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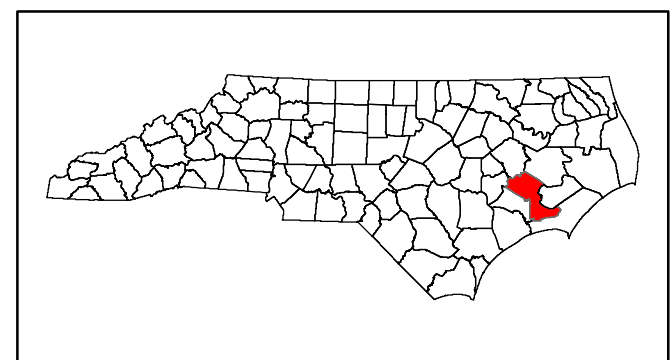
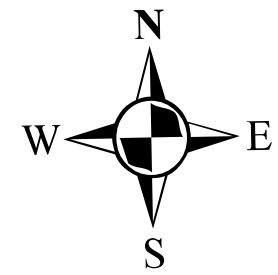
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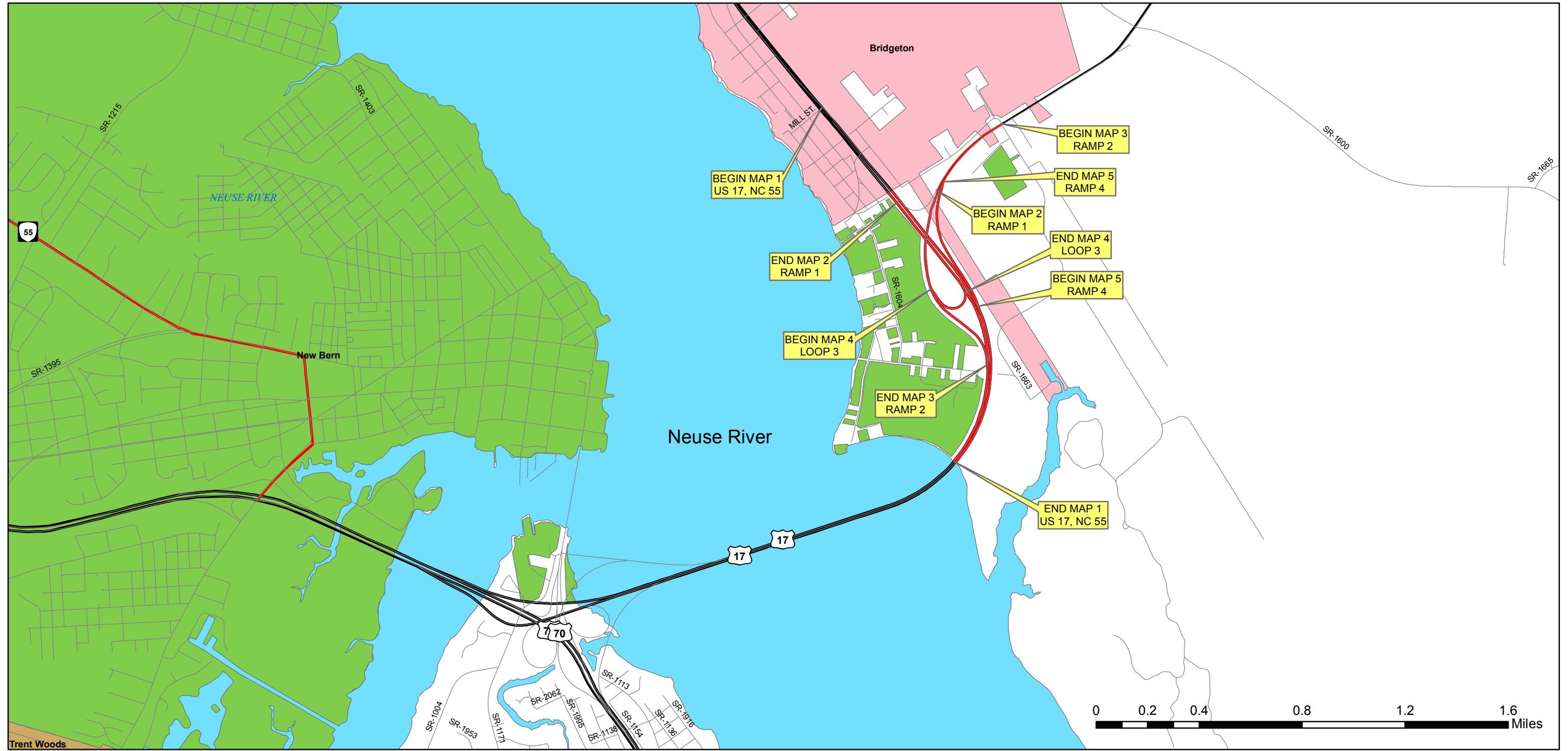
LEGEND

- Road Class**
- US 17, NC 55 Resurface
 - NC
 - US
 - Secondary

- City Limits**
- Bridgeton
 - New Bern
 - Trent Woods



Vicinity Map
 Mill & Resurface US 17 & NC 55
 In Craven County
 From Mill St. to the Neuse River Bridge
 WBS: 2016CPT.02.01.10251.1



