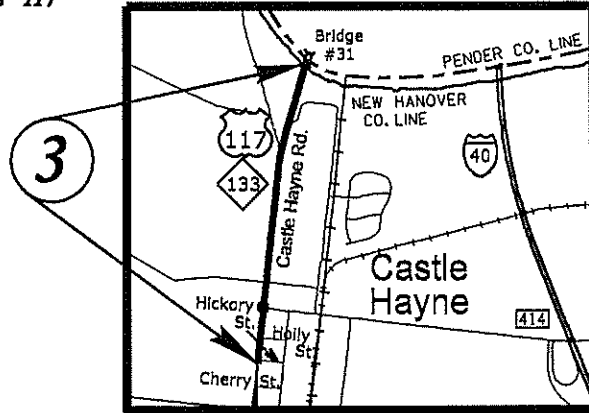


NEW HANOVER & BRUNSWICK COUNTIES

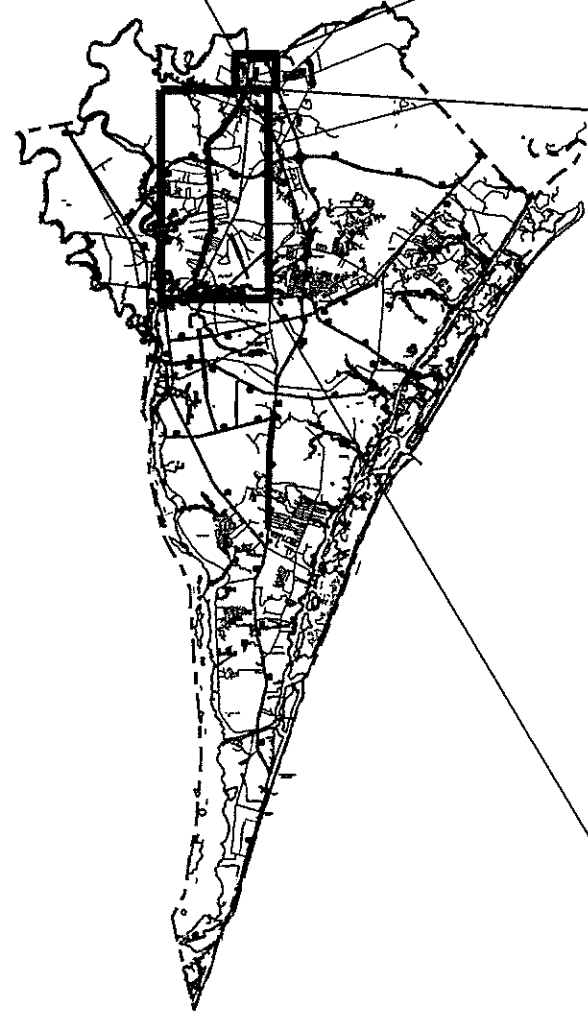
3CR.10651.159
NC 133 /
US 117



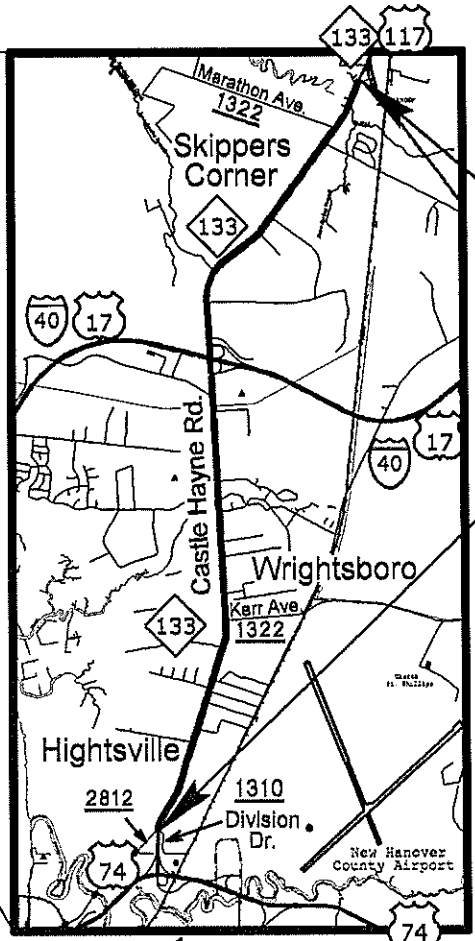
LOCATION: BRUNSWICK CO. - 1 SECTION OF US 17 (NBL & SBL)
NEW HANOVER CO. - 1 SECTION OF NC 133
1 SECTION OF NC 133 /US 117

TYPE OF WORK: RUT FILLING, MICROSURFACING TYPE III, REMOVAL OF
PAVEMENT MARKINGS, THERMOPLASTIC PAVEMENT
MARKINGS & SNOWPLOWABLE MARKERS, ETC.

