

09/28/09

See Sheet 1-A For Index of Sheets

STATE OF NORTH CAROLINA  
DIVISION OF HIGHWAYS

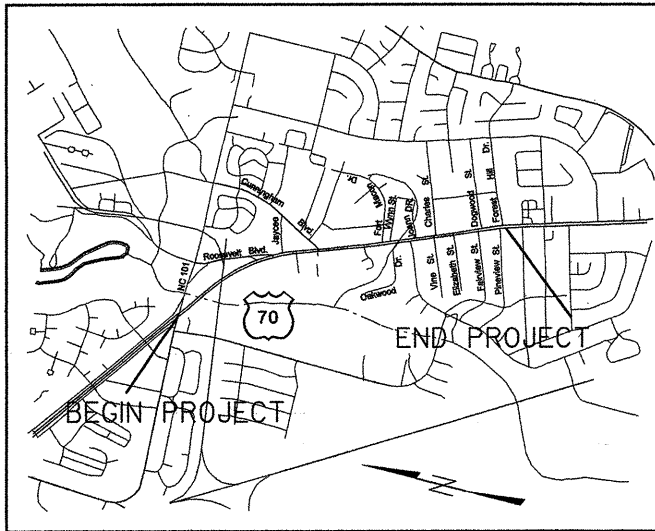
**CRAVEN COUNTY**

LOCATION: US 70 FROM NC 101 TO FOREST HILL DR. IN HAVELOCK

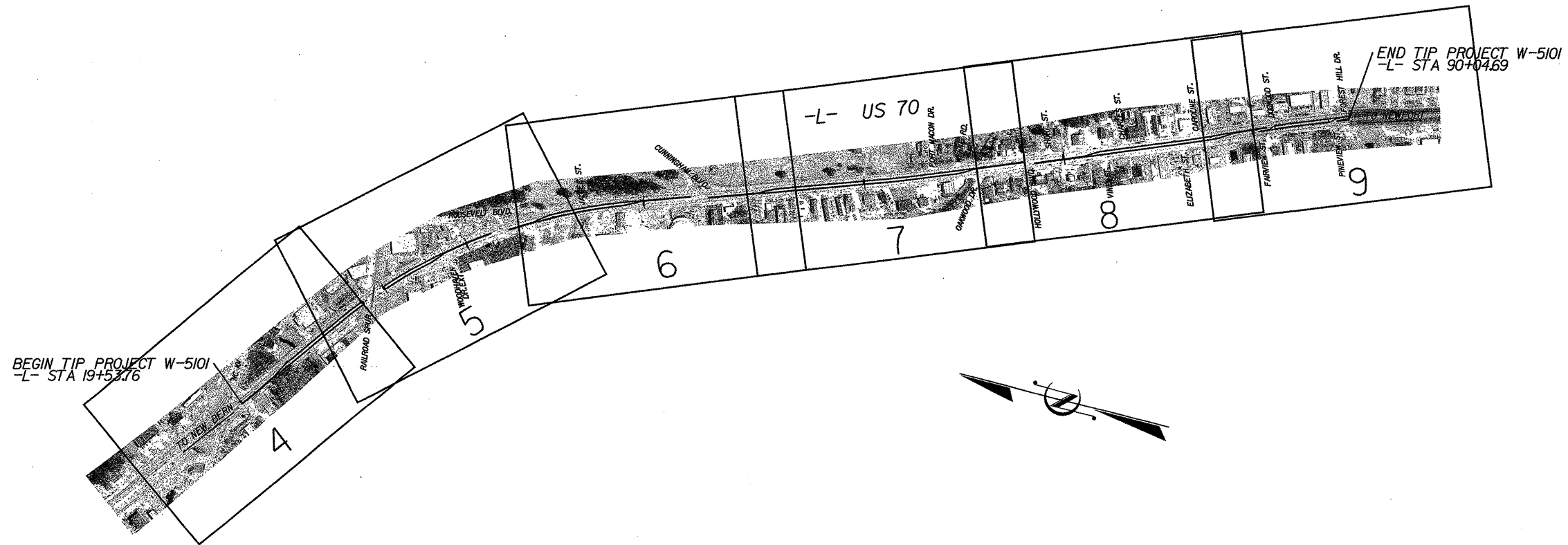
TYPE OF WORK: CONSTRUCT RAISED MEDIAN

STATE	STATE PROJECT REFERENCE NO.	SHEET NO.	TOTAL SHEETS
N.C.	W-5101	1	
STATE PROJ. NO.	F.A. PROJ. NO.	DESCRIPTION	
41858.1.1		P. E.	
41858.3.1		CONST.	