10/26/98

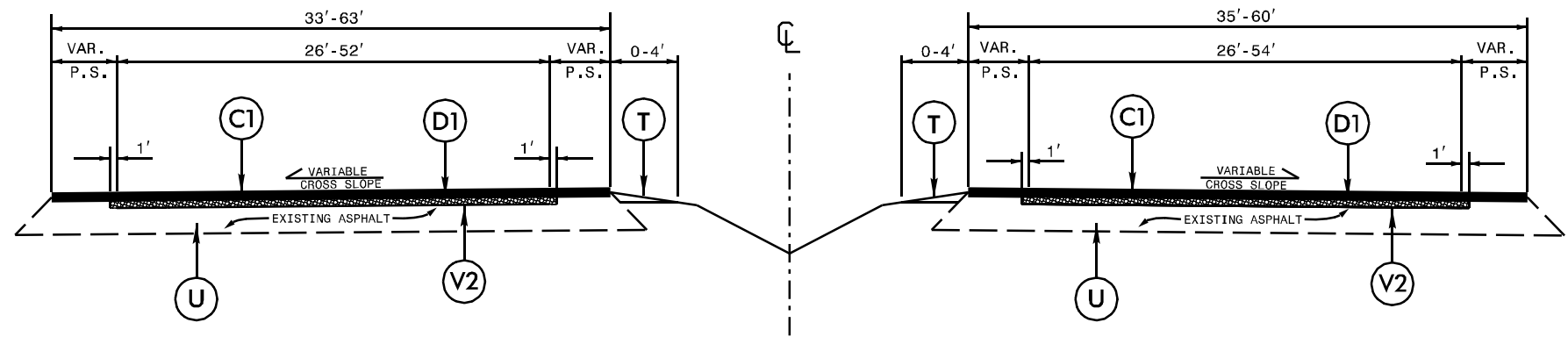
PAVEMENT SCHEDULE

C1	PROP. APPROX. 2" ASPHALT CONCRETE SURFACE COURSE, TYPE S 9.5B, AT AN AVERAGE RATE OF 224 LBS PER SQ. YD.
D1	PROP. APPROX. 2.5" ASPHALT CONCRETE INTERMEDIATE COURSE, TYPE I19.0B, AT AN AVERAGE RATE OF 285 LBS PER SQ. YD.
T	SHOULDER RECONSTRUCTION
U	EXISTING PAVEMENT
V1	MILLING DEPTH 0-2" FOR THE ENTIRE WIDTH OF ROADWAY.
V2	MILLING DEPTH 4.5" FOR A WIDTH AS SHOWN ON THE TYPICAL.

NOTE: PAVEMENT EDGE SLOPES ARE 1:1 UNLESS SHOWN OTHERWISE.

TYPICAL SECTION NO. 1

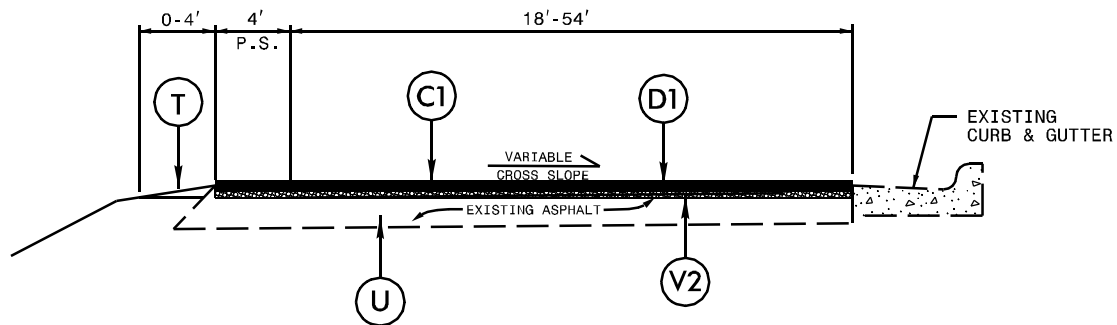
MAP 1: US 17, FROM MILL STREET TO NEUSE RIVER BRIDGE



- NOTE:**
1. PLACE ASPHALT SURFACE COURSE AT FULL WIDTH.
 2. INCLUDES INCIDENTAL MILLING AT THE ENDS OF MAIN LINE SECTIONS AND BRIDGE APPROACH TIE-INS, OR AS DIRECTED BY THE ENGINEER. SEE DETAIL 1 & 2

