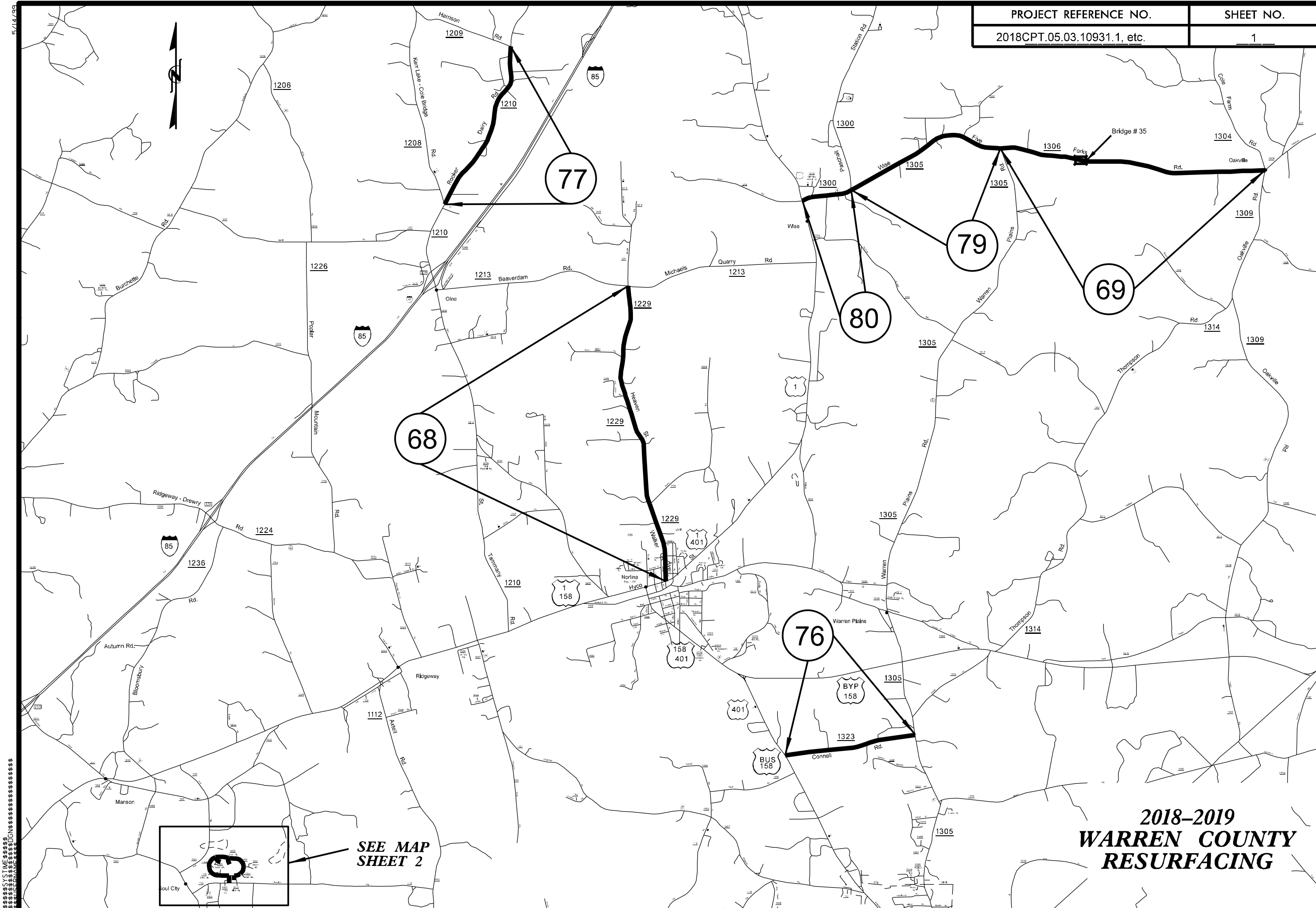


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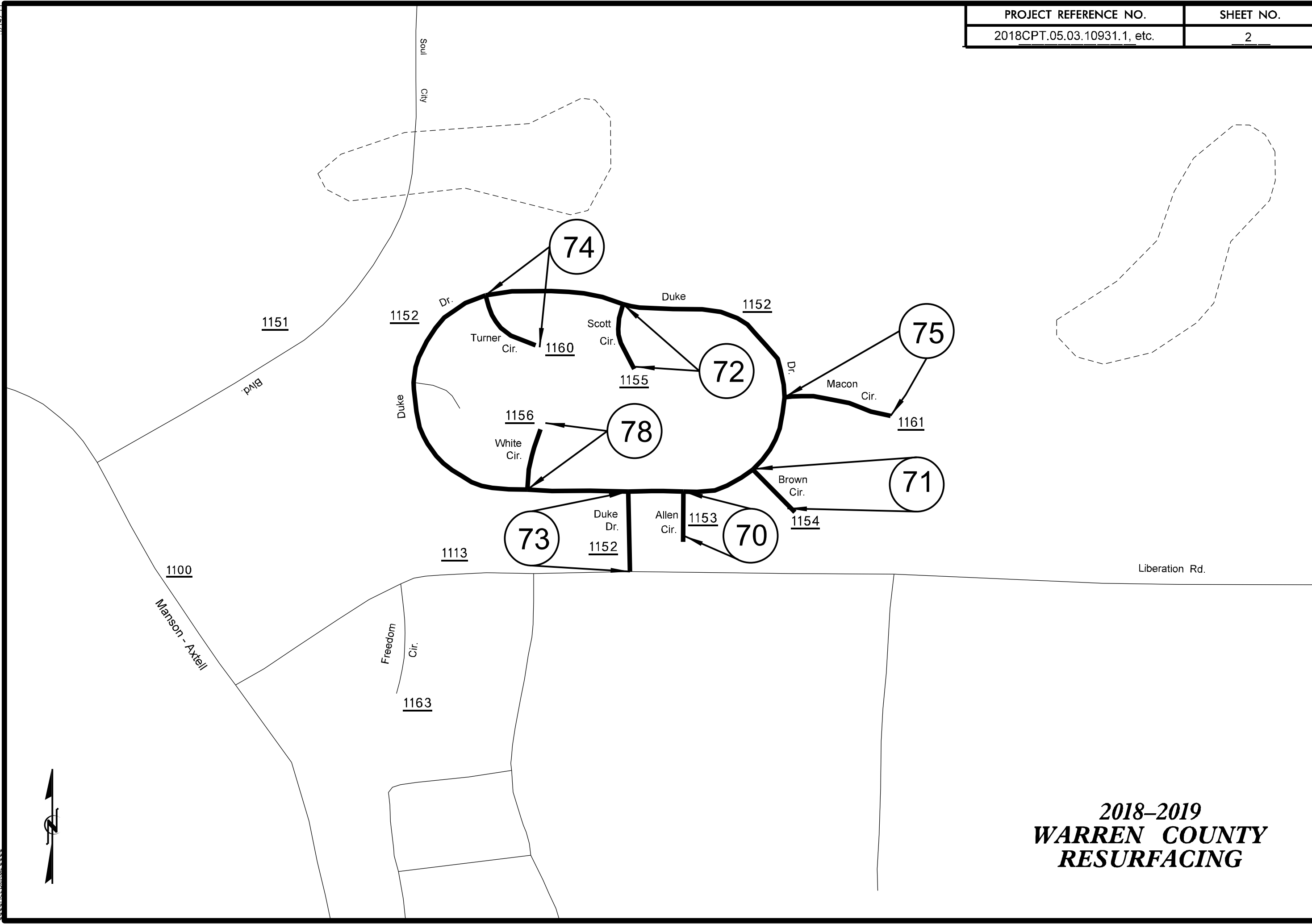
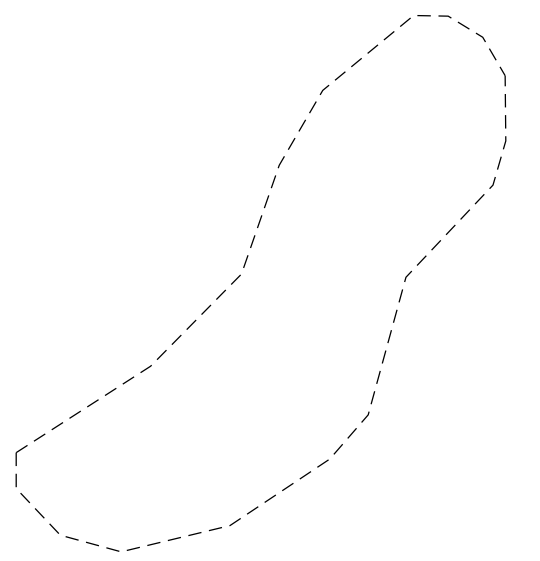
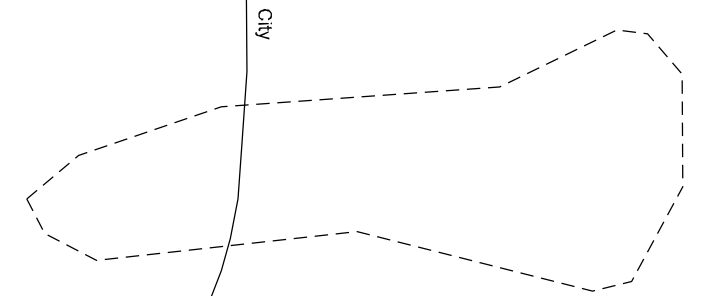
SEE MAP SHEET 2