INDEX OF SHEETS	
SHEET NO.	SHEET
1 & 2	INDEX OF SHEETS & TITLE SHEETS
3 - 6	PAVEMENT SCHEDULE, TYPICAL SECTIONS AND DETAIL SHEETS
7 - 9	SUMMARY OF QUANTITIES

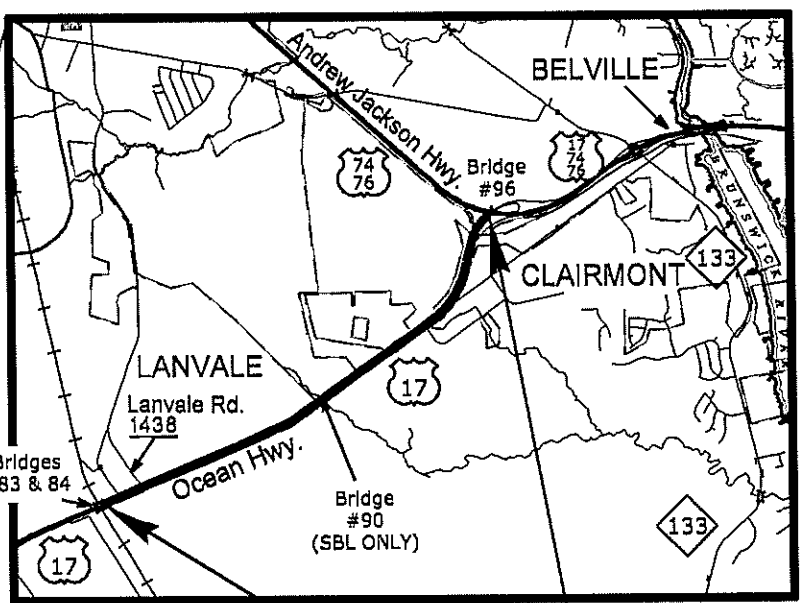


NEW HANOVER
COUNTY



3CR.10651.159
NC 133

2



3CR.10101.159
US 17 (NBL & SBL)

