+/- (TMP-21A)

AWAY FROM TRAFFIC:
* CONSTRUCT -LPA- AND -RPA- (TMP-21A)
* AWAY FROM TRAFFIC, PLACE TEMPORARY PCB ON PROPOSED -L- AS SHOWN ON TMP-26
* BEGIN INSTALLATION OF FINAL POLES OF 09-0775T1 (SEE TMP-31 AND SIGNAL PLANS)

USING RSD 1101.02, SHEET 4 OF 14, PLACE TEMPORARY ANCHORED PCB AND CRASH CUSHION ON THE OUTSIDE SHOULDER ON THE RIGHT SIDE OF -Y4- (SB US 52) AS SHOWN ON TMP-26

USING RSD 1101.02, SHEETS 1, 2 AND 3 OF 14, FLAGGERS AND LAW ENFORCEMENT AS NEEDED, COMPLETE THE INSTALLATION OF FINAL SIGNAL POLES AND TEMPORARY SIGNAL 09-0557T4 (TMP-27)

STEP 11

USING RSD 1101.02, SHEETS 1, 2 AND 3 OF 14, FLAGGERS AND LAW ENFORCEMENT AS NEEDED, COMPLETE THE FOLLOWING:
* PLACE TEMPORARY PAVEMENT MARKINGS ON -L-, -Y1A-, -Y1B-, -RPA-, -RPB-, AND -Y5- AS SHOWN ON TMP-25 THRU TMP-28
* REMOVE TRAFFIC CONTROL DEVICES FOR CLOSURE OF RAMPS -LPA- AND -RPA-
* REMOVE TEMPORARY SIGNAL AT THE INTERSECTION OF -L- AND -Y1A-/-Y1B-
* ACTIVATE TEMPORARY SIGNALS AT THE FOLLOWING (SEE SIGNAL PLANS):
  - 09-1105T5 AT THE INTERSECTION OF -L- AND -LPB-/-RPB-/-Y5- (TMP-26)
  - 09-0557T4 AT THE INTERSECTION OF -L- AND -Y6A-/-Y6B- (TMP-27)
* SHIFT TRAFFIC TO TEMPORARY PHASE V TRAFFIC PATTERN

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

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

TEMPORARY TRAFFIC CONTROL PHASING

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604

NC LICENSE NO. F-0669

PHASE V

NOTE: PHASE V STEP 1 MAY BE COMPLETED CONCURRENTLY WITH PHASE V STEP 2

STEP 1

A. USING RSD 1101.02, SHEETS 1 AND 2 OF 14, AND FLAGGERS AS NEEDED BEGIN CONSTRUCTION OF THE FOLLOWING:
   * RIGHT SIDE OF -L- FROM STA 23+98+/- TO STA 27+50+/- (TMP-25 AND TMP-26)
   * RIGHT SIDE OF -L- FROM STA 36+35+/- TO -Y5- (TMP-26)
   * RIGHT SIDE OF -Y5- (TMP-26)

   USING RSD 1101.02, SHEET 3 OF 14, BEGIN CONSTRUCTION OF MONOLITHIC ISLANDS AT THE FOLLOWING:
   * ON -L- FROM STA 41+10+/- TO STA 43+10+/- (TMP-27)
   * ON -L- FROM STA 45+30+/- TO STA 52+49+/- (TMP-27 AND TMP-28)
   * ON -Y6A- FROM STA 11+69+/- TO STA 16+79+/- (TMP-27 AND TMP-29)

B. PERFORM THE FOLLOWING:
   1. USING RSD 1101.02, SHEETS 1 AND 2 OF 14, TMP-2F, TMP-2G AND FLAGGERS AS NEEDED (COVER ROUNDABOUT FLAGGING SIGNS WHEN FLAGGING OPERATION IS NOT ACTIVE):
      * CONSTRUCT MONOLITHIC ISLAND ON -L- FROM STA 12+42+/- TO STA 19+10+/- (TMP-25)
      * CONSTRUCT CENTER ISLAND OF -RDBT- (TMP-25)
   2. PLACE TEMPORARY PAVEMENT MARKINGS FOR -RDBT- AS SHOWN ON TMP-25A AND SHIFT TRAFFIC TO NEW TEMPORARY PATTERN
   3. CONSTRUCT MONOLITHIC ISLANDS ON -L-, -Y1A- AND -Y1B- FOR -RDBT- (TMP-25A)

C. USING RSD 1101.02, SHEETS 1 AND 2 OF 14, AND FLAGGERS AS NEEDED COMPLETE CONSTRUCTION OF THE FOLLOWING:
   * RIGHT SIDE OF -L- FROM STA 23+98+/- TO STA 27+50+/- (TMP-25 AND TMP-26)
   * RIGHT SIDE OF -L- FROM STA 36+35+/- TO -Y5- (TMP-26)
   * RIGHT SIDE OF -Y5- (TMP-26)

   USING RSD 1101.02, SHEETS 1 AND 2, FLAGGERS, AND LAW ENFORCEMENT AS NEEDED:
   * COMPLETE INSTALLATION OF FINAL SIGNAL POLES FOR 09-1105T6 AT THE INTERSECTION OF -L- AND -RPB-/-LPB-/-Y5- (SEE SIGNAL PLANS)(TMP-31)
   * COMPLETE FINAL SIGNAL POLES FOR 09-09-0775T AT THE INTERSECTION OF -L- AND -RPA-/-LPA- (SEE SIGNAL PLANS)(TMP-31)

STEP 2

A. BEHIND BARRIER AND USING SHORT TERM ROAD CLOSURES ON -Y4- AS NEEDED, REMOVE EXISTING STRUCTURE

B. BEHIND BARRIER, CONSTRUCT RIGHT SIDE OF -L- FROM STA 27+50+/- TO STA 36+35+/- INCLUDING STAGE 2 OF THE PROPOSED STRUCTURE USING TEMPORARY SHORING AS NEEDED. USE SHORT TERM ROAD CLOSURE ON -Y4- AS NEEDED TO PLACE GIRDERS OVER US 52.

   BEHING BARRIER, CONSTRUCT THE FOLLOWING (TMP-26):
   * PROPOSED PAVEMENT AND PROPOSED BARRIER ON THE INSIDE SHOULDER OF US 52 SB ON -Y4- FROM STA 64+49+/- TO STA 67+66+/-
   * PROPOSED PAVEMENT AND PROPOSED BARRIER ON THE INSIDE SHOULDER OF US 52 NB ON -Y4- FROM STA 64+48+/- TO STA 67+60+/-
   * BEGIN INSTALLATION OF PROPOSED GUARDRAIL IN THE MEDIAN OF US 52
   * MINIMUM OF 6′ FROM FACE OF PROPOSED BARRIER OF THE PROPOSED OUTSIDE SHOULDERS OF US 52 (SEE TMP-26)
   * CONSTRUCT THE PROPOSED BARRIERS AND PROPOSED GUARDRAIL ON THE OUTSIDE SHOULDERS OF US 52

   USING RSD 1101.02, SHEET 4 OF 14 AS NEEDED
   * REMOVE AND REPLACE INSIDE SHOULDERS OF US 52 ON -Y4- FROM STA 36+55+/- TO STA 61+00+/- (TMP-26C)

C. USING RSD 1101, SHEETS 4, 9 AND 10 OF 14,
   1. COMPLETE INSTALLATION OF PROPOSED GUARDRAIL IN CENTER MEDIAN OF US 52 (-Y4-)
   2. REMOVE THE TEMPORARY PCB ON THE INSIDE SHOULDERS OF US 52 (-Y4-)

PHASE VI

STEP 1

USING RSD 1101.02, SHEETS 1, 2, AND 3 OF 14, TMP-2F, TMP-2G, FLAGGERS, AND LAW ENFORCEMENT AS NEEDED:
* PLACE TEMPORARY PAVEMENT MARKINGS AS SHOWN IN TMP-30 THRU TMP-32 AND TMP-35 THRU TMP-37
* SHIFT TRAFFIC TO TEMPORARY TRAFFIC PATTERN
* ACTIVATE TEMPORARY SIGNALS AT THE FOLLOWING:
  - 09-0775T AT THE INTERSECTION OF -L- AND -RPA-/-RPB- (TMP-31)
  - 09-1105T6 AT THE INTERSECTION OF -L- AND -RPB-/LPB-/-Y5- (TMP-31)
* REMOVE TEMPORARY PCB FROM THE OUTSIDE SHOULDERS OF US 52 (-Y4-)

STEP 2

USING RSD 1101.02, SHEET 3 OF 14 AS NEEDED, COMPLETE/CONSTRUCT MONOLITHIC ISLANDS AT THE FOLLOWING:
* ON -L- FROM STA 21+54+/- TO STA 52+49+/- (TMP-30 THRU TMP-33)
* ON -Y6A- FROM STA 11+69+/- TO STA 16+79+/- (TMP-32 AND TMP-34)

USING RSD 1101.02, SHEETS 4, 9 AND 10 OF 14:
* CONSTRUCT PROPOSED OUTSIDE SHOULDERS OF US 52 (-Y4-)
* REMOVE AND REPLACE EXISTING OUTSIDE SHOULDERS OF US 52 AND ASPHALT SHOULDERS OF RAMPS AND LOOPS AS SHOWN IN ROADWAY PLANS (TMP-31, TMP-35 THRU TMP-37)

STEP 3

USING RSD 1101.02, SHEETS 1, 2, 3, 4, 9 AND 10 OF 14, FLAGGERS, AND LAW ENFORCEMENT AS NEEDED, PERFORM THE FOLLOWING:
* PLACE FINAL LAYER OF SURFACE COURSE
* PLACE FINAL PAVEMENT MARKINGS
* ACTIVATE FINAL SIGNALS
* PLACE TRAFFIC INTO FINAL PATTERN
* RESURFACE -Y4- US 52 NB FROM STA 29+42+/- TO STA 71+05+/-
* RESURFACE -Y4- US 52 SB FROM STA 29+42+/- TO STA 72+55+/-

STEP 4

REMOVE ALL TEMPORARY TRAFFIC CONTROL DEVICES

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

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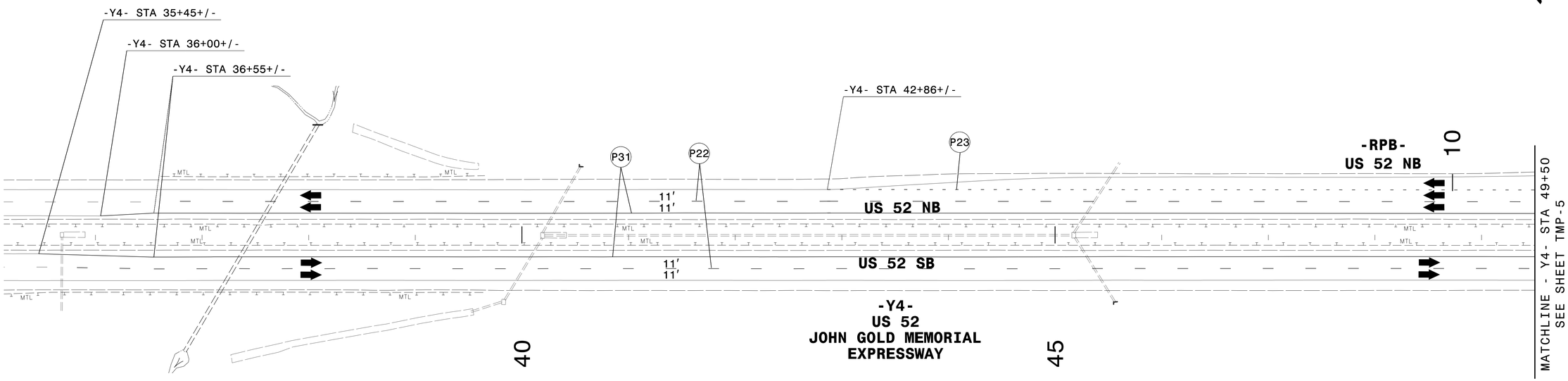
DIVISION OF HIGHWAYS · STATE OF NORTH CAROLINA · DEPARTMENT OF TRANSPORTATION · WORK ZONE TRAFFIC CONTROL

TEMPORARY TRAFFIC CONTROL PHASING

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-4

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669



USING RSD 1101.01, SHEET 1 OF 3 AND IN COORDINATION WITH ADJACENT CONSTRUCTION AND ENGINEER, PLACE ADVANCE WARNING SIGNS AS NEEDED ON NORTHERN APPROACH TO THE PROJECT LIMITS

APPROVED: _____

DATE: _____

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D STOUCHKO

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TEMPORARY TRAFFIC CONTROL PHASE I DETAIL

2/21/2023
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PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-5

PLANS PREPARED FOR THE NCDOT BY:

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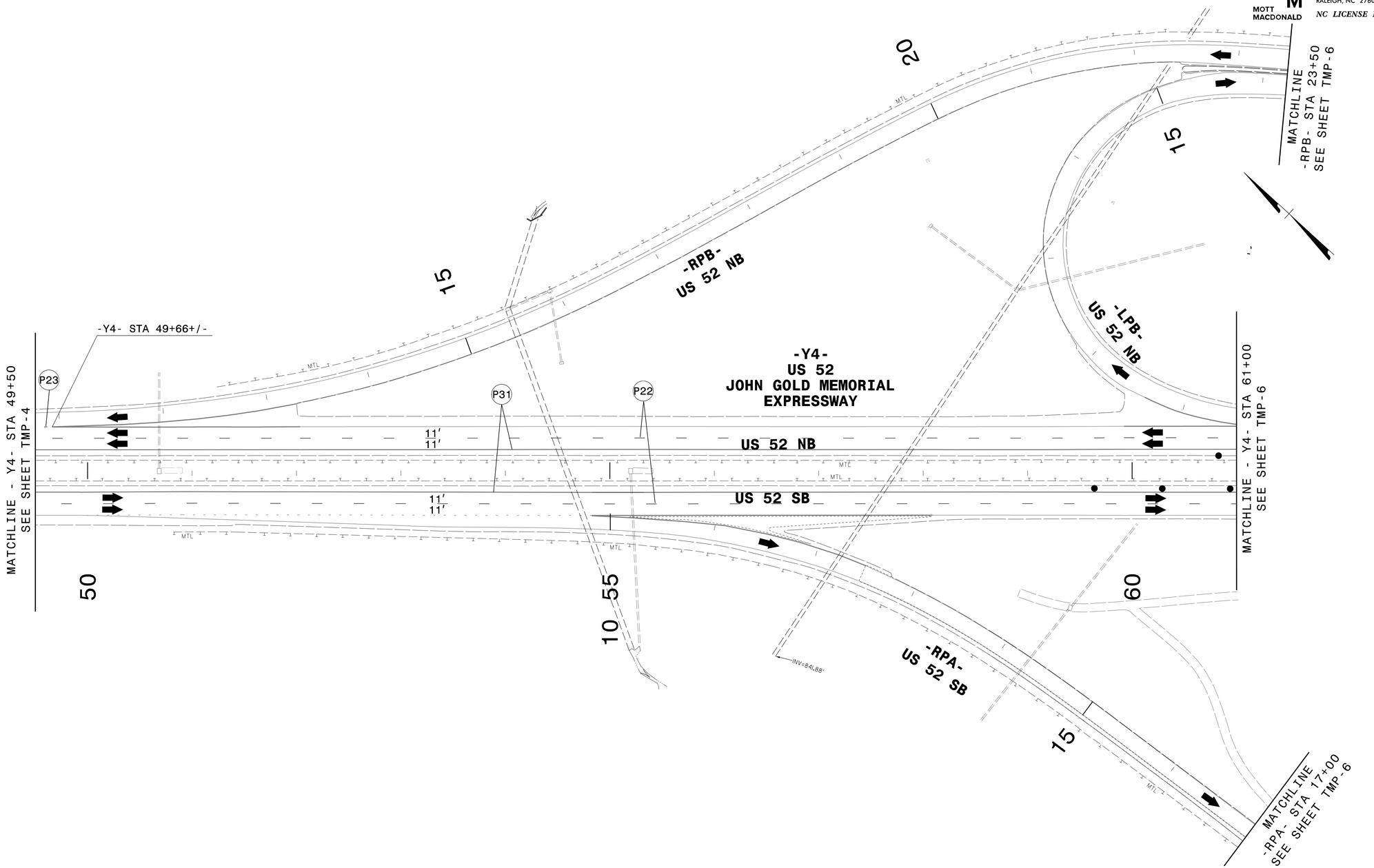
RALEIGH, NC 27604
NC LICENSE NO. F-0669