TYPICAL SECTION NO. 2

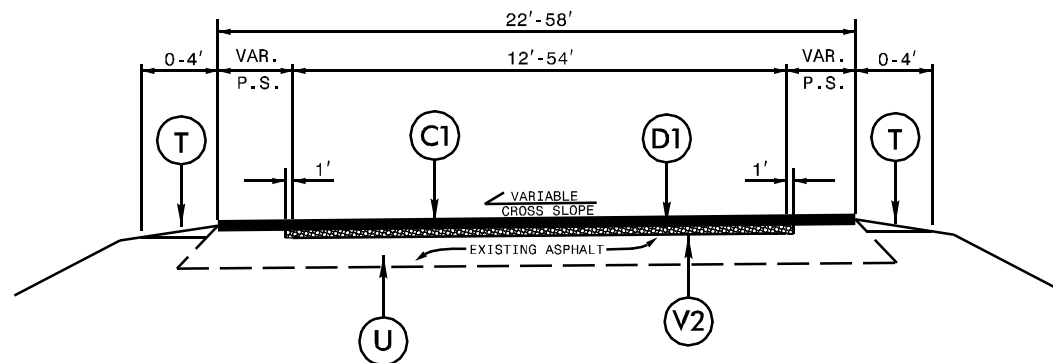
RAMP 1 & LOOP 3



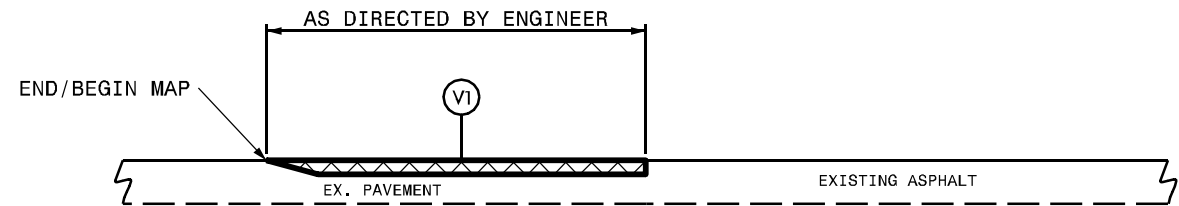
- NOTE:**
1. PLACE ASPHALT SURFACE COURSE AT FULL WIDTH.

TYPICAL SECTION NO. 3

RAMP 2 & RAMP 4

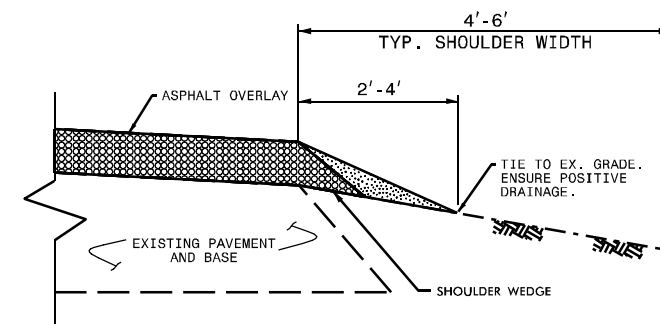


- NOTE:**
1. PLACE ASPHALT SURFACE COURSE AT FULL WIDTH.
 2. RAMP 2 CONSISTS OF AN EAST BOUND LANE AND A WEST BOUND LANE.
 3. SHOULDER RECONSTRUCTION WILL BE IN VARIOUS LOCATIONS DEEMED NECESSARY BY THE ENGINEER ON BOTH SIDES OF THE RAMPS BUT NOT THE ENTIRE LENGTH OF THE RAMPS.



DETAIL 1 INCIDENTAL MILLING

- NOTE:**
1. INCLUDES INCIDENTAL MILLING AT Y LINE TIE-INS OR AS DIRECTED BY THE ENGINEER.
 2. PAVE TO THE END OF THE MILLED SURFACE TO CREATE A SMOOTH TRANSITION.



SHOULDER RECONSTRUCTION DETAIL

- NOTE:**
1. SHOULDERS SHALL BE RECONSTRUCTED AS SHOWN IN STD. DWG. NO. 560.01 & 560.02, WITH A MINIMUM SLOPE OF 1" PER FOOT TO ENSURE POSITIVE DRAINAGE AWAY FROM THE ROADWAY.
 2. A VEGETATIVE BUFFER SHALL BE MAINTAINED BETWEEN THE DISTURBED AREA ALONG THE EDGE OF PAVEMENT AND THE DITCH SHOULDER POINT TO MINIMIZE EROSION. PULLING DITCHES OR CUTTING SHOULDERS TO GENERATE BORROW MATERIAL WILL NOT BE ALLOWED.

10/26/98

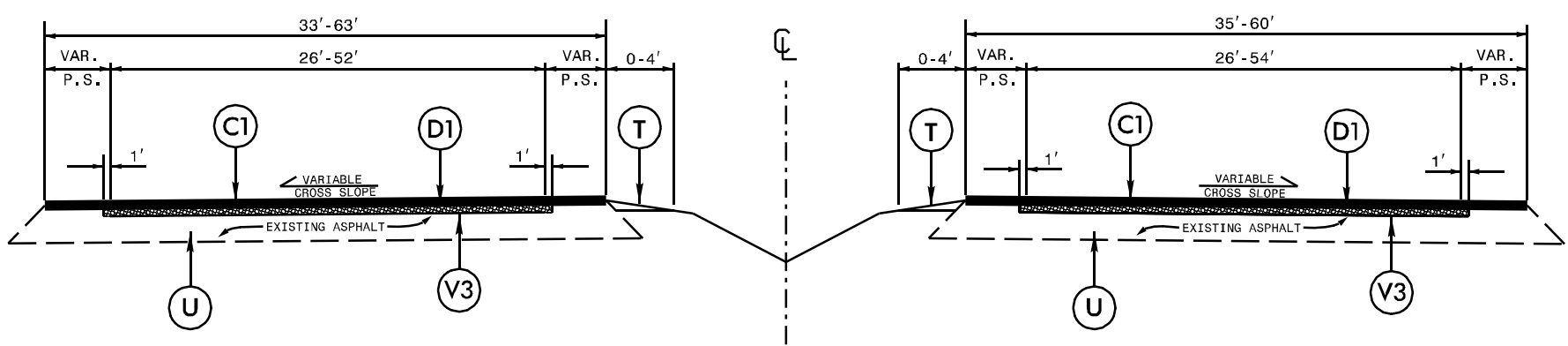
PAVEMENT SCHEDULE

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U	EXISTING PAVEMENT
V1	INCIDENTAL MILLING
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NOTE: PAVEMENT EDGE SLOPES ARE 1:1 UNLESS SHOWN OTHERWISE.