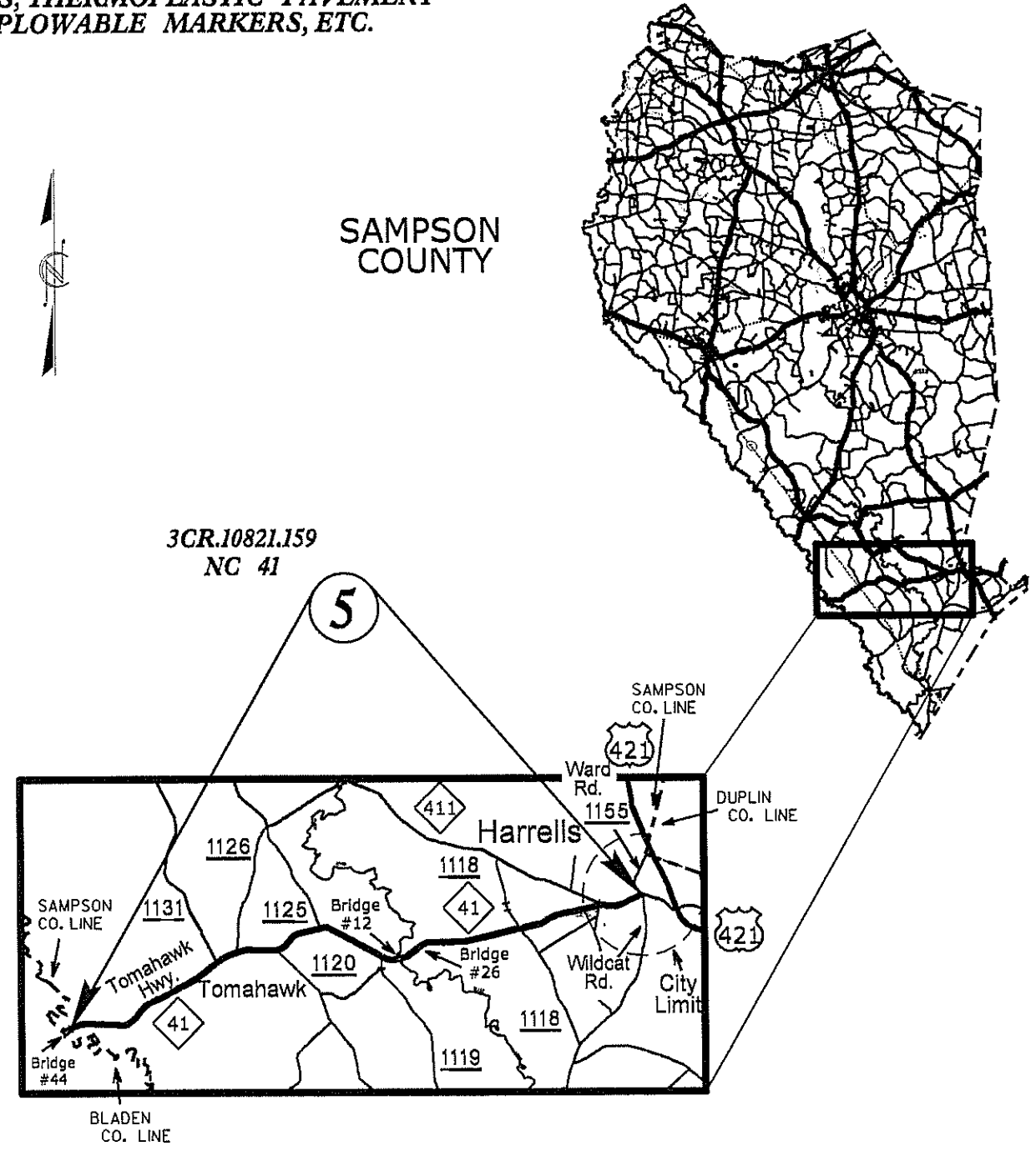
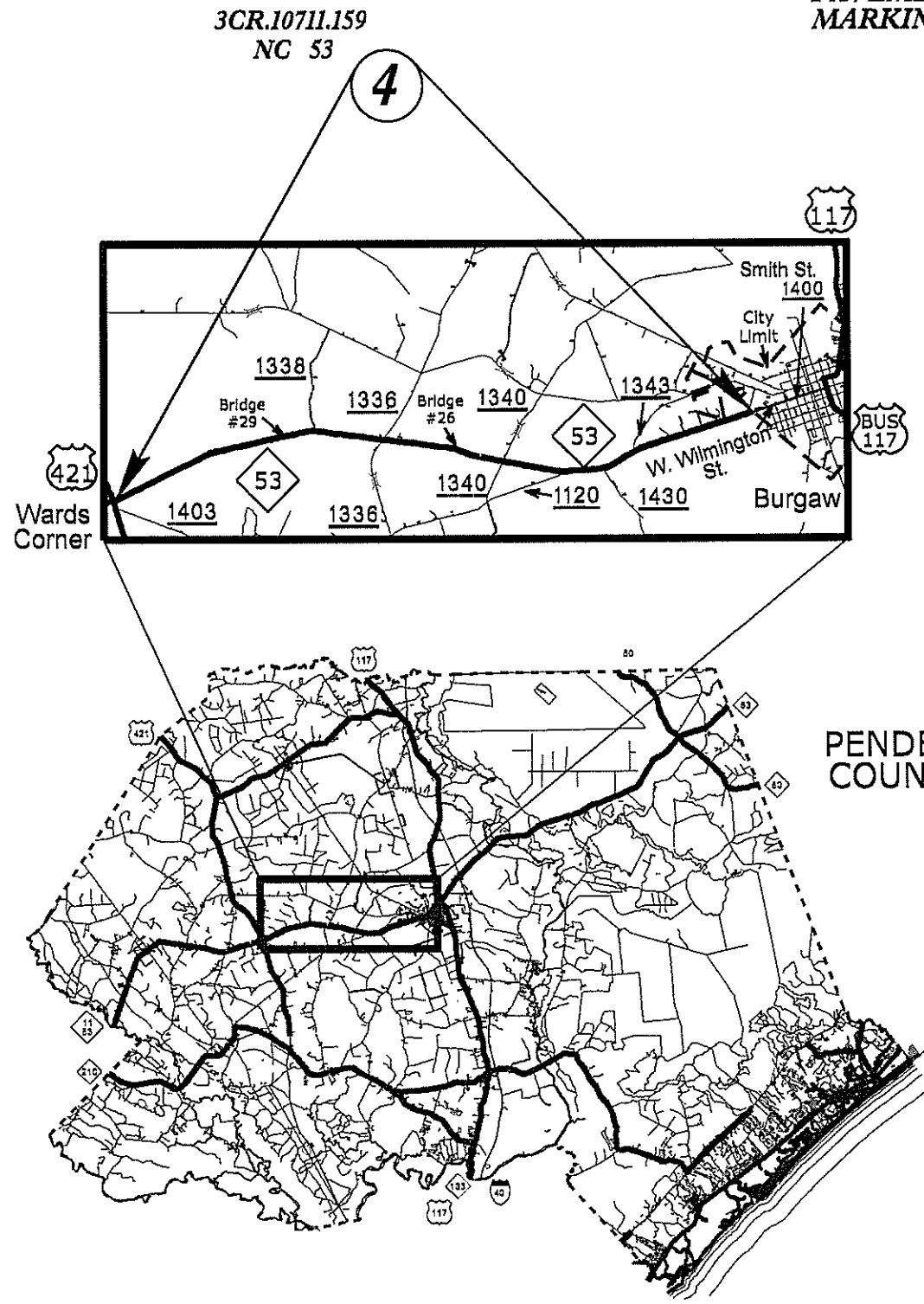
BRUNSWICK
COUNTY

8/17/99
 18-APR-2014 10:51
 C:\MDY\000\1\PROJECTS\2014\159\3CR.10101.159, Etc., Rdy., tsh., 2014.dgn

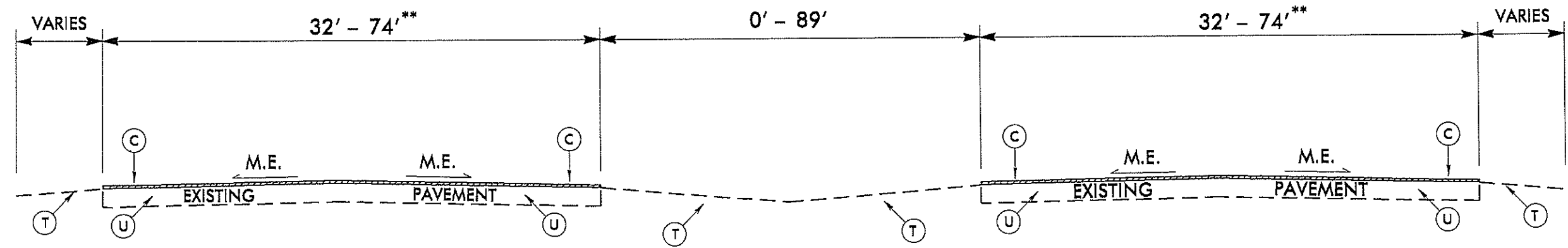
PENDER & SAMPSON COUNTY

LOCATION: PENDER CO. - 1 SECTION OF NC 53
SAMPSON CO. - 1 SECTION OF NC 41

TYPE OF WORK: RUT FILLING, MICROSURFACING TYPE III, REMOVAL OF PAVEMENT MARKINGS, THERMOPLASTIC PAVEMENT MARKINGS & SNOWPLOWABLE MARKERS, ETC.