APPROVED: _____

DATE: _____

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D STOUCHKO

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

TEMPORARY TRAFFIC CONTROL PHASE I DETAIL

2/21/2023
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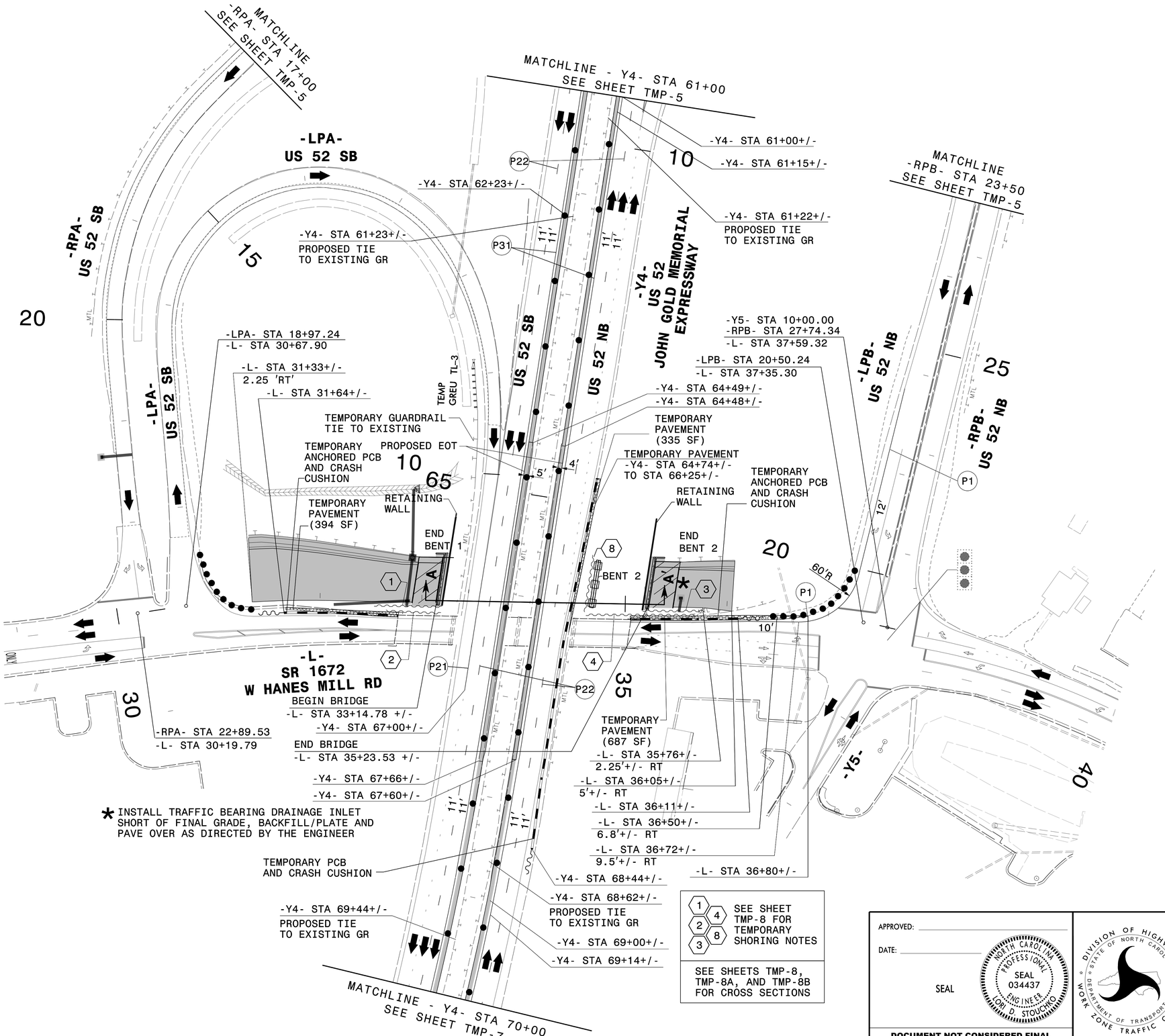
PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-6

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669



APPROVED: _____

DATE: _____

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

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

TEMPORARY TRAFFIC CONTROL PHASE I DETAIL

2/21/2023
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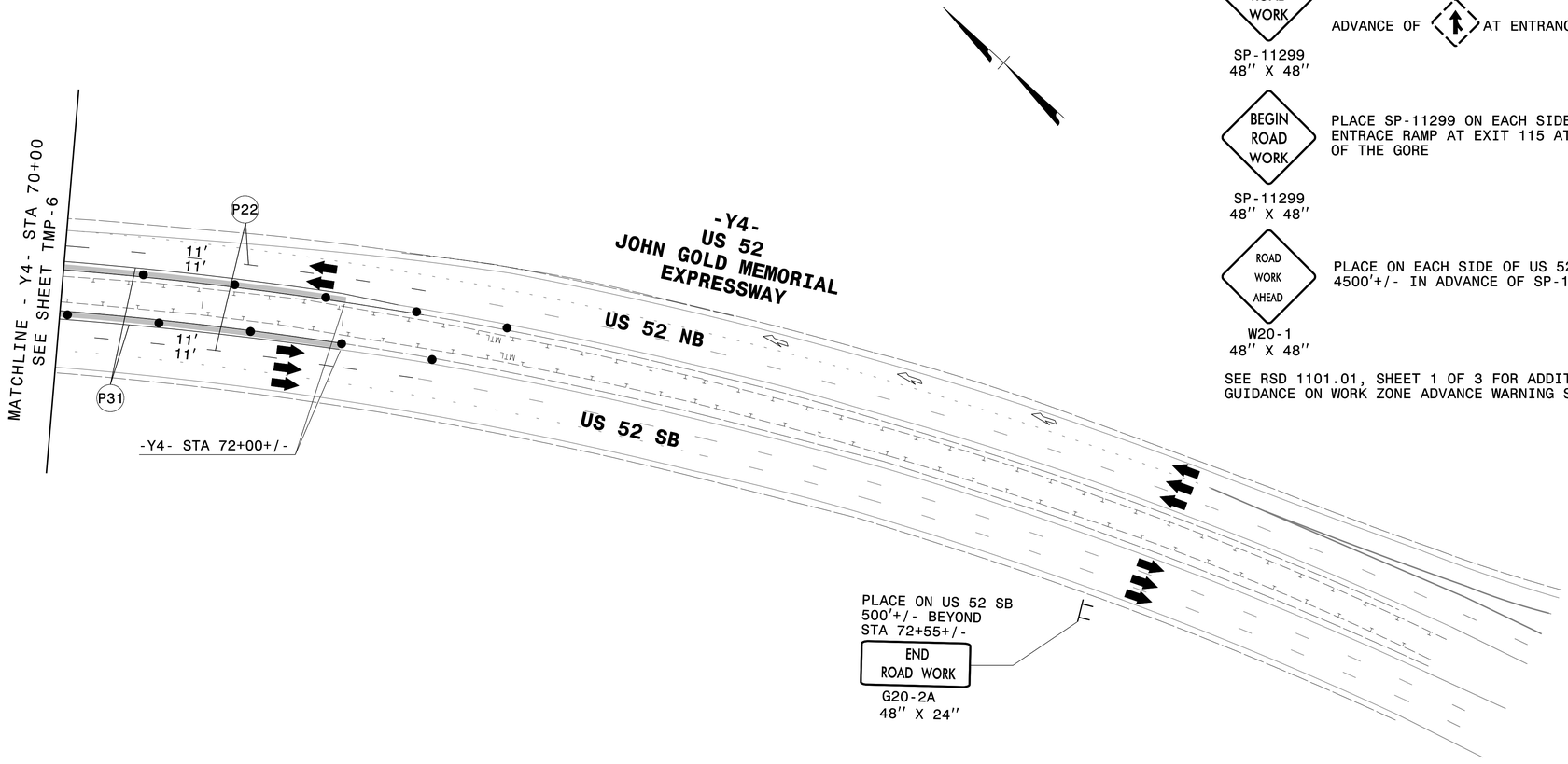
PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-7

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669



BEGIN ROAD WORK

SP-11299
48″ X 48″

PLACE SP-11299 ON EACH SIDE OF US 52 NB 350′+/- ADVANCE OF AT ENTRANCE RAMP EXIT 115

BEGIN ROAD WORK

SP-11299
48″ X 48″

PLACE SP-11299 ON EACH SIDE OF THE US 52 NB ENTRACE RAMP AT EXIT 115 AT 500′ IN ADVANCE OF THE GORE

ROAD WORK AHEAD

W20-1
48″ X 48″

PLACE ON EACH SIDE OF US 52 NB 4500′+/- IN ADVANCE OF SP-11299

SEE RSD 1101.01, SHEET 1 OF 3 FOR ADDITIONAL GUIDANCE ON WORK ZONE ADVANCE WARNING SIGNS

APPROVED: _____

DATE: _____

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D STOUCHKO

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

TEMPORARY TRAFFIC CONTROL PHASE I DETAIL

2/21/2023
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PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-8

PLANS PREPARED FOR THE NCDOT BY:

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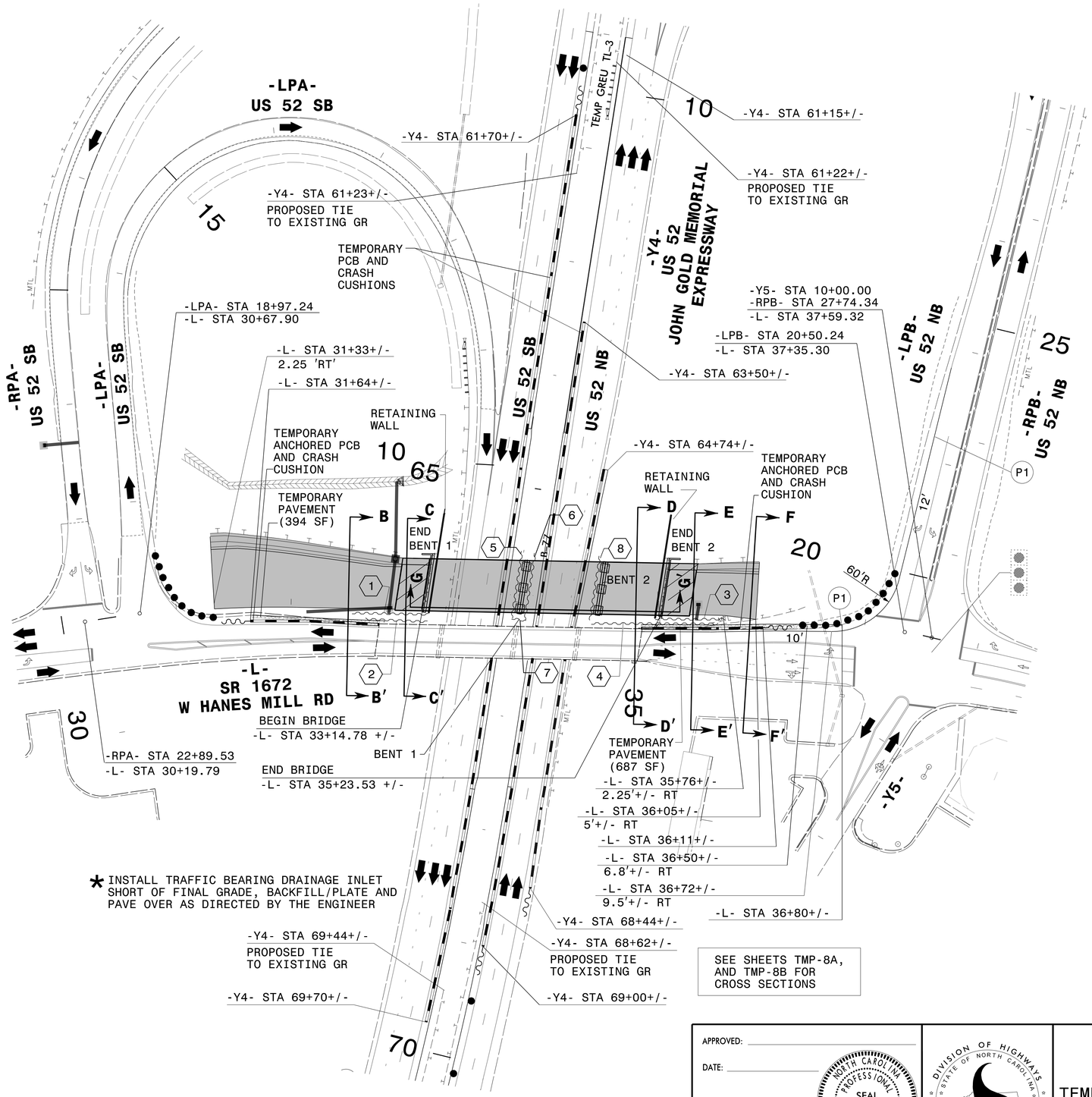
RALEIGH, NC 27604
NC LICENSE NO. F-0669



1 QUANTITY = 1176.8 SF
TEMPORARY SHORING ON -L-
FROM STA 32+53.2+/-, 6.3'+/- RT
TO STA 33+19.5+/-, 6.3'+/- RT
(SEE SHEET TMP-2A FOR
TEMPORARY SHORING NOTES)

2 QUANTITY = 315.36 SF
TEMPORARY SHORING ON -L-
FROM STA 32+64.9+/-, 11.4'+/- RT
TO STA 33+18.9+/-, 12.8'+/- RT
(SEE SHEET TMP-A2 FOR
TEMPORARY SHORING NOTES)

3 QUANTITY = 1091.97 SF
TEMPORARY SHORING ON -L-
FROM STA 35+20.5+/-, 6.3'+/- RT
TO STA 35+47.1+/-, 6.3'+/- RT
TO STA 35+77.9+/-, 5.4'+/- RT
(SEE SHEET TMP-2A FOR
TEMPORARY SHORING NOTES)

4 QUANTITY = 1538.98 SF
TEMPORARY SHORING ON -L-
FROM STA 34+61.5+/-, 11.4'+/- RT
TO STA 35+71.9+/-, 9.7'+/- RT
(SEE SHEET TMP-2A FOR
TEMPORARY SHORING NOTES)

5 QUANTITY = 295.5 SF
TEMPORARY SHORING ON -Y4-
FROM STA 65+55.5+/-, 5.8'+/- RT
TO STA 66+14.6+/-, 5.8'+/- RT
(SEE SHEET TMP-2A FOR
TEMPORARY SHORING NOTES)

6 QUANTITY = 295.5 SF
TEMPORARY SHORING ON -Y4-
FROM STA 65+55.5+/-, 5.8'+/- LT
TO STA 66+14.6+/-, 5.8'+/- LT
(SEE SHEET TMP-2A FOR
TEMPORARY SHORING NOTES)

7 QUANTITY = 58 SF
TEMPORARY SHORING ON -Y4-
FROM STA 66+14.6+/-, 5.8'+/- RT
TO STA 66+14.6+/-, 5.8'+/- LT
(SEE SHEET TMP-2B FOR
TEMPORARY SHORING NOTES)

8 QUANTITY = 197.75 SF
TEMPORARY SHORING ON -Y4-
FROM STA 65+49.3+/-, 61.8'+/- LT
TO STA 66+05.8+/-, 61.8'+/- LT
(SEE SHEET TMP-2B FOR
TEMPORARY SHORING NOTES)

* INSTALL TRAFFIC BEARING DRAINAGE INLET SHORT OF FINAL GRADE, BACKFILL/PLATE AND PAVE OVER AS DIRECTED BY THE ENGINEER

SEE SHEETS TMP-8A, AND TMP-8B FOR CROSS SECTIONS

APPROVED: _____

DATE: _____

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

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

TEMPORARY TRAFFIC CONTROL PHASE I DETAIL

3/10/2023
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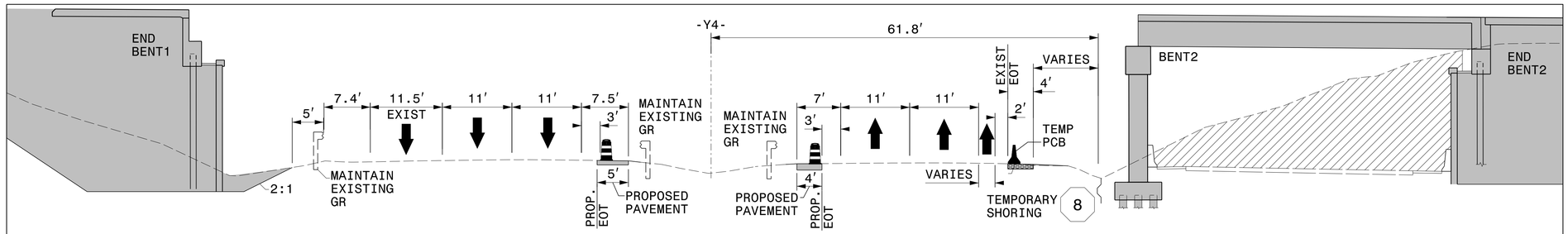
User:STO86227

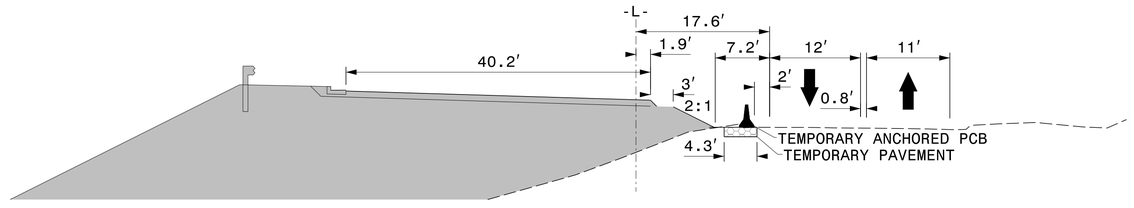
PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-8A