TYPICAL SECTION NO. 1

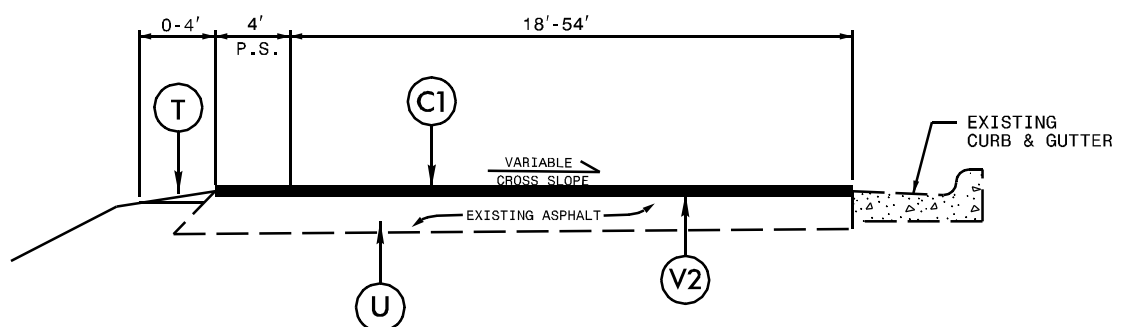
MAP 1: US 17, FROM MILL STREET TO NEUSE RIVER BRIDGE



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 2. INCLUDES INCIDENTAL MILLING AT THE ENDS OF MAIN LINE SECTIONS AND BRIDGE APPROACH TIE-INS, OR AS DIRECTED BY THE ENGINEER. SEE DETAIL 1 & 2

TYPICAL SECTION NO. 2

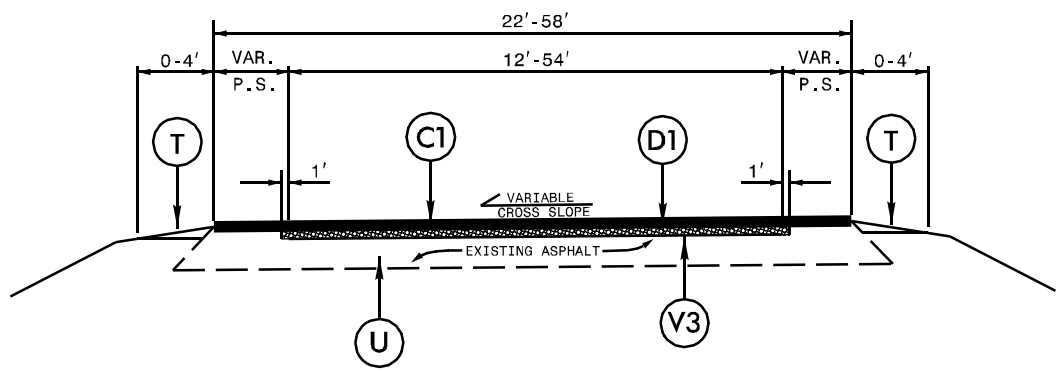
RAMP 1 & LOOP 3



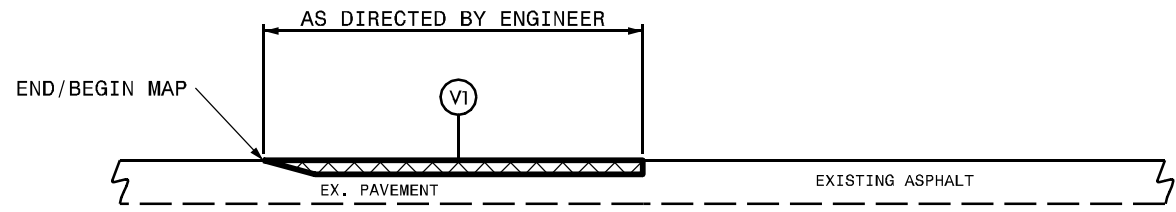
- NOTE:**
1. PLACE ASPHALT SURFACE COURSE AT FULL WIDTH.

TYPICAL SECTION NO. 3

RAMP 2 & RAMP 4

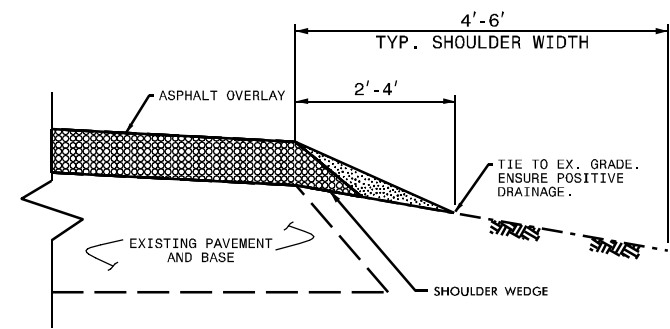


- NOTE:**
1. PLACE ASPHALT SURFACE COURSE AT FULL WIDTH.
 2. RAMP 2 CONSISTS OF AN EAST BOUND LANE AND A WEST BOUND LANE.
 3. SHOULDER RECONSTRUCTION WILL BE IN VARIOUS LOCATIONS DEEMED NECESSARY BY THE ENGINEER ON BOTH SIDES OF THE RAMPS BUT NOT THE ENTIRE LENGTH OF THE RAMPS.



