

WBS NO: 2025CPT.01.02.10281

CONTRACT: DA00610

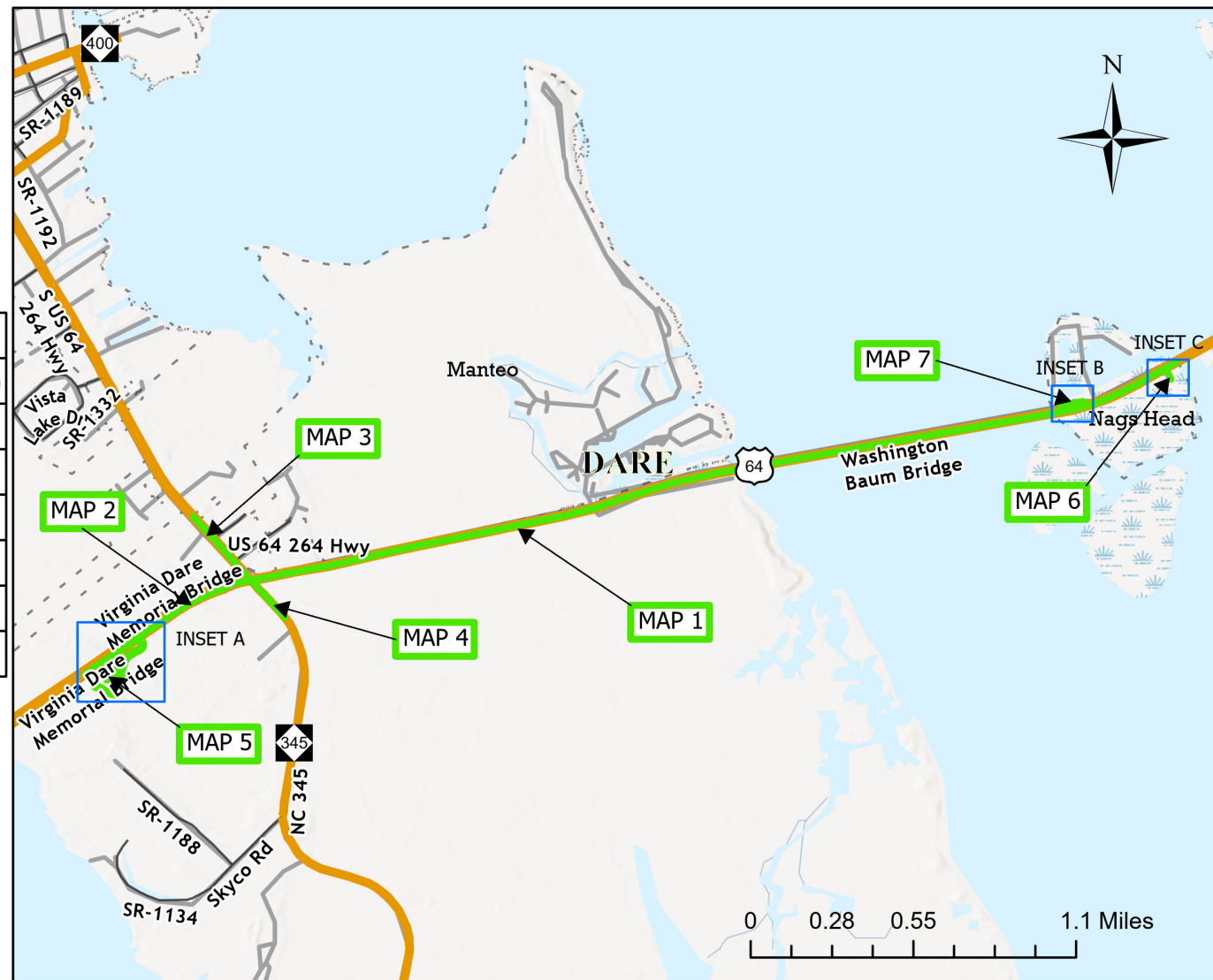
**STATE OF NORTH CAROLINA
DIVISION OF HIGHWAYS**

DARE

STATE	STATE PROJECT REFERENCE NUMBER	SHEET NO.
NC	2025CPT.01.02.10281	1
STATE PROJECT NUMBER		DESCRIPTION
2025CPT.01.02.10281		P.E., CONST.

TYPE OF WORK: MILLING, RESURFACING, SHOULDER RECONSTRUCTION, & PAVEMENT MARKINGS

MAP	ROUTE	FROM	TO
01	US 64	NC 345	Bridge #14 (Melvin R. Daniels Bridge)
02	US 64 Bypass	NC 345	VA Dare Bridge
03	US 64	Pavement Joint	US 64
04	NC 345	Pavement Joint	US 64
05	Sarah Owens Welcome Center		
06	Little Bridge Access	US 64	End of Parking Lot
07	Service Road	Beginning of Pavement	End of Pavement



(SEE SHEET 1-A FOR INSET DETAIL)

PROJECT LENGTH

MAP	LENGTH
01	2.621
02	0.53
03	0.23
04	0.138

MAP	LENGTH
05	0.65
06	0.03
07	0.07

Prepared in the Office of:
DIVISION OF HIGHWAYS
113 AIRPORT DR., EDENTON, NC 27932

B. N. BRASWELL, PE
DIV. PROJ. DEVELOPMENT ENGINEER

M. S. WINSLOW
DIVISION CONTRACT ENGINEER

J. S. ABEL, JR.
DIVISION PROJECT TEAM LEAD

D. H. STALLINGS
DIVISION DESIGN ENGINEER



WBS NO: 2025CPT.01.02.10281

CONTRACT: DA00610

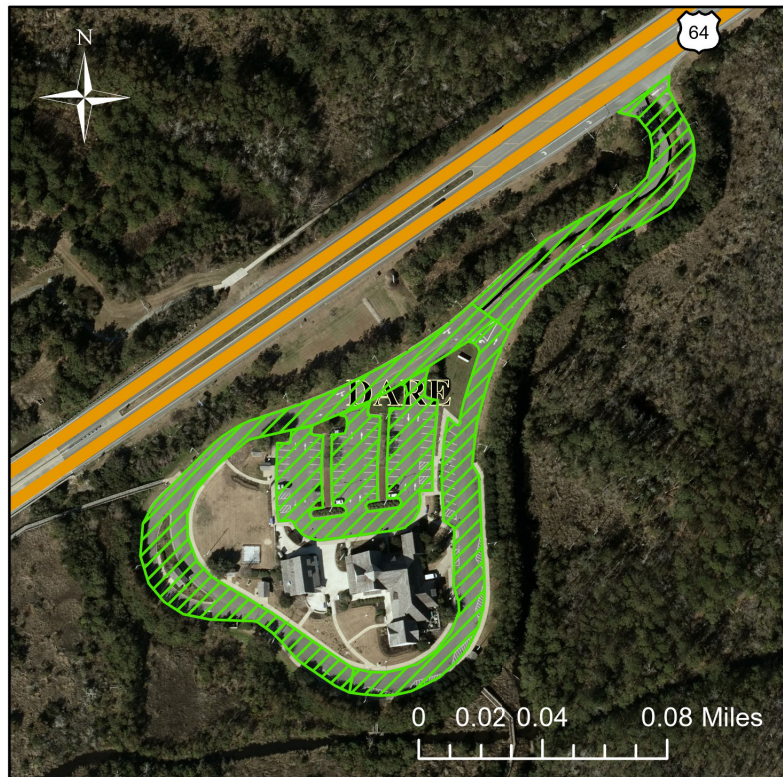
STATE OF NORTH CAROLINA DIVISION OF HIGHWAYS

DARE

STATE	STATE PROJECT REFERENCE NUMBER	SHEET NO.
NC	2025CPT.01.02.10281	1-A
STATE PROJECT NUMBER		DESCRIPTION
2025CPT.01.02.10281		P.E., CONST.

TYPE OF WORK: MILLING, RESURFACING, SHOULDER RECONSTRUCTION, & PAVEMENT MARKINGS

INSET A - MAP 5



SARAH OWENS WELCOME CENTER

INSET B - MAP 6



LITTLE BRIDGE ACCESS

INSET C - MAP 7



SERVICE ROAD

INSET DETAIL SHEET

PROJECT LENGTH

Prepared in the Office of:
DIVISION OF HIGHWAYS
113 AIRPORT DR., EDENTON, NC 27932

B. N. BRASWELL, PE
DIV. PROJ. DEVELOPMENT ENGINEER

J. S. ABEL, JR.
DIVISION PROJECT TEAM LEAD

M. S. WINSLOW
DIVISION CONTRACT ENGINEER

D. H. STALLINGS
DIVISION DESIGN ENGINEER



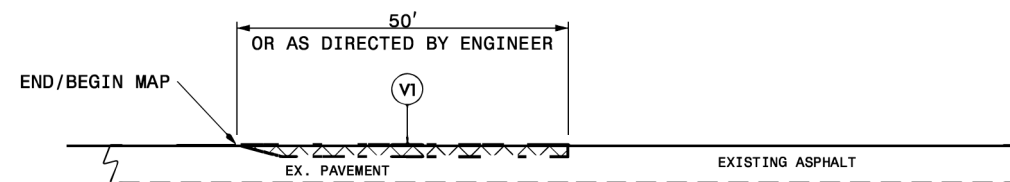
PAVEMENT SCHEDULE

C1	PROP. APPROX. 1.5" ASPHALT CONCRETE SURFACE COURSE, TYPE S9.5C, AT AN AVERAGE RATE OF 168 LBS. PER SQ. YD.
V1	INCIDENTAL MILLING ASPHALT PAVEMENT.
V2	MILLING ASPHALT PAVEMENT. 1.5" IN DEPTH.
U	EXISTING PAVEMENT.

NOTES:

PROJECT REFERENCE NO.	SHEET NO.
2025CPT.01.02.10281, ETC.	2

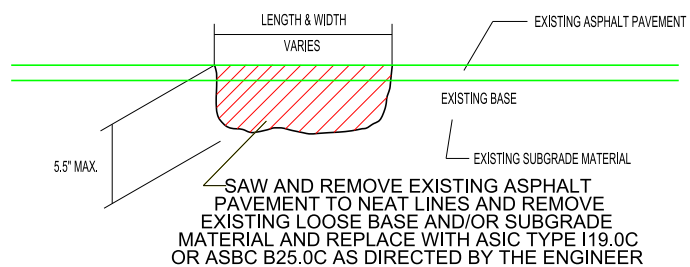
- * ALL INTERSECTING ROADS ARE TO BE RESURFACED TO THE ENDS OF THEIR RADII, THE MAIN LINE RIGHT OF WAY OR AS DIRECTED BY THE ENGINEER. THIS SHALL INCLUDE ANY TAPERS AND TURN LANES LOCATED BOTH ON THE MAIN LINE OR INTERSECTING PAVED ROADWAY.
- * EDGES, PAVEMENT WIDENING, INTERSECTIONS AND BRIDGE FLARES ARE INCLUDED IN THE SUMMARY OF QUANTITIES.
- * 1.5" MILLING AND 1.5" OF S9.5C TO BE APPLIED THE FULL WIDTH OF THE ROADWAY



DETAIL 1

MAIN LINE MILLING

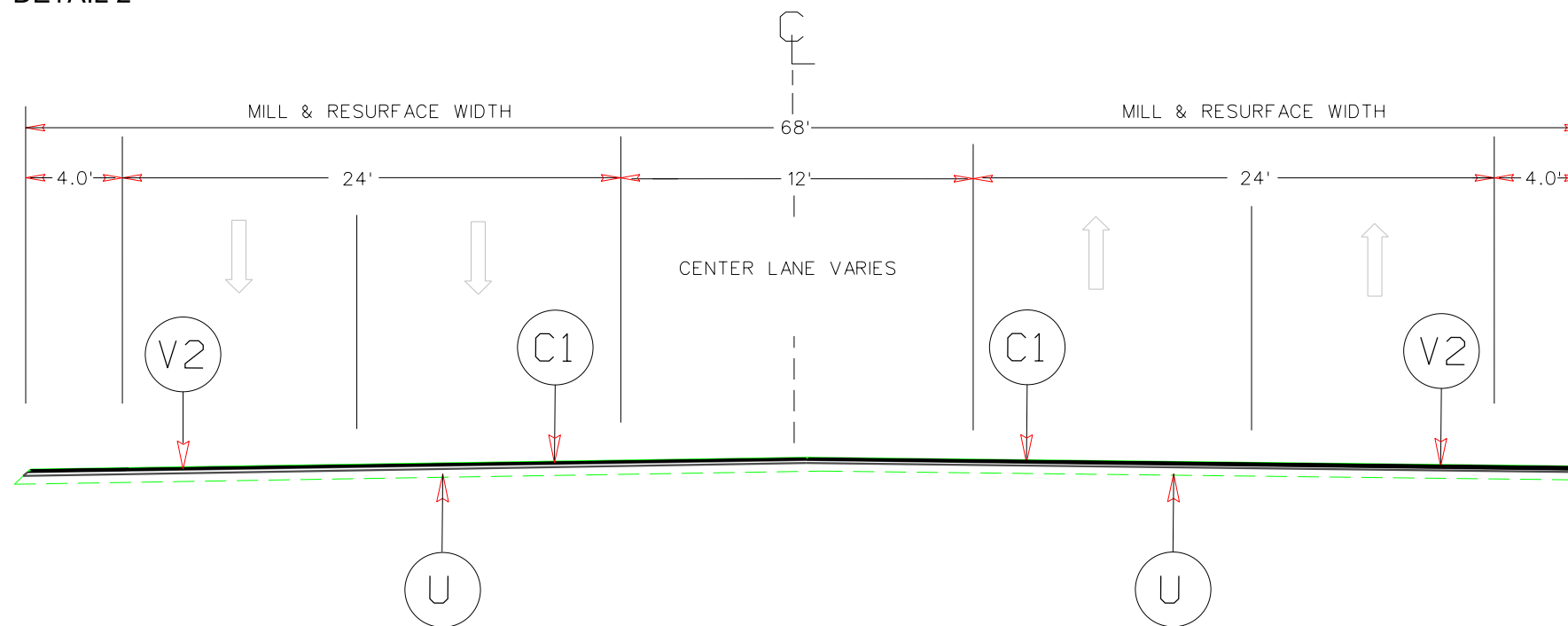
- NOTE:
1. INCLUDES INCIDENTAL MILLING AT THE ENDS OF MAIN LINE SECTIONS, OR AS DIRECTED BY THE ENGINEER.
 2. PAVE TO THE END OF THE MILLED SURFACE TO CREATE A SMOOTH TRANSITION.



*NOTE: EDGES OF PATCHED AREA ARE TO BE CLEANED OF ALL DEBRIS AND COATED WITH AN APPROVED TACK MATERIAL BEFORE PLACING ASPHALT.

PATCHING EXISTING PAVEMENT (FULL DEPTH)

DETAIL 2



TYPICAL SECTION NO. 1

USE WITH MAP 1 (STA 0+00 - 46+77)
 & MAP 1 (BAUM BRIDGE (STA 119+40) - DANIELS BRIDGE (138+40))
 USE WITH MAP 2

\$\$\$\$\$\$SYTIME\$\$\$\$\$
 \$\$\$\$CADDEN\$\$\$\$\$
 \$\$\$\$USMAN\$\$\$\$\$

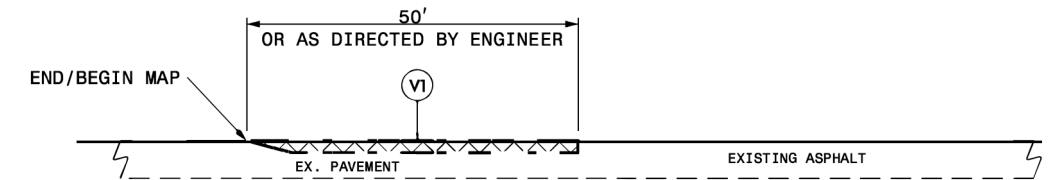
PAVEMENT SCHEDULE

B1	PROP. APPROX. 0.75" OPEN GRADE FRICTION COURSE, TYPE FC-1, MODIFIED, AT AN AVERAGE RATE OF 90 LBS. PER SQ. YD.
C1	PROP. APPROX. 1.5" ASPHALT CONCRETE SURFACE COURSE, TYPE S9.5C, AT AN AVERAGE RATE OF 168 LBS. PER SQ. YD.
V1	INCIDENTAL MILLING ASPHALT PAVEMENT.
V2	MILLING ASPHALT PAVEMENT. 1.5" IN DEPTH.
V3	MILLING ASPHALT PAVEMENT. 0.75" IN DEPTH.
U	EXISTING PAVEMENT.