PLANS PREPARED FOR THE NCDOT BY:

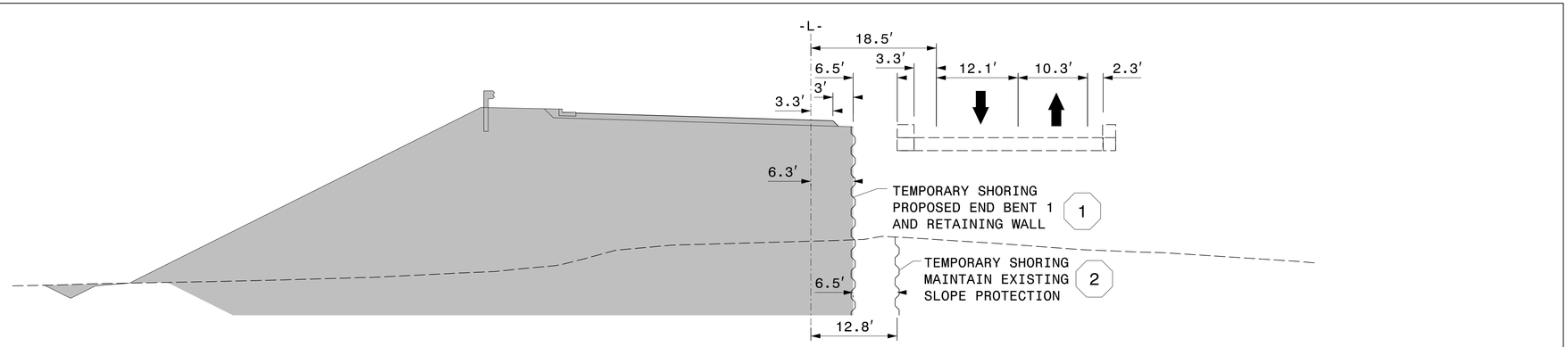
MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669



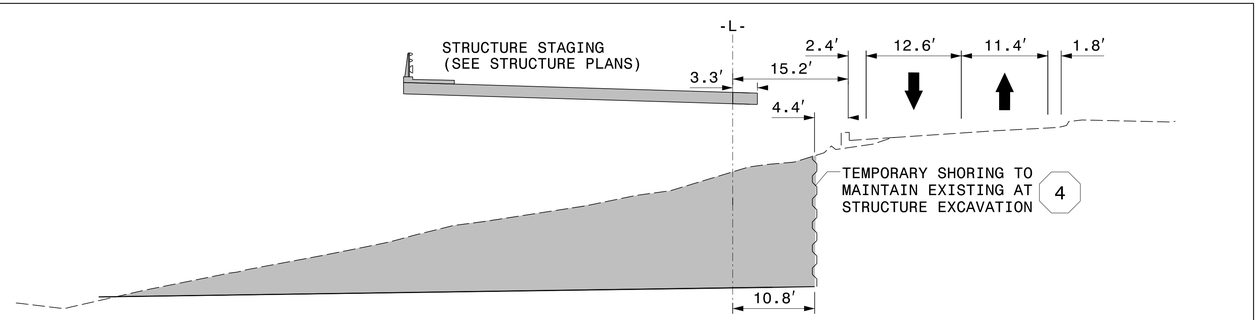
SECTION A-A′ STAGE 1 BRIDGE — SEE TMP-6



SECTION B-B′ -L- STA 32+50 — SEE TMP-8



SECTION C-C′ -L- STA 33+00 — SEE TMP-8



SECTION D-D′ -L- STA 35+00 — SEE TMP-8

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

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

TEMPORARY TRAFFIC CONTROL PHASE I DETAIL

3/10/2023
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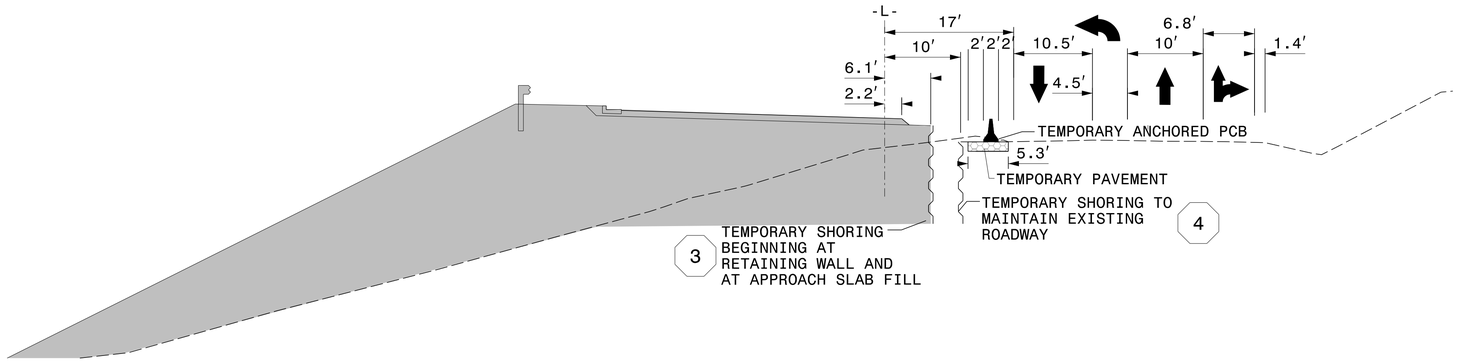
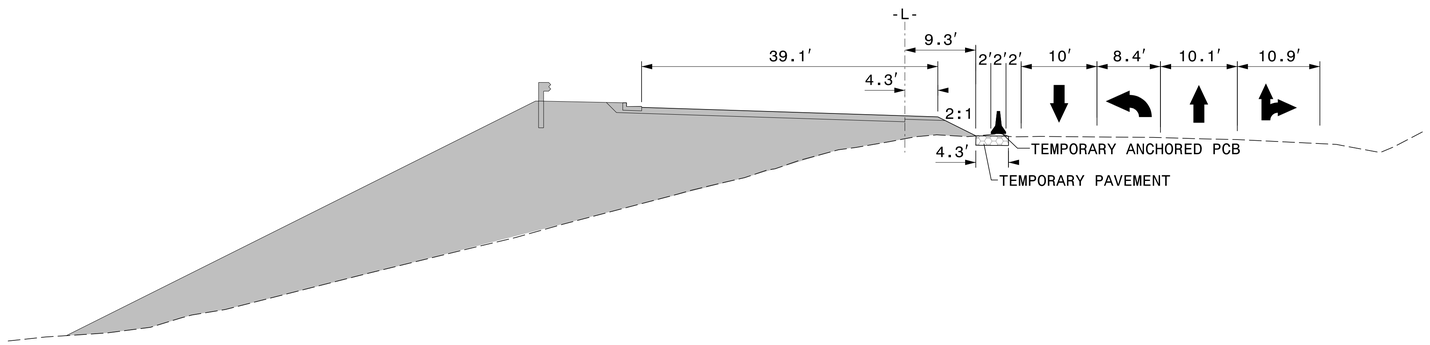
User:ST086227

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-8B

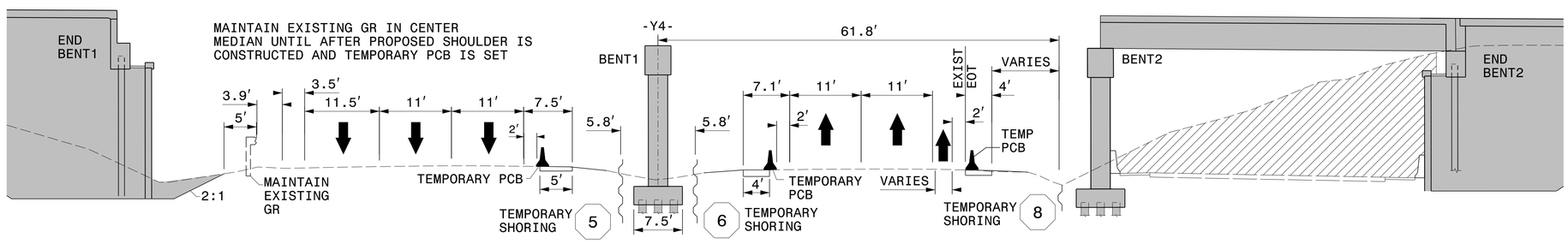
PLANS PREPARED FOR THE NCDOT BY:
MOTT MACDONALD
MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669



SECTION E-E′ -L- STA 35+50 SEE TMP-8



SECTION F-F′ -L- STA 36+00 SEE TMP-8



SECTION G-G′ -Y4- SEE TMP-8

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER JOHN D. STOUCHKO

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

TEMPORARY TRAFFIC CONTROL PHASE I DETAIL

2/21/2023
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PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-9

PLANS PREPARED FOR THE NCDOT BY:

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1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669

-L-
SR 1672
W HANES MILL RD

300'

MATCHLINE -L- STA 11+00
SEE THIS SHEET

BEGIN REMOVE CURB & GUTTER AND FILL TO EDGE OF EXISTING ROADWAY

TEMPORARY PAVEMENT (1236 SF)

-Y1A- F' G

-Y1A- STA 11+39+/-
-Y1A- STA 12+34+/-
49.1'+/- RT
-RDBT- STA 13+70.71
-RDBT- STA 10+00.00
-L- STA 19+76.20

-RDBT- STA 10+19+/-
2' RT
-L- STA 19+77+/-
19' RT

-RDBT- STA 12+93.44
-Y1A- STA 12+70.29

TEMPORARY PAVEMENT (281 SF)

-RDBT- STA 11+81.84
-L- STA 20+94.22
-L- STA 20+94+/-

-L- STA 23+81+/-

D D'

-RDBT- STA 11+63+/-
2' RT

T
E 09-0699T1
M (SEE SIGNAL
P PLANS)

-RDBT- STA 11+22+/-
2' RT
-L- STA 23+63+/-

-RDBT- STA 11+05.22
-Y1B- STA 10+00.00

TEMPORARY PAVEMENT (983 SF)

-RDBT- STA 10+93+/-
2' RT

-Y1B- STA 10+02+/-

-Y1B- STA 11+50+/-

-Y1B-
SR 1673
MUSEUM DR

500'

MATCHLINE -L- STA 25+00
SEE SHEET TMP-10

-L- STA 12+00+/-

1 R11-2
48" x 30"
ROAD CLOSED
TYPE III BARRICADE

2 ROAD WORK AHEAD W20-1
48" X 48"

3 END ROAD WORK G20-2A
48" X 24"

* INSTALL TRAFFIC BEARING DRAINAGE INLET SHORT OF FINAL GRADE, BACKFILL/PLATE AND PAVE OVER AS DIRECTED BY THE ENGINEER

SEE SHEETS TMP-9A AND TMP-9B FOR SECTIONS

APPROVED: _____

DATE: _____

SEAL

NORTH CAROLINA PROFESSIONAL ENGINEER SEAL 034437 JORI D STOUCHKO

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

TEMPORARY TRAFFIC CONTROL PHASE II DETAIL

2/21/2023
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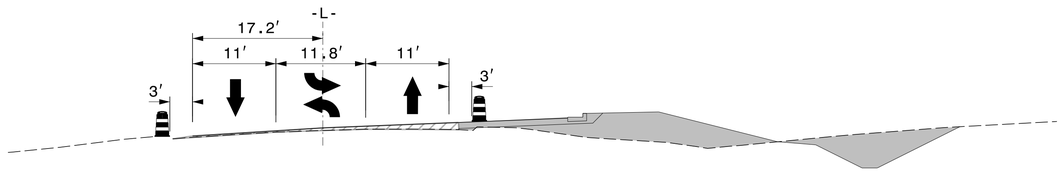
User:ST086227

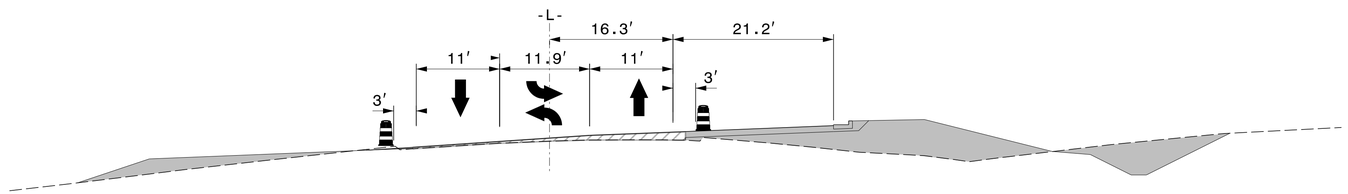
PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-9A

PLANS PREPARED FOR THE NCDOT BY:

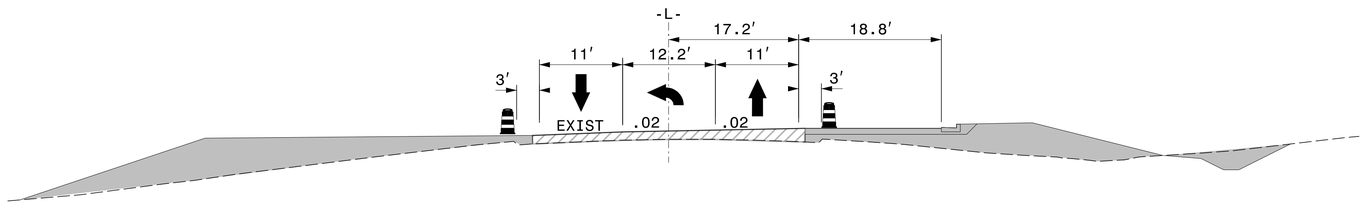
MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669



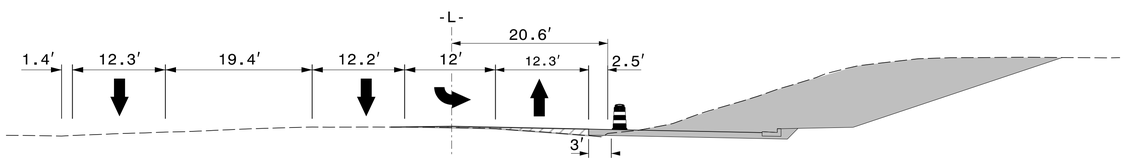
SECTION A-A′ -L- STA 16+00 SEE TMP-9



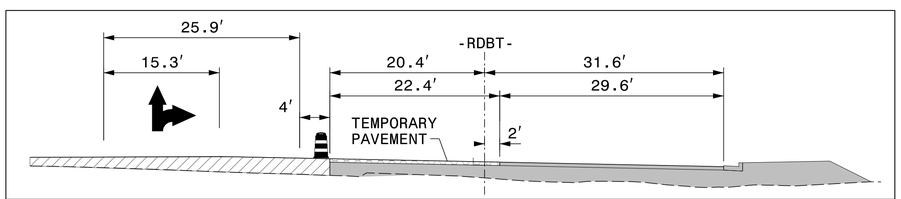
SECTION B-B′ -L- STA 17+00 SEE TMP-9



SECTION C-C′ -L- STA 19+00 SEE TMP-9



SECTION D-D′ -L- STA 22+00 SEE TMP-9



SECTION E-E′ -RDBT- STA 10+50 SEE TMP-9

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER JOHN D. STOUCHKO

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

TEMPORARY TRAFFIC CONTROL PHASE II DETAIL

2/21/2023
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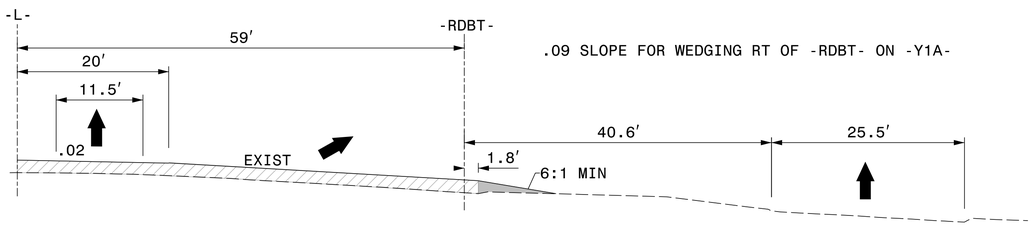
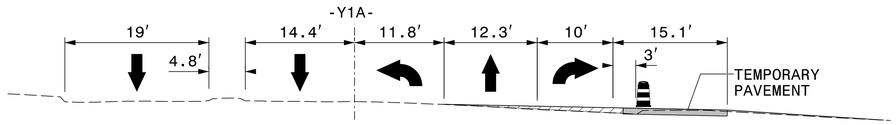
User:STO86227

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-9B

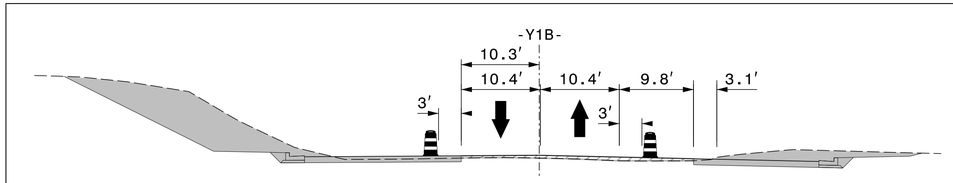
PLANS PREPARED FOR THE NCDOT BY:
MOTT MACDONALD
MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669