**2018-2019  
WARREN COUNTY  
RESURFACING**

5/14/19

5/14/99

SECTION 2  
 1100 1101 1102 1103 1104 1105 1106 1107 1108 1109 1110 1111 1112 1113 1114 1115 1116 1117 1118 1119 1120 1121 1122 1123 1124 1125 1126 1127 1128 1129 1130 1131 1132 1133 1134 1135 1136 1137 1138 1139 1140 1141 1142 1143 1144 1145 1146 1147 1148 1149 1150 1151 1152 1153 1154 1155 1156 1157 1158 1159 1160 1161 1162 1163 1164 1165 1166 1167 1168 1169 1170 1171 1172 1173 1174 1175 1176 1177 1178 1179 1180 1181 1182 1183 1184 1185 1186 1187 1188 1189 1190 1191 1192 1193 1194 1195 1196 1197 1198 1199 1200



**2018-2019  
 WARREN COUNTY  
 RESURFACING**

903

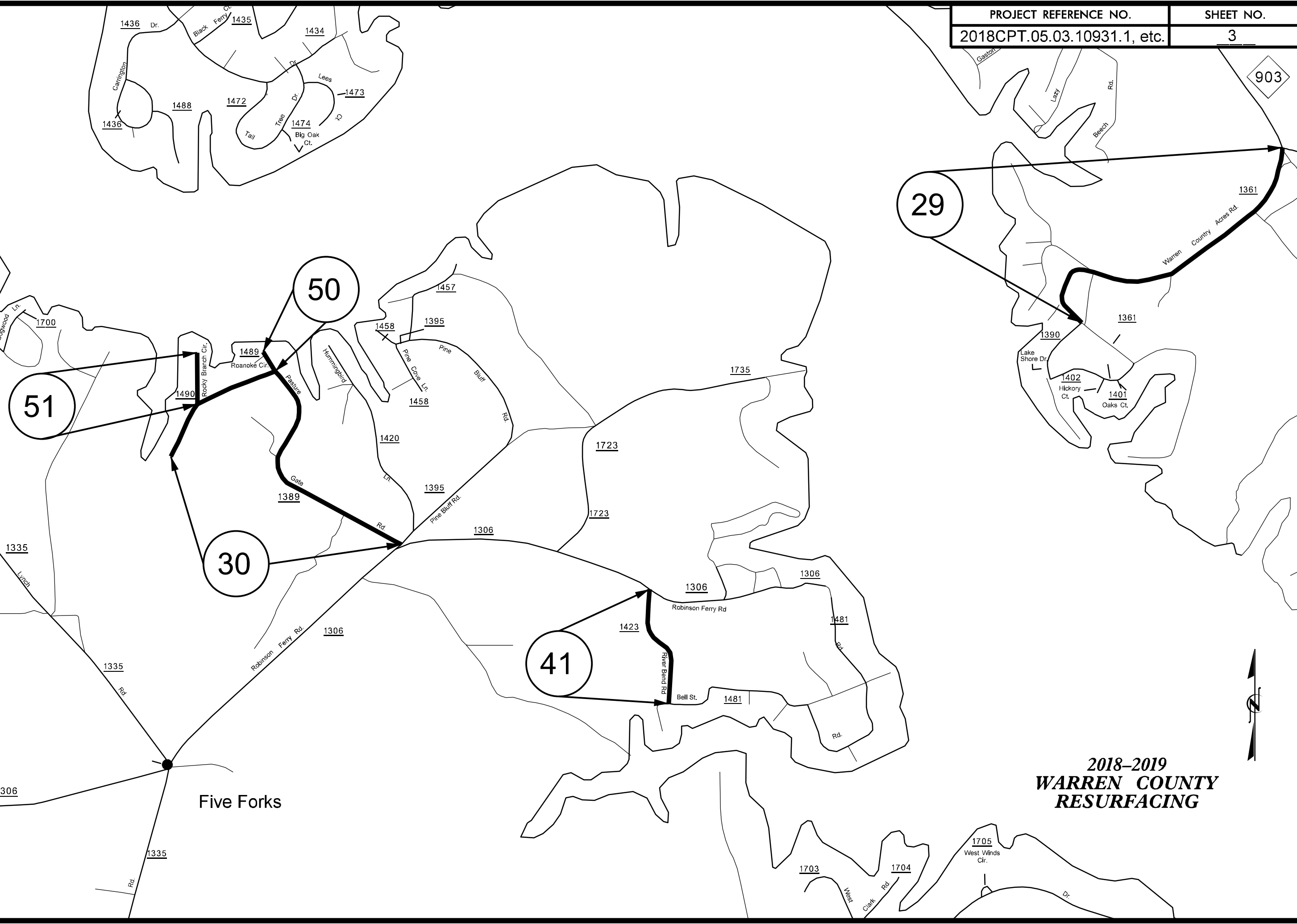
29

50

51

30

41



Five Forks

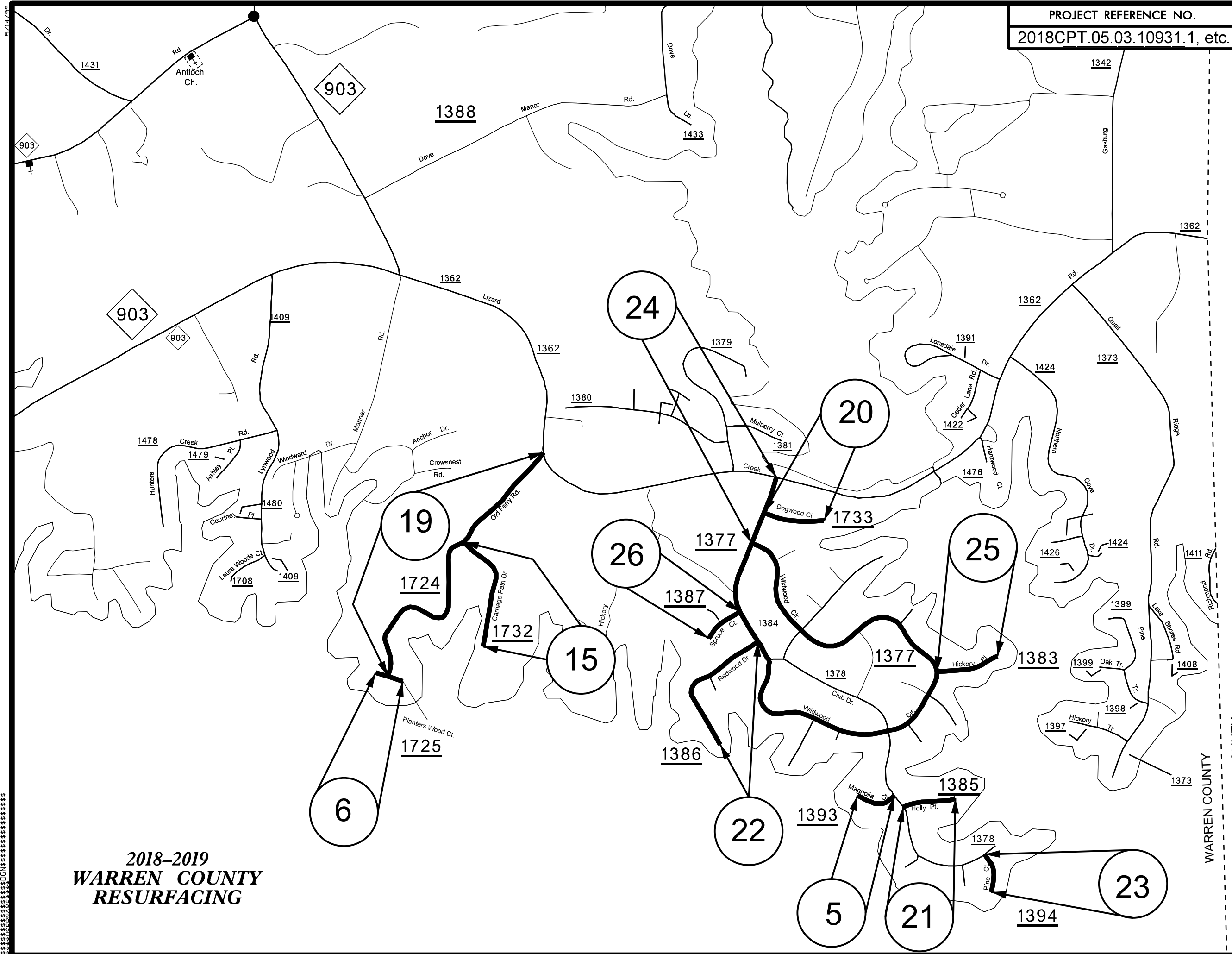
**2018-2019  
WARREN COUNTY  
RESURFACING**