DETAIL 1 INCIDENTAL MILLING

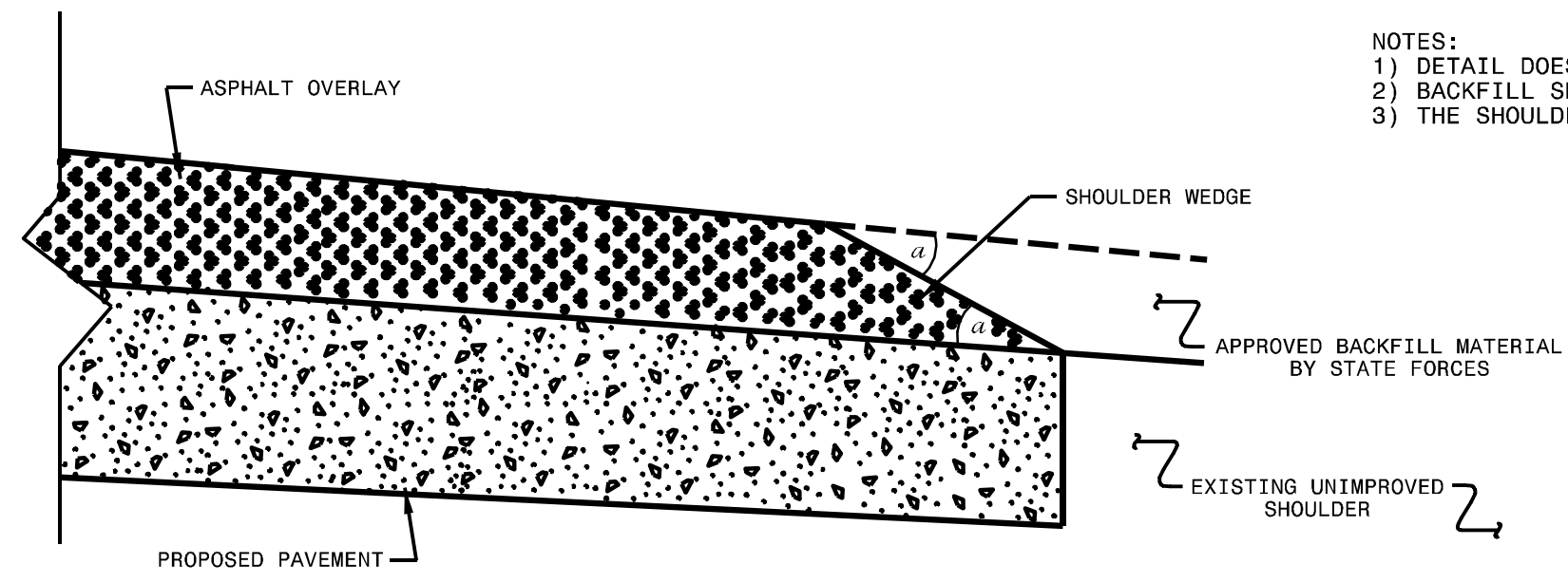
- NOTE:**
1. INCLUDES INCIDENTAL MILLING AT Y LINE TIE-INS OR AS DIRECTED BY THE ENGINEER.
 2. PAVE TO THE END OF THE MILLED SURFACE TO CREATE A SMOOTH TRANSITION.