SECTION F-F′ -RDBT- STA 12+75 SEE TMP-9



SECTION G-G′ -Y1A- STA 12+00 SEE TMP-9



SECTION H-H′ -Y1B- STA 10+50 SEE TMP-9

APPROVED: _____

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NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D STOUCHKO

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

TEMPORARY TRAFFIC CONTROL PHASE II DETAIL

2/21/2023
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PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-10

PLANS PREPARED FOR THE NCDOT BY:
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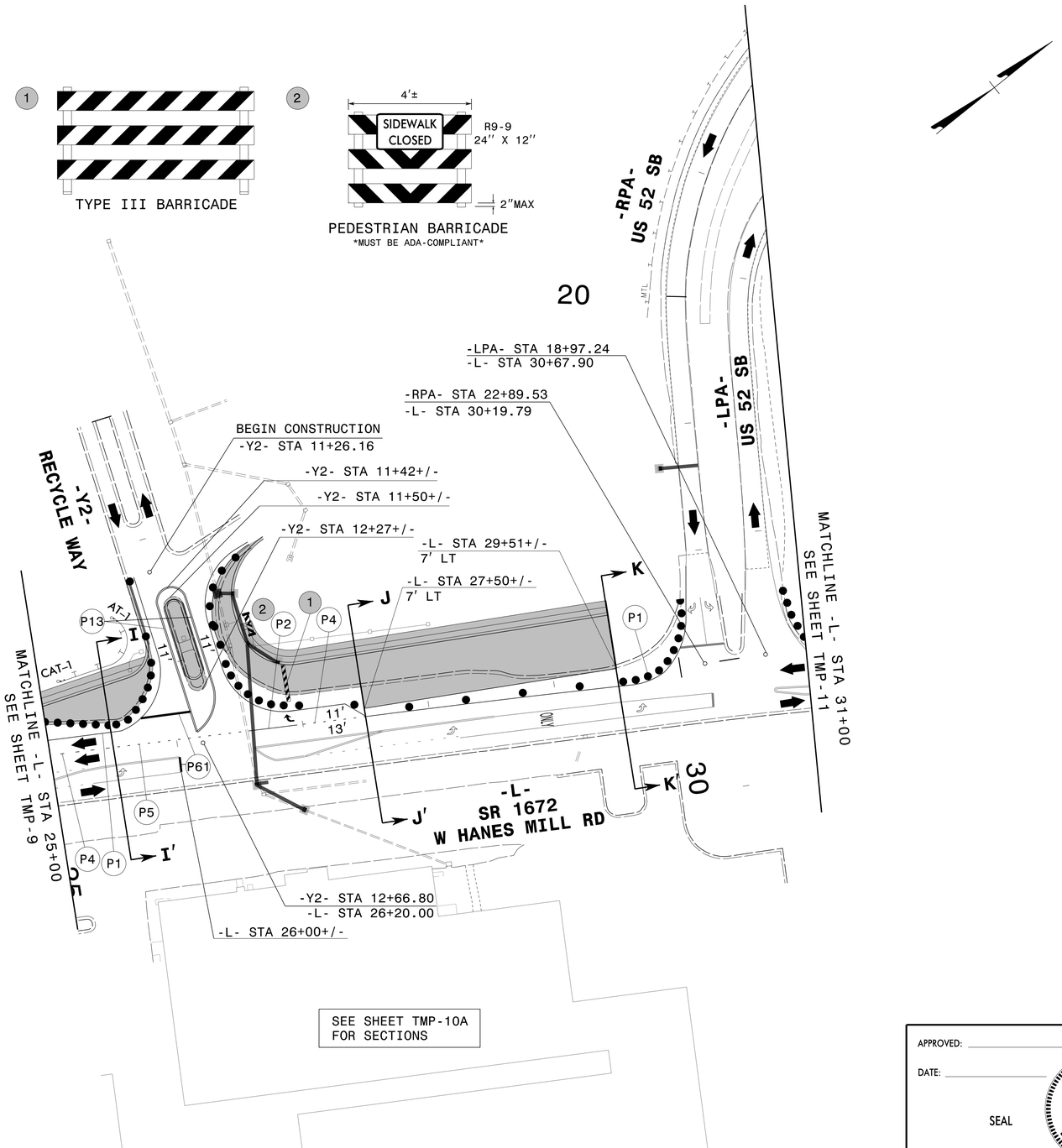
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669

1 TYPE III BARRICADE

2 PEDESTRIAN BARRICADE
MUST BE ADA-COMPLIANT



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NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER JOHN D. STOUCHKO

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

TEMPORARY TRAFFIC CONTROL PHASE II DETAIL

2/21/2023
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PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-10A

PLANS PREPARED FOR THE NCDOT BY:

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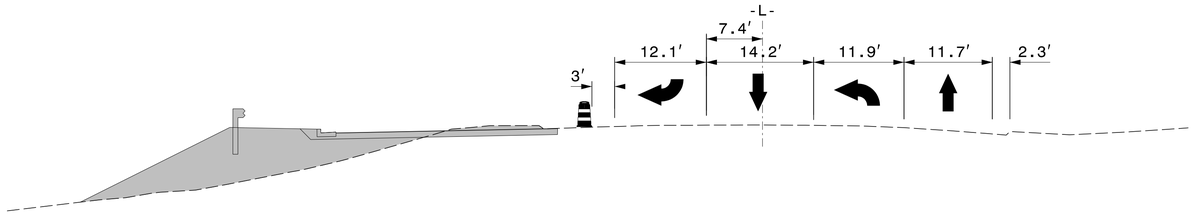
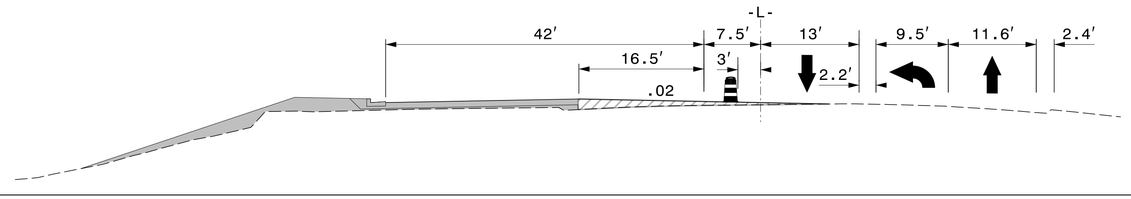
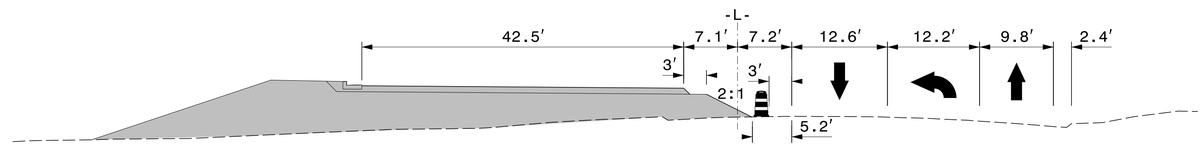
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669



SECTION I-I′ -L- STA 25+50 SEE TMP-10



SECTION J-J′ -L- STA 27+50 SEE TMP-10



SECTION K-K′ -L- STA 29+50 SEE TMP-10

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL ENGINEER SEAL 034437 LORI D STOUCHKO

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

TEMPORARY TRAFFIC CONTROL PHASE II DETAIL

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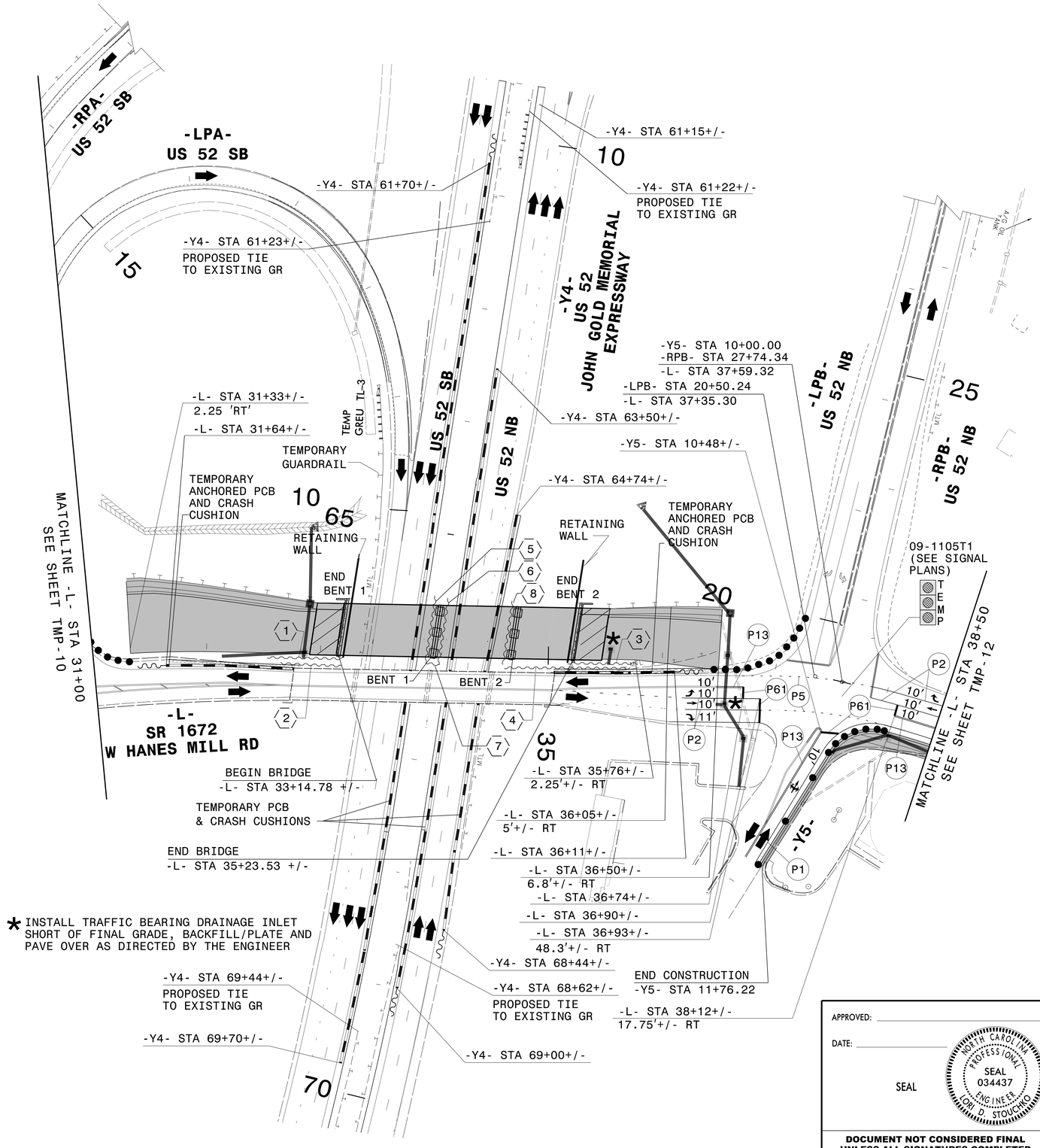
User:ST086227

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-11

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669



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DATE: _____

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

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

TEMPORARY TRAFFIC CONTROL PHASE II DETAIL

2/2/2023
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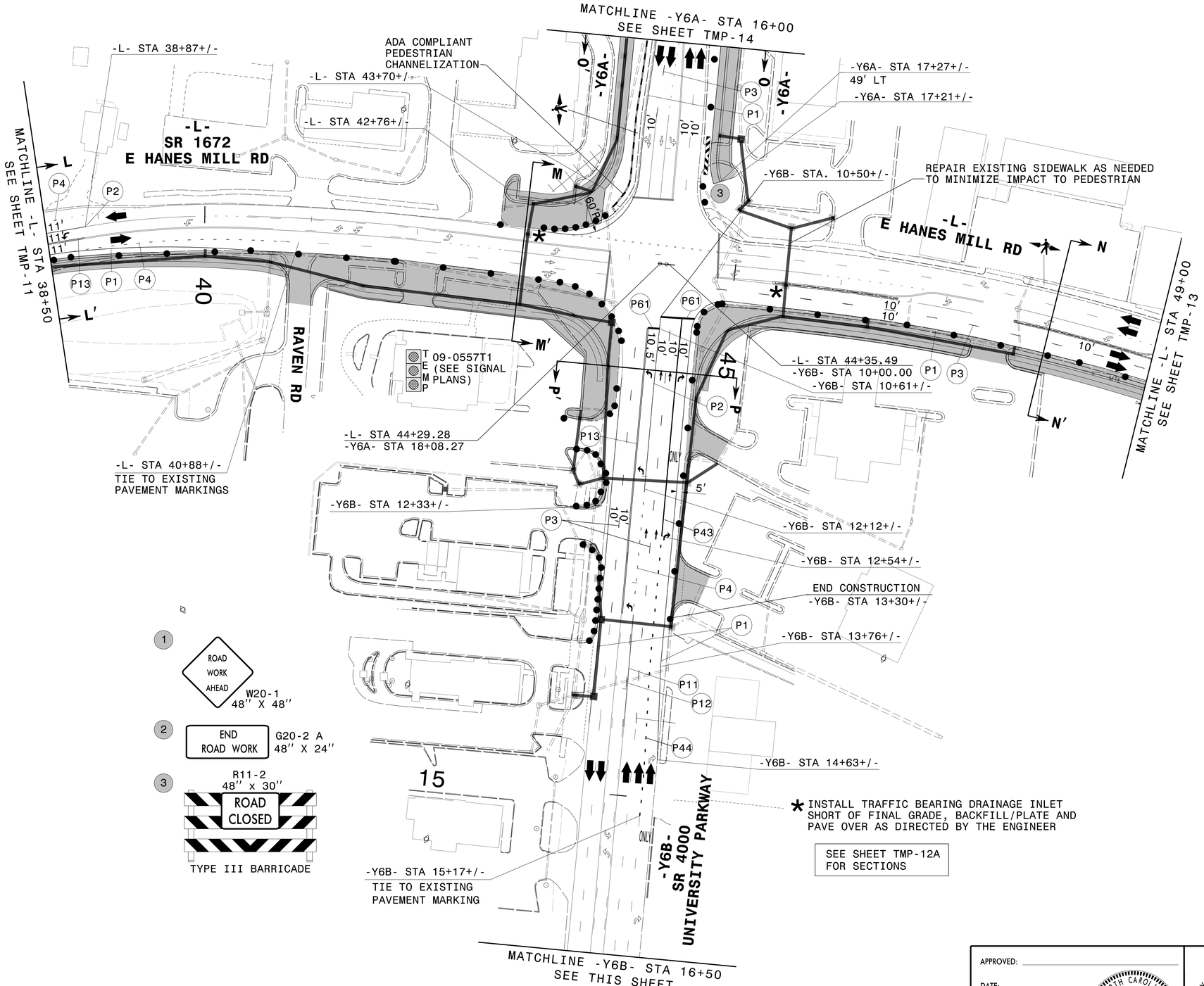
PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-12

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669



1. ROAD WORK AHEAD — W20-1, 48" X 48"
2. END ROAD WORK — G20-2 A, 48" X 24"
3. R11-2, 48" x 30", ROAD CLOSED — TYPE III BARRICADE

* INSTALL TRAFFIC BEARING DRAINAGE INLET SHORT OF FINAL GRADE, BACKFILL/PLATE AND PAVE OVER AS DIRECTED BY THE ENGINEER

SEE SHEET TMP-12A FOR SECTIONS

APPROVED: _____

DATE: _____

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER TONI D. STOUCHKO

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2/2/2023
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PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-12A

PLANS PREPARED FOR THE NCDOT BY:

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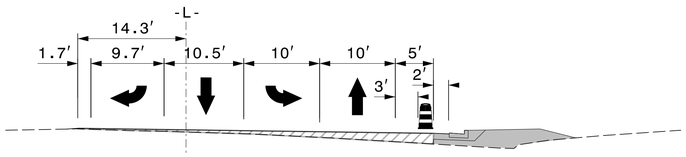
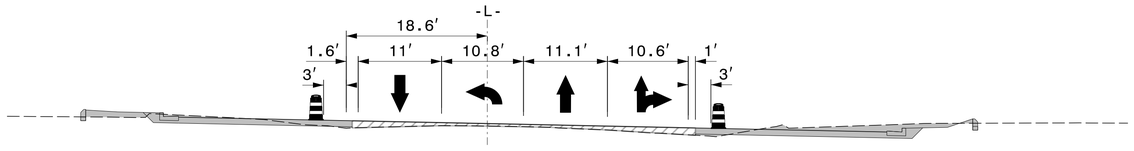
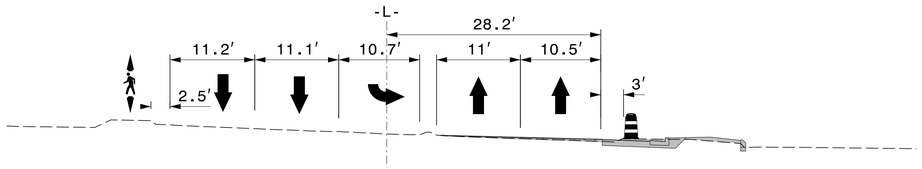
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669