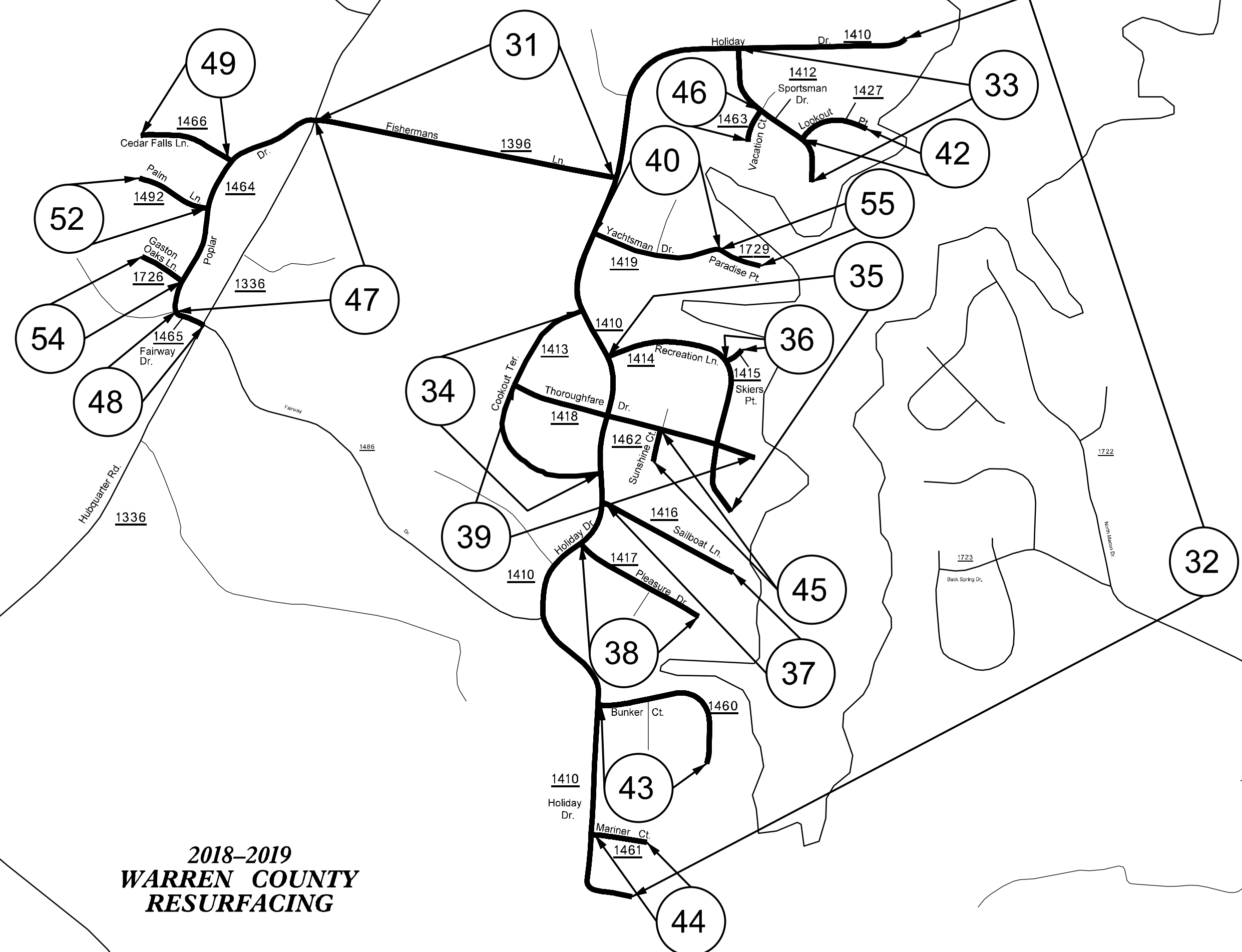
5/14/99



2018-2019  
**WARREN COUNTY  
RESURFACING**

WARREN COUNTY  
NORTHAMPTON COUNTY



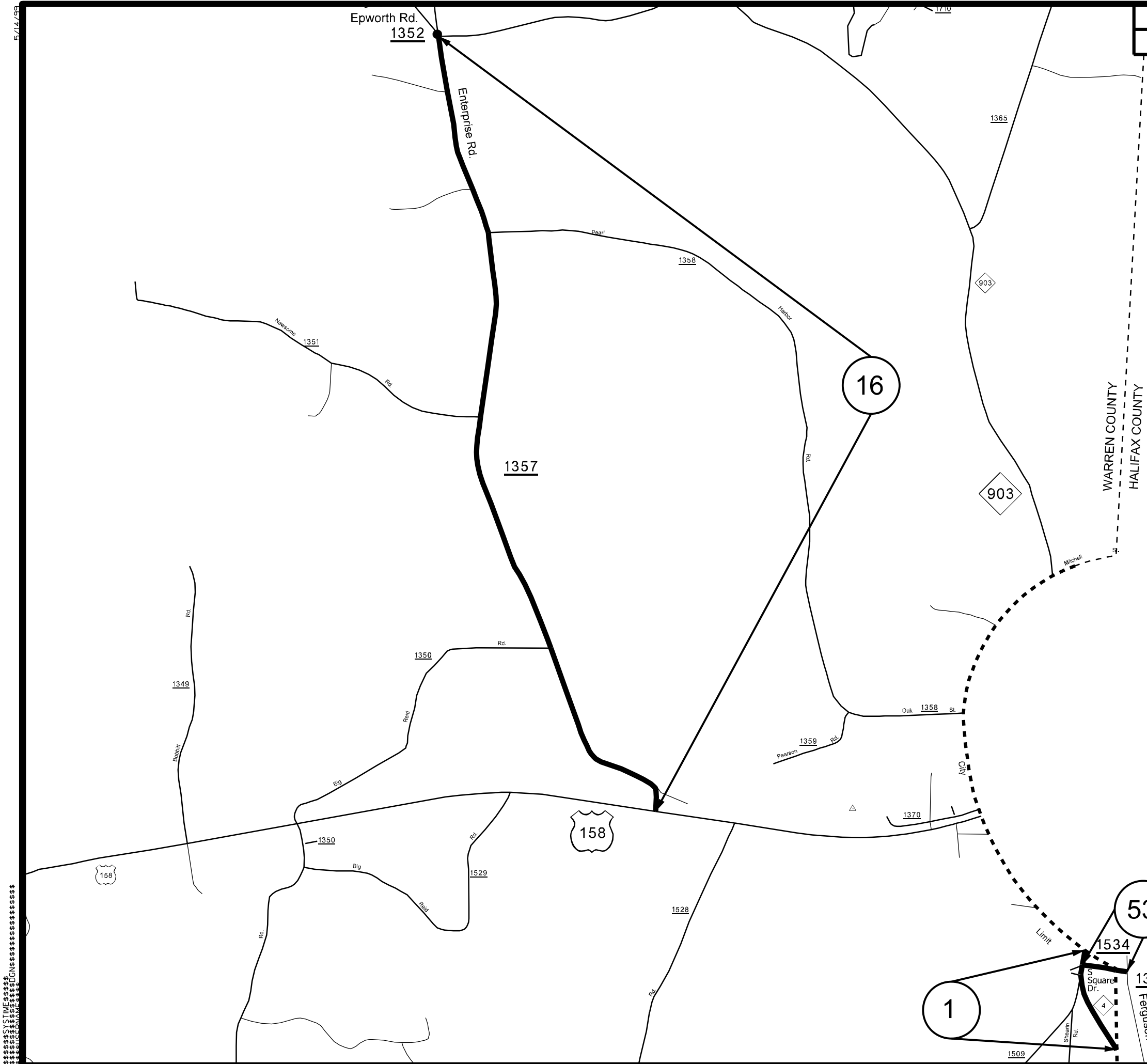


2018-2019  
**WARREN COUNTY  
RESURFACING**

5/14/19  
C:\PROJECTS\2018-2019 WARREN COUNTY RESURFACING\DRAWINGS\DWG\2018CPT.05.03.10931.1.DWG

1348





**2018-2019  
WARREN COUNTY  
RESURFACING**

5/14/19  
C:\PROJECTS\2018-2019 WARREN COUNTY RESURFACING\DWG\WARREN\_CPT\_05\_03\_10931\_1\_01.dwg



PAVEMENT SCHEDULE

S SHOULDER GRADING  
ASB REQUIRED (EXCEPT AT RESIDENTIAL AREAS)