NOTES:

PROJECT REFERENCE NO.	SHEET NO.
2025CPT.01.02.10281, ETC.	2-A

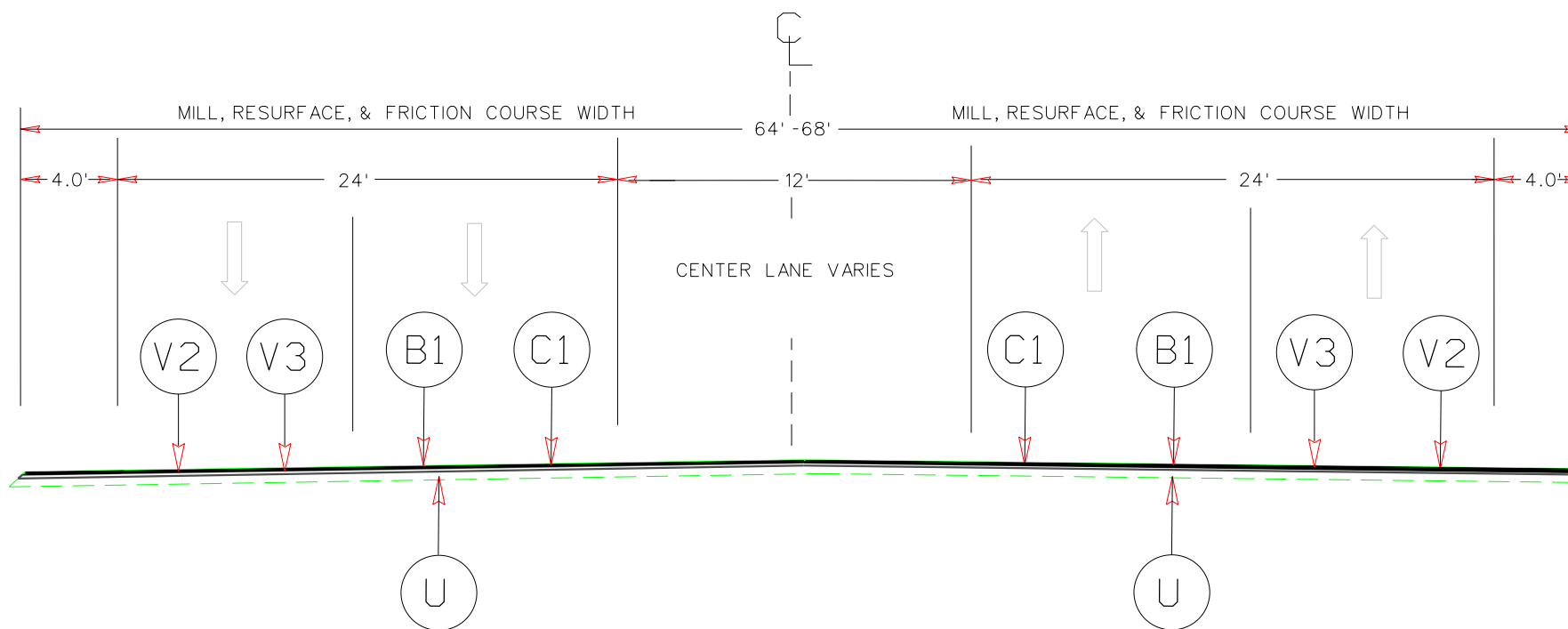
- * ALL INTERSECTING ROADS ARE TO BE RESURFACED TO THE ENDS OF THEIR RADII, THE MAIN LINE RIGHT OF WAY OR AS DIRECTED BY THE ENGINEER. THIS SHALL INCLUDE ANY TAPERS AND TURN LANES LOCATED BOTH ON THE MAIN LINE OR INTERSECTING PAVED ROADWAY.
- * EDGES, PAVEMENT WIDENING, INTERSECTIONS AND BRIDGE FLARES ARE INCLUDED IN THE SUMMARY OF QUANTITIES.
- * 1.5" MILLING AND 1.5" OF S9.5C TO BE APPLIED THE FULL WIDTH OF THE ROADWAY



DETAIL 1

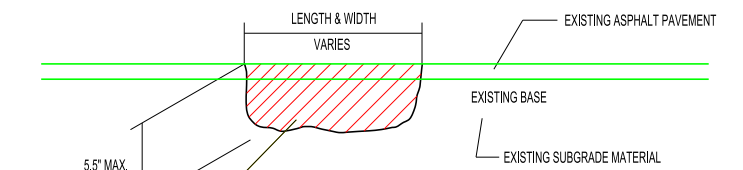
MAIN LINE MILLING

- NOTE:
1. INCLUDES INCIDENTAL MILLING AT THE ENDS OF MAIN LINE SECTIONS, OR AS DIRECTED BY THE ENGINEER.
 2. PAVE TO THE END OF THE MILLED SURFACE TO CREATE A SMOOTH TRANSITION.



TYPICAL SECTION NO. 1A

USE WITH MAP 1 (STA 46+77 - BAUM BRIDGE (STA 63+77))



- SAW AND REMOVE EXISTING ASPHALT PAVEMENT TO NEAT LINES AND REMOVE EXISTING LOOSE BASE AND/OR SUBGRADE MATERIAL AND REPLACE WITH ASIC TYPE I19.0C OR ASBC B25.0C AS DIRECTED BY THE ENGINEER
- *NOTE: EDGES OF PATCHED AREA ARE TO BE CLEANED OF ALL DEBRIS AND COATED WITH AN APPROVED TACK MATERIAL BEFORE PLACING ASPHALT.

PATCHING EXISTING PAVEMENT (FULL DEPTH)

DETAIL 2

\$\$\$\$\$\$SYTIME\$\$\$\$\$\$
 \$\$\$\$\$\$DATE\$\$\$\$\$\$
 \$\$\$\$\$\$DRAWN\$\$\$\$\$\$
 \$\$\$\$\$\$CHECKED\$\$\$\$\$\$
 \$\$\$\$\$\$DATE\$\$\$\$\$\$
 \$\$\$\$\$\$DESIGNED\$\$\$\$\$\$
 \$\$\$\$\$\$BY\$\$\$\$\$\$
 \$\$\$\$\$\$DATE\$\$\$\$\$\$
 \$\$\$\$\$\$PROJECT\$\$\$\$\$\$
 \$\$\$\$\$\$NO. 1A\$\$\$\$\$\$
 \$\$\$\$\$\$USE\$\$\$\$\$\$

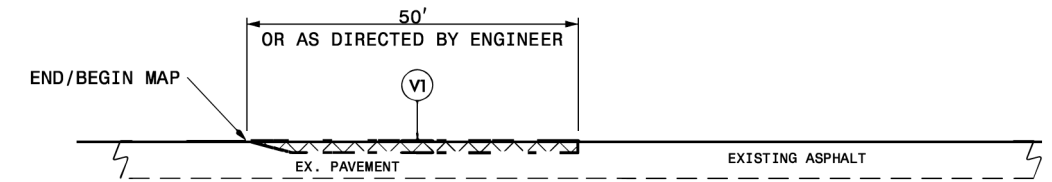
PAVEMENT SCHEDULE

C1	PROP. APPROX. 1.5" ASPHALT CONCRETE SURFACE COURSE, TYPE S9.5C, AT AN AVERAGE RATE OF 168 LBS. PER SQ. YD.
V1	INCIDENTAL MILLING ASPHALT PAVEMENT.
V2	MILLING ASPHALT PAVEMENT. 1.5" IN DEPTH.
U	EXISTING PAVEMENT.

NOTES:

PROJECT REFERENCE NO.	SHEET NO.
2025CPT.01.02.10281, ETC.	3

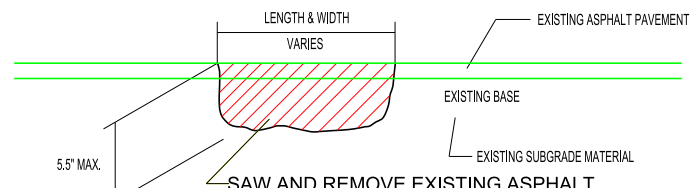
- * ALL INTERSECTING ROADS ARE TO BE RESURFACED TO THE ENDS OF THEIR RADII, THE MAIN LINE RIGHT OF WAY OR AS DIRECTED BY THE ENGINEER. THIS SHALL INCLUDE ANY TAPERS AND TURN LANES LOCATED BOTH ON THE MAIN LINE OR INTERSECTING PAVED ROADWAY.
- * EDGES, PAVEMENT WIDENING, INTERSECTIONS AND BRIDGE FLARES ARE INCLUDED IN THE SUMMARY OF QUANTITIES.
- * 1.5" MILLING AND 1.5" OF S9.5C TO BE APPLIED THE FULL WIDTH OF THE ROADWAY



DETAIL 1

MAIN LINE MILLING

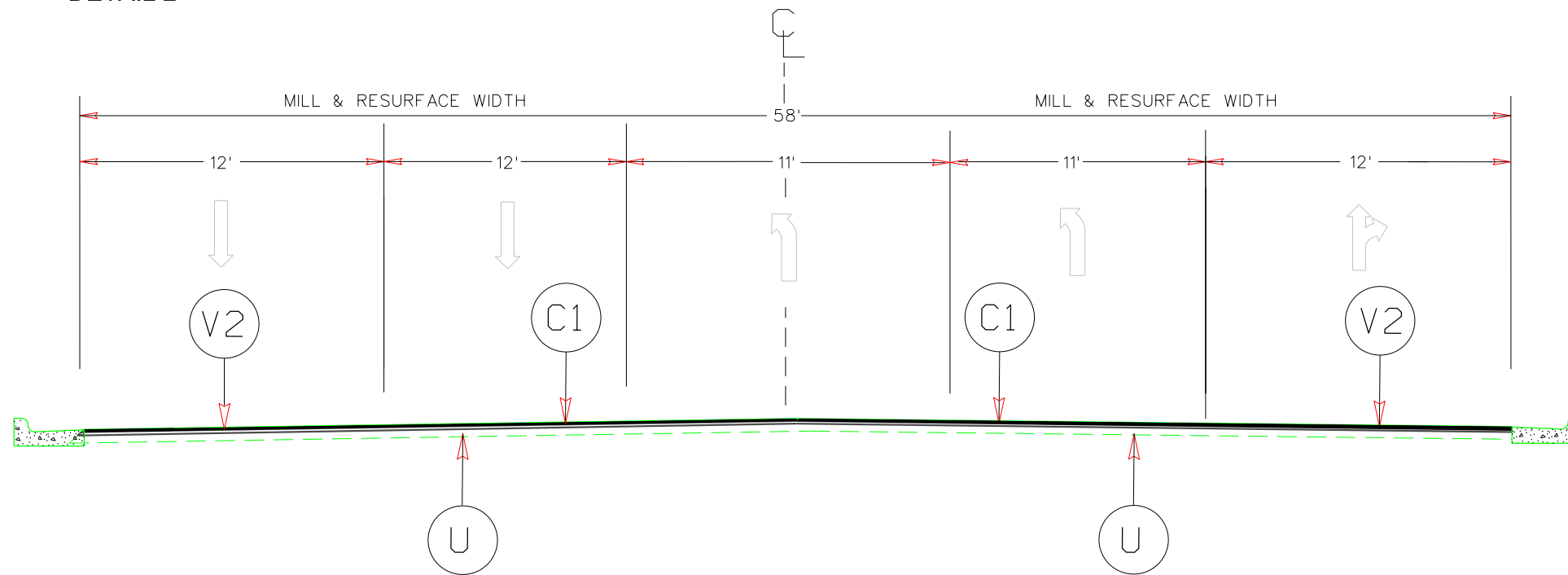
- NOTE:
1. INCLUDES INCIDENTAL MILLING AT THE ENDS OF MAIN LINE SECTIONS, OR AS DIRECTED BY THE ENGINEER.
 2. PAVE TO THE END OF THE MILLED SURFACE TO CREATE A SMOOTH TRANSITION.



*NOTE: EDGES OF PATCHED AREA ARE TO BE CLEANED OF ALL DEBRIS AND COATED WITH AN APPROVED TACK MATERIAL BEFORE PLACING ASPHALT.

PATCHING EXISTING PAVEMENT (FULL DEPTH)

DETAIL 2



TYPICAL SECTION NO. 2

USE WITH MAP3

SYSTE...
 2025...
 11/20/24...
 10:58 AM...
 2025...

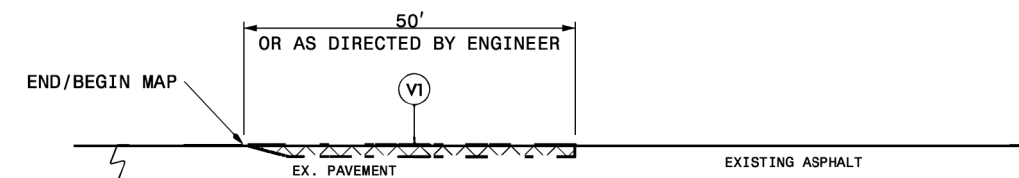
PAVEMENT SCHEDULE

C1	PROP. APPROX. 1.5" ASPHALT CONCRETE SURFACE COURSE, TYPE S9.5C, AT AN AVERAGE RATE OF 168 LBS. PER SQ. YD.
V1	INCIDENTAL MILLING ASPHALT PAVEMENT.
V2	MILLING ASPHALT PAVEMENT. 1.5" IN DEPTH.
U	EXISTING PAVEMENT.

NOTES:

PROJECT REFERENCE NO.	SHEET NO.
2025CPT.01.02.10281, ETC.	4

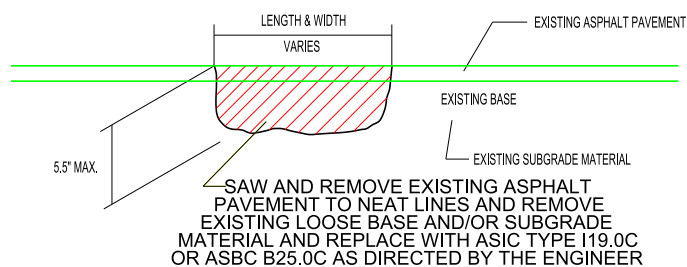
- * ALL INTERSECTING ROADS ARE TO BE RESURFACED TO THE ENDS OF THEIR RADII, THE MAIN LINE RIGHT OF WAY OR AS DIRECTED BY THE ENGINEER. THIS SHALL INCLUDE ANY TAPERS AND TURN LANES LOCATED BOTH ON THE MAIN LINE OR INTERSECTING PAVED ROADWAY.
- * EDGES, PAVEMENT WIDENING, INTERSECTIONS AND BRIDGE FLARES ARE INCLUDED IN THE SUMMARY OF QUANTITIES.
- * 1.5" MILLING AND 1.5" OF S9.5C TO BE APPLIED THE FULL WIDTH OF THE ROADWAY



DETAIL 1

MAIN LINE MILLING

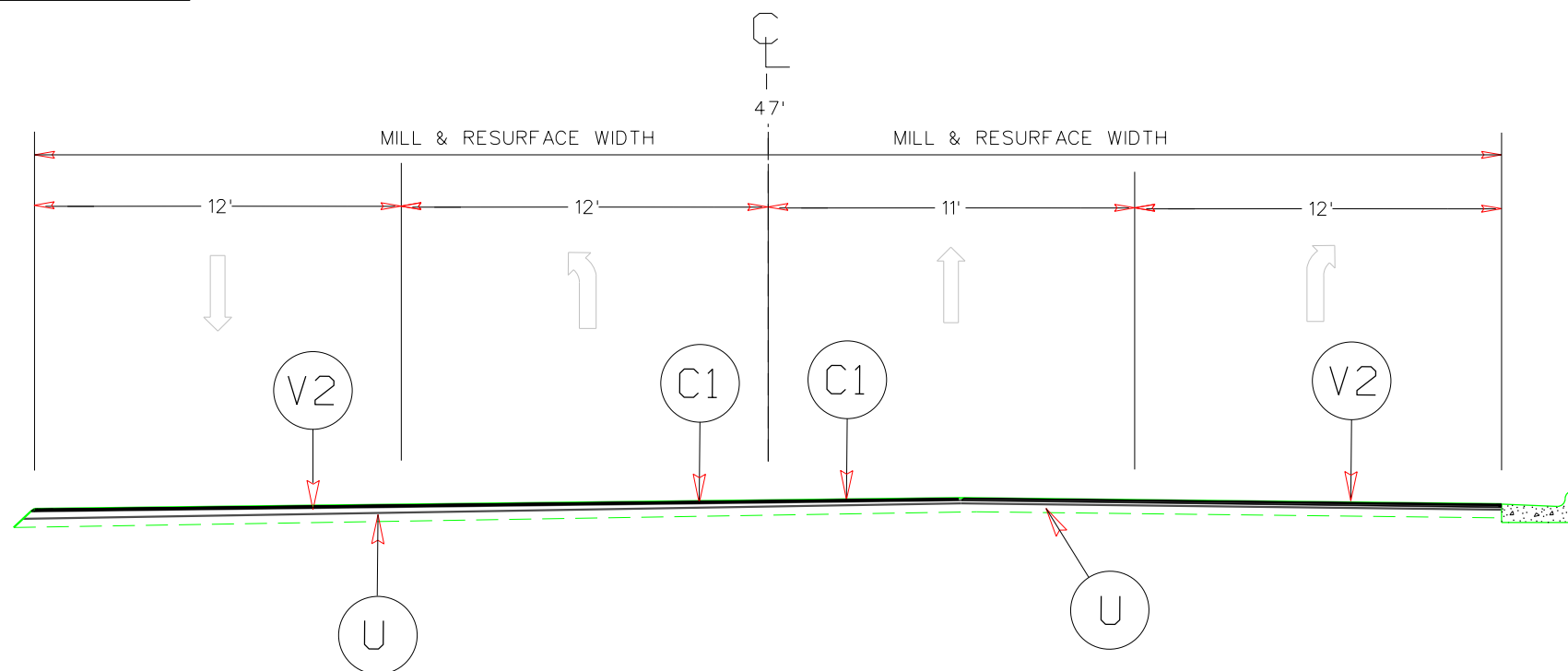
- NOTE:
1. INCLUDES INCIDENTAL MILLING AT THE ENDS OF MAIN LINE SECTIONS, OR AS DIRECTED BY THE ENGINEER.
 2. PAVE TO THE END OF THE MILLED SURFACE TO CREATE A SMOOTH TRANSITION.