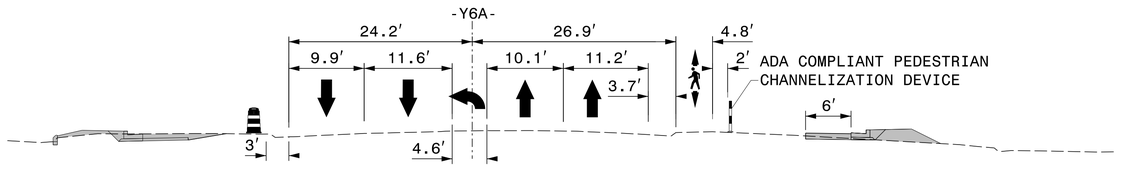
SECTION L-L′ -L- STA 38+50 SEE TMP-12



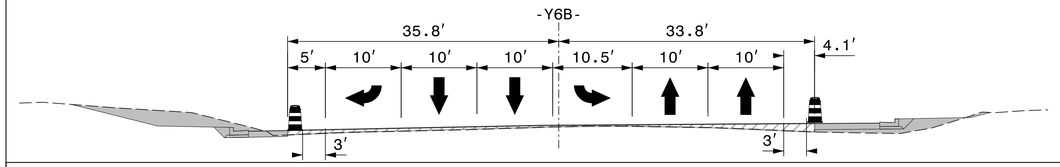
SECTION M-M′ -L- STA 43+00 SEE TMP-12



SECTION N-N′ -L- STA 48+00 SEE TMP-12



SECTION O-O′ -Y6A- STA 16+00 SEE TMP-12



SECTION P-P′ -Y6B- STA 11+00 SEE TMP-12

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

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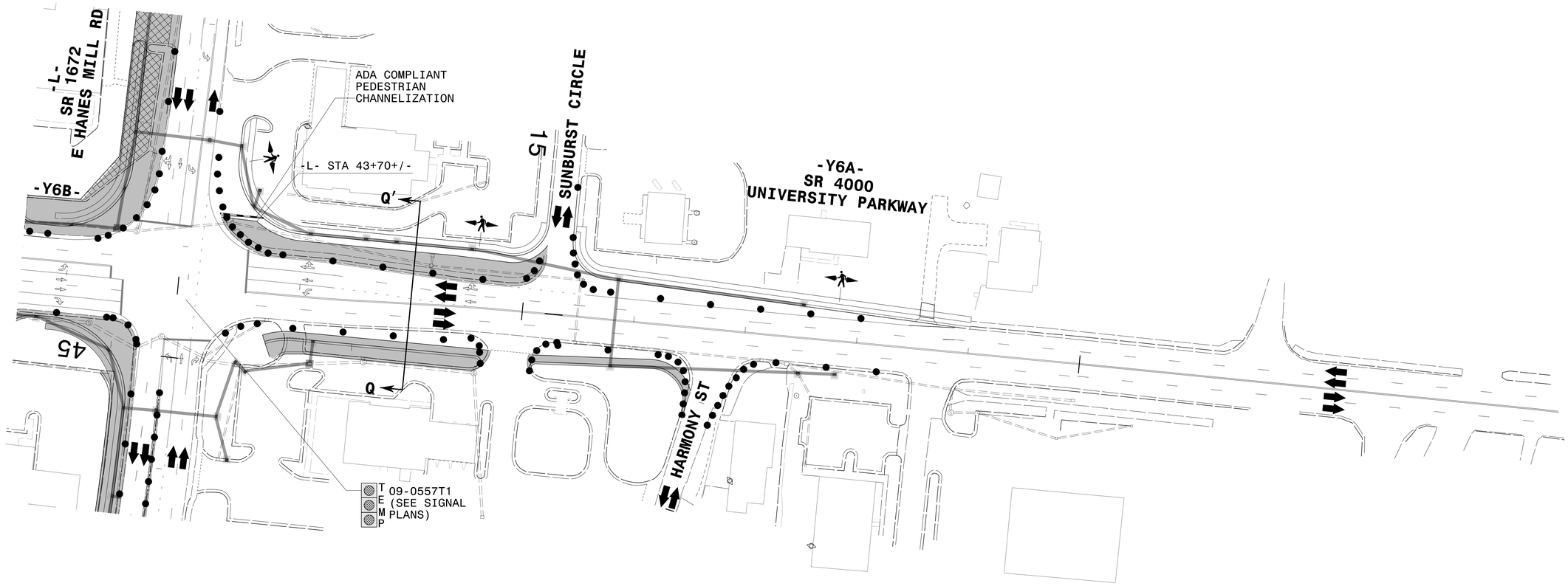
DIVISION OF HIGHWAYS · STATE OF NORTH CAROLINA · DEPARTMENT OF TRANSPORTATION · WORK ZONE TRAFFIC CONTROL

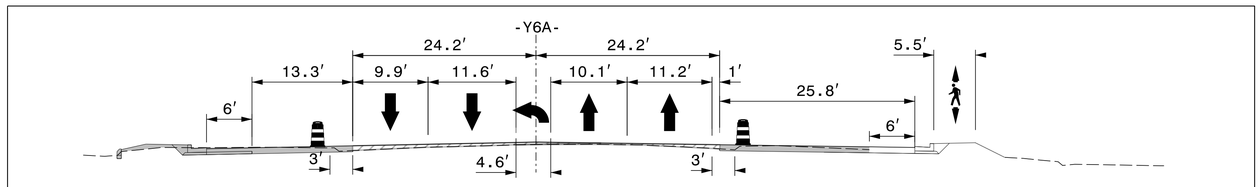
TEMPORARY TRAFFIC CONTROL PHASE II DETAIL

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-12B

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669





SECTION Q-Q′ -Y6A- STA 16+00

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D STOUCHKO

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

TEMPORARY TRAFFIC CONTROL PHASE II DETAIL

2/21/2023
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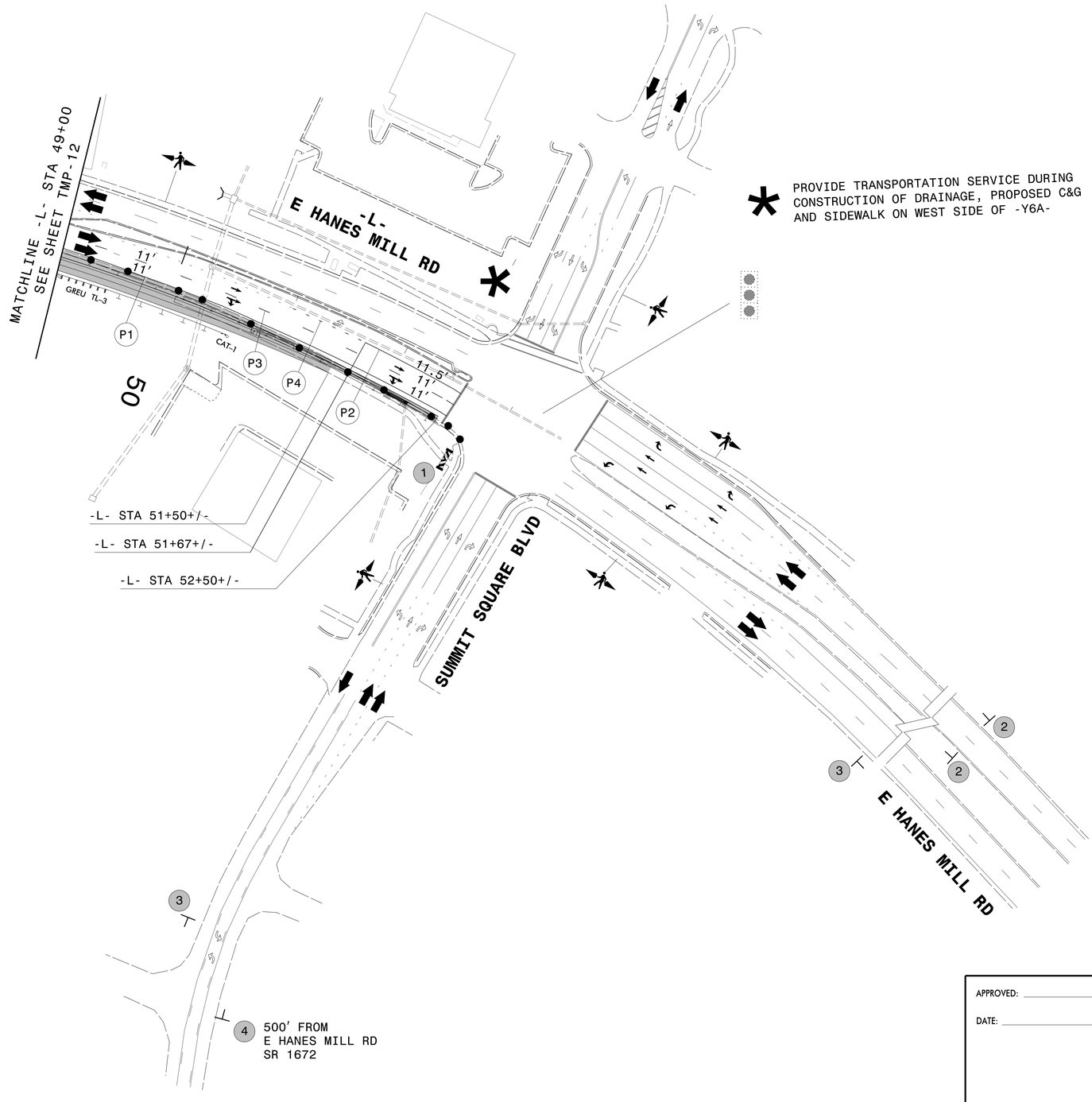
User:ST086227

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-13

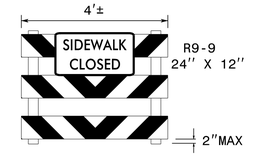
PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669



* PROVIDE TRANSPORTATION SERVICE DURING CONSTRUCTION OF DRAINAGE, PROPOSED C&G AND SIDEWALK ON WEST SIDE OF -Y6A-

1 — PEDESTRIAN BARRICADE
MUST BE ADA-COMPLIANT



2 — BEGIN ROAD WORK
1000' FROM SUMMIT SQUARE BLVD
SP-11299
48" X 48"

3 — END ROAD WORK
G20-2A
48" X 24"
500' FROM SUMMIT SQUARE BLVD

4 — ROAD WORK AHEAD
W20-1
48" X 48"
NEXT LEFT
SP-4L
42" X 12"

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER JORI D. STOUCHKO

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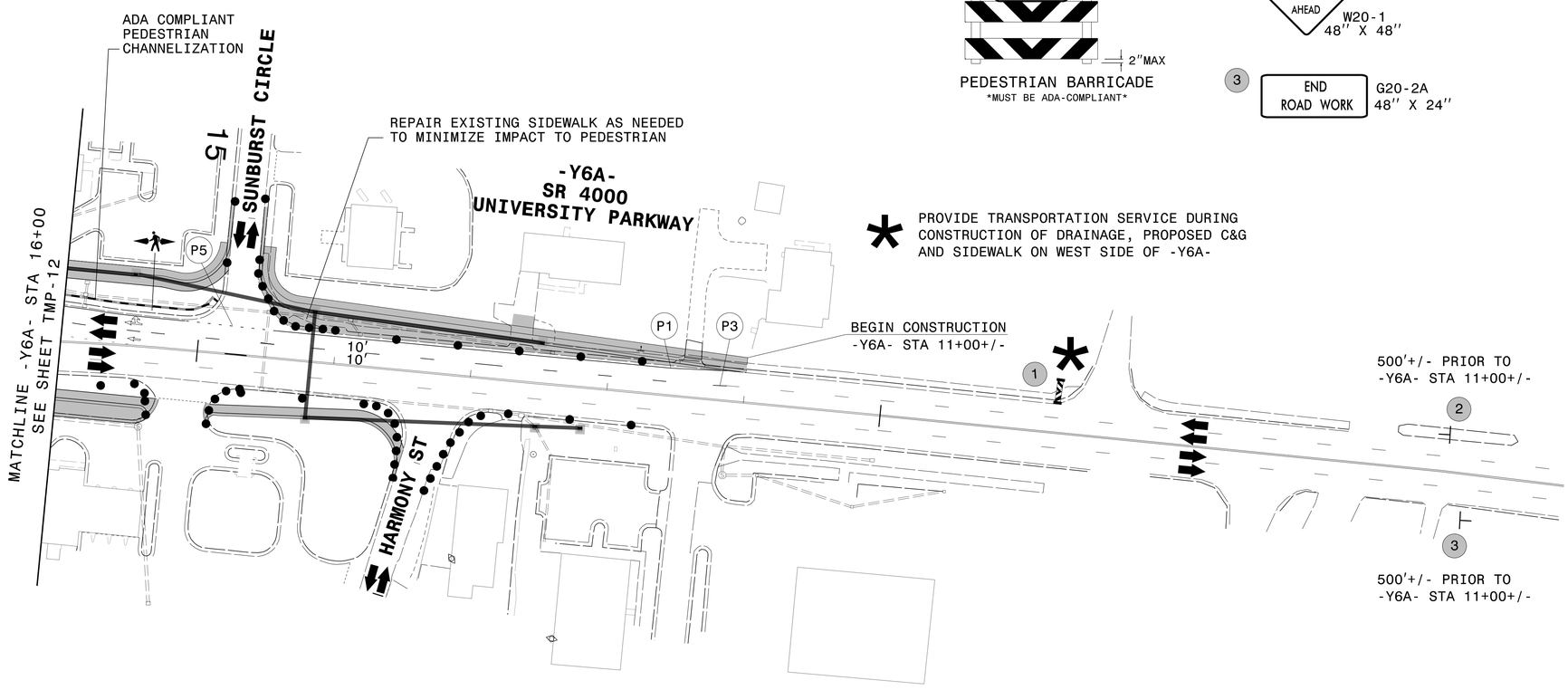
DIVISION OF HIGHWAYS — STATE OF NORTH CAROLINA — DEPARTMENT OF TRANSPORTATION — WORK ZONE TRAFFIC CONTROL

TEMPORARY TRAFFIC CONTROL PHASE II DETAIL

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-14

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669



* PROVIDE TRANSPORTATION SERVICE DURING CONSTRUCTION OF DRAINAGE, PROPOSED C&G AND SIDEWALK ON WEST SIDE OF -Y6A-

1 — 4'± — SIDEWALK CLOSED — R9-9 24" X 12" — 2"MAX

PEDESTRIAN BARRICADE
MUST BE ADA-COMPLIANT

2 — ROAD WORK AHEAD — W20-1 48" X 48"

3 — END ROAD WORK — G20-2A 48" X 24"

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D STOUCHKO

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

TEMPORARY TRAFFIC CONTROL PHASE II DETAIL

2/21/2023
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User:STO8627

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-15

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669

1 R11-2 48" x 30"

TYPE III BARRICADE

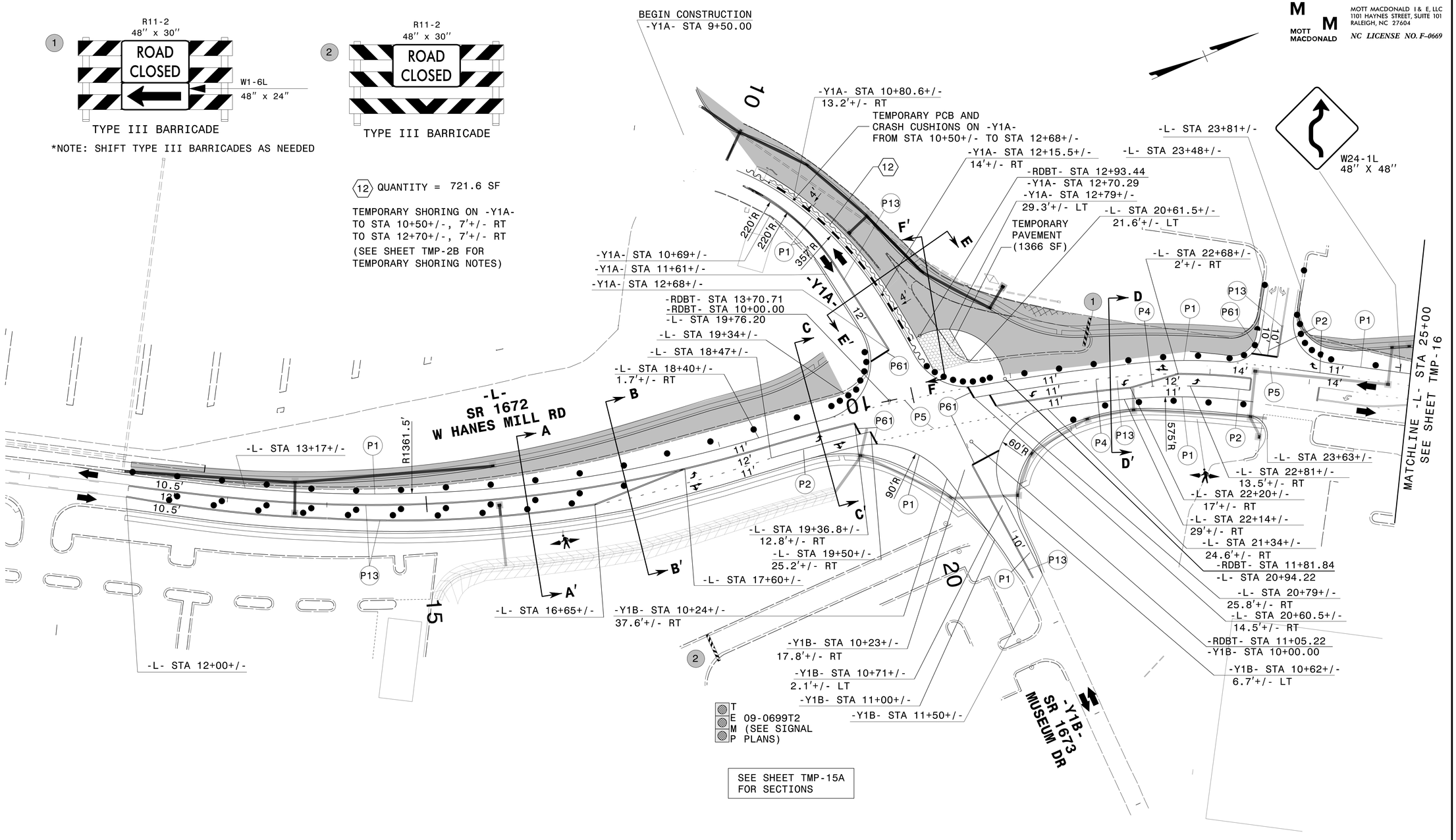
2 R11-2 48" x 30"