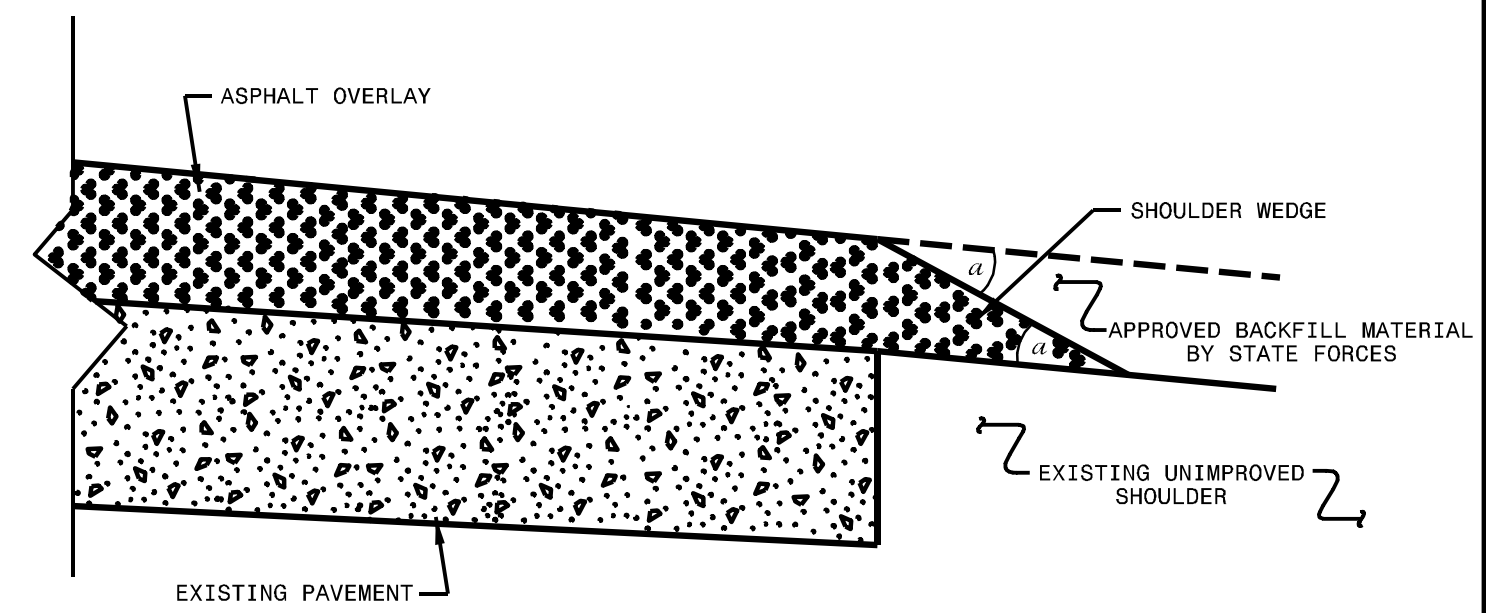
SHOULDER RECONSTRUCTION DETAIL

- NOTE:**
1. SHOULDERS SHALL BE RECONSTRUCTED AS SHOWN IN STD. DWG. NO. 560.01 & 560.02, WITH A MINIMUM SLOPE OF 1" PER FOOT TO ENSURE POSITIVE DRAINAGE AWAY FROM THE ROADWAY.
 2. A VEGETATIVE BUFFER SHALL BE MAINTAINED BETWEEN THE DISTURBED AREA ALONG THE EDGE OF PAVEMENT AND THE DITCH SHOULDER POINT TO MINIMIZE EROSION. PULLING DITCHES OR CUTTING SHOULDERS TO GENERATE BORROW MATERIAL WILL NOT BE ALLOWED.

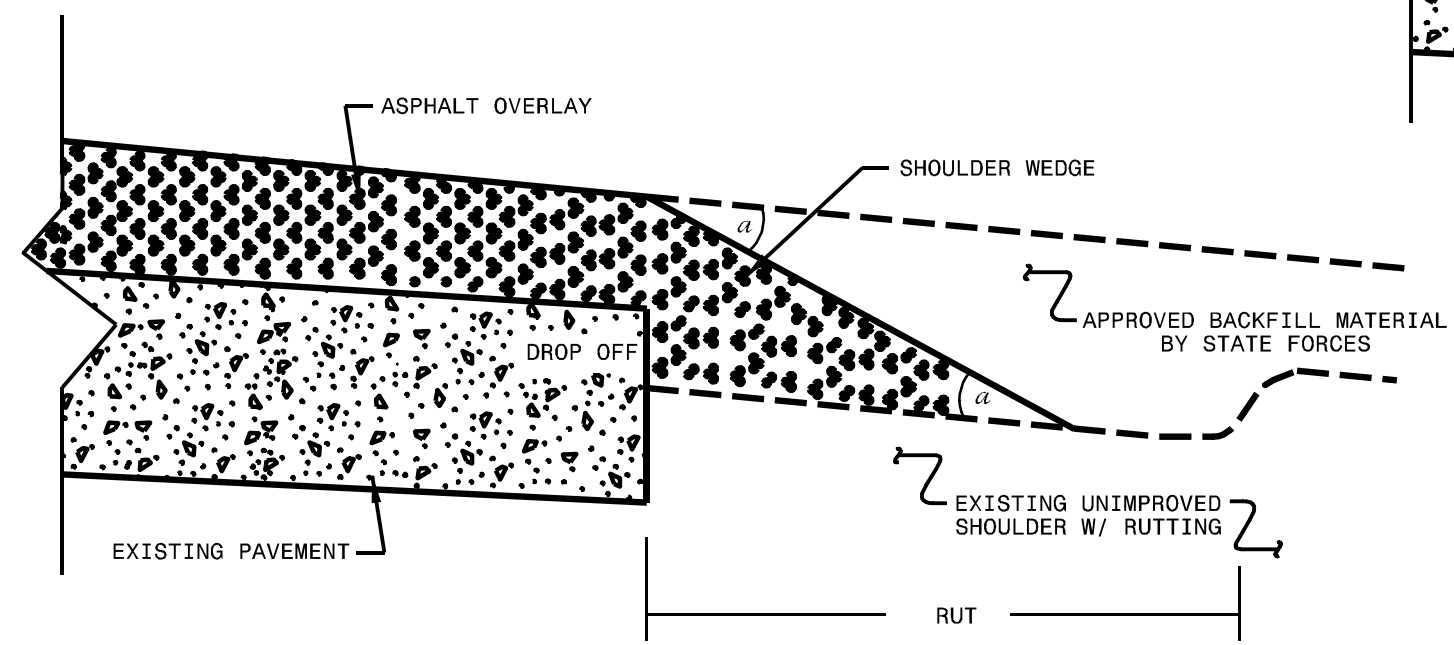
- NOTES:
 1) DETAIL DOES NOT APPLY TO OGAFB AND ULTRA-THIN BONDED WEARING COURSE.
 2) BACKFILL SHOULDER WITH APPROVED MATERIAL.
 3) THE SHOULDER WEDGE DEVICE MAY BE DISENGAGED AT PAVED DRIVEWAYS AND SIDE STREETS.