*NOTE: EDGES OF PATCHED AREA ARE TO BE CLEANED OF ALL DEBRIS AND COATED WITH AN APPROVED TACK MATERIAL BEFORE PLACING ASPHALT.

PATCHING EXISTING PAVEMENT (FULL DEPTH)

DETAIL 2



TYPICAL SECTION NO. 3

USE WITH MAP 4

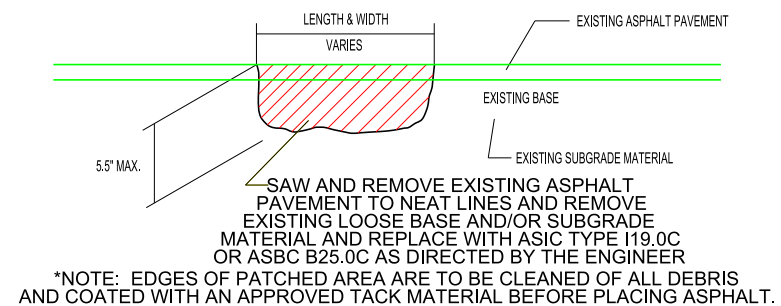
PAVEMENT SCHEDULE

C2	PROP. APPROX. 1.25" ASPHALT CONCRETE SURFACE COURSE, TYPE S9.5B, AT AN AVERAGE RATE OF 138 LBS. PER SQ. YD.
V3	MILLING ASPHALT PAVEMENT. 1.25" IN DEPTH.
U	EXISTING PAVEMENT.

NOTES:

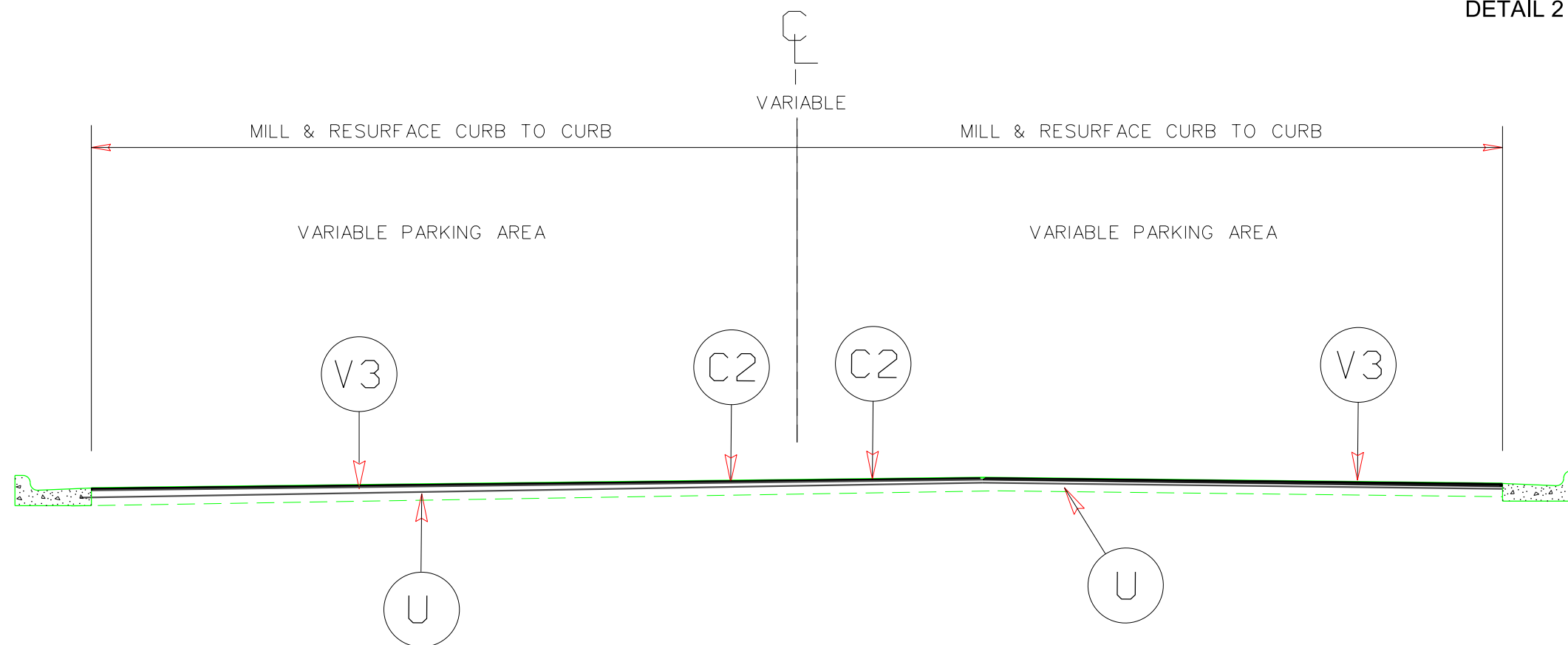
PROJECT REFERENCE NO.	SHEET NO.
2025CPT.01.02.10281, ETC.	5

- * ALL INTERSECTING ROADS ARE TO BE RESURFACED TO THE ENDS OF THEIR RADII, THE MAIN LINE RIGHT OF WAY OR AS DIRECTED BY THE ENGINEER. THIS SHALL INCLUDE ANY TAPERS AND TURN LANES LOCATED BOTH ON THE MAIN LINE OR INTERSECTING PAVED ROADWAY.
- * EDGES, PAVEMENT WIDENING, INTERSECTIONS AND BRIDGE FLARES ARE INCLUDED IN THE SUMMARY OF QUANTITIES.
- * 1.25" MILLING AND 1.25" OF S9.5B TO BE APPLIED THE FULL WIDTH OF THE ROADWAY AND PARKING AREAS



PATCHING EXISTING PAVEMENT (FULL DEPTH)

DETAIL 2



TYPICAL SECTION NO. 4
USE WITH MAP 5
SARAH OWENS WELCOME CENTER

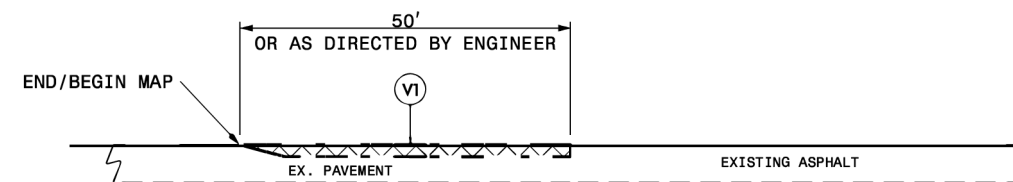
PAVEMENT SCHEDULE

C2	PROP. APPROX. 1.25" ASPHALT CONCRETE SURFACE COURSE, TYPE S9.5B, AT AN AVERAGE RATE OF 138 LBS. PER SQ. YD.
V1	INCIDENTAL MILLING ASPHALT PAVEMENT
T	SHOULDER RECONSTRUCTION
U	EXISTING PAVEMENT.

NOTES:

PROJECT REFERENCE NO.	SHEET NO.
2025CPT.01.02.10281, ETC.	6

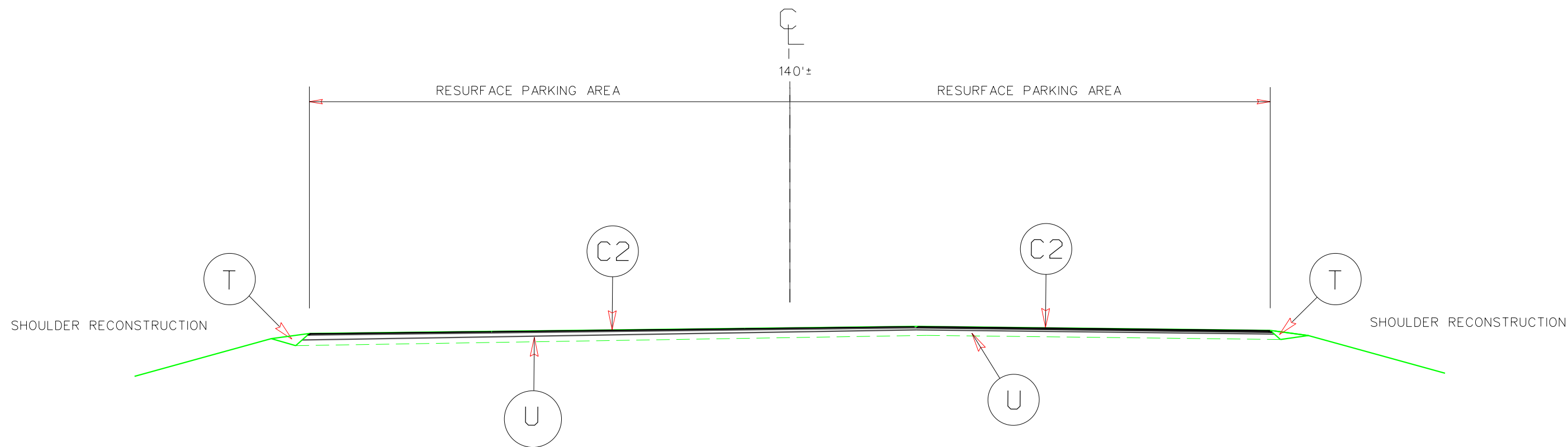
- * ALL INTERSECTING ROADS ARE TO BE RESURFACED TO THE ENDS OF THEIR RADII, THE MAIN LINE RIGHT OF WAY OR AS DIRECTED BY THE ENGINEER. THIS SHALL INCLUDE ANY TAPERS AND TURN LANES LOCATED BOTH ON THE MAIN LINE OR INTERSECTING PAVED ROADWAY.
- * EDGES, PAVEMENT WIDENING, INTERSECTIONS AND BRIDGE FLARES ARE INCLUDED IN THE SUMMARY OF QUANTITIES.
- * 1.25" OF S9.5B TO BE APPLIED THE FULL WIDTH OF THE PARKING AREA



DETAIL 1

MAIN LINE MILLING

- NOTE:
1. INCLUDES INCIDENTAL MILLING AT THE ENDS OF MAIN LINE SECTIONS, OR AS DIRECTED BY THE ENGINEER.
 2. PAVE TO THE END OF THE MILLED SURFACE TO CREATE A SMOOTH TRANSITION.



TYPICAL SECTION NO. 5

USE WITH MAP 6
MELVIN R. DANIELS BRIDGE
RECREATIONAL ACCESS

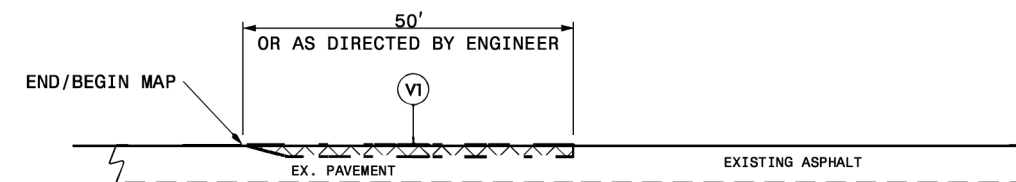
PAVEMENT SCHEDULE

C3	PROP. APPROX. 1.5" ASPHALT CONCRETE SURFACE COURSE, TYPE S9.5B, AT AN AVERAGE RATE OF 165 LBS. PER SQ. YD.
V1	INCIDENTAL MILLING ASPHALT PAVEMENT
T	SHOULDER RECONSTRUCTION
U	EXISTING PAVEMENT.

NOTES:

PROJECT REFERENCE NO.	SHEET NO.
2025CPT.01.02.10281, ETC.	7

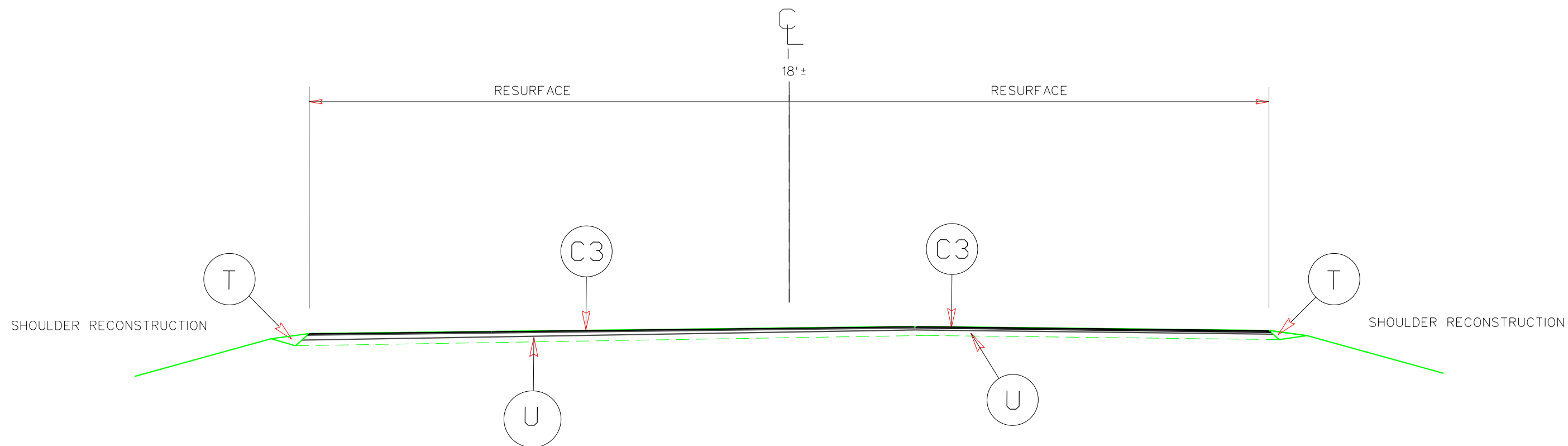
- * ALL INTERSECTING ROADS ARE TO BE RESURFACED TO THE ENDS OF THEIR RADII, THE MAIN LINE RIGHT OF WAY OR AS DIRECTED BY THE ENGINEER. THIS SHALL INCLUDE ANY TAPERS AND TURN LANES LOCATED BOTH ON THE MAIN LINE OR INTERSECTING PAVED ROADWAY.
- * EDGES, PAVEMENT WIDENING, INTERSECTIONS AND BRIDGE FLARES ARE INCLUDED IN THE SUMMARY OF QUANTITIES.
- * 1.5" OF S9.5B TO BE APPLIED THE FULL WIDTH OF THE ROADWAY



DETAIL 1

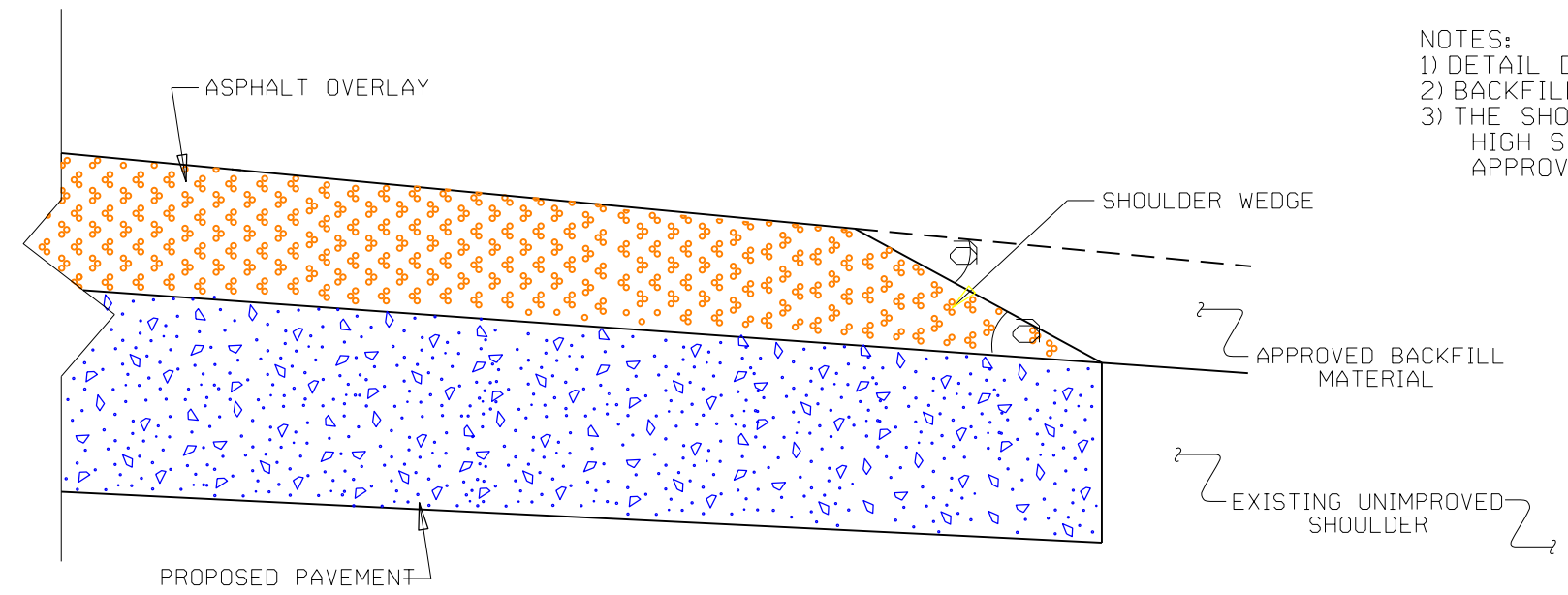
MAIN LINE MILLING

- NOTE:
1. INCLUDES INCIDENTAL MILLING AT THE ENDS OF MAIN LINE SECTIONS, OR AS DIRECTED BY THE ENGINEER.
 2. PAVE TO THE END OF THE MILLED SURFACE TO CREATE A SMOOTH TRANSITION.