TYPE III BARRICADE

*NOTE: SHIFT TYPE III BARRICADES AS NEEDED

12 QUANTITY = 721.6 SF

TEMPORARY SHORING ON -Y1A-
TO STA 10+50+/-, 7'+/- RT
TO STA 12+70+/-, 7'+/- RT
(SEE SHEET TMP-2B FOR TEMPORARY SHORING NOTES)



APPROVED: _____

DATE: _____

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

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

TEMPORARY TRAFFIC CONTROL PHASE III DETAIL

2/2/2023
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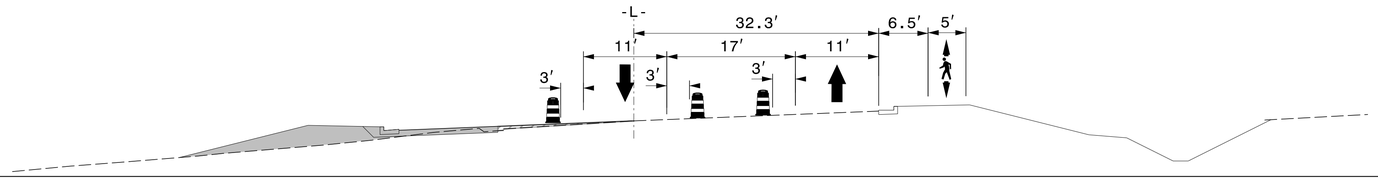
User:ST086227

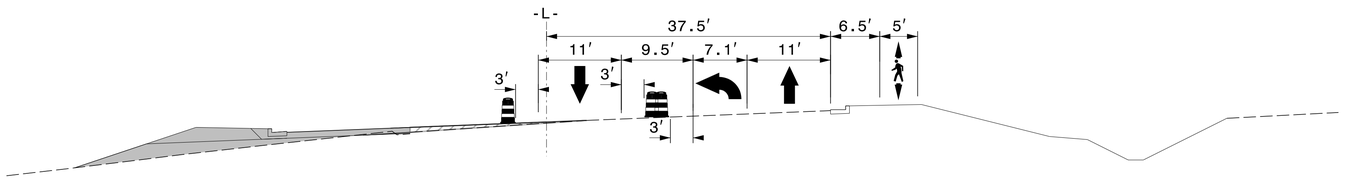
PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-15A

PLANS PREPARED FOR THE NCDOT BY:

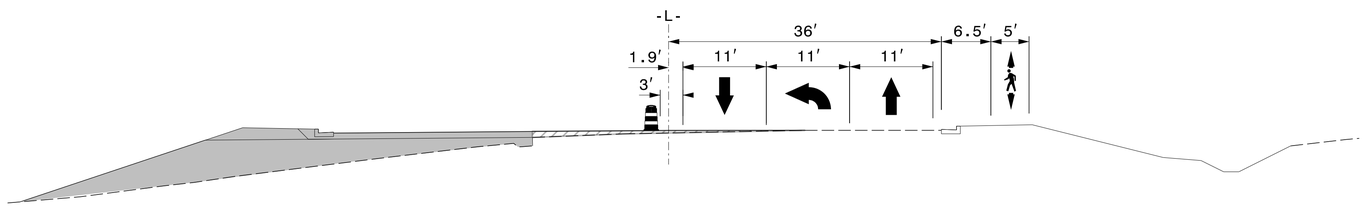
MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669



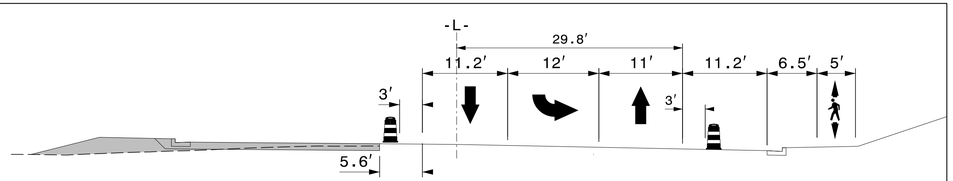
SECTION A-A′ -L- STA 16+00 SEE TMP-15



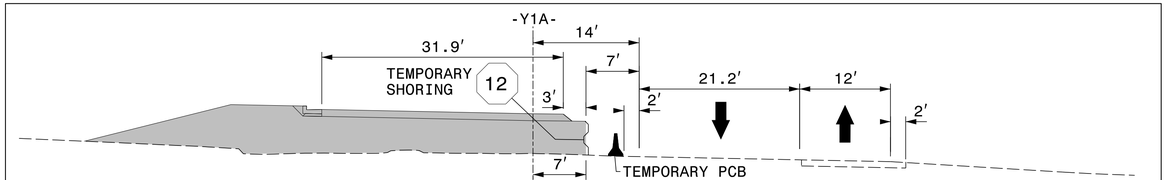
SECTION B-B′ -L- STA 17+00 SEE TMP-15



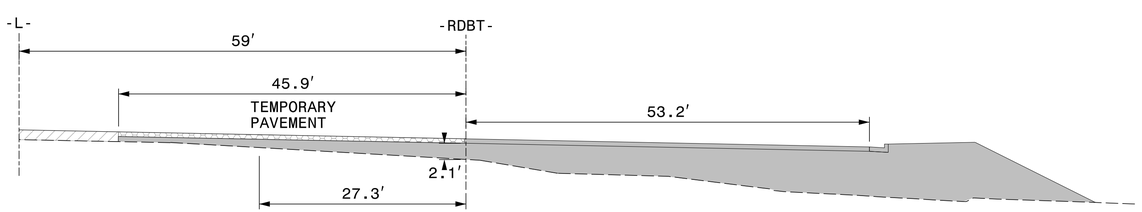
SECTION C-C′ -L- STA 19+00 SEE TMP-15



SECTION D-D′ -L- STA 22+00 SEE TMP-15



SECTION E-E′ -Y1A- STA 12+00 SEE TMP-15



SECTION F-F′ -RDBT- STA 12+75 SEE TMP-15

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER TORI D. STOUCHKO

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

TEMPORARY TRAFFIC CONTROL PHASE III DETAIL

2/21/2023
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User:STO86227

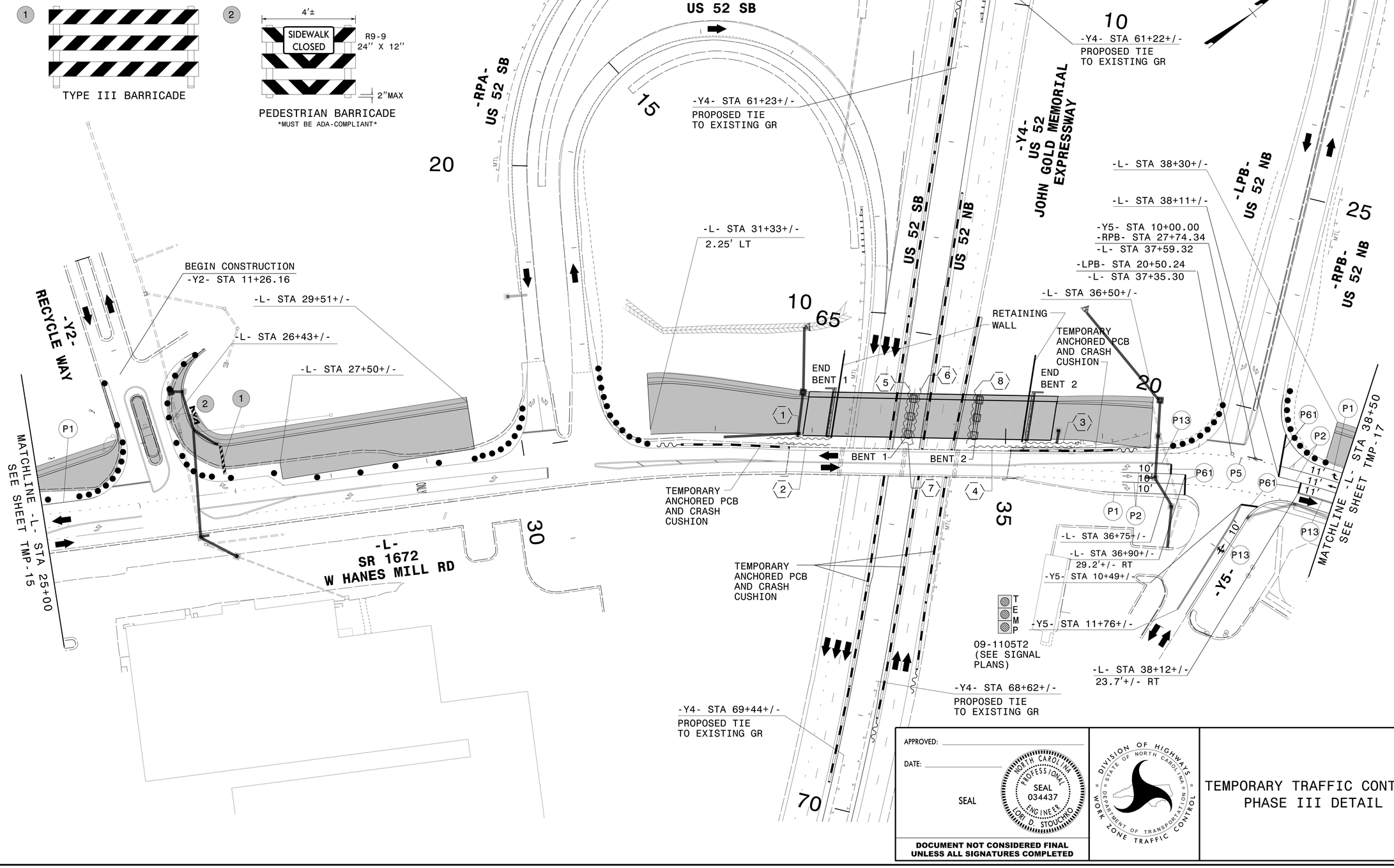
PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-16

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669

1 TYPE III BARRICADE

2 PEDESTRIAN BARRICADE
MUST BE ADA-COMPLIANT



APPROVED: _____

DATE: _____

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

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

TEMPORARY TRAFFIC CONTROL PHASE III DETAIL

2/2/2023
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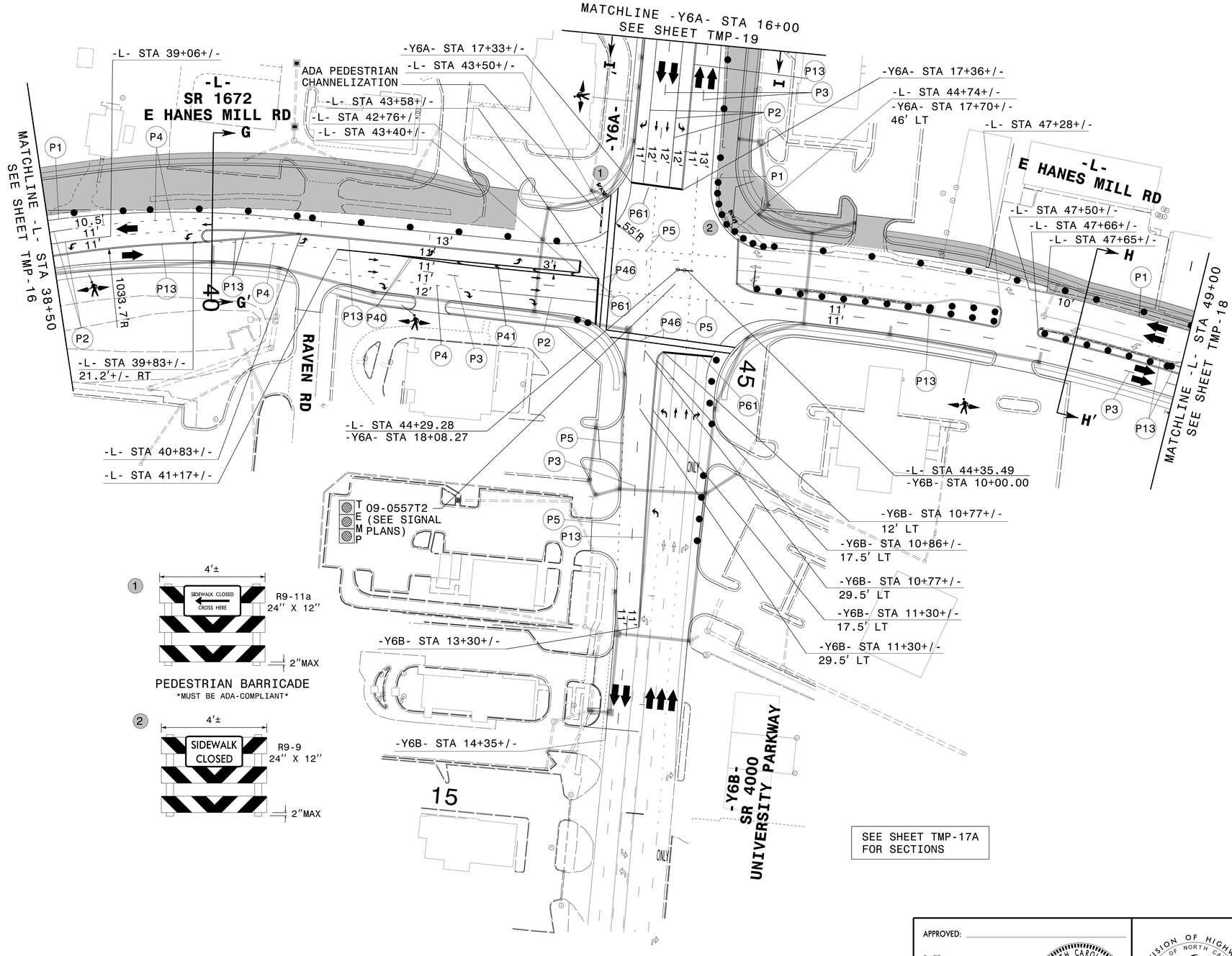
User:ST086227

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-17

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669



1

PEDESTRIAN BARRICADE
MUST BE ADA-COMPLIANT

2

SEE SHEET TMP-17A
FOR SECTIONS

APPROVED: _____

DATE: _____

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

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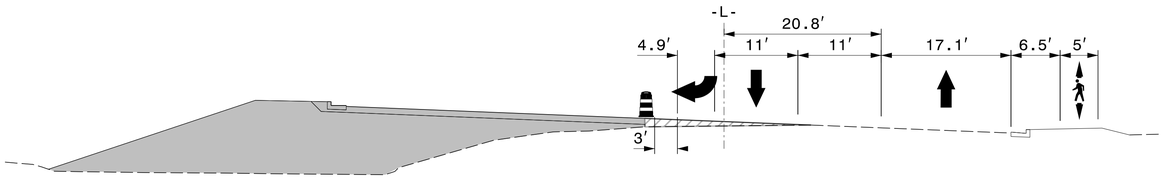
DIVISION OF HIGHWAYS · STATE OF NORTH CAROLINA · DEPARTMENT OF TRANSPORTATION · WORK ZONE TRAFFIC CONTROL

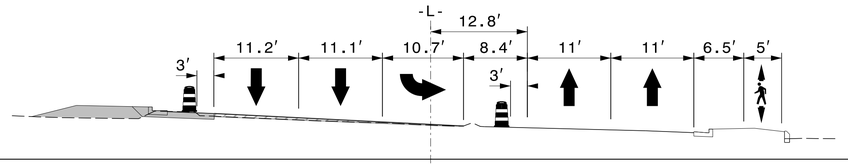
TEMPORARY TRAFFIC CONTROL PHASE III DETAIL