8/17/99
 M:\APR-2014\1041\PROJECTS\2014\Micro Surfacing\B.N.H.P.\SYROADWAY\Pro\3CR.10101.159, Etc.,Rel.,tah_2014.dgn
 15-APR-2014 10:41 AM
 DT:ADY\BDC\YFC\TSCA\2014\1041\PROJECTS\2014\Micro Surfacing\B.N.H.P.\SYROADWAY\Pro\3CR.10101.159, Etc.,Rel.,tah_2014.dgn

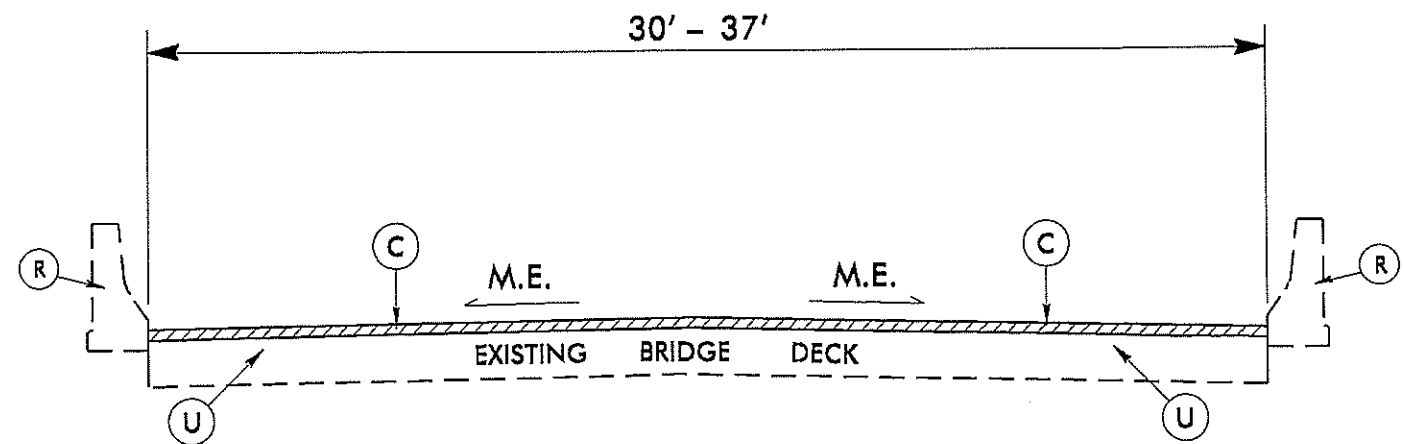


** WIDTHS INCLUDE
PAVED SHOULDERS

TYPICAL SECTION NO. 1

MAP NO. 1
US 17 (BRUNSWICK CO.)
NBL - MP 39.97 TO MP 43.90
SBL - MP 3.24 TO MP 7.17

RUT FILLING
NBL - MP 42.87 TO MP 43.90
SBL - MP 3.24 TO MP 7.17
(SEE RUT FILLING DETAIL)



TYPICAL SECTION NO. 2

MAP NO. 1
US 17 (SBL ONLY)
BRIDGE #90 (BRUNSWICK CO.)
MP 4.94 - MP 4.95

MAP NO. 3
NC 133 /JS 117
BRIDGE #31
(PENDER CO.) MP 0.06 - MP 0.00
(NEW HANOVER CO.) MP 15.58 - MP 15.64

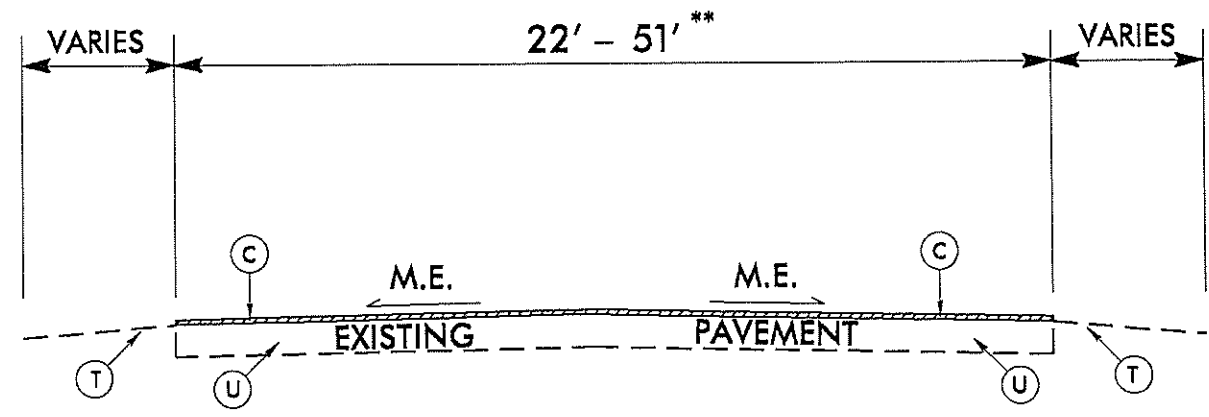
MAP NO. 4
NC 53
BRIDGE #26 (PENDER CO.)
MP 24.96 - MP 25.00