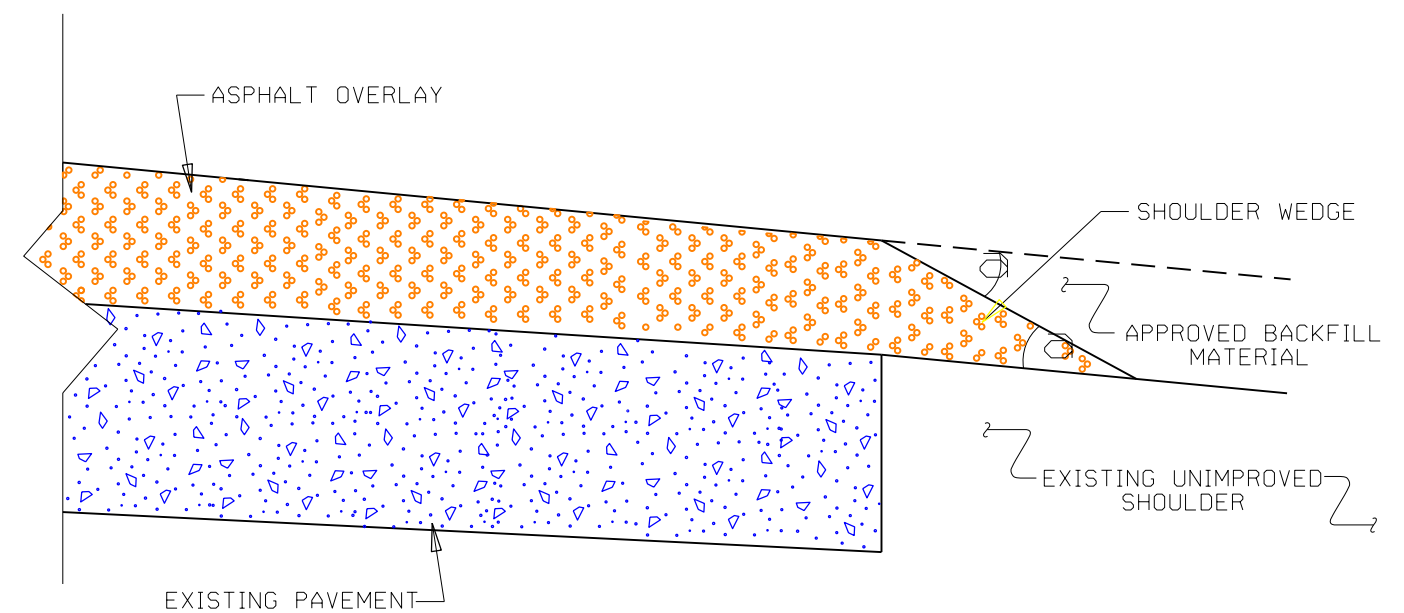


TYPICAL SECTION NO. 6
USE WITH MAP 7
SERVICE ROAD

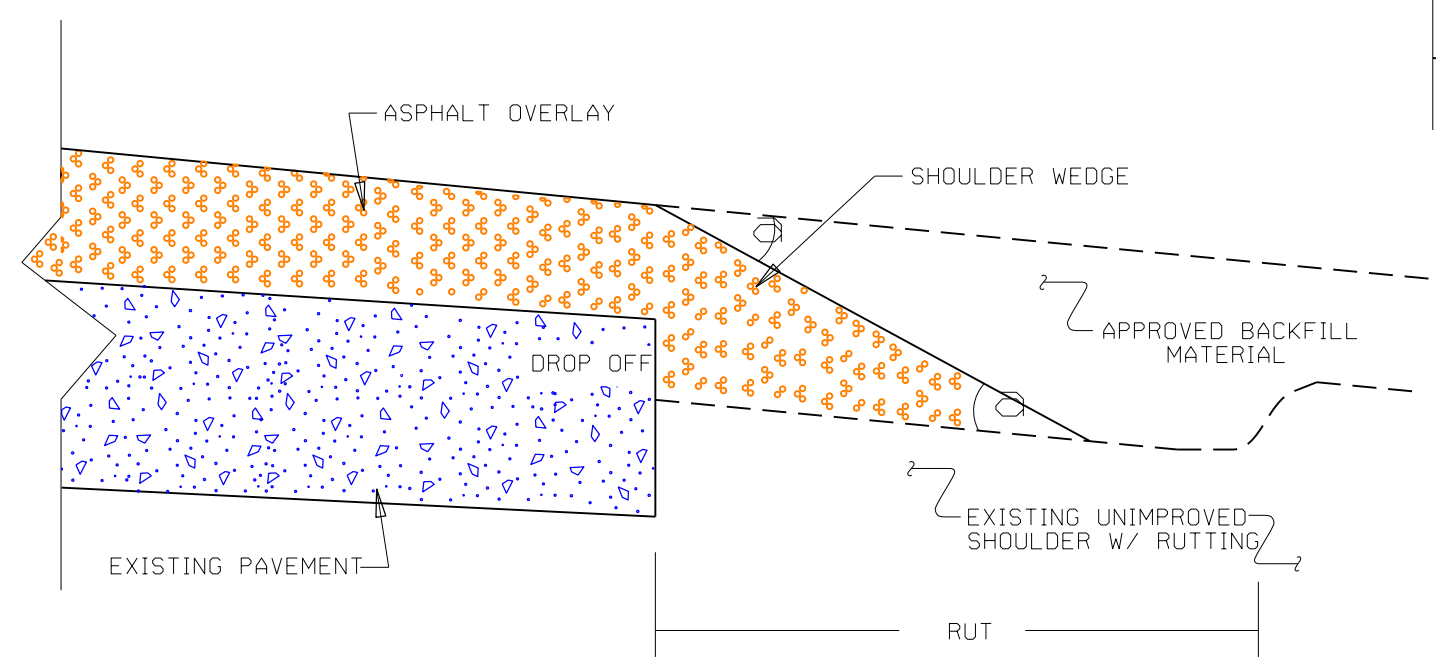
- NOTES:
 1) DETAIL DOES NOT APPLY TO OGAFCC AND ULTRA-THIN BONDED WEARING COURSE.
 2) BACKFILL SHOULDER WITH APPROVED MATERIAL.
 3) THE SHOULDER WEDGE DEVICE MAY BE DISENGAGED AT PAVED DRIVEWAYS, SIDE STREETS, HIGH SHOULDERS, AND OTHER LOCATIONS NOT FEASIBLE TO CONSTRUCT AS APPROVED BY THE ENGINEER.



SHOULDER WEDGE DETAIL
 (Resurfacing Projects w/ Widening or
 with Existing Paved Shoulder having no dropoffs)



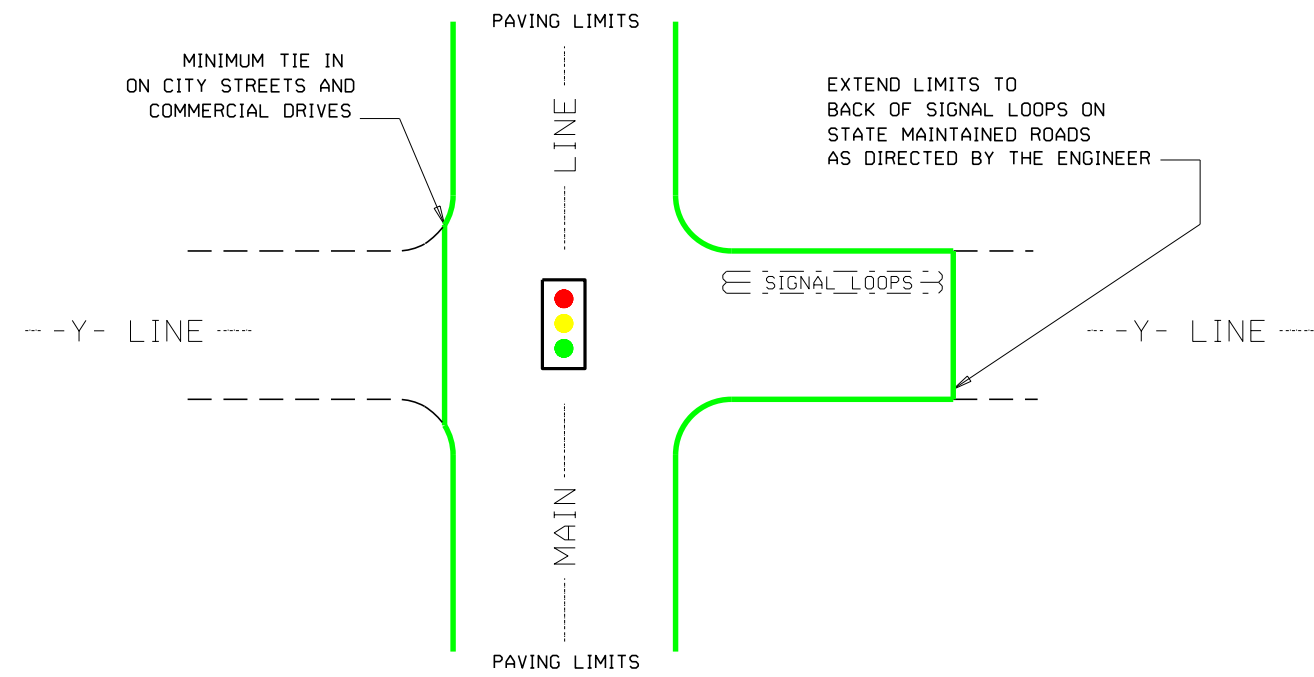
SHOULDER WEDGE DETAIL
 (Resurfacing Projects w/ NO Widening)



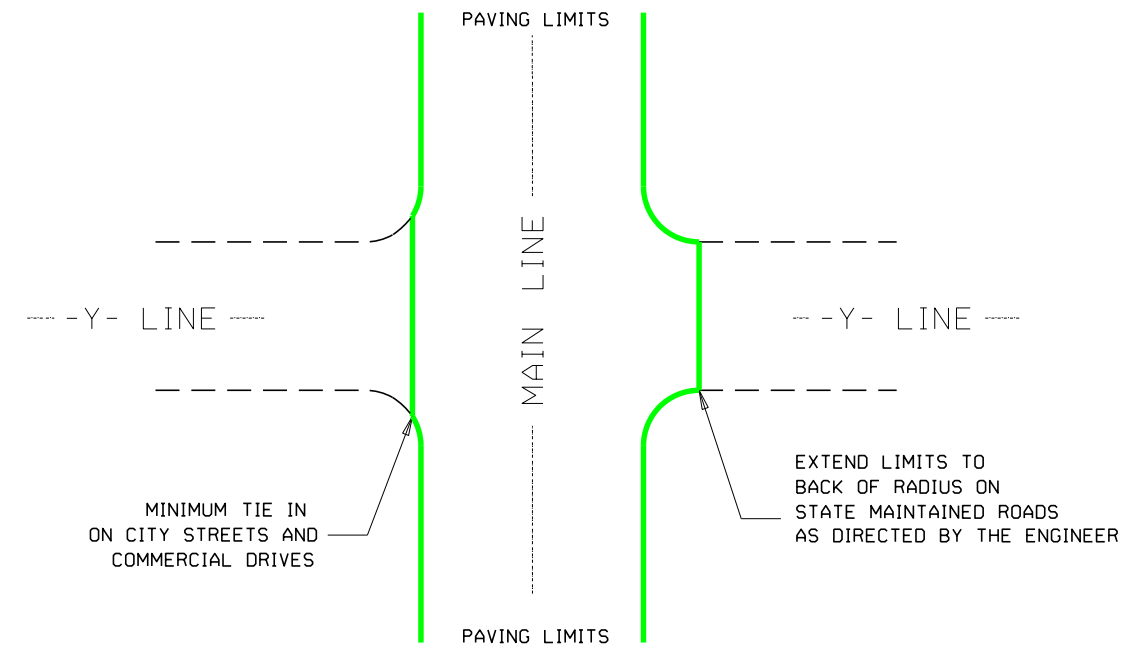
SHOULDER WEDGE DETAIL
 (Resurfacing Adjacent to
 Rutted Shoulder)

- SHOULDER WEDGE ANGLE = 30°

CONTRACT STANDARDS AND DEVELOPMENT UNIT Office 919-707-6950 FAX 919-250-4119			
SHOULDER WEDGE DETAILS			
ORIGINAL BY: T.SPELL	DATE: 7-19-11		
MODIFIED BY:	DATE: 2/2/16		
CHECKED BY:	DATE:		
FILE SPEC.: stusr/details/stand/shoulderwedge.dgn			



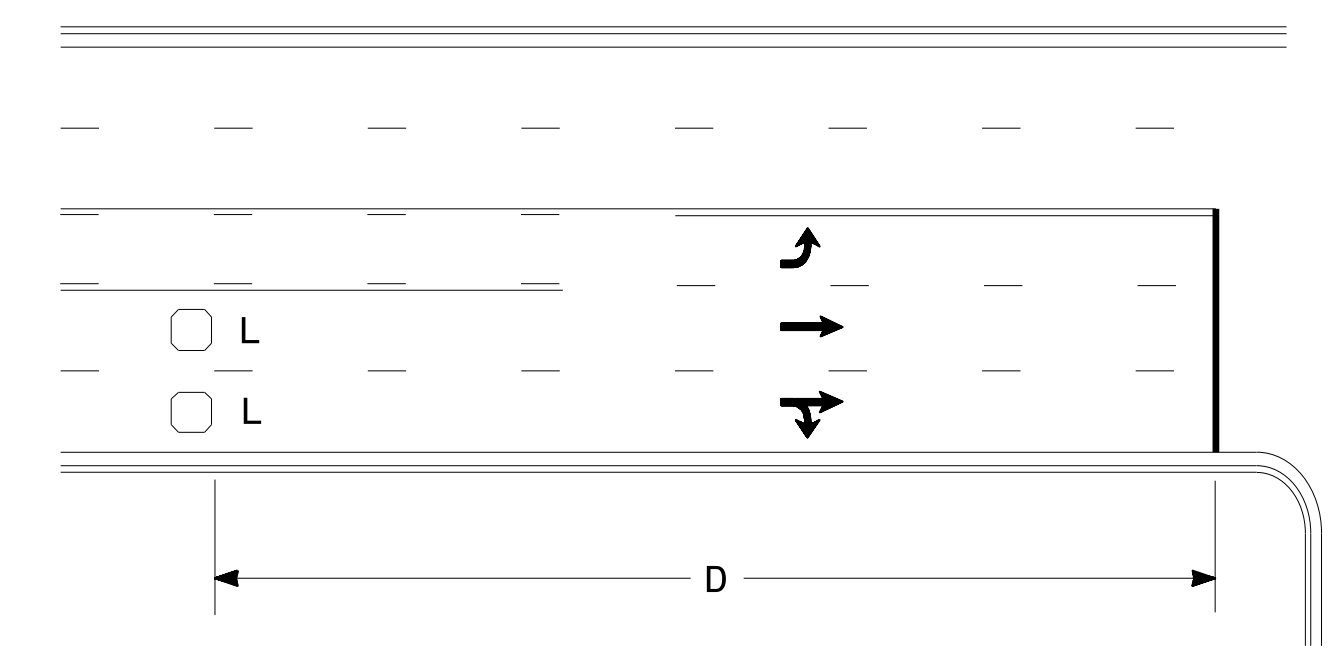
TYPICAL DETAIL OF PROJECT LIMITS AT SIGNALIZED Y LINES



TYPICAL DETAIL OF PROJECT LIMITS AT UNSIGNALIZED Y LINES

ADDITIONAL INTERSECTIONS (NON-TYPICAL)		
Extend paving limits to back of radius or loop on the following intersections:		
MAP#	STREET NAME	COMMENTS
1	PIRATES WAY	PAVE TO BACK OF LOOPS
1	BOAT RAMP	PAVE TO BACK OF LOOPS
1	SERVICE ROAD	PAVE BOTH INTERSECTIONS & SERVICE RD
1	SOUTH MARINA DRIVE	PAVE TO BACK OF RADIUS
1	LITTLE BRIDGE REC. ACCESS	PAVE DRIVEWAY & PARKING AREA
2	SARAH OWENS WELCOME CENTER	PAVE ENTRANCE, EXIT, & PARKING AREA
3	RUSSELL TWIFORD RD	PAVE TO BACK OF RADIUS
3	BERRY DRIVE	PAVE TO BACK OF PEDESTRIAN TRAIL (JOINT)
3	MARSHALL C. COLLINS DRIVE	PAVE TO BACK OF RADIUS