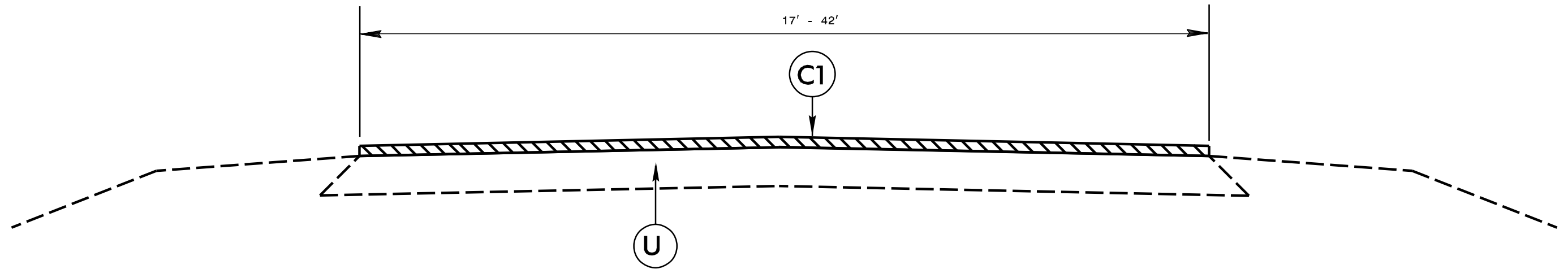
PROJECT REFERENCE NO.

SHEET NO.

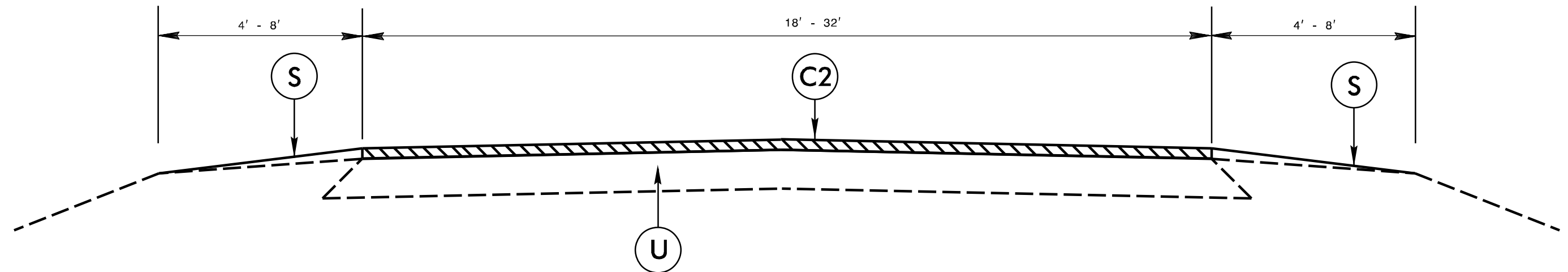
2018CPT.05.03.10931J, etc.

8

C1	1" ASPHALT CONCRETE SURFACE COURSE, TYPE S4.75A, AT AN AVERAGE RATE OF 100 LBS. PER SQ. YD.	U	EXISTING PAVEMENT
C2	1 1/4" ASPHALT CONCRETE SURFACE COURSE, TYPE S9.5B, AT AN AVERAGE RATE OF 137.5 LBS. PER SQ. YD.	V1	1 1/2" MILLING
C3	1 1/2" ASPHALT CONCRETE SURFACE COURSE, TYPE S9.5B, AT AN AVERAGE RATE OF 165 LBS. PER SQ. YD.	V2	0" - 1 1/2" MILLING



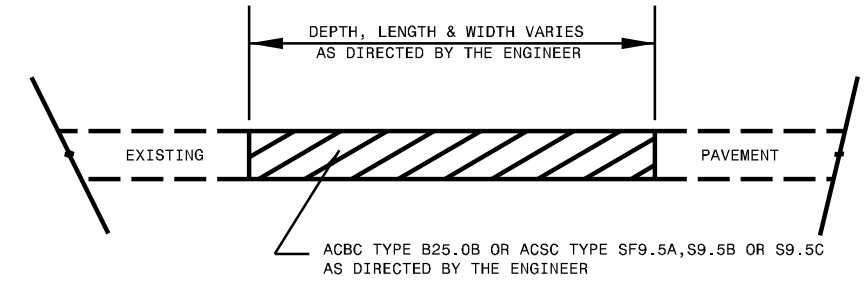
TYPICAL SECTION NO. 1



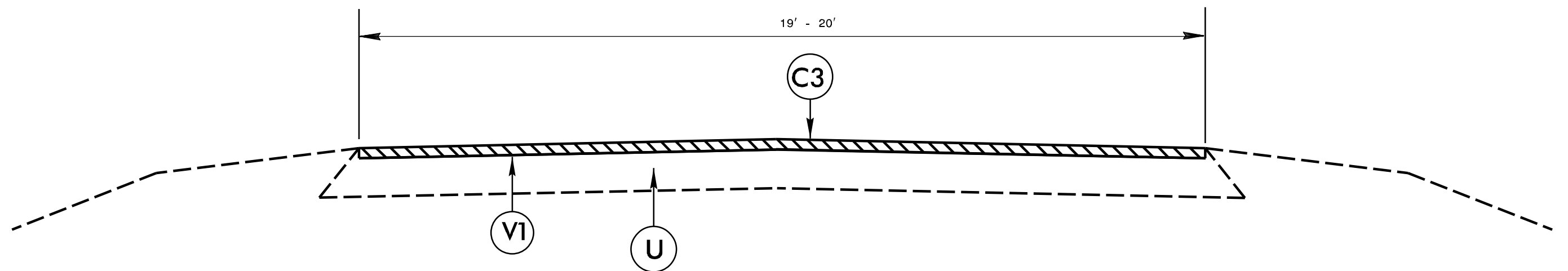
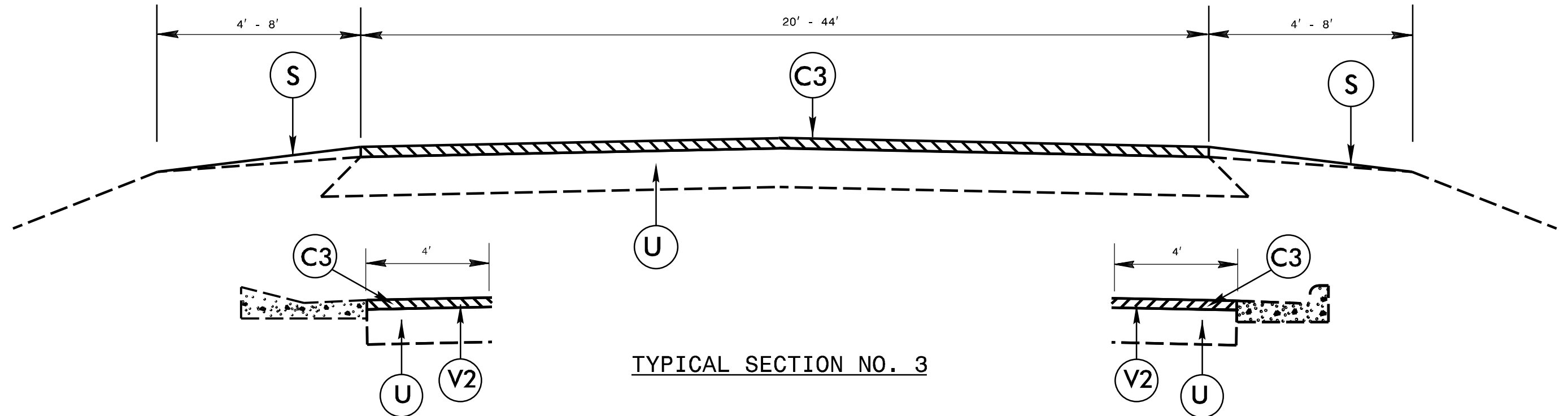
TYPICAL SECTION NO. 2