PAVEMENT SCHEDULE	
C	PROP. LATEX MODIFIED MICRO-SURFACING, TYPE III 22 TO 28 LBS. PER SQ.YD.
R	EXISTING CONCRETE BRIDGE RAIL
T	EXISTING EARTH MATERIAL
U	EXISTING PAVEMENT

M.E. = MATCH EXISTING

REVISIONS

8/17/99
 E:\NH_P\S\ROADWAY\Proj\3CR.10101.159, Etc. Rel. typ. 2014.dgn
 14-APR-2014 13:52
 C:\HDS\000\The Project\3CR.10101.159, Etc. Rel. typ. 2014.dgn



** WIDTHS INCLUDE
PAVED SHOULDERS

TYPICAL SECTION NO. 3

MAP NO. 2
NC 133 (NEW HANOVER CO.)
MP 3.37 TO MP 9.73

RUT FILLING
MP 3.39 TO MP 5.39
MP 7.40 TO MP 8.19
(SEE RUT FILLING DETAIL)

MAP NO. 3
NC 133 /US 117 (NEW HANOVER CO.)
MP 14.72 TO MP 15.57

MAP NO. 4
NC 53 (PENDER CO.)
MP 19.36 TO MP 27.10
(NO WORK - PENDER BRIDGE #29
MP 22.90 - MP 22.92)

MAP NO. 5
NC 41 (SAMPSON CO.)
MP 0.03 TO MP 10.34
(NO WORK - SAMPSON BRIDGE #26
MP 3.87 - MP 3.92 & SAMPSON
BRIDGE #12 MP 4.26 - MP 4.31)

PAVEMENT SCHEDULE	
C	PROP. LATEX MODIFIED MICRO-SURFACING, TYPE III 22 TO 28 LBS. PER SQ.YD.
T	EXISTING EARTH MATERIAL
U	EXISTING PAVEMENT

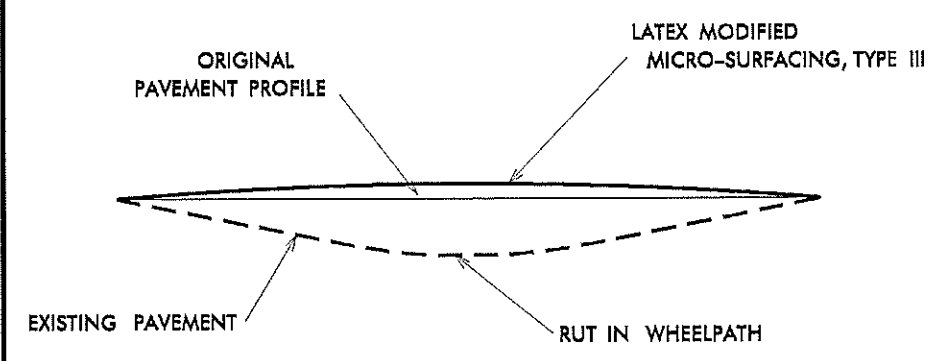
M.E. = MATCH EXISTING

REVISIONS

8/17/99
 B:\NH.P.S.\ROADWAY\2004\3CR.10101.159.Etc.\Relyp.typ_2014.dgn
 14-APR-2014 13:51
 D:\RDY\DDC\RE\TREAT_2014\2014_Micro Surfacing\11-11-14\2414.dgn

RUT FILLING FOR MICROSURFACING & HI-VISIBILITY CROSSWALK DETAILS

REPROFILING RUTTED WHEELPATHS WITH MICRO-SURFACING

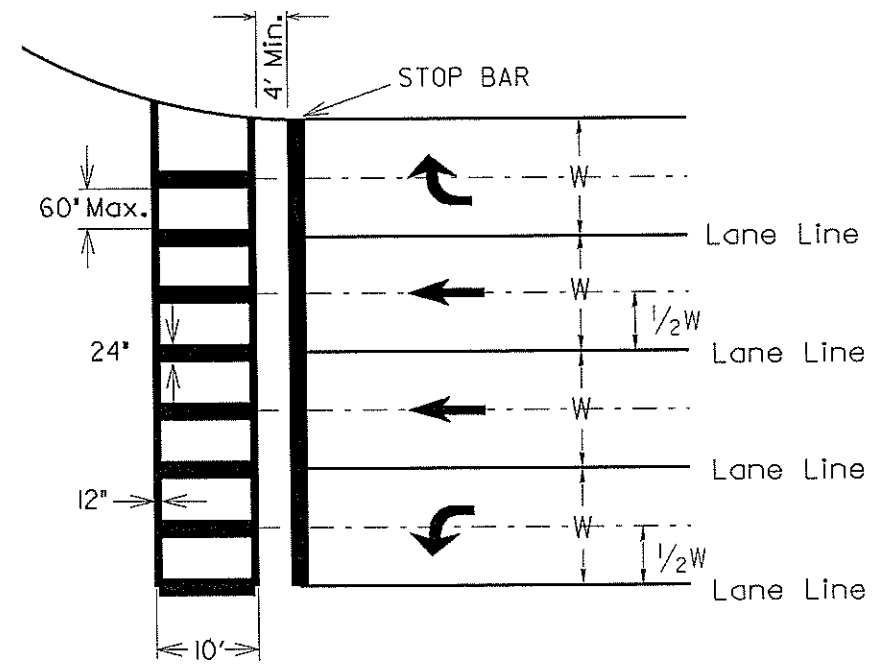


REPROFILING RUTTED WHEELPATHS WITH MICRO-SURFACING

RULE OF THUMB: FOR EVERY INCH (mm) OF MICRO-SURFACING MIX, ADD 0.125 IN. (3.2 mm) TO 0.25 IN. (6.4 mm) AS A CROWN TO ALLOW FOR COMPACTION UNDER TRAFFIC.