High Speed Detection (≥40 mph)

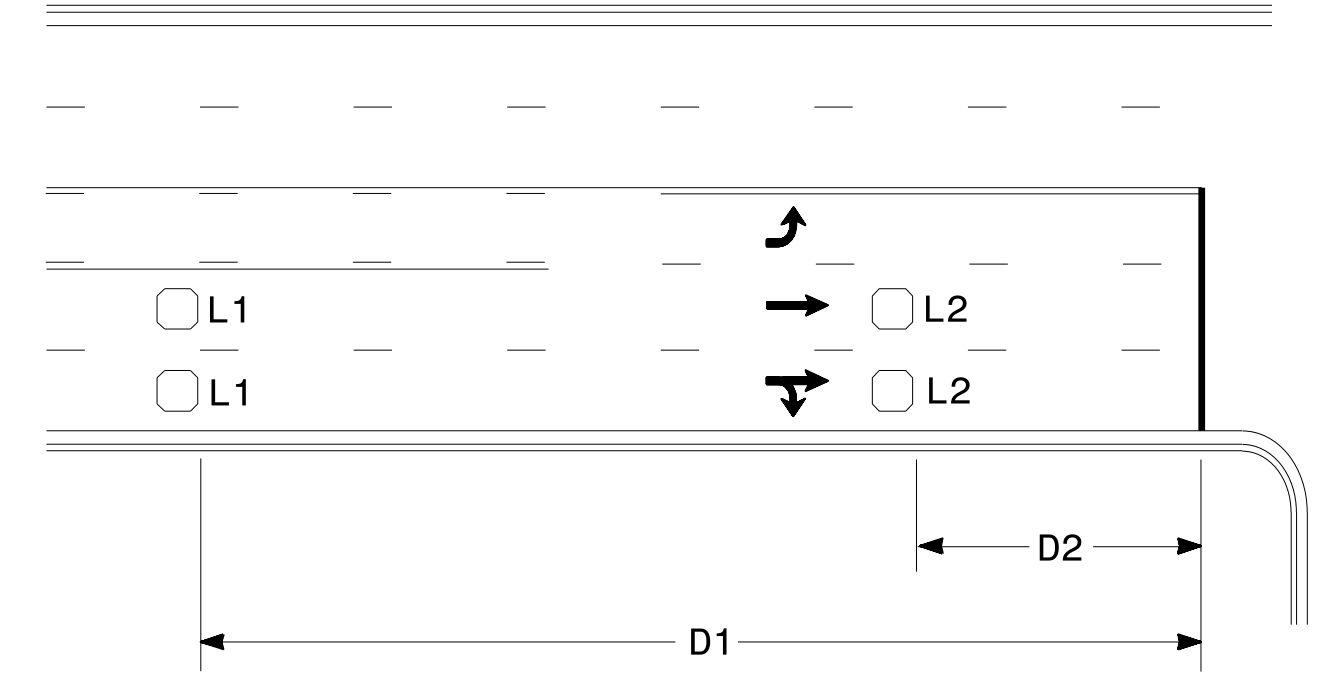


Speed Limit mph	D ft
40	250
45	300
50	355
55	420

L = 6ft X 6ft
Wired in series for TS1
Controllers
Wired separately for TS2,
170, and 2070L Controllers

Volume Density Operation

OR

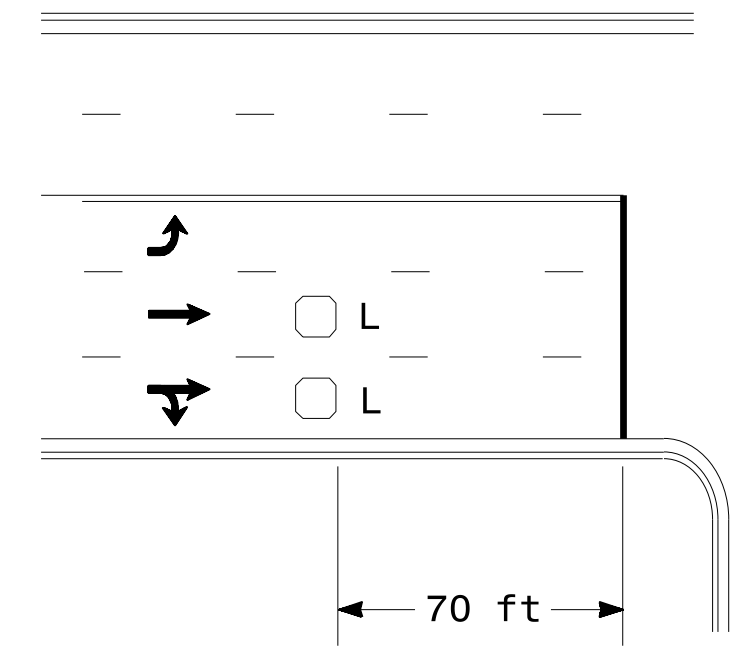


Speed Limit mph	D1 ft	D2 ft
40	250	80
45	300	90
50	355	100
55	420	110

L1 = 6ft X 6ft
Wired in series
L2 = 6ft X 6ft
Wired in series

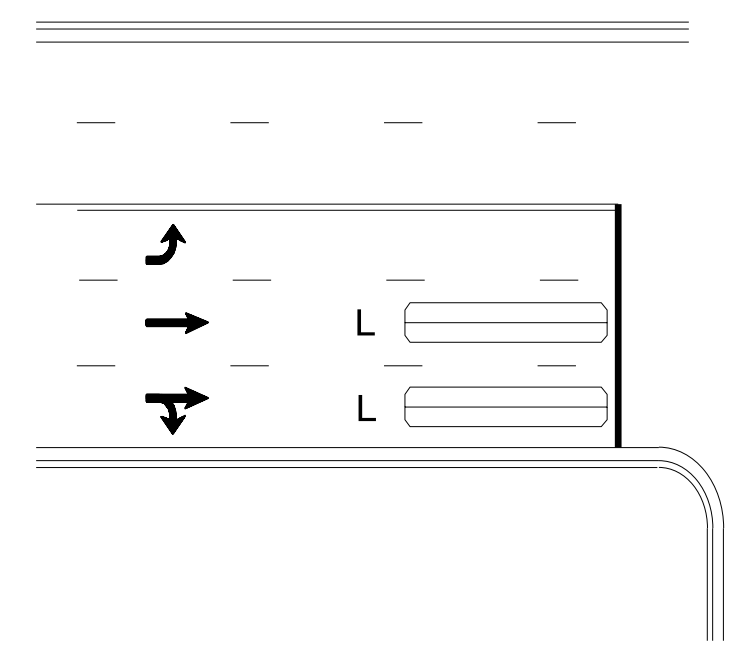
"Stretch" Operation

Low Speed Detection (≤35 mph)



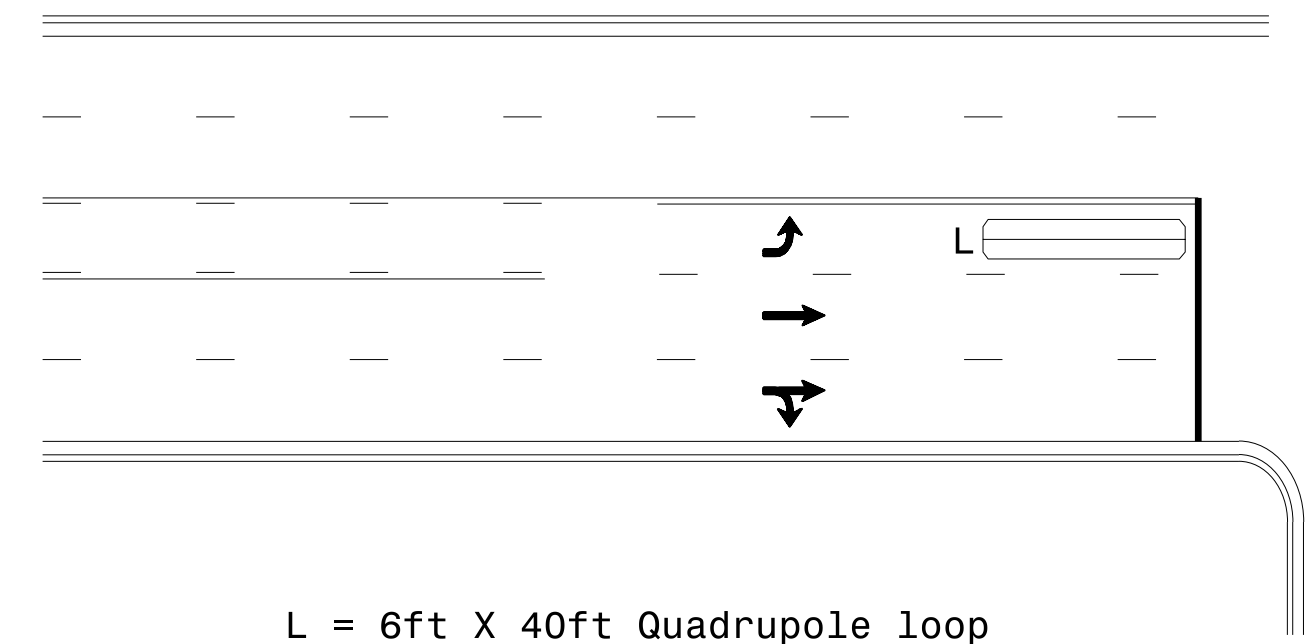
L = 6ft X 6ft
Wired in series

OR



L = 6ft X 40ft
Quadrupole loop, wired separately

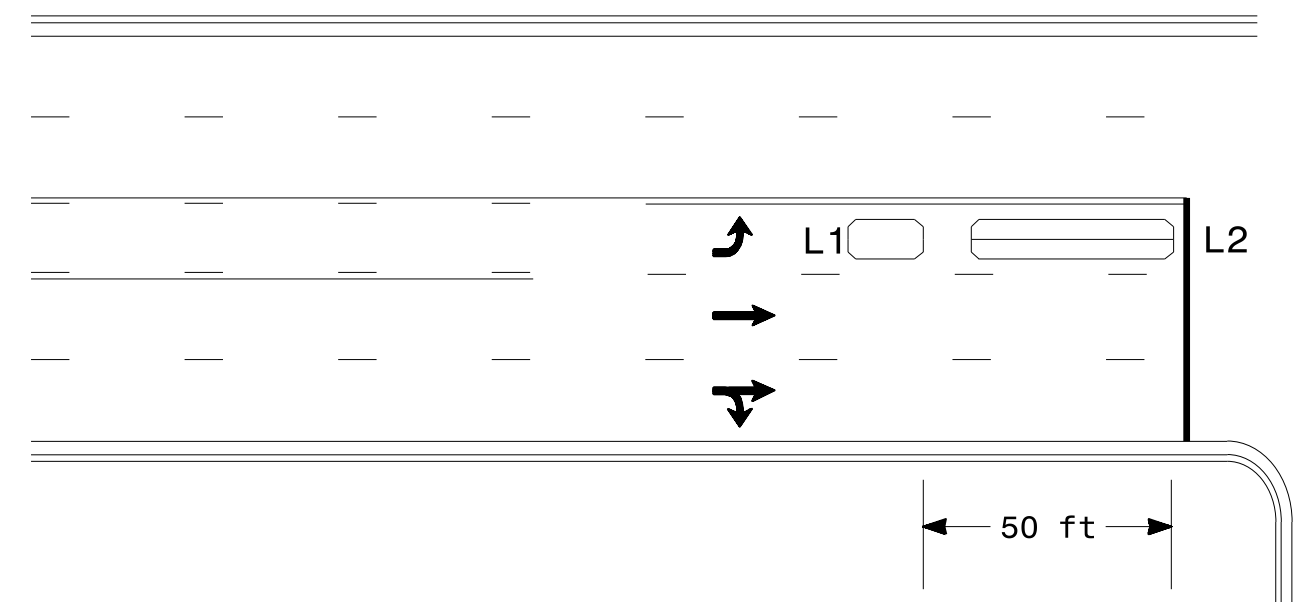
Left Turn Lane Detection



L = 6ft X 40ft Quadrupole loop

Presence Loop Detection

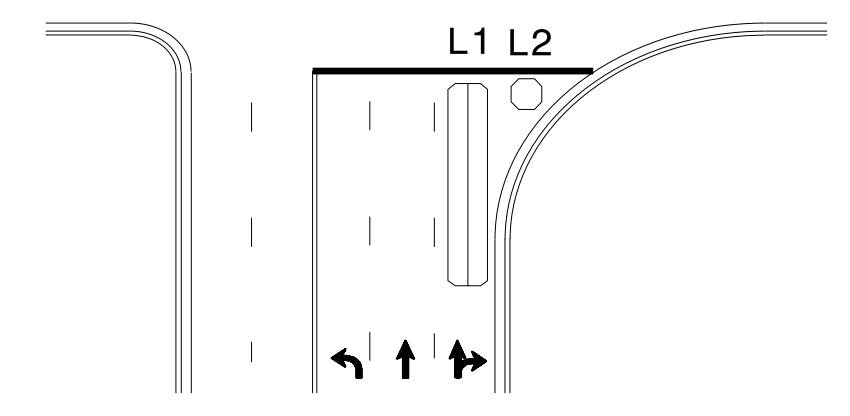
OR



L1 = 6ft X 15ft Queue detector
L2 = 6ft X 40ft Quadrupole loop

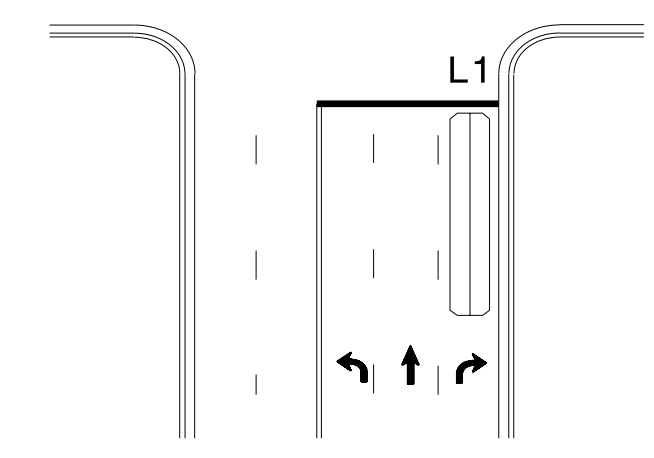
Queue Loop Detection

Right Turn Lane Detection

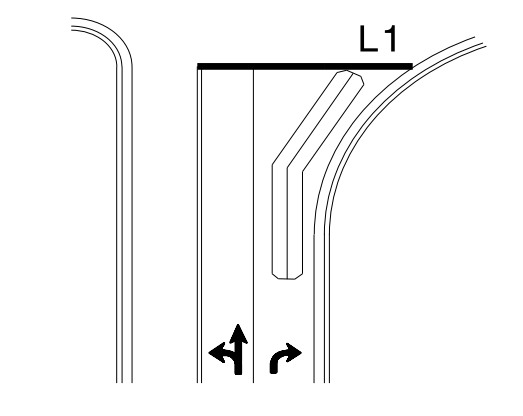


Shared Lane/
Wide Radius Turn

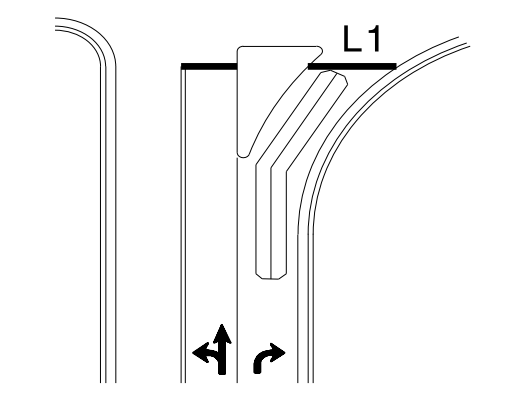
L1 = 6ft X 40ft Quadrupole loop
L2 = 6ft X 6ft [Minimum] Presence loop
Wired separately