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:	10/16/12
CHECKED BY:		DATE:	
FILE SPEC.:	s:\usr\details\stand\shoulderwedge\detail.dgn		

\$\$\$\$\$
 SYSTEM\$\$\$\$\$
 USER\$\$\$\$\$

PROJECT NO.	SHEET NO.	TOTAL NO.
2016CPT.02.01.10251.1	4	

SUMMARY OF QUANTITIES

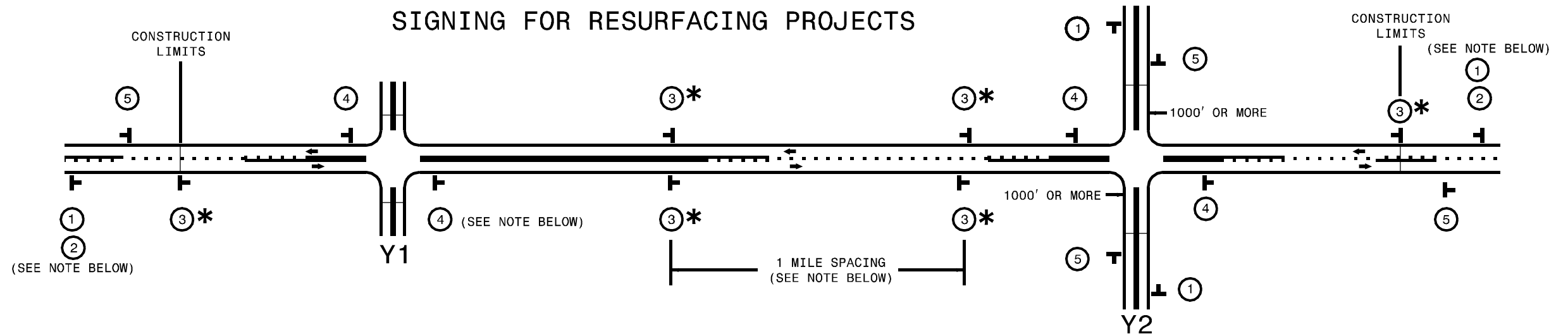
PROJECT NO	COUNTY	MAP NO	ROUTE	DESCRIPTION	TYP	LANES	FINAL SURFACE TESTING REQUIRED	WARM MIX ASPHALT REQUIRED	LENGTH MI	WIDTH FT	INCIDENTAL STONE BASE TONS	SHOULDER RECONSTRUCTION SMI	4.5" MILLING SY	INCIDENTAL MILLING SY	INTER-MEDIATE COURSE, I19.0B TONS	SURFACE COURSE, S9.5B TONS	ASPHALT BINDER FOR PLANT MIX TONS	ADJ. OF MANHOLES EA	ADJ. OF METER OR VALVE BOX EA	SEED & MULCHING AC	4413000000-E	4457000000-N	
																					WORK ZONE ADVANCE/GENERAL WARNING SIGNING SF	TEMPORARY TRAFFIC CONTROL LS	
2016CPT.02.01.10251.1	Craven	1	US 17, NC 55	FROM MILL ST. TO NEUSE RIVER BRIDGE	1	4	NO	NO	1.611	73	400	3.22	68,994	536	10,648	10,719	1,154	2	1	2.00	280	1	
		2	RAMP 1	FROM NC 55 TO US 17 N.	2	1	NO	NO	0.198	23		0.20	2,672		415	371	42			0.10			
		3	RAMP 2	FROM US 17/NC 55 TO NC 55	3	3	NO	NO	0.787	74		0.80	34,166		4,882	5,282	551			0.40			
		4	LOOP 3	FROM US 17/NC 55 TO NC 55	2	1	NO	NO	0.173	23		0.20	2,334		363	305	36			0.10			
		5	RAMP 4	FROM US 17/NC 55 TO NC 55	3	2	NO	NO	0.467	26		0.50	7,123		1,105	1,283	130			0.24			
TOTAL FOR PROJ NO. 2016CPT.02.01.10251.1								3.236		400	4.92	115,289	536	17,413	17,960	1,913	2	1	2.84	280	1		
GRAND TOTAL								3.236		400	4.92	115,289	536	17,413	17,960	1,913	2	1	2.84	280	1		

PROJECT NO.	SHEET NO.	TOTAL NO.
2016CPT.02.01.10251.1	4	

SUMMARY OF QUANTITIES

PROJECT NO	COUNTY	MAP NO	ROUTE	DESCRIPTION	TYP NO	LANES	FINAL SURFACE TESTING REQUIRED	WARM MIX ASPHALT REQUIRED	LENGTH MI	WIDTH FT	INCIDENTAL STONE BASE TONS	SHOULDER RECONSTRUCTION SMI	2.5" MILLING SY	0" to 2" MILLING SY	INCIDENTAL MILLING SY	INTER-MEDIATE COURSE, I19.0B TONS	SURFACE COURSE, S9.5B TONS	ASPHALT BINDER FOR PLANT MIX TONS	ADJ. OF MANHOLES EA	ADJ. OF METER OR VALVE BOX EA	SEED & MULCHING AC	441300000-E	445700000-N	
																						WORK ZONE ADVANCE/GENERAL WARNING SIGNING SF	TEMPORARY TRAFFIC CONTROL LS	
2016CPT.02.01.10251.1	Craven	1	US 17, NC 55	FROM MILL ST. TO NEUSE RIVER BRIDGE	1	4	NO	NO	1.611	73	400	3.22	68,994		536	10,648	10,719	1,154	2	1	2.00	280	1	
		2	RAMP 1	FROM NC 55 TO US 17 N.	2	1	NO	NO	0.198	23		0.20		2,672			371	22				0.10		
		3	RAMP 2	FROM US 17/NC 55 TO NC 55	3	3	NO	NO	0.787	74		0.80	34,166			4,882	5,282	551				0.40		
		4	LOOP 3	FROM US 17/NC 55 TO NC 55	2	1	NO	NO	0.173	23		0.20		2,334			305	18				0.10		
		5	RAMP 4	FROM US 17/NC 55 TO NC 55	3	2	NO	NO	0.467	26		0.50	7,123			1,105	1,283	130				0.24		
TOTAL FOR PROJ NO. 2016CPT.02.01.10251.1									3.236		400	4.92	110,283	5,006	536	16,635	17,960	1,875	2	1	2.84	280	1	
GRAND TOTAL									3.236		400	4.92	110,283	5,006	536	16,635	17,960	1,875	2	1	2.84	280	1	