RUT FILLING WILL BE MEASURED AND PAID AT THE CONTRACT UNIT PRICE PER GALLON FOR LATEX MODIFIED EMULSION AND AT THE CONTRACT UNIT PRICE PER TON OF AGGREGATE, TYPE III.

SPECIAL EMPHASIS HI-VISIBILITY CROSSWALK MARKING DETAIL



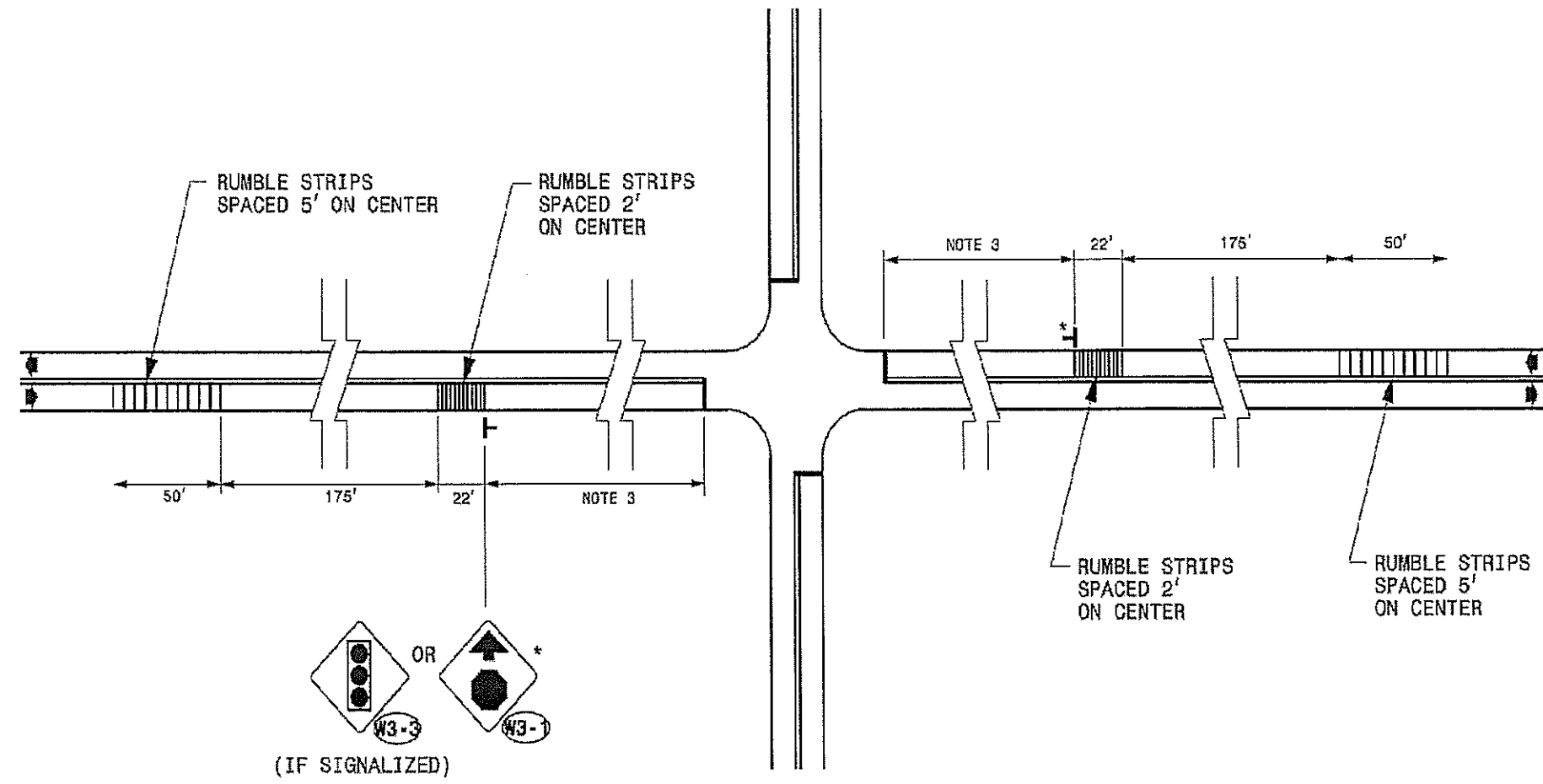
NOTES: SPACING OF CROSSWALK LINES POSITIONED TO AVOID WHEELPATHS

REVISIONS

14-APR-2014 14:49
 01-MDY-0001-VIS-CPG-12-2014
 B.N.H. P. S. ROADWAY Proj. 3CR.10101.159, Etc. Rdj...tip...2014.dgn
 8/17/99

8/17/99

REVISIONS



GENERAL NOTES:

1. ALL RUMBLE STRIPS SHALL BE CENTERED IN THE LANE AND SHALL BE 2 FEET LESS THAN THE WIDTH OF THE TRAVEL LANE
2. RUMBLE STRIPS SHALL BE PLACED USING 4" x 240 MIL WHITE THERMOPLASTIC PAVEMENT MARKING MATERIAL.
3. PLACEMENT OF STOP-AHEAD (W3-1) OR SIGNAL-AHEAD (W3-3) SIGNS SHALL COMPLY WITH THE 2009 MUTCD SECTION 5C.04.