Standard Turn

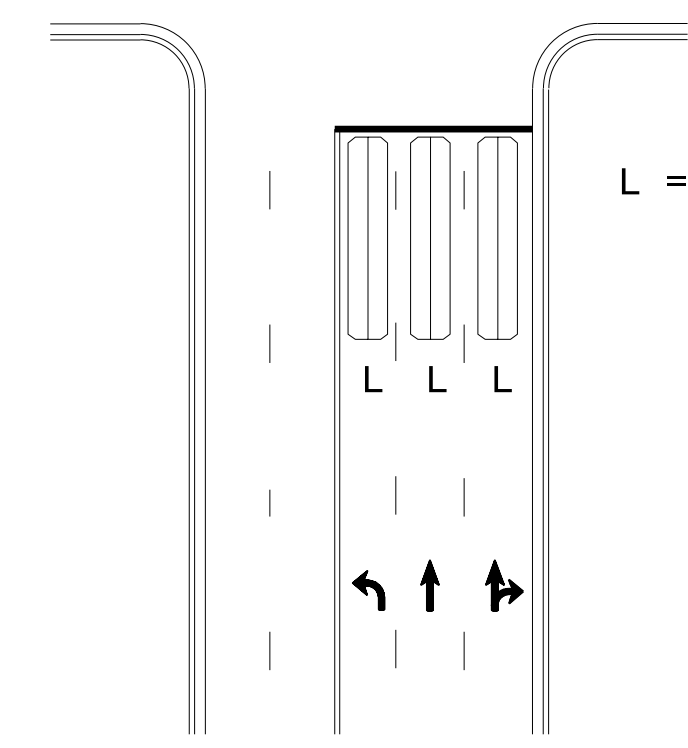


Wide Radius Turn



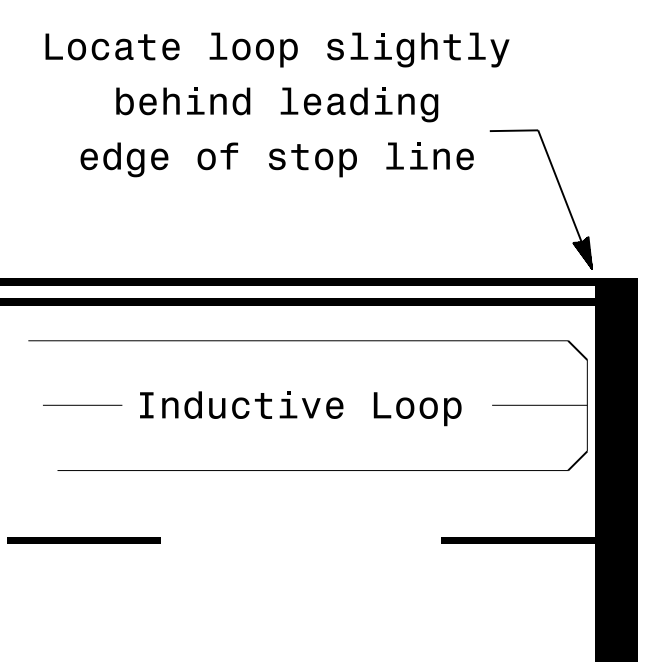
Channelized Turn

Side Street Detection



L = 6ft X 40ft
Quadrupole loop
Wired to separate
detectors/channels

Presence Loop Placement at Stop Lines



Locate loop slightly
behind leading
edge of stop line

Note:
Loop may be located in advance
of stop line under any of the
following conditions:
1) stop line is greater than 15'
from edge of intersecting
roadway
2) loop detects a permissive or
protected/permissive left turn
3) for an exclusive right turn
lane

Recommended Number of Turns

Single 6' X 6' loop
(when wired separately):

Length of Lead-in ft	Number of Turns
< 250	3
250-375	4
375-525	5
> 525	6

Quadrupole loops: Use 2-4-2 turns
6' X 15' Loops:
Lead-in < 150', use 2 turns
Lead-in > 150', use 3 turns

750 N. Greenfield Pkwy, Garner, NC 27529

Typical Signal Loop Locations

PLAN DATE: January 2015	REVIEWED BY: JPG
PREPARED BY: PLA	REVIEWED BY:
REVISIONS	INIT. DATE

SCALE: N/A

SEAL

1/30/2015

3D:\4146-2015_12\319
 S:\4146\4146115\SIGNAL\Signal Design\Section\Eastern\Region\loop\yp\lca\2015.dgn
 paalexander

PROJECT NO.	SHEET NO.	TOTAL NO.
2025CPT.01.02.10281	10	

SUMMARY OF QUANTITIES

PROJECT NO	COUNTY	MAP NO	ROUTE	DESCRIPTION	TYP NO	LANES	LANE TYPE	FINAL SURFACE TESTING REQUIRED	WARM MIX ASPHALT REQUIRED	LENGTH	WIDTH	BEGIN MP	END MP	MATERIAL TRANSFER VEHICLE REQUIRED	000100000-N	010600000-E	122000000-E	124500000-E	129700000-E	129700000-E	129700000-E	133000000-E	151900000-E	152300000-E	152400000-E	
															MOBILIZATION	BORROW EXCAVATION	INCIDENTAL STONE BASE	SHOULDER RECONSTRUCTION	MILLING ASPHALT PAVEMENT (0.75")	MILLING ASPHALT PAVEMENT (1.5")	MILLING ASPHALT PAVEMENT, (1.25")	INCIDENTAL MILLING	ASPHALT CONC SURFACE COURSE, S9.5B	ASPHALT CONC SURFACE COURSE, S9.5C	ASPHALT CONC LEVELING COURSE, S9.5C	
											MI	FT														
											LS	CY	TONS	SMI	SY	SY	SY	SY	TONS	TONS	TONS					
2025CPT.01.02.10281	Dare	1	US-64	FROM NC 345 TO BRIDGE #14 (MELVIN R. DANIELS BRIDGE)	1, 1A	4-5	MD	NO	NO	2.61	68	25.12	27.733	YES	1					15,000	68,133		5,475		6,519	50
2025CPT.01.02.10281	Dare	2	US-64 BYP	FROM NC 345 TO VA DARE BRIDGE	1	4	MD	NO	NO	0.52	68	5.356	5.88	YES	*					20,597		569		1,749	50	
2025CPT.01.02.10281	Dare	3	US-64	FROM US 64 BYP TO PAVEMENT JOINT	2	5	2WU	NO	NO	0.23	58	24.88	25.11	NO	*					7,281		457		716		
2025CPT.01.02.10281	Dare	4	NC-345	FROM US 64 BYP TO PAVEMENT JOINT	3	3	2WU	NO	NO	0.14	47	4.72	4.858	NO	*		75			3,805		1,331		506		
2025CPT.01.02.10281	Dare	5	SARAH OWENS WELCOME CENTER	FROM US 64 TO US 64	4	2		NO	NO	0.65	28	0	0.65	NO	*							10,416		788		
2025CPT.01.02.10281	Dare	6	LITTLE BRIDGE ACCESS	FROM US 64 TO END OF PARKING LOT	5	2		NO	NO	0.03	140	0	0.03	NO	*		8					282		160		
2025CPT.01.02.10281	Dare	7	SERVICE ROAD	FROM BEGINNING OF PAVEMENT TO END OF PAVEMENT	6	2	2WU	NO	NO	0.07	18	0	0.07	NO	*	12	6	0.14					98			
TOTAL FOR PROJ NO. 2025CPT.01.02.10281										4.26					*	20	81	0.21	15,000	99,816	10,416	8,114	1,046	9,490	100	
GRAND TOTAL										4.26					1	20	81	0.21	15,000	99,816	10,416	8,114	1,046	9,490	100	

SUMMARY OF QUANTITIES

PROJECT NO	COUNTY	MAP NO	ROUTE	DESCRIPTION	TYP NO	LANES	LANE TYPE	FINAL SURFACE TESTING REQUIRED	WARM MIX ASPHALT REQUIRED	LENGTH	WIDTH	BEGIN MP	END MP	MATERIAL TRANSFER VEHICLE REQUIRED	157500000-E	157700000-E	166200000-E	170500000-E	283000000-N	284500000-N	608400000-E	611700000-N	732400000-N	744400000-E	745610000-E	
															ASPHALT BINDER FOR PLANT MIX	POLYMER MODIFIED ASPHALT BINDER FOR PLANT MIX	OPEN-GRADED ASPHALT FRICTION COURSE, FC-1 MODIFIED	PATCHING EXISTING PAVEMENT (FULL DEPTH)	ADJUSTMENT OF MANHOLES	ADJUSTMENT OF METER OR VALVE BOXES	SEEDING & MULCHING	RESPONSE FOR EROSION CONTROL	JUNCT BOX (STD SIZE)	INDUCTIVE LOOP SAWCUT	LEAD-IN CABLE (14-2)	
											MI	FT														
											TONS	TON	TONS	TON	EA	EA	ACR	EA	EA	LF	LF					
2025CPT.01.02.10281	Dare	1	US-64	FROM NC 345 TO BRIDGE #14 (MELVIN R. DANIELS BRIDGE)	1, 1A	4-5	MD	NO	NO	2.61	68	25.12	27.733	YES	388	46	743			1	2			3	690	412
2025CPT.01.02.10281	Dare	2	US-64 BYP	FROM NC 345 TO VA DARE BRIDGE	1	4	MD	NO	NO	0.52	68	5.356	5.88	YES	106								1	255	185	
2025CPT.01.02.10281	Dare	3	US-64	FROM US 64 BYP TO PAVEMENT JOINT	2	5	2WU	NO	NO	0.23	58	24.88	25.11	NO	42									495	118	
2025CPT.01.02.10281	Dare	4	NC-345	FROM US 64 BYP TO PAVEMENT JOINT	3	3	2WU	NO	NO	0.14	47	4.72	4.858	NO	30								1	1,050	90	
2025CPT.01.02.10281	Dare	5	SARAH OWENS WELCOME CENTER	FROM US 64 TO US 64	4	2		NO	NO	0.65	28	0	0.65	NO	52			15								
2025CPT.01.02.10281	Dare	6	LITTLE BRIDGE ACCESS	FROM US 64 TO END OF PARKING LOT	5	2		NO	NO	0.03	140	0	0.03	NO	10									0.1		
2025CPT.01.02.10281	Dare	7	SERVICE ROAD	FROM BEGINNING OF PAVEMENT TO END OF PAVEMENT	6	2	2WU	NO	NO	0.07	18	0	0.07	NO	6							1				
TOTAL FOR PROJ NO. 2025CPT.01.02.10281										4.26					634	46	743	15	1	2	0.2	1	5	2,490	805	
GRAND TOTAL										4.26					634	46	743	15	1	2	0.2	1	5	2,490	805	

PROJECT NO.	SHEET NO.	TOTAL NO.
2025CPT.01.02.10281	11	

THERMOPLASTIC AND PAINT QUANTITIES

PROJECT NO	COUNTY	MAP NO	ROUTE	DESCRIPTION	TYP NO	LANES	LANE TYPE	LENGTH	WIDTH	BEGIN MP	END MP	4413000000-E	4457000000-N	4685000000-E		4688000000-E		4695000000-E	4700000000-E	4709000000-E	4720000000-E		4720000000-E	4720000000-E	4720000000-E	
												WORK ZONE ADVANCE / GENERAL WARNING SIGNING	TEMPORARY TRAFFIC CONTROL	THERMOPLASTIC PAVEMENT MARKING LINES (4", 90 MILS) WHITE	THERMOPLASTIC PAVEMENT MARKING LINES (4", 90 MILS) YELLOW	THERMOPLASTIC PAVEMENT MARKING LINES (6", 90 MILS) WHITE	THERMOPLASTIC PAVEMENT MARKING LINES (6", 90 MILS) YELLOW	THERMOPLASTIC PAVEMENT MARKING LINES (8", 90 MILS) WHITE	THERMOPLASTIC PAVEMENT MARKING LINES (12", 90 MILS)	THERMO PAVEMENT MARKING LINES (24" 90 MILS)	THERMO PAVEMENT MARKING CHARACTER (90 MILS), MANTEO RIGHT LANE	THERMO PAVEMENT MARKING CHARACTER (90 MILS), MANTEO LEFT LANE	THERMO PAVEMENT MARKING CHARACTER (90 MILS), BIKE ONLY	THERMOPLASTIC PAVEMENT MARKING CHARACTER (90 MILS), ONLY	THERMOPLASTIC PAVEMENT MARKING CHARACTER (90 MILS), STOP	
												SF	LS	LF	LF	LF	LF	LF	LF	EA	EA	EA	EA	EA		
2025CPT.01.02.10281	Dare	1	US-64	FROM NC 345 TO BRIDGE #14 (MELVIN R. DANIELS BRIDGE)	1, 1A	4-5	MD	2.61	68	25.12	27.733	150	1			26,856	28,760		825	393	15		48			
2025CPT.01.02.10281	Dare	2	US-64 BYP	FROM NC 345 TO VA DARE BRIDGE	1	4	MD	0.52	68	5.356	5.88	118	*			7,450	1,488		60			14				
2025CPT.01.02.10281	Dare	3	US-64	FROM US 64 BYP TO PAVEMENT JOINT	2	5	2WU	0.23	58	24.88	25.11	144	*			1,571	2,505						12			
2025CPT.01.02.10281	Dare	4	NC-345	FROM US 64 BYP TO PAVEMENT JOINT	3	3	2WU	0.14	47	4.72	4.858	118	*			1,474	2,466		30							
2025CPT.01.02.10281	Dare	5	SARAH OWENS WELCOME CENTER	FROM US 64 TO US 64	4	2		0.65	28	0	0.65		*	2,613	305			110								
2025CPT.01.02.10281	Dare	6	LITTLE BRIDGE ACCESS	FROM US 64 TO END OF PARKING LOT	5	2		0.03	140	0	0.03		*	892												8
2025CPT.01.02.10281	Dare	7	SERVICE ROAD	FROM BEGINNING OF PAVEMENT TO END OF PAVEMENT	6	2	2WU	0.07	18	0	0.07		*													
TOTAL FOR PROJ NO. 2025CPT.01.02.10281								4.26				530	*	3,505	305	37,351	35,219	110	915	480	15	14	48	12	8	
GRAND TOTAL								4.26				530	1	3,505	305	37,351	35,219	110	915	480	15	14	48	12	8	

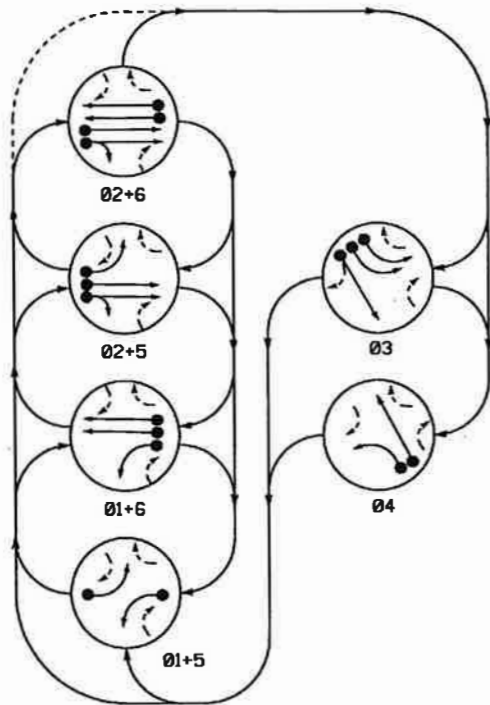
THERMOPLASTIC AND PAINT QUANTITIES

PROJECT NO	COUNTY	MAP NO	ROUTE	DESCRIPTION	TYP NO	LANES	LANE TYPE	LENGTH	WIDTH	BEGIN MP	END MP	4725000000-E	4725000000-E	4725000000-E	4725000000-E						4810000000-E					
												THERMO PAVEMENT MARKING SYMBOL (90 MILS), HANDICAP FIGURE	THERMO PAVEMENT MARKING SYMBOL (90 MILS), BIKE FIGURE	THERMO PAVEMENT MARKING SYMBOL (90 MILS), 24" YIELD LINE	THERMOPLASTIC PAVEMENT MARKING SYMBOL (90 MILS), LT ARROW	THERMOPLASTIC PAVEMENT MARKING SYMBOL (90 MILS), STR ARROW	THERMOPLASTIC PAVEMENT MARKING SYMBOL (90 MILS), RT ARROW	THERMOPLASTIC PAVEMENT MARKING SYMBOL (90 MILS), STR & RT ARROW	THERMOPLASTIC PAVEMENT MARKING SYMBOL (90 MILS), STR & LT ARROW	THERMOPLASTIC PAVEMENT MARKING SYMBOL (90 MILS), LT & RT ARROW	PAINT PAVEMENT MARKING LINES (4") WHITE	PAINT PAVEMENT MARKING LINES (4") YELLOW				
												EA	EA	EA	EA	EA	EA	EA	EA	EA	EA	EA	EA	EA	EA	EA
2025CPT.01.02.10281	Dare	1	US-64	FROM NC 345 TO BRIDGE #14 (MELVIN R. DANIELS BRIDGE)	1, 1A	4-5	MD	2.61	68	25.12	27.733		6			18	14	7	1							
2025CPT.01.02.10281	Dare	2	US-64 BYP	FROM NC 345 TO VA DARE BRIDGE	1	4	MD	0.52	68	5.356	5.88				4	7	2	3								
2025CPT.01.02.10281	Dare	3	US-64	FROM US 64 BYP TO PAVEMENT JOINT	2	5	2WU	0.23	58	24.88	25.11			6	11	2	4									
2025CPT.01.02.10281	Dare	4	NC-345	FROM US 64 BYP TO PAVEMENT JOINT	3	3	2WU	0.14	47	4.72	4.858			8	3	3	3									
2025CPT.01.02.10281	Dare	5	SARAH OWENS WELCOME CENTER	FROM US 64 TO US 64	4	2		0.65	28	0	0.65				1	16			2	2	2,613	305				
2025CPT.01.02.10281	Dare	6	LITTLE BRIDGE ACCESS	FROM US 64 TO END OF PARKING LOT	5	2		0.03	140	0	0.03				1	1	1				892					
2025CPT.01.02.10281	Dare	7	SERVICE ROAD	FROM BEGINNING OF PAVEMENT TO END OF PAVEMENT	6	2	2WU	0.07	18	0	0.07															
TOTAL FOR PROJ NO. 2025CPT.01.02.10281								4.26				6	6	14	38	43	13	8	2	2	3,505	305				
GRAND TOTAL								4.26				6	6	14	38	43	13	8	2	2	3,505	305				