# PAVEMENT SCHEDULE

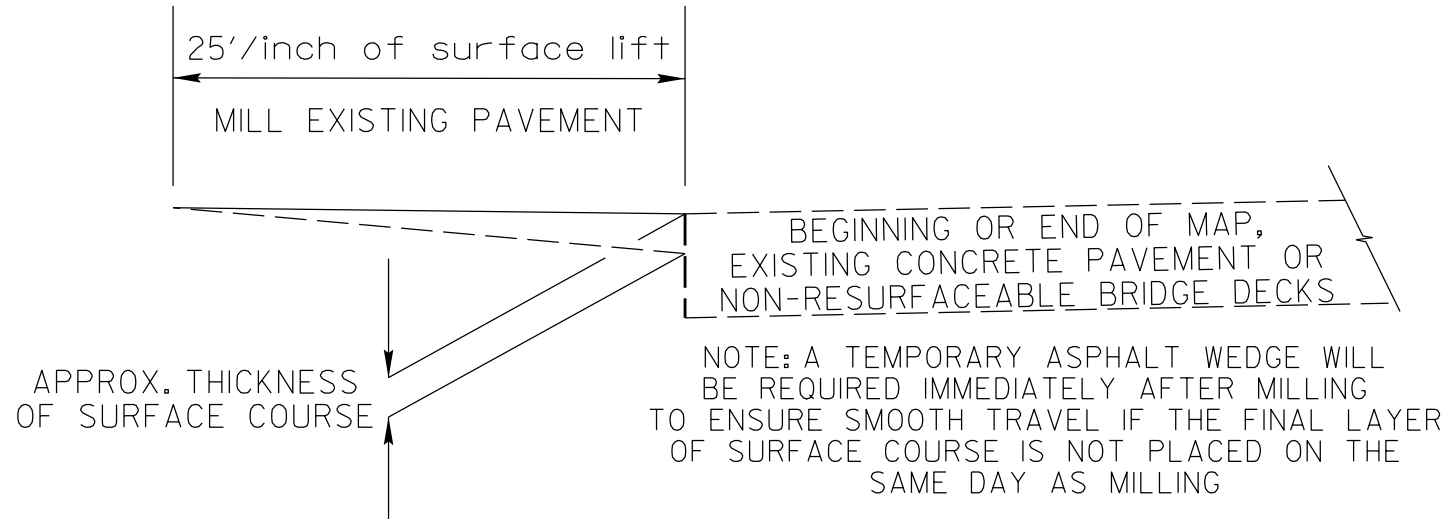
	S	SHOULDER GRADING ASB REQUIRED (EXCEPT AT RESIDENTIAL AREAS)
C1	U	EXISTING PAVEMENT
C2	V1	1 1/2" MILLING
C3	V2	0"-1 1/2" MILLING



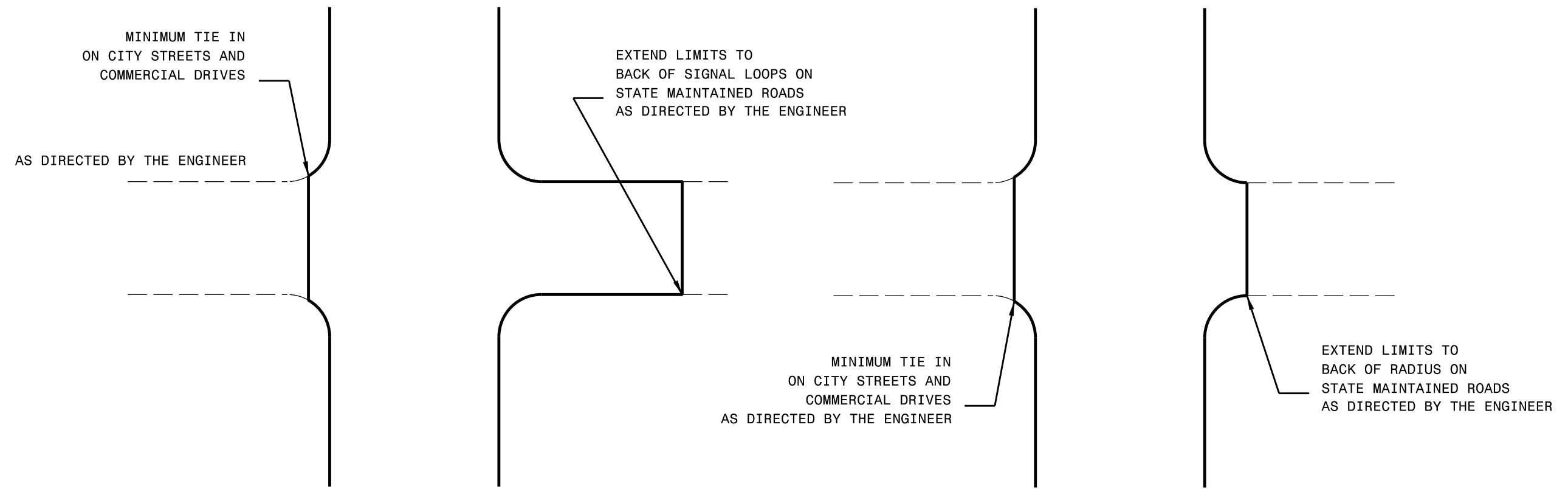
**PATCHING EXISTING PAVEMENT**  
MILLING (IF REQUIRED BY TYPICAL) TO BE PERFORMED PRIOR TO PATCHING



**TYPICAL SECTION NO. 4**



**DETAIL OF INCIDENTAL MILLING**



**DETAIL OF PROJECT LIMITS AT  
SIGNALIZED Y LINES**

**DETAIL OF PROJECT LIMITS AT  
UNSIGNALIZED Y LINES**











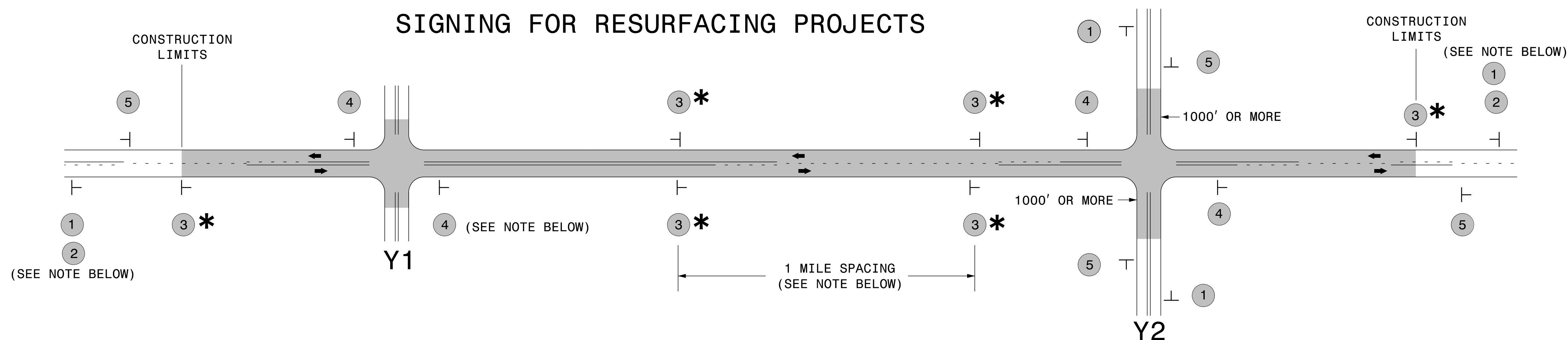


PROJECT NO.	SHEET NO.	TOTAL NO.
2018CPT.05.03.10931.1, etc.		