TIP PROJECT: W-5101



VICINITY MAP



GRAPHIC SCALES



PROJECT LENGTH

LENGTH ROADWAY TIP PROJECT W-5101 = 1.355 MI  
TOTAL LENGTH TIP PROJECT W-5101 = 1.355 MI

Prepared in the Office of:  
**DIVISION OF HIGHWAYS**

1704 N. Greene St., Greenville, NC 27834

2006 STANDARD SPECIFICATIONS

RIGHT OF WAY DATE:  
NA

LETTING DATE:  
November 18, 2008

DWAYNE H. ALLIGOOD, PE  
PROJECT ENGINEER

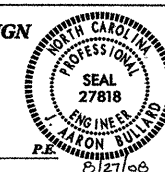
J. AARON BULLARD, PE  
PROJECT DESIGN ENGINEER

HYDRAULICS ENGINEER

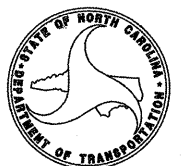
SIGNATURE: P.E.

ROADWAY DESIGN ENGINEER

SIGNATURE: J. Bullard



DIVISION OF HIGHWAYS  
STATE OF NORTH CAROLINA

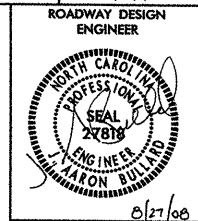


STATE HIGHWAY DESIGN ENGINEER P.E.

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mjackson AT D2CAD24585

8/17/99

PROJECT REFERENCE NO.	SHEET NO.
W-5101	1-A



SHEET NUMBER	INDEX OF SHEETS SHEET
1	TITLE SHEET
1-A	INDEX OF SHEETS, GENERAL NOTES, AND LIST OF STANDARD DRAWINGS
1-B	CONVENTIONAL SYMBOLS
1-C	<b>MAPS</b>
2	PAVEMENT SCHEDULE AND TYPICAL SECTIONS
3	SUMMARY OF QUANTITIES
4 THRU 9	PLAN SHEETS

GENERAL NOTES: 2006 SPECIFICATIONS  
 EFFECTIVE: 07-18-06  
 REVISED: 07-30-08

SUBSURFACE PLANS:  
 NO SUBSURFACE PLANS ARE AVAILABLE ON THIS PROJECT. THE CONTRACTOR SHOULD MAKE HIS OWN INVESTIGATION AS TO THE SUBSURFACE CONDITIONS.

2006 ROADWAY ENGLISH STANDARD DRAWINGS  
 EFF. 07-18-06  
 REV. 01-02-07

The following Roadway Standards as appear in "Roadway Standard Drawings" Highway Design Branch - N. C. Department of Transportation - Raleigh, N. C., Dated July 18, 2006 are applicable to this project and by reference hereby are considered a part of these plans:

STD. NO.	TITLE
DIVISION 8 - INCIDENTALS	
846.01	Concrete Curb, Gutter and Curb & Gutter
852.01	Concrete Islands

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3/15/06

**Note: Not to Scale**

\*S.U.E. = *Subsurface Utility Engineering*

STATE OF NORTH CAROLINA  
DIVISION OF HIGHWAYS

# CONVENTIONAL PLAN SHEET SYMBOLS

**BOUNDARIES AND PROPERTY:**

State Line	-----
County Line	-----
Township Line	-----
City Line	-----
Reservation Line	-----
Property Line	-----
Existing Iron Pin	○
Property Corner	⊗
Property Monument	⊠
Parcel/Sequence Number	(23)
Existing Fence Line	-----
Proposed Woven Wire Fence	-----
Proposed Chain Link Fence	-----
Proposed Barbed Wire Fence	-----
Existing Wetland Boundary	-----
Proposed Wetland Boundary	-----
Existing Endangered Animal Boundary	-----
Existing Endangered Plant Boundary	-----