THERMOPLASTIC AND PAINT QUANTITIES

PROJECT NO	COUNTY	MAP NO	ROUTE	DESCRIPTION	TYP NO	LANES	LANE TYPE	LENGTH	WIDTH	BEGIN MP	END MP	4815000000-E		4820000000-E	4825000000-E	4835000000-E	4845000000-N						4905100000-N		
												PAINT PAVEMENT MARKING LINES (6") WHITE	PAINT PAVEMENT MARKING LINES (6") YELLOW	PAINT PAVEMENT MARKING LINES (8") WHITE	PAINT PAVEMENT MARKING LINES (12")	PAINT PAVEMENT MARKING LINES (24")	PAINT PAVEMENT MARKING CHARACTER (MSG ONLY)	PAINT PAVEMENT MARKING CHARACTER (MSG STOP)	PAINT PAVEMENT MARKING SYMBOL (LT ARROW)	PAINT PAVEMENT MARKING SYMBOL (STR ARROW)	PAINT PAVEMENT MARKING SYMBOL (RT ARROW)	PAINT PAVEMENT MARKING SYMBOL (STR & RT ARROW)	PAINT PAVEMENT MARKING SYMBOL (STR & LT ARROW)	PAINT PAVEMENT MARKING SYMBOL (LT & RT ARROW)	NON-CAST IRON SNOWPLOWABLE PAVEMENT MARKER
												LF	LF	LF	LF	LF	EA	EA	EA	EA	EA	EA	EA	EA	EA
2025CPT.01.02.10281	Dare	1	US-64	FROM NC 345 TO BRIDGE #14 (MELVIN R. DANIELS BRIDGE)	1, 1A	4-5	MD	2.61	68	25.12	27.733	26,856	28,760			825	393			18	14	7	1		411
2025CPT.01.02.10281	Dare	2	US-64 BYP	FROM NC 345 TO VA DARE BRIDGE	1	4	MD	0.52	68	5.356	5.88	7,450	1,488			60	60			4	7	2	3		139
2025CPT.01.02.10281	Dare	3	US-64	FROM US 64 BYP TO PAVEMENT JOINT	2	5	2WU	0.23	58	24.88	25.11	1,571	2,505			37	37	12		11	2	2	4		61
2025CPT.01.02.10281	Dare	4	NC-345	FROM US 64 BYP TO PAVEMENT JOINT	3	3	2WU	0.14	47	4.72	4.858	1,474	2,466			30	62			3	3	3			66
2025CPT.01.02.10281	Dare	5	SARAH OWENS WELCOME CENTER	FROM US 64 TO US 64	4	2		0.65	28	0	0.65					110	50			1	16			2	2
2025CPT.01.02.10281	Dare	6	LITTLE BRIDGE ACCESS	FROM US 64 TO END OF PARKING LOT	5	2		0.03	140	0	0.03									8	1	1	1		
2025CPT.01.02.10281	Dare	7	SERVICE ROAD	FROM BEGINNING OF PAVEMENT TO END OF PAVEMENT	6	2	2WU	0.07	18	0	0.07														
TOTAL FOR PROJ NO. 2025CPT.01.02.10281								4.26				37,351	35,219	110	915	602	12	8	38	43	13	8	2	2	677
GRAND TOTAL								4.26				37,351	35,219	110	915	602	12	8	38	43	13	8	2	2	677

PHASING DIAGRAM



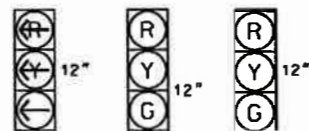
PHASING DIAGRAM DETECTION LEGEND

- DETECTED MOVEMENT
- UNDETECTED MOVEMENT (OVERLAP)
- UNSIGNALIZED MOVEMENT
- PEDESTRIAN MOVEMENT

SIGNAL FACE	PHASE					
	01+5	01+6	02+5	02+6	03	04
11						
21,22	R	R	G	G	R	Y
31,32						
33,34	R	R	R	R	G	R
41	R	R	R	R	R	G
42	R	R	R	R	R	G
51						
61,62	R	G	R	G	R	Y

SIGNAL FACE I.D.

All Heads L.E.D.



11
31, 32
51

41

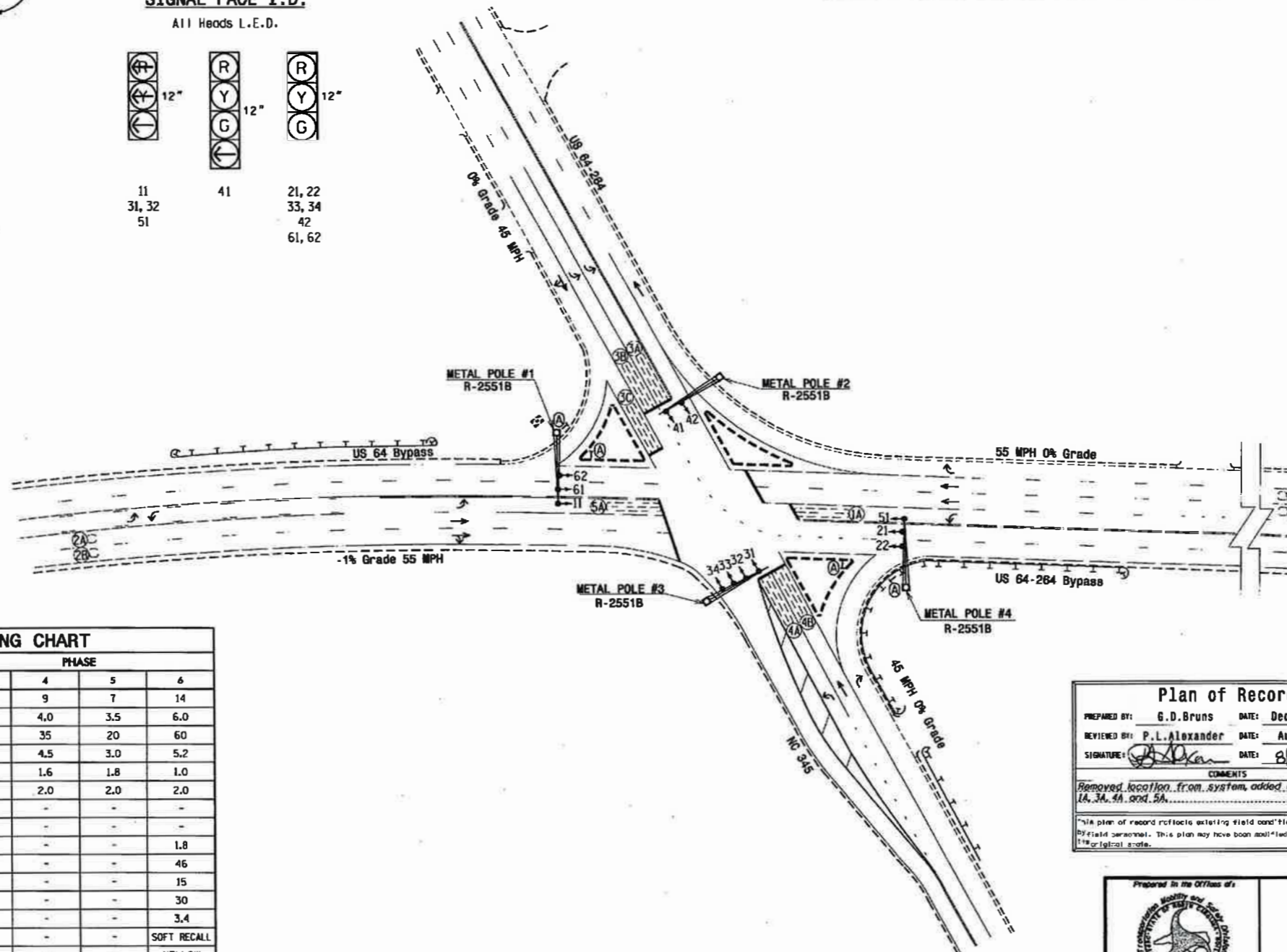
21, 22
33, 34
42
61, 62

OASIS 2070L LOOP & DETECTOR INSTALLATION CHART											
INDUCTIVE LOOPS				DETECTOR PROGRAMMING							
LOOP	SIZE (FT)	DISTANCE FROM STOPBAR (FT)	TURNS	NEW LOOP	PHASE	CALLING	EXTENSION	STRETCH TIME	DELAY TIME	SYSTEM LOOP	NEW CARD
1A	6X40	0	2-4-2	-	1	Y	Y	-	-	3	-
2A	6X6	420	5	-	2	Y	Y	-	-	-	-
2B	6X6	420	5	-	2	Y	Y	-	-	-	-
3A	6X40	0	2-4-2	-	3	Y	Y	-	-	3	-
3B	6X40	0	2-4-2	-	3	Y	Y	-	-	-	-
3C	6X40	0	2-4-2	-	3	Y	Y	-	-	-	-
4A	6X40	0	2-4-2	-	4	Y	Y	-	-	3	-
4B	6X40	0	2-4-2	-	4	Y	Y	-	-	-	-
5A	6X40	0	2-4-2	-	5	Y	Y	-	-	-	-
6A	6X6	420	6	-	6	Y	Y	-	-	-	-
6B	6X6	420	6	-	6	Y	Y	-	-	-	-

6 Phase Fully Actuated Isolated

NOTES

- Refer to "Roadway Standard Drawings NCDOT" dated July 2006 and "Standard Specifications for Roads and Structures" dated July 2006.
- Do not program signal for late night flashing operation unless otherwise directed by the Engineer.
- Enable Added Extension for phases 3 and 4.
- Program controller for split side street backup logic (see Electrical Details).
- Phase 1 and/or phase 5 may be lagged.
- The order of phase 3 and phase 4 may be reversed.
- Set all detector units to presence mode.
- Maximum times shown in timing chart are for free-run operation only. Coordinated signal system timing values supersede these values.
- Closed loop system data: Controller Asset #0319.



FEATURE	PHASE					
	1	2	3	4	5	6
Min Green 1"	10	14	9	9	7	14
Extension 1"	3.5	6.0	4.0	4.0	3.5	6.0
Max Green 1"	25	60	45	35	20	60
Yellow Clearance	3.0	5.3	4.5	4.5	3.0	5.2
Red Clearance	1.9	1.0	1.6	1.6	1.8	1.0
Red Revert	2.0	2.0	2.0	2.0	2.0	2.0
Walk 1"	-	-	-	-	-	-
Don't Walk 1	-	-	-	-	-	-
Seconds Per Actuation *	-	1.8	-	-	-	1.8
Max Variable Initial *	-	46	-	-	-	46
Time Before Reduction *	-	15	-	-	-	15
Time To Reduce *	-	30	-	-	-	30
Minimum Gap	-	3.4	-	-	-	3.4
Recall Mode	-	SOFT RECALL	-	-	-	SOFT RECALL
Vehicle Call Memory	-	YELLOW	-	-	-	YELLOW
Dual Entry	-	-	-	-	-	-
Simultaneous Gap	ON	ON	ON	ON	ON	ON

* These values may be field adjusted. Do not adjust Min Green and Extension times for phases 2 and 6 lower than what is shown. Min Green for all other phases should not be lower than 4 seconds.

PROPOSED	EXISTING
○ → Traffic Signal Head	● → N/A
○ → Modified Signal Head	○ → N/A
○ → Pedestrian Signal Head With Push Button & Sign	○ → N/A
○ → Signal Pole with Guy	○ → N/A
○ → Signal Pole with Sidewalk Guy	○ → N/A
□ → Inductive Loop Detector	□ → N/A
□ → Controller & Cabinet Junction Box	□ → N/A
□ → 2-in Underground Conduit	□ → N/A
→ N/A Right of Way	→ N/A Right of Way
→ (A) Directional Arrow "YIELD" Sign (R1-2)	→ (A) Directional Arrow "YIELD" Sign (R1-2)

Plan of Record

PREPARED BY: G.D. Bruns DATE: December 2010

REVIEWED BY: P.L. Alexander DATE: August 2011

SIGNATURE: *[Signature]* DATE: 8/17/11

COMMENTS: *Removed location from system, added delay to loops 1A, 3A, 4A and 5A.*

*This plan of record reflects existing field conditions as submitted by field personnel. This plan may have been modified from original state.

Prepared in the Office of:

 North Carolina Department of Transportation
 750 R. Greenfield Pkwy, Garner, NC 27525

US 64/US 64-264 Bypass at US 64-264/NC 345

Division 1 Dare County Wanted

PLAN DATE: January 2006 REVIEWED BY: M. Warbooba

PREPARED BY: EW Winshaw REVIEWED BY:

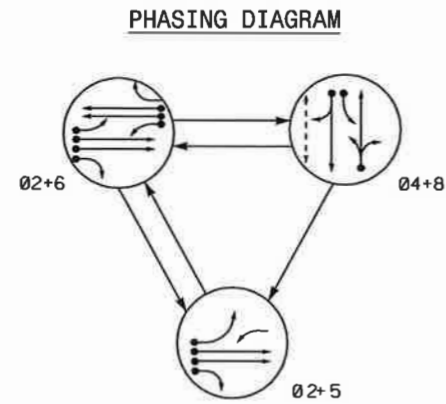
REVISIONS: INIT: DATE:

SEAL

Not a certified document. This document originally issued and sealed by B. Madubuchukwu, #25475 on 2/27/2006. This document shall not be considered a certified document.

SIGNATURE: DATE:

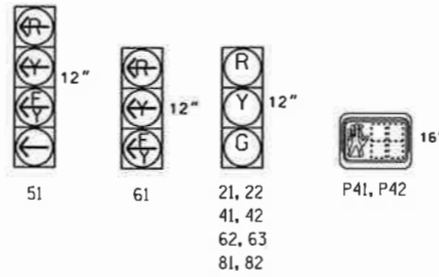
SIG. LICENSE NO. 01-0319



SIGNAL FACE	PHASE			
	02+5	02+6	04+8	FLASH
21,22	G	G	R	Y
41,42	R	R	G	R
51	-	-	-	-
61	-	-	-	-
62,63	R	G	R	Y
81,82	R	R	G	R
P41,P42	DW	DW	W	DRK

SIGNAL FACE I.D.

All Heads L.E.D.
All Signal Heads are Tethered

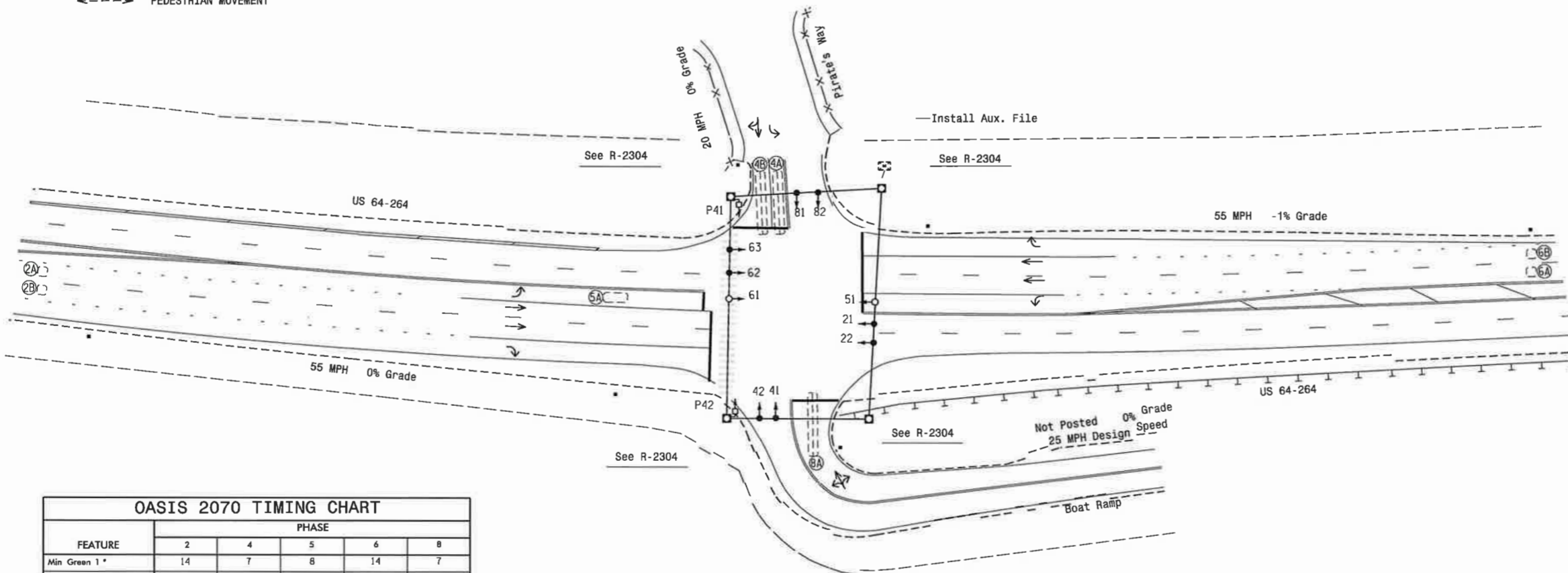
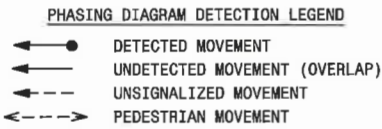


LOOP	SIZE (FT)	DISTANCE FROM STOPBAR (FT)	TURNS	NEW LOOP	DETECTOR PROGRAMMING							
					PHASE	CALLING	EXTENSION	FULL TIME DELAY	STRETCH TIME	DELAY TIME	SYSTEM LOOP	NEW CARD
2A	6X6	420	5	-	2	Y	Y	-	-	-	-	-
2B	6X6	420	5	-	2	Y	Y	-	-	-	-	-
4A	6X40	+5	2-4-2	-	4	Y	Y	-	-	-	-	-
4B	6X40	+5	2-4-2	-	4	Y	Y	-	-	10	-	-
5A	6X15	50	3	-	5	Y	Y	-	-	10	-	-
6A	6X6	420	5	-	6	Y	Y	-	-	-	-	-
6B	6X6	420	5	-	6	Y	Y	-	-	-	-	-
8A	6X40	+5	2-4-2	-	8	Y	Y	-	-	10	-	-

3 Phase Fully Actuated Isolated

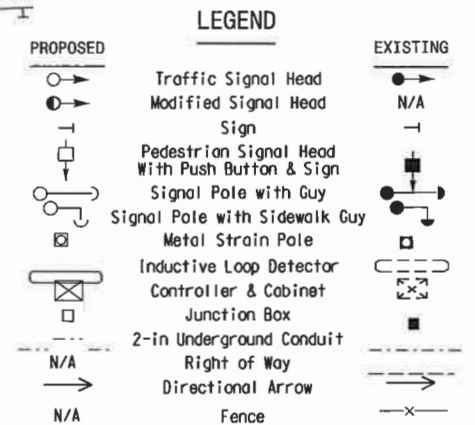
NOTES

- Refer to "Roadway Standard Drawings NCDOT" dated January 2012 and "Standard Specifications for Roads and Structures" dated January 2012.
- Do not program signal for late night flashing operation unless otherwise directed by the Engineer.
- Disable Backup Protection for phase 2.
- Phase 5 may lag.
- Set all detector units to presence mode.
- Program pedestrian heads to countdown the flashing "Don't Walk" time only.
- Pavement markings are existing.