### THERMOPLASTIC AND PAINT QUANTITIES

PROJECT NO	COUNTY	MAP NO	ROUTE	DESCRIPTION	TYP NO	LANES	LENGTH	WIDTH	4413000000-E	4457000000-N	4685000000-E	4686000000-E		4700000000-E	4710000000-E	4721000000-E		
									WORK ZONE ADVANCE/GENERAL WARNING SIGNING	TEMPORARY TRAFFIC CONTROL	4" X 90 M WHITE THERMO	4" X 120 M WHITE THERMO	4" X 120 M YELLOW THERMO	12" X 90 M YELLOW THERMO	24" X 120 M WHITE THERMO	THERMO MSG SCHOOL 120 M		
							MI	FT	SF	LS	LF	LF	LF	LF	LF	EA		
<b>TOTAL FOR MAP NO. 74</b>									<b>0.06</b>		<b>8</b>	<b>0.01</b>						
2018CPT.05.03.20931.1	Warren	75	SR 1161 - MACON CIR	SR 1152 - DUKE DR TO CUL-DE-SAC	4	2	0.11	20	10	0.01								
<b>TOTAL FOR MAP NO. 75</b>									<b>0.11</b>		<b>10</b>	<b>0.01</b>						
2018CPT.05.03.20931.1	Warren	76	SR 1323 - CONNELL RD	US 401 TO SR 1305 - WARREN PLAINS RD	2	2	1.15	22-32	129	0.01	12,374	280	13,554	110	100	12		
<b>TOTAL FOR MAP NO. 76</b>									<b>1.15</b>		<b>129</b>	<b>0.01</b>	<b>12,374</b>	<b>280</b>	<b>13,554</b>	<b>110</b>	<b>100</b>	<b>12</b>
2018CPT.05.03.20931.1	Warren	77	SR 1210 - ROOKER DAIRY RD	SR 1208 - KERR LAKE-COLE BRIDGE RD TO SR 1209 - HARRISON RC	2	2	1.57	21	174	0.02	16,861	50	16,548					
<b>TOTAL FOR MAP NO. 77</b>									<b>1.57</b>		<b>174</b>	<b>0.02</b>	<b>16,861</b>	<b>50</b>	<b>16,548</b>			
2018CPT.05.03.20931.1	Warren	78	SR 1156 - WHITE CIR	SR 1152 - DUKE DR TO CUL-DE-SAC	4	2	0.06	20	7	0.01								
<b>TOTAL FOR MAP NO. 78</b>									<b>0.06</b>		<b>7</b>	<b>0.01</b>						
2018CPT.05.03.20931.1	Warren	79	SR 1305 - WISE FIVE FORKS RD	SR 1300 - PASCHALL STATION RD TO SR 1306 - WISE FIVE FORKS RD	2	2	1.46	22	164	0.02	15,710	46	12,824					
<b>TOTAL FOR MAP NO. 79</b>									<b>1.46</b>		<b>164</b>	<b>0.02</b>	<b>15,710</b>	<b>46</b>	<b>12,824</b>			
2018CPT.05.03.20931.1	Warren	80	SR 1300 - WISE FIVE FORKS RD	SR 1305 - WISE FIVE FORKS RD TO US 1	2	2	0.44	22	50	0.01	4,734	22	3,518					
<b>TOTAL FOR MAP NO. 80</b>									<b>0.44</b>		<b>50</b>	<b>0.01</b>	<b>4,734</b>	<b>22</b>	<b>3,518</b>			
<b>TOTAL FOR PROJ NO. 2018CPT.05.03.20931.1</b>									<b>38.72</b>		<b>4,369</b>	<b>0.99</b>	<b>195,049</b>	<b>815</b>	<b>175,756</b>	<b>110</b>	<b>200</b>	<b>24</b>
													<b>176,571</b>					
<b>GRAND TOTAL</b>									<b>39.05</b>		<b>4,406</b>	<b>1.00</b>	<b>197,899</b>	<b>870</b>	<b>179,206</b>	<b>110</b>	<b>200</b>	<b>24</b>
													<b>180,076</b>					

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

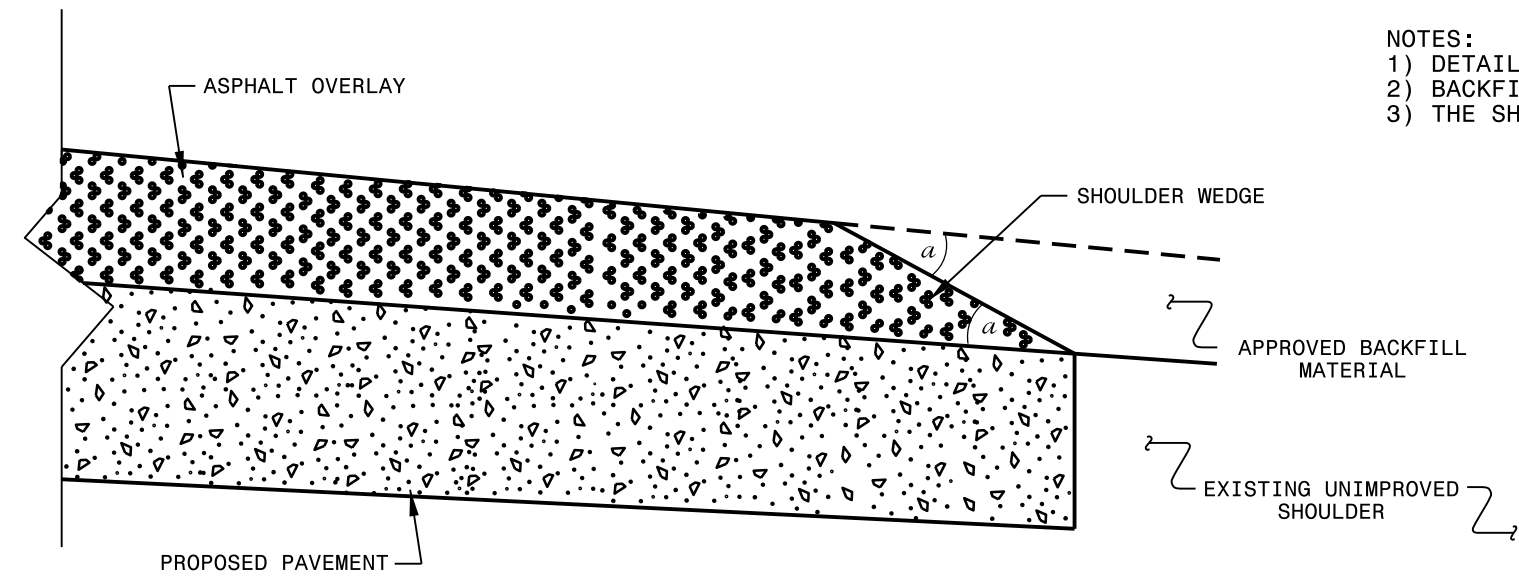
### \* SIGNING FOR ASPHALT SURFACE TREATMENTS (ONLY)