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-17A

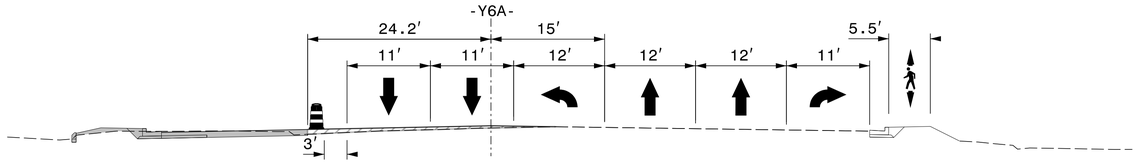
PLANS PREPARED FOR THE NCDOT BY:
MOTT MACDONALD
MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669



SECTION G-G′ -L- STA 40+00 SEE TMP-17



SECTION H-H′ -L- STA 48+00 SEE TMP-17



SECTION I-I′ -Y6A- STA 16+00 SEE TMP-17

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

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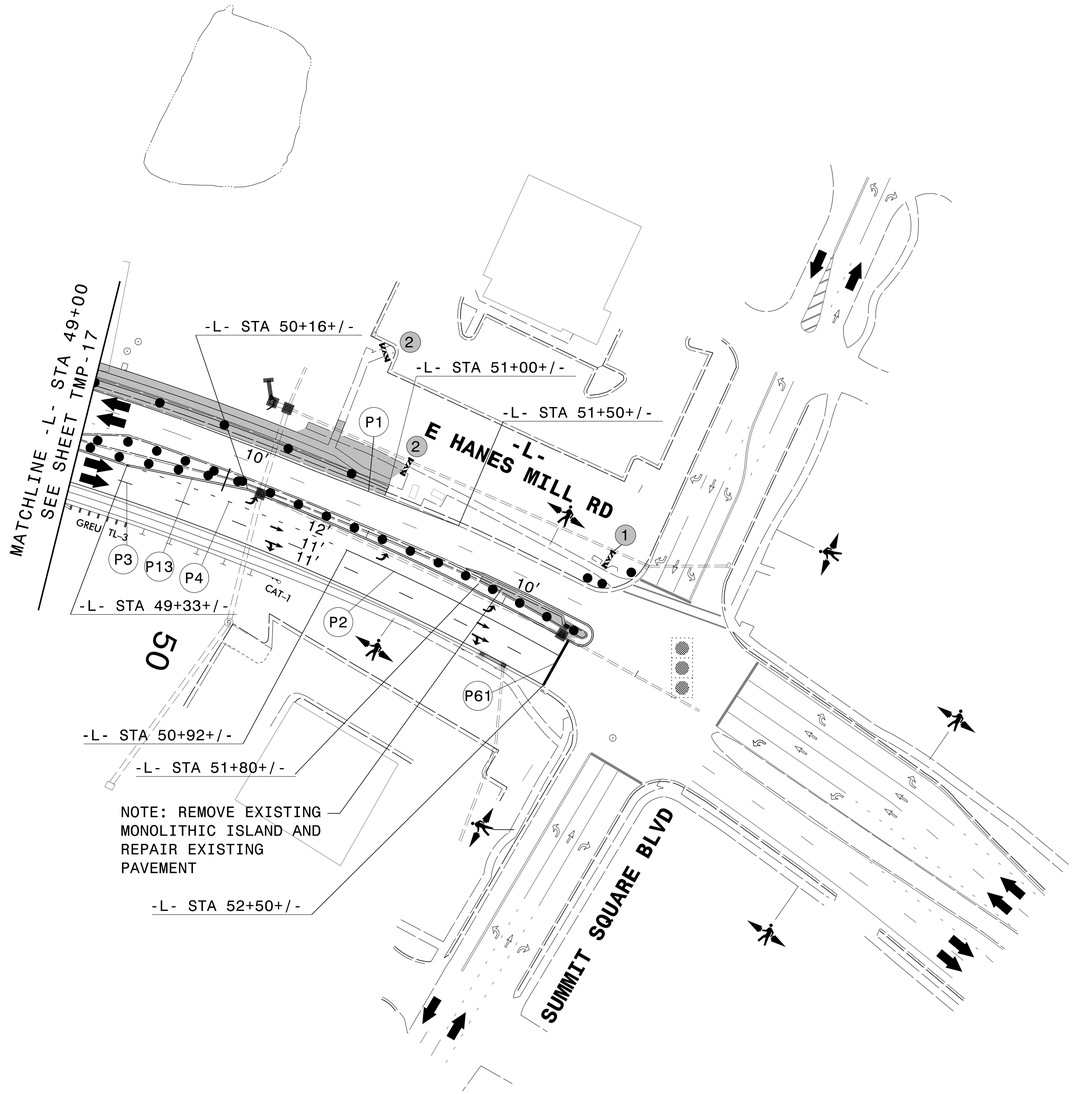
DIVISION OF HIGHWAYS · STATE OF NORTH CAROLINA · DEPARTMENT OF TRANSPORTATION · WORK ZONE TRAFFIC CONTROL

TEMPORARY TRAFFIC CONTROL PHASE III DETAIL

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-18

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669



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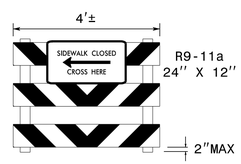
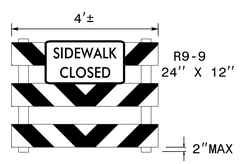


PEDESTRIAN BARRICADE
MUST BE ADA-COMPLIANT

2



PEDESTRIAN BARRICADE
MUST BE ADA-COMPLIANT

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

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

TEMPORARY TRAFFIC CONTROL PHASE III DETAIL

3/13/2023
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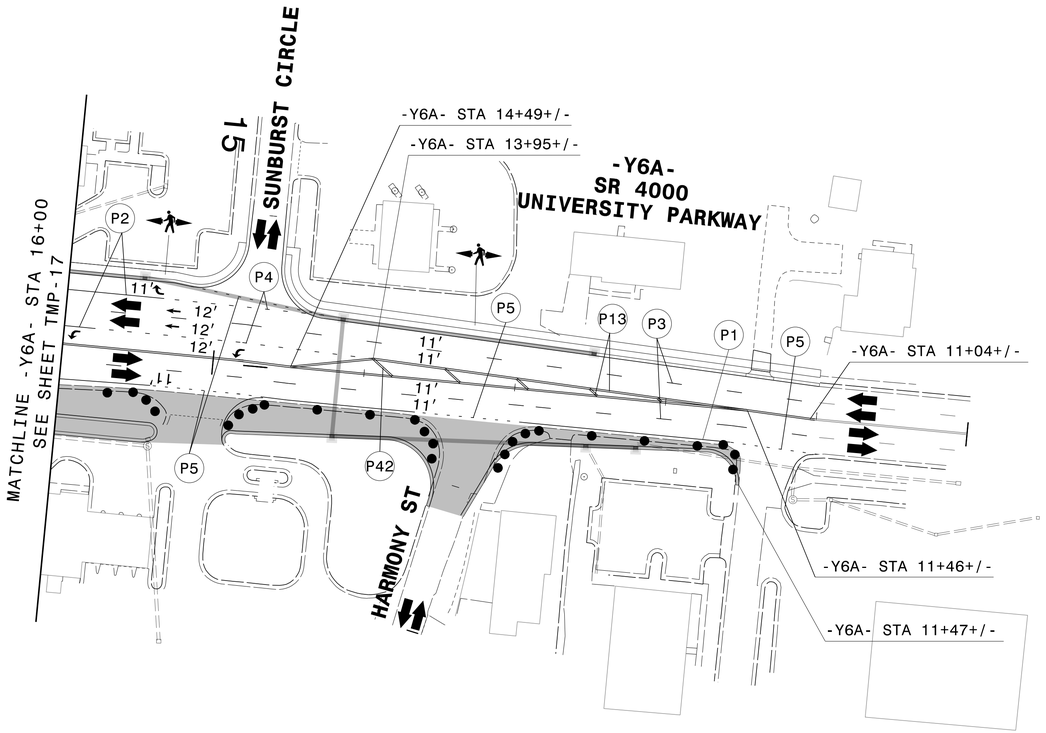
User:ST086227

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-19

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669



APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D STOUCHKO

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

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

TEMPORARY TRAFFIC CONTROL PHASE III DETAIL

2/21/2023
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User:ST086227

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-20

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669

BEGIN CONSTRUCTION
-Y1A- STA 9+50.00

TEMPORARY ANCHORED PCB
AND CRASH CUSHIONS ON -Y1A-
FROM STA 10+50+/- TO STA 12+47+/-

1 R11-2
48" x 30"
ROAD CLOSED
TYPE III BARRICADE

R1-2
48" x 48" x 48"

-L- SR 1672 W HANES MILL RD

-L- STA 12+00+/-

-Y1A- STA 11+90+/-
13'+/- LT

-Y1A- STA 12+40+/-
26.3'+/- LT

-RDBT- STA 12+93.44

-Y1A- STA 12+70.29

-RDBT- STA 13+70.71

-RDBT- STA 10+00.00

-L- STA 19+76.20

-L- STA 19+34+/-

-L- STA 19+83+/-
14'+/- RT

-L- STA 19+88+/-
56'+/- RT

-Y1A- STA 12+65+/-
14.9'+/- LT

-Y1A- STA 12+80+/-
15.3'+/- LT

-L- STA 20+79+/-
2.2'+/- RT

-L- STA 20+84+/-
13.7'+/- RT

-RDBT- STA 11+81.84

-L- STA 20+94.22

-L- STA 22+30+/-
11.3'+/- LT

-L- STA 23+29+/-
21.5'+/- LT

-L- STA 23+03+/-
26.9'+/- LT

-L- STA 20+94+/-
13.4'+/- RT

-L- STA 21+27+/-
44'+/- RT

-L- STA 21+00+/-
25.2'+/- RT

-Y1B- STA 10+02+/-
5.8'+/- LT

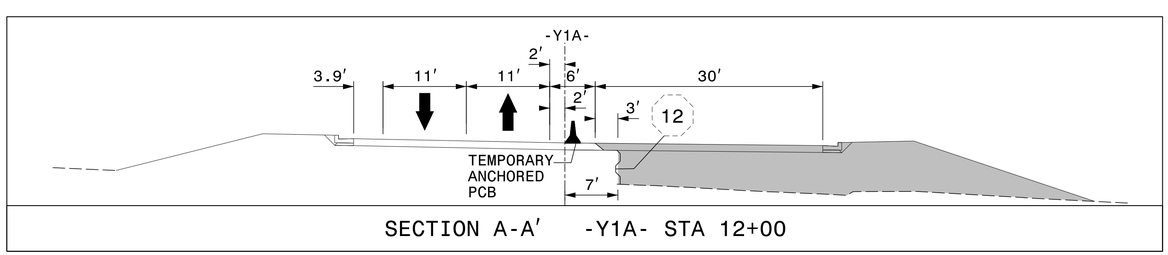
-RDBT- STA 11+05.22
-Y1B- STA 10+00.00

-Y1B- SR 1673 MUSEUM DR

09-0699T3 (SEE SIGNAL PLANS) TEMP

MATCHLINE -L- STA 25+00
SEE SHEET TMP-21

* INSTALL TRAFFIC BEARING DRAINAGE INLET SHORT OF FINAL GRADE, BACKFILL/PLATE AND PAVE OVER AS DIRECTED BY THE ENGINEER



SECTION A-A' -Y1A- STA 12+00

APPROVED: _____

DATE: _____

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER JOHN D. STOUCHKO

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

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

TEMPORARY TRAFFIC CONTROL PHASE IV DETAIL

2/21/2023
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User:STO86227

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-21

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669

1 R11-2 48" x 30"
ROAD CLOSED
DETOUR
M4-10R 48" x 18"
TYPE III BARRICADE

2 R11-2 48" x 30"
ROAD CLOSED
W1-6L 48" x 24"
TYPE III BARRICADE

3
TYPE III BARRICADE

4 4'±
SIDEWALK CLOSED
R9-9 24" X 12"
2"MAX
PEDESTRIAN BARRICADE
MUST BE ADA-COMPLIANT

-LPA- US 52 SB
-RPA- US 52 SB
-LPB- STA. 15+26+/-
-LPB- STA. 15+50+/-
-RPB- STA. 23+50+/-
-Y4- STA 61+22+/- PROPOSED TIE TO EXISTING GR
-Y4- STA 61+23+/- PROPOSED TIE TO EXISTING GR
-Y4- US 52 JOHN GOLD MEMORIAL EXPRESSWAY
-LPB- US 52 NB
-RPB- US 52 NB
-L- STA 38+30+/-
-Y5- STA 10+00.00
-RPB- STA 27+74.34
-L- STA 37+59.32
-LPB- STA 20+50.24
-L- STA 37+35.30
-L- STA 36+50+/-
-LPA- STA 18+97.24
-L- STA 30+67.90
-RPA- STA 22+89.53
-L- STA 30+19.79
-L- STA 31+33+/-
-L- STA 29+51+/-
BEGIN CONSTRUCTION
-Y2- STA 11+26.16
-Y2- RECYCLE WAY
RETAINING WALL
TYPE III
TYPE III
GREU TL-3
GREU TL-3
MATCHLINE -L- STA 25+00 SEE SHEET TMP-20
MATCHLINE -L- STA 38+50 SEE SHEET TMP-22
-L- SR 1672 W HANES MILL RD
TEMPORARY ANCHORED PCB AND CRASH CUSHION
TEMPORARY PCB AND CRASH CUSHIONs
TEMPORARY ANCHORED PCB AND CRASH CUSHION
09-1105T3 (SEE SIGNAL PLANS)
TEMP
-Y5-
-L- STA 25+40+/-
-Y2- STA 12+66.80
-L- STA 26+20.00
-Y4- STA 68+62+/-
SEE SHEET TMP-21B FOR SECTIONS
SEE TMP-2C FOR -LPB- AND -RPB- TEMPORARY DETOURS

APPROVED: _____
DATE: _____
SEAL

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

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

TEMPORARY TRAFFIC CONTROL PHASE IV DETAIL

2/21/2023
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User:ST086227

PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-21A

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669

NOTE: USE DRUMS AND TYPE III BARRICADES WITH R11-2 "ROAD CLOSED" BARRICADE MOUNTED SIGN TO CLOSE -RPA-

BEGIN CONSTRUCTION
-RPA- STA 17+50

-RPA-
US 52 SB

GREU TL-3

CAT-1

-LPA-
US 52 SB

BEGIN CONSTRUCTION
-LPA- STA 13+50

-LPA- STA 18+97.24
-L- STA 30+67.90

-RPA- STA 22+89.53
-L- STA 30+19.79

-L- STA 29+51+/-

-L- STA 29+51+/-
7.5' LT

-L- STA 31+33+/-

-L- STA 31+33+/-
2.25' RT

TYPE III

RETAINING WALL

TEMPORARY ANCHORED PCB AND CRASH CUSHION

TYPE III

TEMPORARY ANCHORED PCB AND CRASH CUSHION

-L-
SR 1672
W HANES MILL RD

US 52 SB

US 52 NB

-Y4-
US 52
JOHN GOLD MEMORIAL EXPRESSWAY

-LPB- STA. 15+50+/-

-RPB- STA. 23+50+/-

-LPB-
US 52 NB

-LPB- STA 18+64+/-

-Y5- STA 10+00.00
-RPB- STA 27+74.34
-L- STA 37+59.32

-LPB- STA 20+34+/-

-LPB- STA 20+50.24
-L- STA 37+35.30

-LPB- STA 20+47+/-

-L- STA 36+50+/-

-RPB-
US 52 NB

GREU TL-3

-L- STA. 37+88+/-

-L- STA. 38+92+/-

-L- STA. 39+94+/-

-L- STA. 40+00+/-

-Y5-

TEMP 09-1105T4 (SEE SIGNAL PLANS)

1 R11-2 48" x 30"
ROAD CLOSED
TYPE III BARRICADE

2 R11-2 48" x 30"
ROAD CLOSED
DETOUR
M4-10R 48" x 18"
TYPE III BARRICADE

SEE SHEET TMP-21B FOR SECTIONS

SEE TMP 2D FOR -RPA- AND -LPA- TEMPORARY DETOURS

APPROVED: _____

DATE: _____

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORRI D. STOUCHKO

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

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

TEMPORARY TRAFFIC CONTROL PHASE IV DETAIL

2/21/2023
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PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-21B