SHEET 1 OF 1

ENGLISH STANDARD DRAWING FOR
TWO-LANE, TWO-WAY THERMOPLASTIC
RUMBLE STRIPS

11-13

STATE OF
NORTH CAROLINA
DEPT. OF TRANSPORTATION
DIVISION OF HIGHWAYS
RALEIGH, N.C.

07-APR-2014 11:58
 C:\PROJ\B00\REV\STATE\2014\2014_Micro Surfacing
 B.N.H.P. SARDONMAY\Proj\3CR.10101.159_Etc...Rdy...typ_2014.dgn

PROJECT NO.	SHEET NO.	TOTAL NO.
3CR.10101.159, Etc.	7	

SUMMARY OF QUANTITIES

PROJECT NO	COUNTY	MAP NO	ROUTE	DESCRIPTION	TYP	LANES	LANE TYPE	FINAL SURFACE TESTING REQUIRED	WARM MIX ASPHALT REQUIRED	LENGTH MI	WIDTH FT	AGGREGATE, TYPE III TON	LATEX MODIFIED EMULSION GAL	LATEX MODIFIED MICROSURFACING, TYPE III SY	ADJUSTMENT OF DROP INLET EA	PORTABLE LIGHTING LS	INDUCTIVE LOOP SAWCUT LF	LEAD-IN CABLE (14-2) LF
3CR.10101.159	Brunswick	1	US 17 NBL & SBL	MICROSURFACING & RUT FILING FROM BRIDGE # 96 ON US 74/76 (ANDREW JACKSON HWY) TO 0.88 MI. WEST OF SR 1438 (LANVALE RD.)	1&2	4	M2	NO	NO	3.93	32 - 74	470	8,601	179,940		0.30	175	25
TOTAL FOR MAP NO. 1										3.93		470	8,601	179,940		0.30	175	25
TOTAL FOR PROJ NO. 3CR.10101.159										3.93		470	8,601	179,940		0.30	175	25
3CR.10651.159	NewHanover	2	NC 133 (CASTLE HAYNE RD.)	MICROSURFACING & RUT FILING FROM SR 1310 (DIVISION DR.) TO 0.11 MI. NORTH OF SR 1337 (MARATHON AVE.)	3	2	M2	NO	NO	6.36	23 - 46	259	4,738	115,000		0.60	175	25
TOTAL FOR MAP NO. 2										6.36		259	4,738	115,000		0.60	175	25
3CR.10651.159	NewHanover	3	NC 133 / US 117 (CASTLE HAYNE RD.)	CO. LINE TO 0.01 MI. SOUTH OF HICKORY ST. (NON-SYSTEM) IN CASTLE HAYNE	2&3	2	M2	NO	NO	0.98	24 - 51			17,182	2	0.10	175	25
TOTAL FOR MAP NO. 3										0.98				17,182	2	0.10	175	25
TOTAL FOR PROJ NO. 3CR.10651.159										7.34		259	4,738	132,182	2	0.70	350	50
3CR.10711.159	Pender	4	NC 53	MICROSURFACING FROM 0.023 MI. EAST OF US 421 INTERSECTION TO 0.53 MI. WEST OF SR 1400 (SMITH ST.) NOTE: THERMO RUMBLE STRIPS IN VICINITY OF US 421	2&3	2	2WU	NO	NO	7.74	23 - 46			126,000			175	25
TOTAL FOR MAP NO. 4										7.74				126,000			175	25
TOTAL FOR PROJ NO. 3CR.10711.159										7.74				126,000			175	25
3CR.10821.159	Sampson	5	NC 41 (TOMAHAWK HWY.)	MICROSURFACING FROM 0.013 MI. WEST OF SR 1155 (WARD RD.) IN HARRELLS TO BLADEN CO. LINE	3	2	2WU	NO	NO	10.34	22 - 47			179,000				
TOTAL FOR MAP NO. 5										10.34				179,000				
TOTAL FOR PROJ NO. 3CR.10821.159										10.34				179,000				
GRAND TOTAL										29.35		729	13,339	617,122	2	1.00	700	100