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

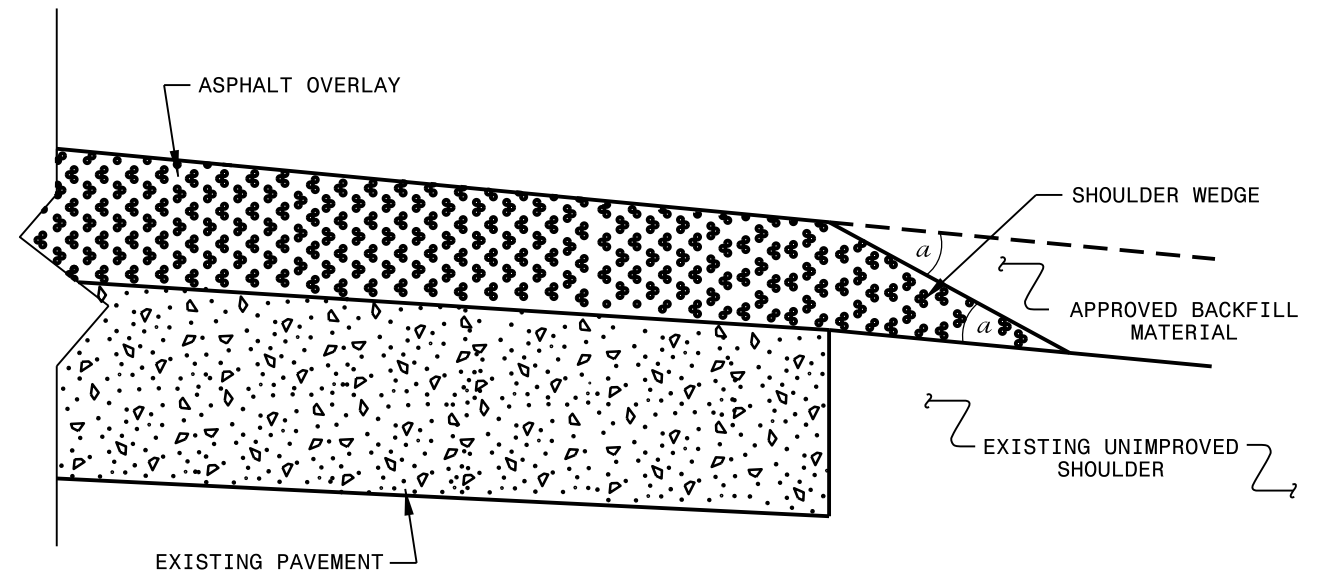


**RESURFACING  
ADVANCE WARNING SIGNS  
FOR  
RURAL AND SUBURBAN  
2 LANE ROADWAYS**

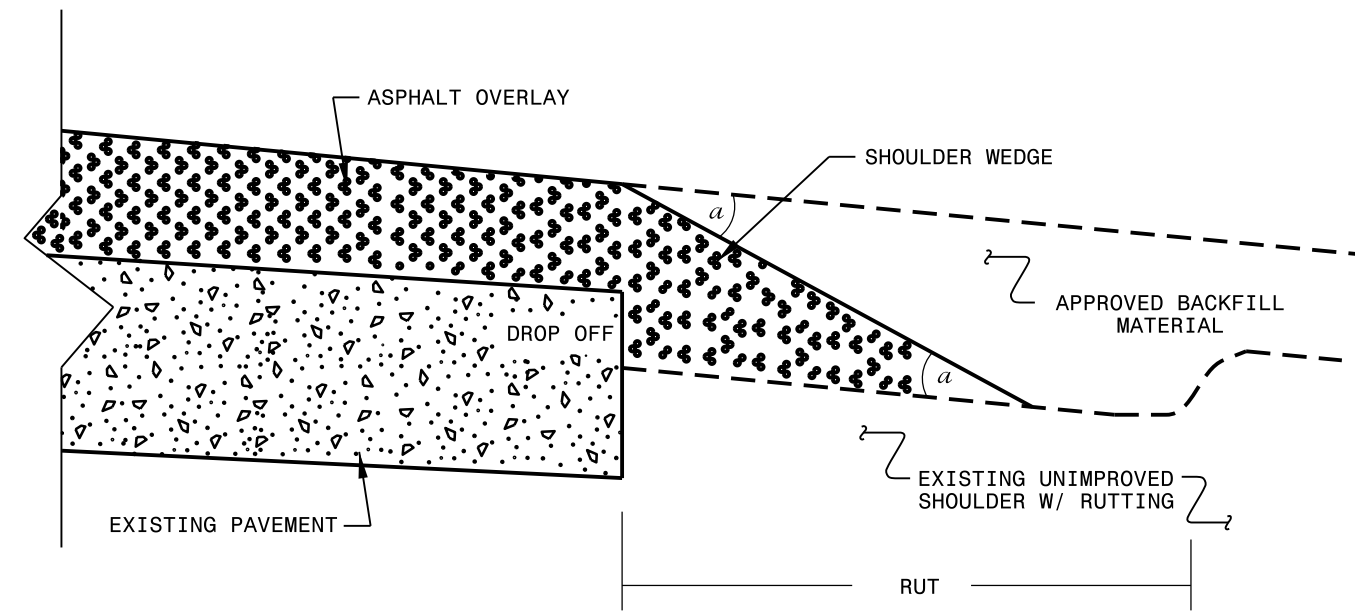
- NOTES:
- 1) DETAIL DOES NOT APPLY TO OGAFB AND ULTRA-THIN BONDED WEARING COURSE.
  - 2) BACKFILL SHOULDER WITH APPROVED MATERIAL.
  - 3) THE SHOULDER WEDGE DEVICE MAY BE DISENGAGED AT PAVED DRIVEWAYS AND SIDE STREETS.



**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.: susr/details/stand/shoulderwedgedetail.dgn

SYSTEMS DESIGN  
 USER NAME

**DIVISION OF HIGHWAYS  
STATE OF NORTH CAROLINA**

***SOIL STABILIZATION TIMEFRAMES***

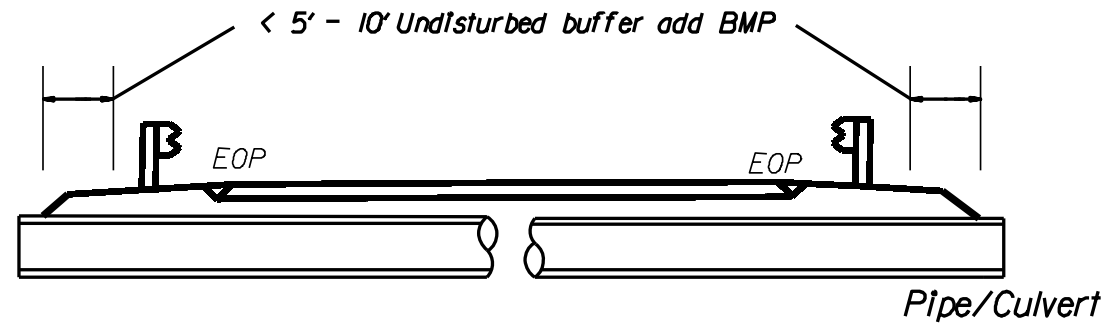
<i>SITE DESCRIPTION</i>	<i>STABILIZATION TIME</i>	<i>TIMEFRAME EXCEPTIONS</i>
<b>PERIMETER DIKES, SWALES, DITCHES AND SLOPES</b>	<b>7 DAYS</b>	<b>NONE</b>
<b>HIGH QUALITY WATER (HOW) ZONES</b>	<b>7 DAYS</b>	<b>NONE</b>
<b>SLOPES STEEPER THAN 3:1</b>	<b>7 DAYS</b>	<b>IF SLOPES ARE 10' OR LESS IN LENGTH AND ARE NOT STEEPER THAN 2:1, 14 DAYS ARE ALLOWED.</b>
<b>SLOPES 3:1 OR FLATTER</b>	<b>14 DAYS</b>	<b>7 DAYS FOR SLOPES GREATER THAN 50' IN LENGTH.</b>
<b>ALL OTHER AREAS WITH SLOPES FLATTER THAN 4:1</b>	<b>14 DAYS</b>	<b>NONE, EXCEPT FOR PERIMETERS AND HOW ZONES.</b>

NOTES: Less than 5' - 10' undisturbed buffer from ROW, ditchline, water feature, or drainage inlet, add BMP.

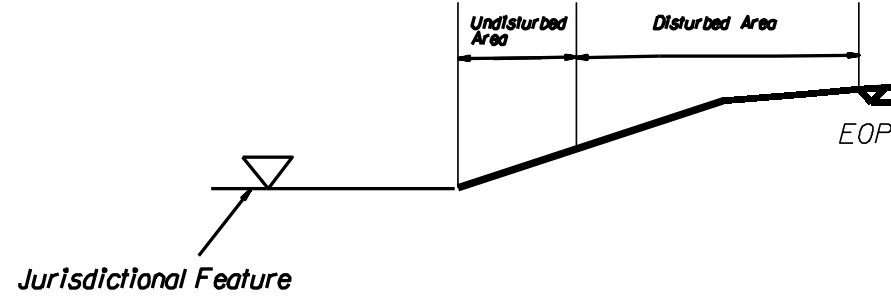
BMP Options: Wattle, Silt Fence, or Hardened Aggregate.

# EROSION CONTROL DETAIL

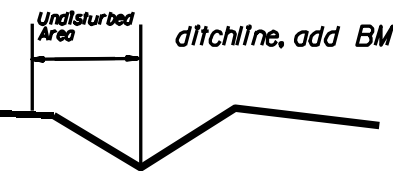
PROJECT REFERENCE NO. <b>1-1111</b>	SHEET NO. <b>10-11/10-11</b>
RDW SHEET NO. ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER



< 5' - 10' Undisturbed buffer from jurisdictional feature add BMP



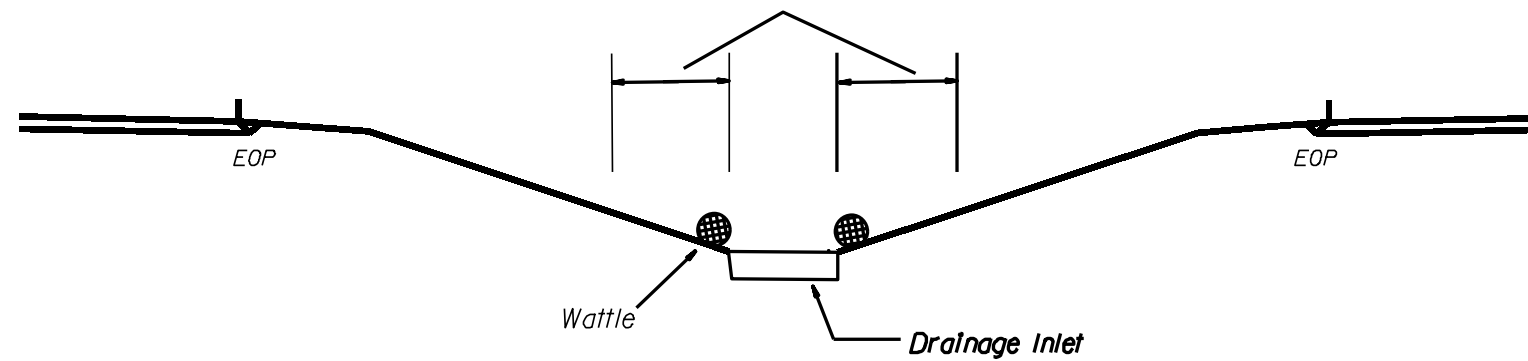
< 5' - 10' Undisturbed buffer from ditchline, add BMP