SIGNING FOR RESURFACING PROJECTS



LEGEND	
	STATIONARY SIGN
	DIRECTION OF TRAFFIC FLOW

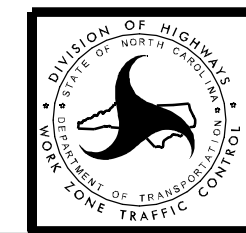
MAINLINE (-L-) SIGNING

-Y- LINE SIGNING

SIGNING NOTES AND PLACEMENT PER DIRECTION	1	2	3*	4	5		
						<p>NO REQUIRED STATIONARY SIGNING FOR THE FOLLOWING -Y- LINE CONDITIONS:</p> <ol style="list-style-type: none"> LESS THAN 1000' OF RESURFACING ALONG -Y- LINE SUBDIVISION ROADS 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> <p>W20-1 48" X 48"</p> </div> <div> <p>W20-7 A 48" X 48"</p> </div> </div> <p>PLACED 500' IN ADVANCE OF FLAGGER. PLACED 250' IN ADVANCE OF FLAGGER.</p>	
	<p>PLACE 1000' PRIOR TO BEGINNING OF CONSTRUCTION LIMITS. ONLY USED ON -Y- LINES IF RESURFACING LIMITS EXTEND 1000' ALONG -Y- LINE.</p>		<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>#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>PLACE 500' FOLLOWING THE END OF CONSTRUCTION LIMITS.</p>				

* SIGNING FOR ASPHALT SURFACE TREATMENTS (ONLY)

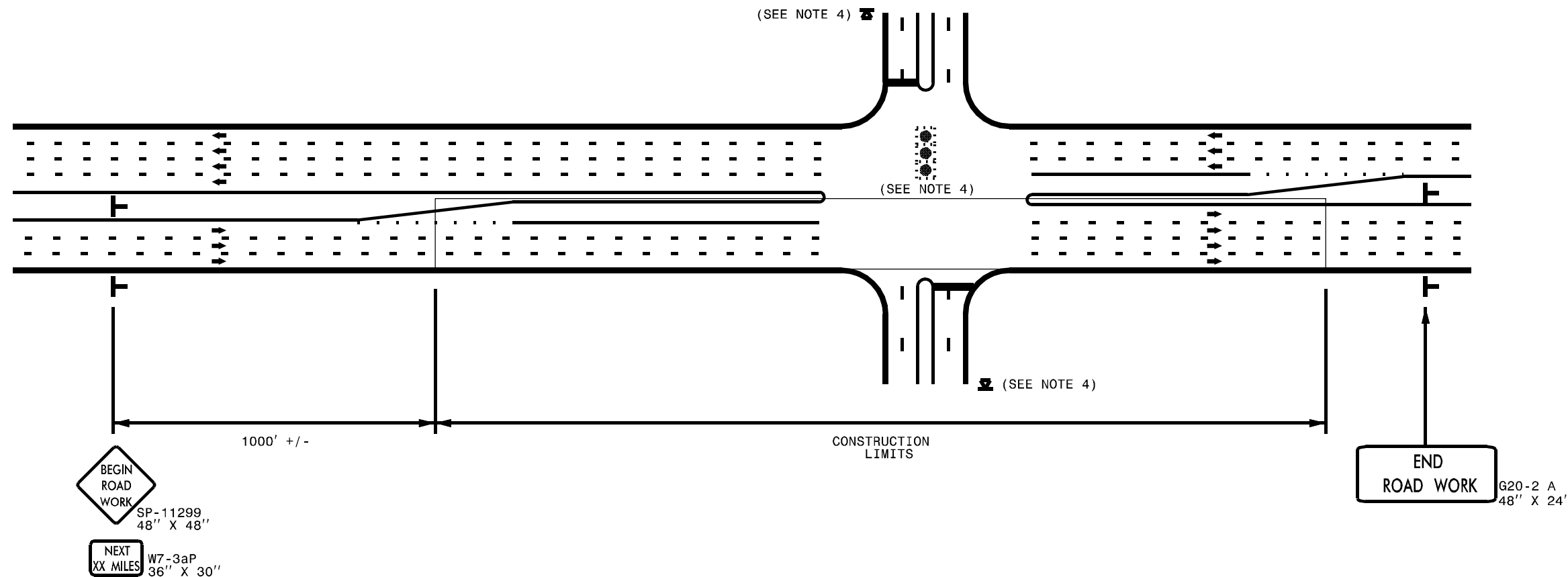
SUBSTITUTE LOW/SOFT SHOULDER SIGNS BY ALTERNATING THE FOLLOWING TWO SIGNS: STARTING WITH "UNMARKED PAVEMENT AHEAD" (SP 06026) FOLLOWED BY "LOOSE GRAVEL" (W8-7).



RESURFACING ADVANCE WARNING SIGNS FOR RURAL AND SUBURBAN 2 LANE ROADWAYS

***** SYSTEM TIME *****
***** DONOR *****
***** USERNAME *****

URBAN / SUBURBAN WORKZONES

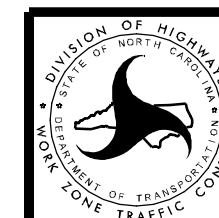


NOTES:

- 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**

*****SYSTEMS*****
 *****DON*****
 *****USER*****