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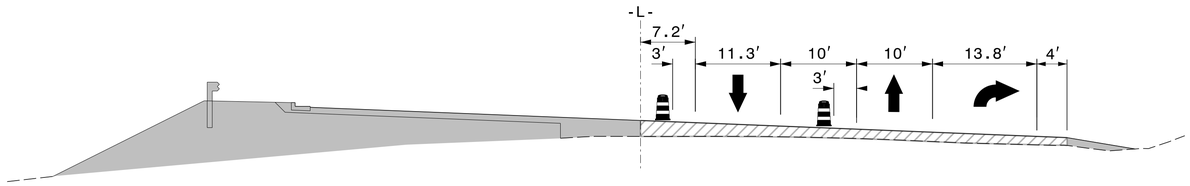
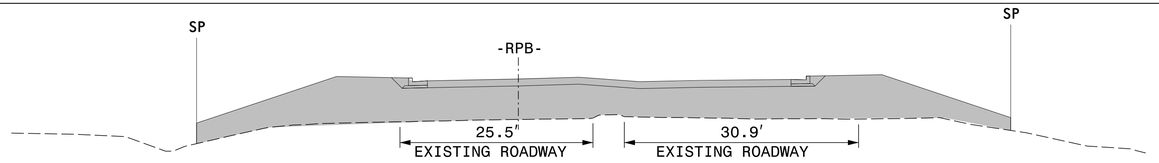
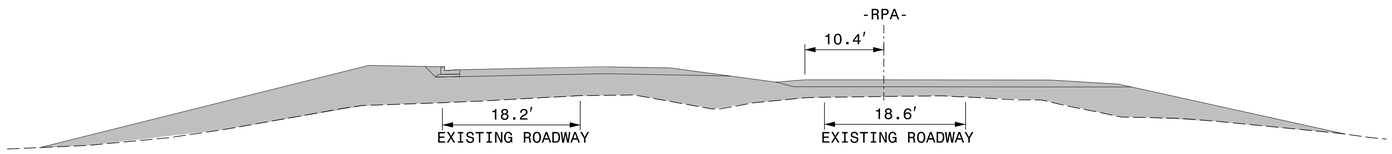
RALEIGH, NC 27604
NC LICENSE NO. F-0669



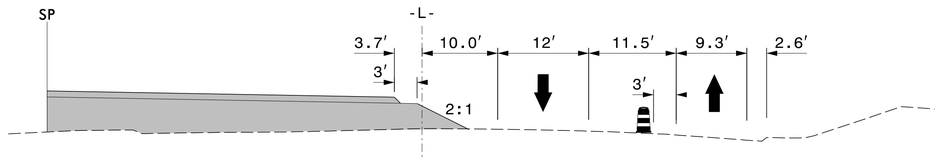
SECTION B-B′ -L- STA 37+00 — SEE TMP-21



SECTION C-C′ -RPB- STA 27+00 — SEE TMP-21



SECTION D-D′ -RPA- STA 21+00 — SEE TMP-21A



SECTION E-E′ -L- STA 30+00 — SEE TMP-21A

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DATE: _____

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NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

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TEMPORARY TRAFFIC CONTROL PHASE IV DETAIL

2/21/2023
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PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-22

PLANS PREPARED FOR THE NCDOT BY:

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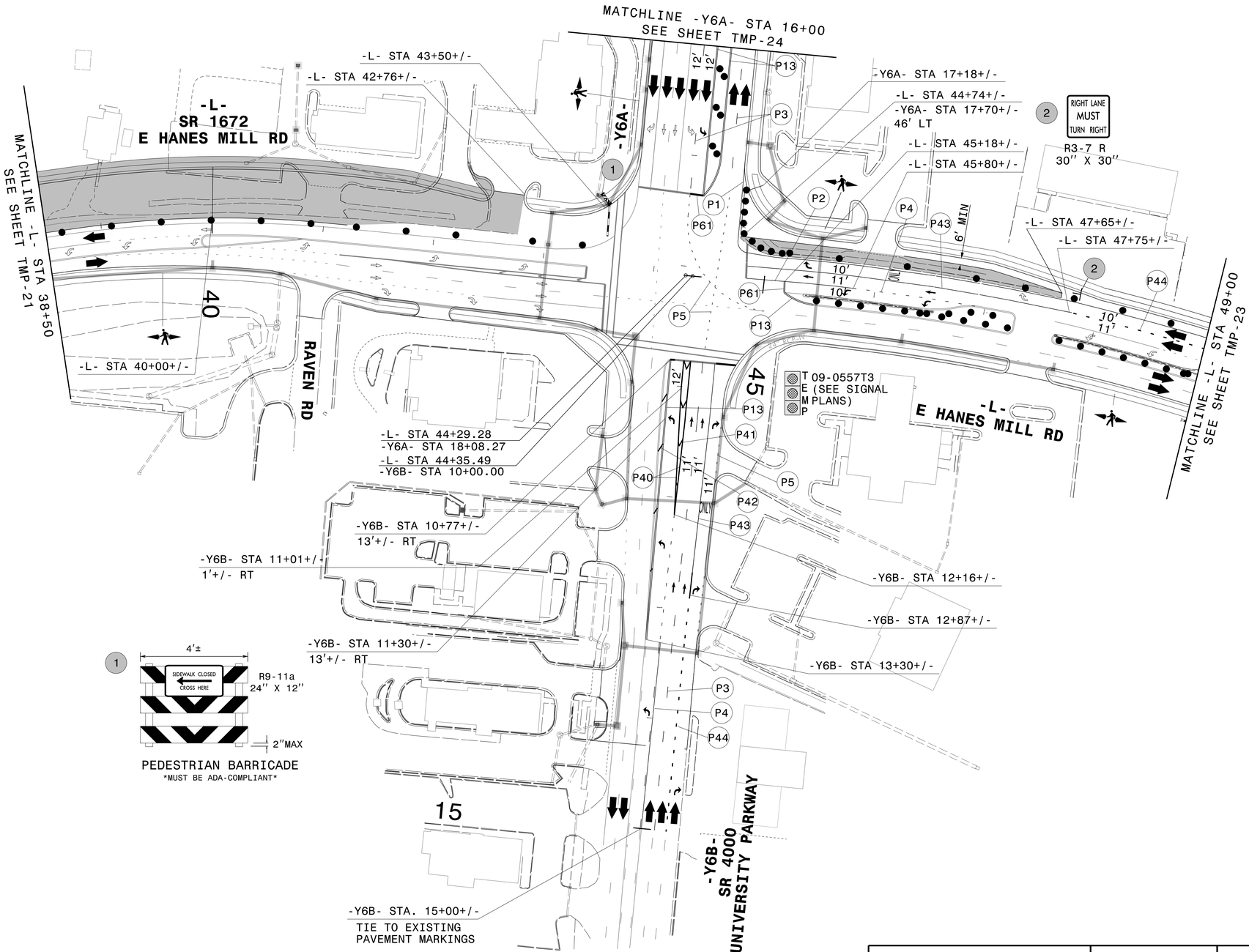
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669



1

PEDESTRIAN BARRICADE
MUST BE ADA-COMPLIANT

APPROVED: _____

DATE: _____

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D STOUCHKO

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DEPARTMENT OF TRANSPORTATION
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TEMPORARY TRAFFIC CONTROL PHASE IV DETAIL

3/13/2023
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PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-23

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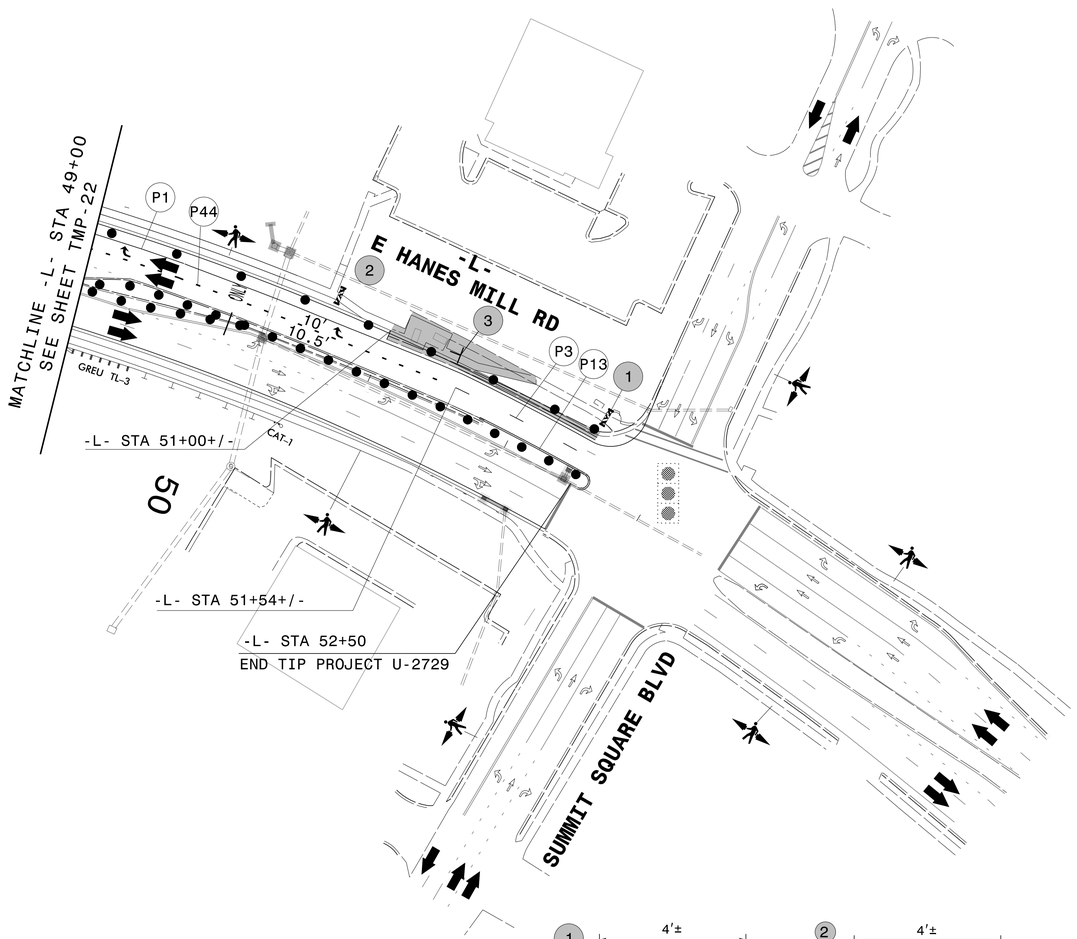

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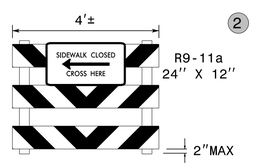
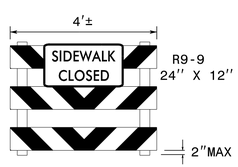


PEDESTRIAN BARRICADE
MUST BE ADA-COMPLIANT

2



PEDESTRIAN BARRICADE
MUST BE ADA-COMPLIANT

3

R3-7 L
30'' X 30''

APPROVED: _____

DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER JOHN D. STOUCHKO

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

TEMPORARY TRAFFIC CONTROL PHASE IV DETAIL

3/13/2023
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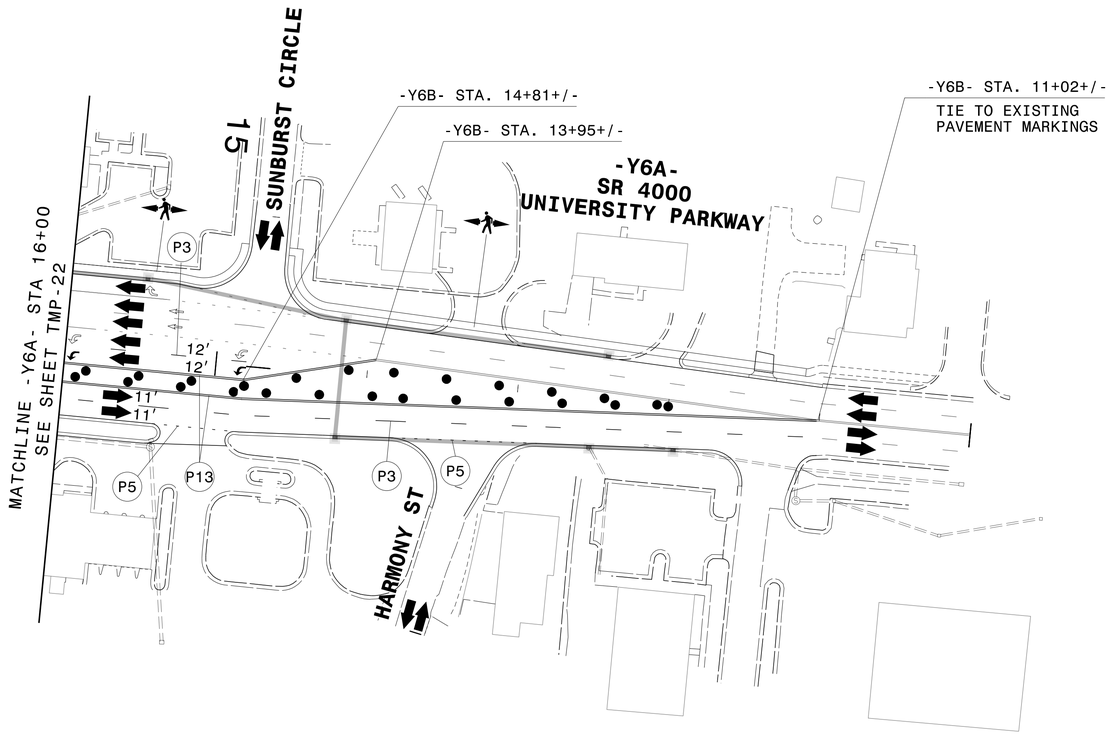
PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-24

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669



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DATE: _____

NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER LORI D. STOUCHKO

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TEMPORARY TRAFFIC CONTROL PHASE IV DETAIL

3/13/2023
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PROJ. REFERENCE NO.	SHEET NO.
U-2729	TMP-25

PLANS PREPARED FOR THE NCDOT BY:

MOTT MACDONALD I & E, LLC
1101 HAYNES STREET, SUITE 101
RALEIGH, NC 27604
NC LICENSE NO. F-0669

BEGIN CONSTRUCTION
-Y1A- STA 9+50.00

PLACE FINAL WARNING SIGNS FOR ROUNDABOUT APPROACHES AND WITHIN THE CENTER ISLAND -RDBT- (SEE FINAL SIGNING PLANS)

R1-2
48'' x 48'' x 48''

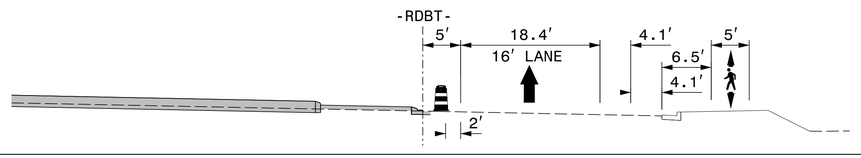
PLACE PROTABLE/STATIONARY YIELD SIGNS AT ROUNDABOUT ACCESS POINTS (SEE RSD 910.40 SHEET 1 OF 2)

-L- SR 1672 W HANES MILL RD

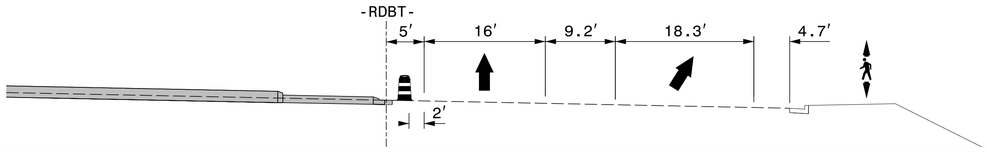
-L- STA 12+42+/-
-L- STA 12+00+/-
-L- STA 19+64+/- 44.5'+/- LT
-RDBT- STA 13+70.71
-RDBT- STA 10+00.00
-L- STA 19+76.20
-L- STA 19+58+/- 18.6'+/- LT
-L- STA 19+10+/-
-L- STA 18+76+/-
-L- STA 19+66+/- 65.7'+/- LT
-L- STA 20+05+/-
-RDBT- STA 12+93.44
-Y1A- STA 12+70.29
-L- STA 20+45+/- 79.3'+/- LT
-L- STA 20+79+/- 66.2'+/- LT
-RDBT- STA 11+81.84
-L- STA 20+94.22
-L- STA 21+06+/- 33.9'+/- LT
-L- STA 21+76+/-
-L- STA 21+78+/-
-L- STA 23+41+/-
-L- STA 24+20+/-
-L- STA 24+04+/- 9.8'+/- RT
-L- STA 21+95+/- 7.1'+/- RT
-L- STA 21+49+/- 31.8'+/- RT
-L- STA 21+51+/- 43'+/- RT
-L- STA 21+04+/- 45.5'+/- RT
-L- STA 20+79+/- 69'+/- RT
-L- STA 20+69+/- 73.1'+/- RT
-L- STA. 23+98+/-
-L- STA 23+37+/- 11.2'+/- RT
-L- STA. 24+52+/-
-L- STA 19+26+/-
-L- STA 20+05+/-
-RDBT- STA 11+05.22
-Y1B- STA 10+00.00
-Y1B- STA 10+84+/-
-Y1B- STA 11+50+/-
-Y1A-
-Y1B- SR 1673 MUSEUM DR

MATCHLINE -L- STA 25+00
SEE SHEET TMP-26

SECTION A-A′ -RDBT- STA 10+50



SECTION B-B′ -RDBT- STA 12+75



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NORTH CAROLINA PROFESSIONAL SEAL 034437 ENGINEER ORI D STOUCHKO

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TEMPORARY TRAFFIC CONTROL PHASE V DETAIL

2/2/2023
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