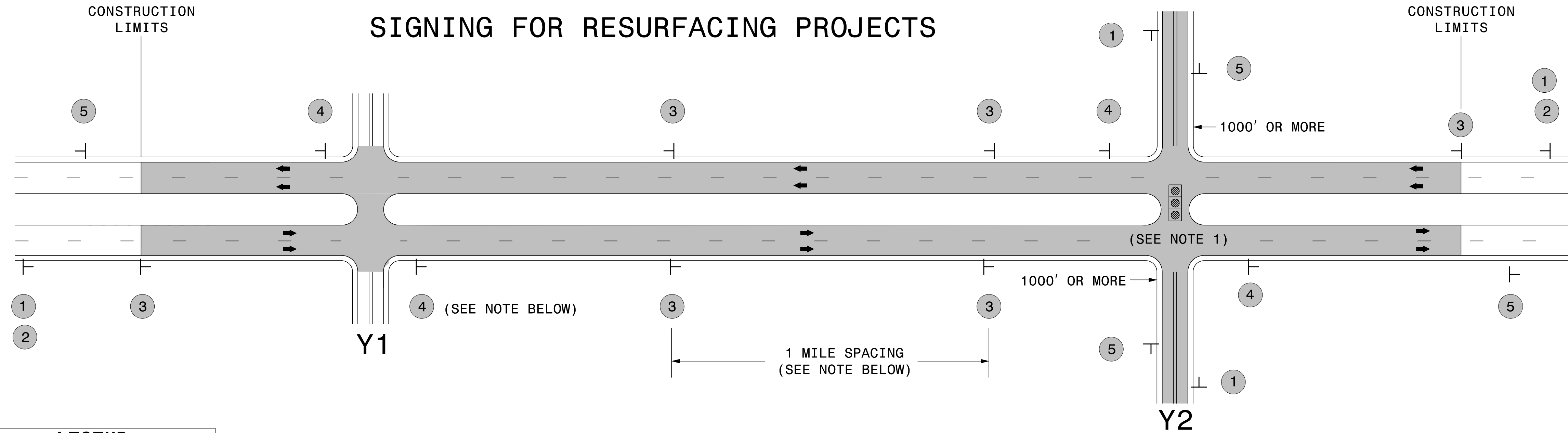
FEATURE	PHASE				
	2	4	5	6	8
Min Green 1 *	14	7	8	14	7
Extension 1 *	6.0	2.0	2.0	6.0	2.0
Max Green 1 *	100	25	15	100	25
Yellow Clearance	5.3	3.0	3.0	5.3	3.2
Red Clearance	1.2	3.3	2.6	1.2	3.1
Walk 1 *	-	7	-	-	-
Don't Walk 1	-	30	-	-	-
Seconds Per Actuation *	1.5	-	-	1.5	-
Max Variable Initial *	46	-	-	46	-
Time Before Reduction *	15	-	-	15	-
Time To Reduce *	30	-	-	30	-
Minimum Gap	3.4	-	-	3.4	-
Recall Mode	MIN RECALL	-	-	MIN RECALL	-
Vehicle Call Memory	YELLOW	-	-	YELLOW	-
Dual Entry	-	ON	-	-	ON
Simultaneous Gap	ON	ON	ON	ON	ON

* These values may be field adjusted. Do not adjust Min Green and Extension times for phases 2 and 6 lower than what is shown. Min Green for all other phases should not be lower than 4 seconds.



Signal Upgrade

	US 64 - 264 at Boat Ramp/Pirate's Way		SEAL NORTH CAROLINA PROFESSIONAL ENGINEER SEAL 029904 J. S. GALLAGHER ENGINEER DATE 4/10/2015
	Division 1 March 2015 PREPARED BY: EM Minshew	Dare County March 2015 REVIEWED BY: J. P. Gallaway	
750 N. Greenfield Pkwy, Garner, NC 27525 SCALE 40 1"=40'	PROJECT REFERENCE NO. 2025CPT.01.02.10281		SHEET NO. Sig-2



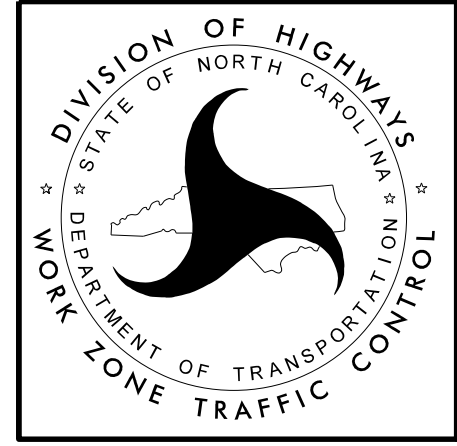
LEGEND
 ┆ STATIONARY SIGN
 ← DIRECTION OF TRAFFIC FLOW

MAINLINE (-L-) SIGNING

-Y- LINE SIGNING

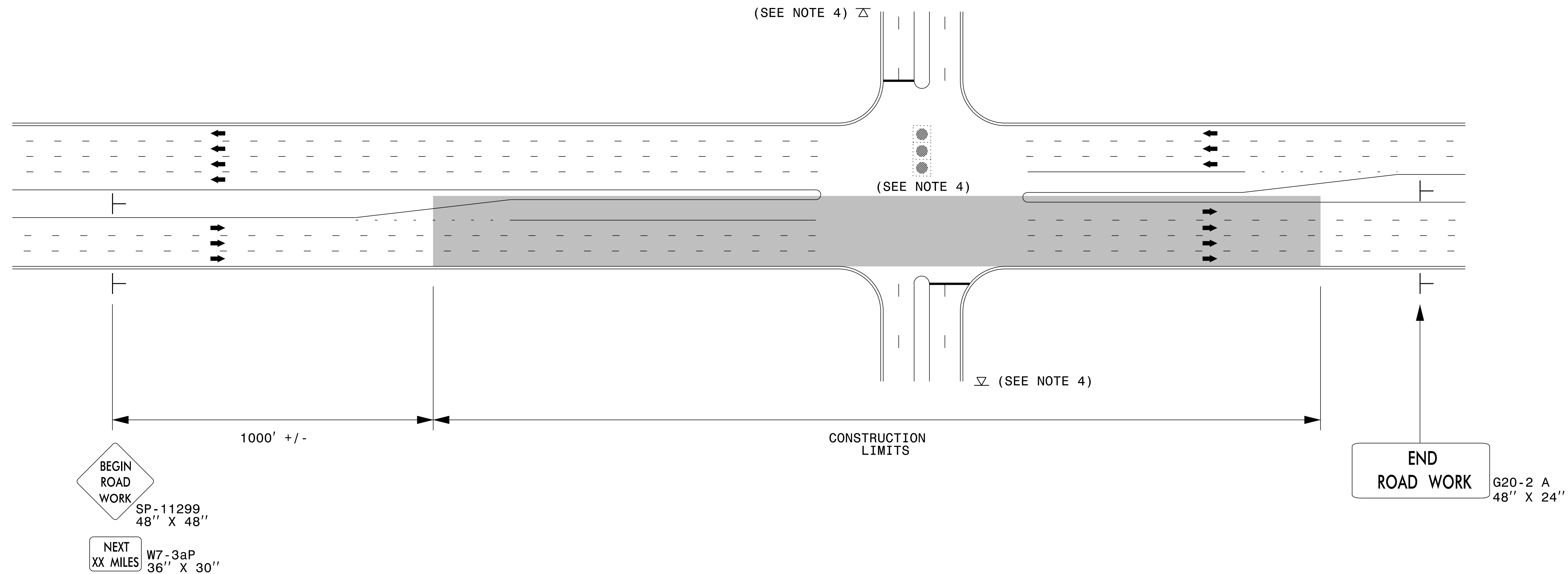
SIGNING NOTES AND PLACEMENT PER DIRECTION	 	<p>PLACE 1000' PRIOR TO BEGINNING OF CONSTRUCTION LIMITS. ONLY USED ON -Y- LINES IF RESURFACING LIMITS EXTEND 1000' ALONG -Y- LINE.</p> <p>#2 SIGN ONLY USED WHEN RESURFACING LIMITS ARE 2 OR MORE MILES IN LENGTH. ROUND UP TO NEXT WHOLE NUMBER. (NO FRACTIONAL OR DECIMAL NUMBERS)</p>	<p>NO REQUIRED STATIONARY SIGNING FOR THE FOLLOWING -Y- LINE CONDITIONS:</p> <ol style="list-style-type: none"> 1) LESS THAN 1000' OF RESURFACING ALONG -Y- LINE 2) SUBDIVISION ROADS 3) DEAD END ROADS <p>WHEN PAVING/CONSTRUCTION ACTIVITIES PROCEED ACROSS AN UNSIGNED -Y- LINE, ADVANCE WARNING PORTABLE SIGNS SHALL BE USED ALONG THE -Y- LINE AS SHOWN BELOW. REMOVE UPON COMPLETION OF WORK.</p> <div style="display: flex; justify-content: space-around;"> <div style="text-align: center;"> <small>W20-1 48" X 48"</small> </div> <div style="text-align: center;"> <small>W20-7 A 48" X 48"</small> </div> </div> <p>PLACED 500' IN ADVANCE OF FLAGGER. PLACED 250' IN ADVANCE OF FLAGGER.</p> <p>NOTES:</p> <ol style="list-style-type: none"> 1) MAY USE LAW ENFORCEMENT TO CONTROL TRAFFIC AT SIGNALIZED INTERSECTIONS AS DIRECTED BY THE ENGINEER. PROVIDE PORTABLE "ROAD WORK AHEAD" (W20-1) SIGNS 500' IN ADVANCE ALONG BOTH APPROACHES FROM THE SIDE STREETS WHEN PAVING PROCEEDS THROUGH THE INTERSECTION.
		<p>PLACE INITIALLY AT THE CONSTRUCTION LIMITS AND SPACED 1 MILE APART THEREAFTER. IF NO -Y- LINES EXIST, PLACE 2ND SET 1/2 MILE FROM THE CONSTRUCTION LIMITS AND THEN SPACE 1 MILE THEREAFTER.</p>	
		<p>THESE ARE FOR -Y- LINES THAT ARE "THROUGH" ROADWAYS. DEAD END AND SUBDIVISION ROADS ARE NOT "THROUGH" ROADWAYS. INSTALL 500' +/- FROM EACH -Y- LINE APPROACH AS SHOWN ABOVE. FOR MULTIPLE -Y- LINES THAT ARE SEPARATED BY 0.25 MILES OR LESS, TREAT AS A SINGLE UNIT AND INSTALL WITHIN 500' OF EACH APPROACH. A MAXIMUM OF 2 SIGN SETS PER MILE. DO NOT INSTALL WHEN -Y- LINES ARE WITHIN 0.5 MILES FROM "END ROAD WORK" SIGN.</p>	
		<p>PLACE 500' FOLLOWING THE END OF CONSTRUCTION LIMITS.</p>	

3/23/2015
 C:\Users\rmgarrrett\Downloads\Resurfacing_AdvWarn_Ltr-Su_Shldr.dgn
 User:rmgarrrett



**RESURFACING
 ADVANCE WARNING SIGNS
 FOR RURAL AND SUBURBAN
 MULTI-LANE ROADWAYS
 W/ SHOULDER SECTIONS**

URBAN / SUBURBAN WORKZONES

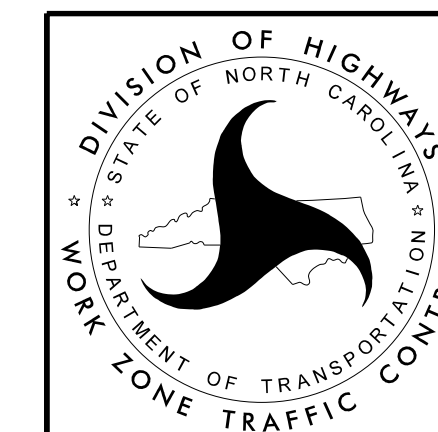


NOTES:

- 1) 48" x 48" SIZED SIGNS (SP- 11299) MAY BE REDUCED TO 36" X 36" ON ROADWAYS WITH SPEED LIMITS OF 40 MPH OR LESS.
- 2) MOUNT SIGNS THAT ARE LARGER THAN 10 SQUARE FEET IN AREA ON TWO OR MORE WOOD OR U-CHANNEL SUPPORTS. PERFORATED SQUARE TUBING SUPPORT SYSTEMS MAY SUPPORT LARGER AREAS ON A SINGLE SUPPORT. FOLLOW MANUFACTURER'S RECOMMENDATIONS. THESE SYSTEMS SHALL BE NCHRP 350 COMPLIANT AND NCDOT APPROVED.
- 3) ADVANCE WARNING SIGNS NOT REQUIRED ON NON-SIGNALIZED SIDE STREETS.
- 4) MAY USE LAW ENFORCEMENT TO CONTROL TRAFFIC AT SIGNALIZED INTERSECTIONS AS DIRECTED BY THE ENGINEER. PROVIDE PORTABLE "ROAD WORK AHEAD" (W20-1) SIGNS 500' IN ADVANCE ALONG BOTH APPROACHES FROM THE SIDE STREETS WHEN PAVING PROCEEDS THROUGH THE INTERSECTION.
- 5) LATERAL CLEARANCE AT ALL SIGN LOCATIONS SHALL BE 2' AS MEASURED FROM THE EDGE OF PAVEMENT OR THE FACE OF THE CURB. WHEN UNABLE TO OBTAIN THE LATERAL CLEARANCE WITHIN THE MEDIAN AREA USE SHOULDER MOUNTS ONLY.
- 6) SIGN MOUNT LOCATIONS SHALL NOT BLOCK SIDEWALKS OR DRIVEWAYS.
- 7) IF STATIONARY GENERAL WARNING SIGNS ARE USED, THEY WILL BE PAID FOR PER SECTION 104 OF THE NCDOT STANDARD SPECIFICATIONS AS EXTRA WORK.
- 8) IF MILLED AREAS ARE NOT PAVED BACK BY THE END OF THE WORK DAY, PORTABLE SIGNS SHALL BE USED TO WARN DRIVERS OF THE PRESENT CONDITIONS. THESE ARE TO INCLUDE, BUT NOT LIMITED TO "ROUGH ROAD" W8-8, "UNEVEN LANES" W8-11, "GROOVED PAVEMENT" W8-15 w/MOTORCYCLE PLAQUE MOUNTED BELOW. THESE ARE TO BE DOUBLE INDICATED ON MULTI-LANE ROADWAYS WITH SPEED LIMITS 45 MPH AND GREATER WHERE LATERAL CLEARANCE CAN BE OBTAINED WITHIN THE MEDIAN AREAS. THESE PORTABLE SIGNS ARE INCIDENTAL TO THE OTHER ITEMS OF WORK INCLUDED IN THE TEMPORARY TRAFFIC CONTROL (LUMP SUM) PAY ITEM.

LEGEND

- ┆ STATIONARY SIGN
- ➔ DIRECTION OF TRAFFIC FLOW



**RESURFACING ADVANCE
WARNING SIGNS FOR
URBAN / SUBURBAN
FACILITIES**