PROJECT NO.	SHEET NO.	TOTAL NO.
3CR.10101.159, Etc.	8	

THERMOPLASTIC AND PAINT QUANTITIES

PROJECT NO	COUNTY	MAP NO	ROUTE	DESCRIPTION	TYP	LANES	LANE TYPE	LENGTH	WIDTH	4413000000-E	4415000000-N	4420000000-N	4457000000-N	4480000000-N	4510000000-N	4685000000-E		4686000000-E		4687000000-E	4695000000-E	4700000000-E	4702000000-E	4710000000-E	4721000000-E				4725000000-E				4810000000-E									
										WORK ZONE ADVANCE/GENERAL WARNING SIGNING	FLASHING ARROW BOARD	PORTABLE CHANGEABLE MESSAGE SIGN	TEMPORARY TRAFFIC CONTROL	TMA	LAW ENFORCEMENT	4" X 90 M WHITE THERMO	4" X 90 M YELLOW THERMO	4" X 120 M WHITE THERMO	4" X 120 M YELLOW THERMO	THERMOPLASTIC PAVEMENT MARKING LINES (4", 240 MILS)	8" X 90 M WHITE THERMO	12" X 90 M YELLOW THERMO	12" X 120 M WHITE THERMO	24" X 120 M WHITE THERMO	THERMO MSG ONLY 120 M	THERMO MSG SCHOOL 120 M	THERMO LT ARROW 90 M	THERMO STR ARROW 90 M	THERMO RT ARROW 90 M	THERMO STR & RT ARROW 90 M	MERGE ARROW 90 M	U-TURN ARROW LEFT 90 M	4" WHITE PAINT	4" YELLOW PAINT								
NO		NO			NO					SF	EA	EA	LS	EA	HR	LF	LF	LF	LF	LF	LF	LF	EA	EA	EA	EA	EA	EA	EA	EA	EA	EA	EA	EA	EA							
3CR.10101.159	Brunswick	1	US 17 NBL & SBL	MICROSURFACING & RUT FILING FROM BRIDGE # 96 ON US 74/76 (ANDREW JACKSON HWY) TO 0.88 MI. WEST OF SR 1436 (LANVALE RD.)	1&2	4	M2	3.93	32 - 74	126	1	1	0.26	1	720	83,393	41,697	23,713		8,739	371			1,350	92		72	162	29	1	3	44	107,106	41,697								
TOTAL FOR MAP NO. 1									3.93	126	1	1	0.26	1	720	83,393	41,697	23,713		8,739	371			1,350	92		72	162	29	1	3	44	107,106	41,697								
TOTAL FOR PROJ NO. 3CR.10101.159									3.93	126	1	1	0.26	1	720	83,393	41,697	23,713		8,739	371								92			72	162	29	1	3	44	107,106	41,697			
																125,090		23,713																		148,803						
3CR.10651.159	NewHanover	2	NC 133 (CASTLE HAYNE RD.)	MICROSURFACING & RUT FILING FROM SR 1310 (DIVISION DR.) TO 0.11 MI. NORTH OF SR 1337 (MARATHON AVE.)	3	2	M2	6.36	23 - 45	736	1	1	0.19	1	200	65,504		7,874	61,733		418	1,153	55	708	8	12	77	26	26	1	6		73,378	61,733								
TOTAL FOR MAP NO. 2									6.36	736	1	1	0.19	1	200	65,504		7,874	61,733		418	1,153	55	708	8	12	77	26	26	1	6				73,378	61,733						
3CR.10651.159	NewHanover	3	NC 133 / US 117 (CASTLE HAYNE RD.)	MICROSURFACING FROM PENDER CO. LINE TO 0.01 MI. SOUTH OF HICKORY ST. (NON-SYSTEM) IN CASTLE HAYNE	2&3	2	M2	0.98	24 - 51	112	1	1	0.03	1	40	9,172		563	8,054			15		109			8	2	5			9,735	8,054									
TOTAL FOR MAP NO. 3									0.98	112	1	1	0.03	1	40	9,172		563	8,054			15		109					8	2	5				9,735	8,054						
TOTAL FOR PROJ NO. 3CR.10651.159									7.34	848	2	2	0.22	2	240	74,676		8,437	69,787		418	1,168	55	817					8	12	85	28	31	1	6		83,113	69,787				
																74,676		78,224																		152,900						
3CR.10711.159	Pender	4	NC 53	MICROSURFACING FROM 0.023 MI. EAST OF US 421 INTERSECTION TO 0.53 MI. WEST OF SR 1400 (SMITH ST.) NOTE: THERMO RUMBLE STRIPS IN VICINITY OF US 421	2&3	2	2WU	7.74	23 - 45	868	1		0.22	1	40	81,808		2,140	44,060	144		286		100			12	24				83,948	44,060									
TOTAL FOR MAP NO. 4									7.74	868	1		0.22	1	40	81,808		2,140	44,060	144		286		100					12	24					83,948	44,060						
TOTAL FOR PROJ NO. 3CR.10711.159									7.74	868	1		0.22	1	40	81,808		2,140	44,060	144		286		100						12	24										128,008	
																81,808		46,200																								
3CR.10821.159	Sampson	5	NC 41 (TOMAHAWK HWY.)	MICROSURFACING FROM 0.013 MI. WEST OF SR 1155 (WARD RD.) IN HARRELLS TO BLADEN CO. LINE	3	2	2WU	10.34	22 - 47	1,163			0.30			108,398		345	72,709			50					3	3	3	2		108,743	72,709									
TOTAL FOR MAP NO. 5									10.34	1,163			0			108,398		345	72,709			50									3	3	3	2		108,743	72,709					
TOTAL FOR PROJ NO. 3CR.10821.159									10.34	1,163			0			108,398		345	72,709			50											3	3	3	2		108,743	72,709			
																108,398		73,054																			181,452					
GRAND TOTAL									29.35	3,005	4	3	1	4	1,000	348,275	41,697	34,635	186,556	144	9,157	1,875	55	2,267	100	24	184	193	69	4	9	44		382,910	228,253							
																389,972		221,191																				611,163				