Use BMP's if shoulders and/or front slopes and/or ditchline and/or back slopes are disturbed

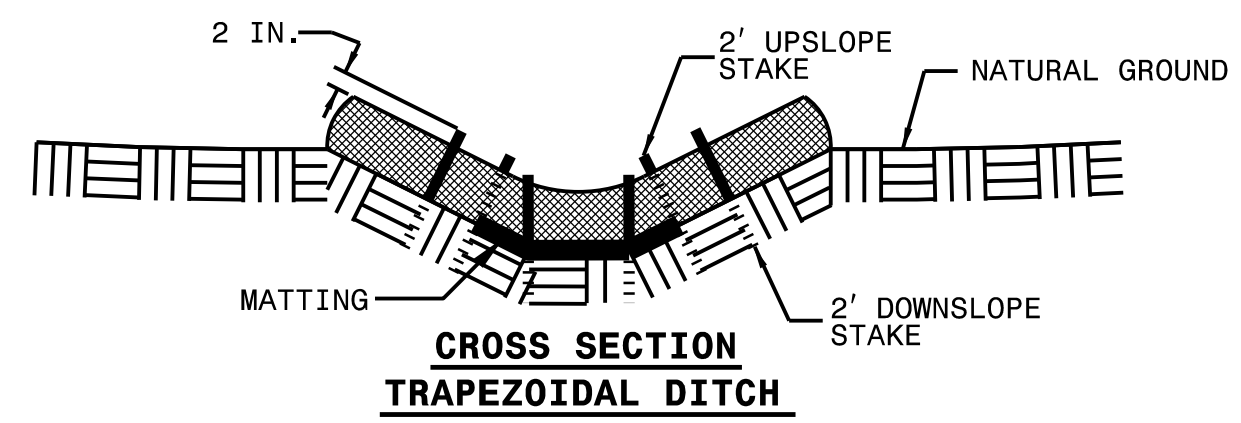
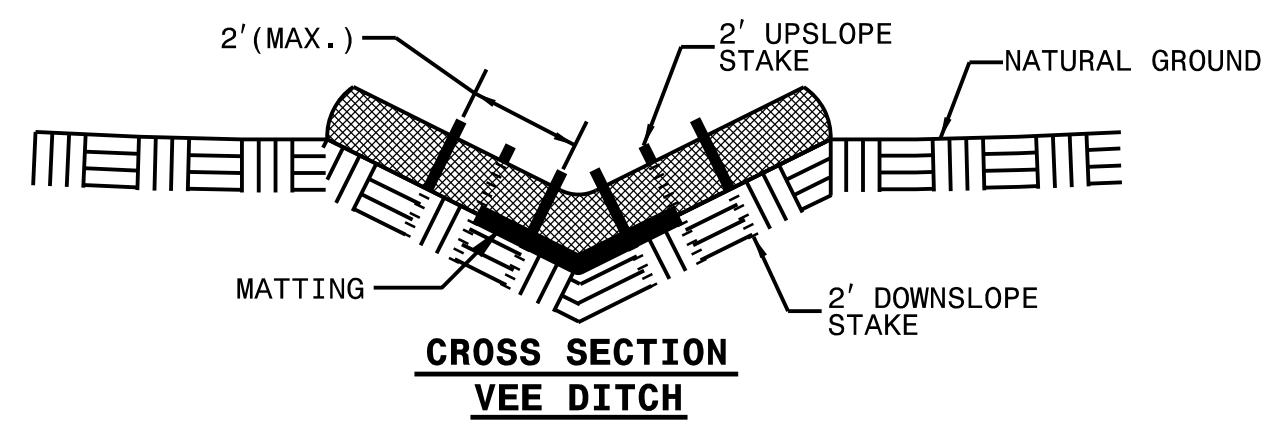
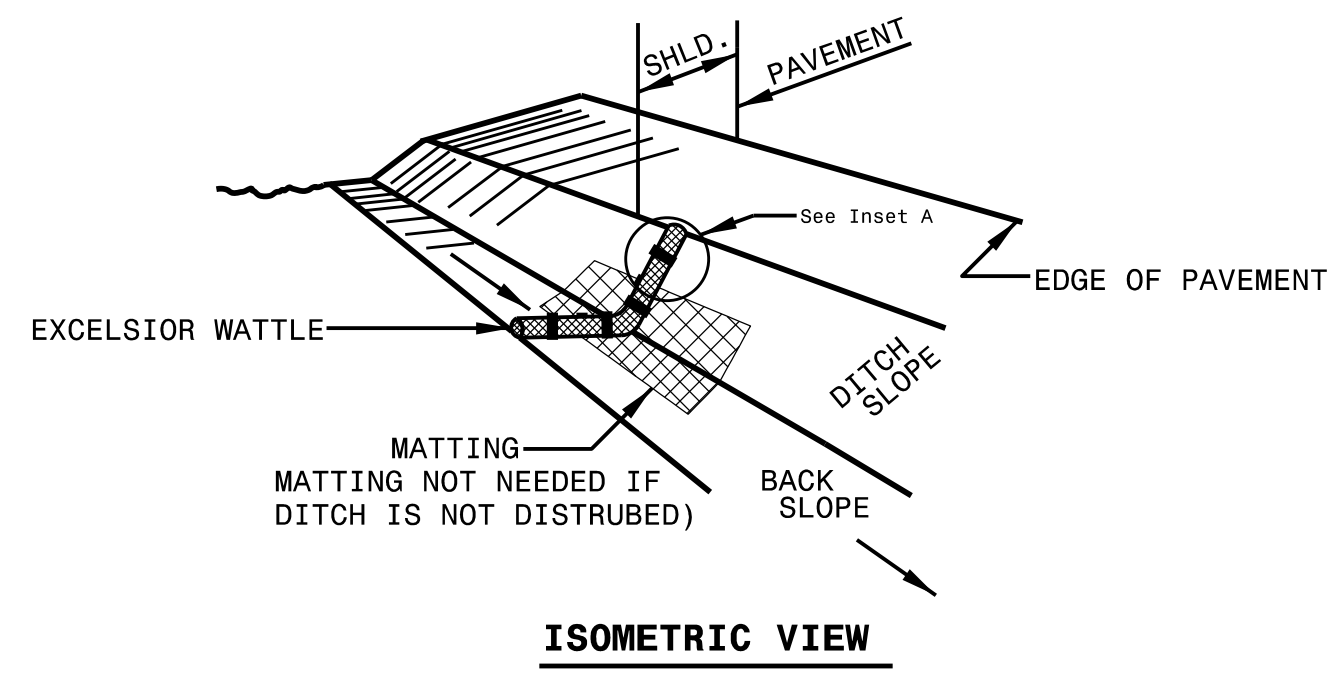


< 5' - 10' Undisturbed buffer from Inlet, add wattle



NOT TO SCALE

# WATTLE DETAIL



**NOTES:**

- USE MINIMUM 12 IN. DIAMETER EXCELSIOR WATTLE.
- USE 2 FT. WOODEN STAKES WITH A 2 IN. BY 2 IN. NOMINAL CROSS SECTION.
- ONLY INSTALL WATTLE(S) TO A HEIGHT IN DITCH SO FLOW WILL NOT WASH AROUND WATTLE AND SCOUR DITCH SLOPES AND AS DIRECTED.
- INSTALL A MINIMUM OF 2 UPSLOPE STAKES AND 4 DOWNSLOPE STAKES AT AN ANGLE TO WEDGE WATTLE TO BOTTOM OF DITCH.
- PROVIDE STAPLES MADE OF 0.125 IN. DIAMETER STEEL WIRE FORMED INTO A U SHAPE NOT LESS THAN 12" IN LENGTH.
- INSTALL STAPLES APPROXIMATELY EVERY 1 LINEAR FOOT ON BOTH SIDES OF WATTLE AND AT EACH END TO SECURE IT TO THE SOIL.
- IF DITCH WILL BE DISTURBED, INSTALL MATTING IN ACCORDANCE WITH SECTION 1631 OF THE STANDARD SPECIFICATIONS.