**BUILDINGS AND OTHER CULTURE:**

Gas Pump Vent or U/G Tank Cap	○
Sign	⊙
Well	⊙
Small Mine	⊗
Foundation	⊠
Area Outline	⊠
Cemetery	⊠
Building	⊠
School	⊠
Church	⊠
Dam	⊠

**HYDROLOGY:**

Stream or Body of Water	-----
Hydro, Pool or Reservoir	-----
Jurisdictional Stream	-----
Buffer Zone 1	-----
Buffer Zone 2	-----
Flow Arrow	-----
Disappearing Stream	-----
Spring	-----
Wetland	-----
Proposed Lateral, Tail, Head Ditch	-----
False Sump	-----

**RAILROADS:**

Standard Gauge	-----
RR Signal Milepost	-----
Switch	-----
RR Abandoned	-----
RR Dismantled	-----

**RIGHT OF WAY:**

Baseline Control Point	◆
Existing Right of Way Marker	△
Existing Right of Way Line	-----
Proposed Right of Way Line	-----
Proposed Right of Way Line with Iron Pin and Cap Marker	-----
Proposed Right of Way Line with Concrete or Granite Marker	-----
Existing Control of Access	⊙
Proposed Control of Access	⊙
Existing Easement Line	-----
Proposed Temporary Construction Easement	-----
Proposed Temporary Drainage Easement	-----
Proposed Permanent Drainage Easement	-----
Proposed Permanent Utility Easement	-----

**ROADS AND RELATED FEATURES:**

Existing Edge of Pavement	-----
Existing Curb	-----
Proposed Slope Stakes Cut	-----
Proposed Slope Stakes Fill	-----
Proposed Wheel Chair Ramp	-----
Existing Metal Guardrail	-----
Proposed Guardrail	-----
Existing Cable Guiderail	-----
Proposed Cable Guiderail	-----
Equality Symbol	⊕
Pavement Removal	-----

**VEGETATION:**

Single Tree	⊙
Single Shrub	⊙
Hedge	-----
Woods Line	-----
Orchard	-----
Vineyard	-----

**EXISTING STRUCTURES:**

<b>MAJOR:</b>	
Bridge, Tunnel or Box Culvert	-----
Bridge Wing Wall, Head Wall and End Wall	-----
<b>MINOR:</b>	
Head and End Wall	-----
Pipe Culvert	-----
Footbridge	-----
Drainage Box: Catch Basin, DI or JB	-----
Paved Ditch Gutter	-----
Storm Sewer Manhole	⊙
Storm Sewer	-----

**UTILITIES:**

<b>POWER:</b>	
Existing Power Pole	●
Proposed Power Pole	○
Existing Joint Use Pole	●
Proposed Joint Use Pole	○
Power Manhole	⊙
Power Line Tower	⊠
Power Transformer	⊠
U/G Power Cable Hand Hole	⊠
H-Frame Pole	●
Recorded U/G Power Line	-----
Designated U/G Power Line (S.U.E.*)	-----

**TELEPHONE:**

Existing Telephone Pole	●
Proposed Telephone Pole	○
Telephone Manhole	⊙
Telephone Booth	⊠
Telephone Pedestal	⊠
Telephone Cell Tower	⊠
U/G Telephone Cable Hand Hole	⊠
Recorded U/G Telephone Cable	-----
Designated U/G Telephone Cable (S.U.E.*)	-----
Recorded U/G Telephone Conduit	-----
Designated U/G Telephone Conduit (S.U.E.*)	-----
Recorded U/G Fiber Optics Cable	-----
Designated U/G Fiber Optics Cable (S.U.E.*)	-----

**WATER:**

Water Manhole	⊙
Water Meter	⊙
Water Valve	⊙
Water Hydrant	⊙
Recorded U/G Water Line	-----
Designated U/G Water Line (S.U.E.*)	-----
Above Ground Water Line	-----

**TV:**

TV Satellite Dish	⊙
TV Pedestal	⊠
TV Tower	⊙
U/G TV Cable Hand Hole	⊠
Recorded U/G TV Cable	-----
Designated U/G TV Cable (S.U.E.*)	-----
Recorded U/G Fiber Optic Cable	-----
Designated U/G Fiber Optic Cable (S.U.E.*)	-----

**GAS:**

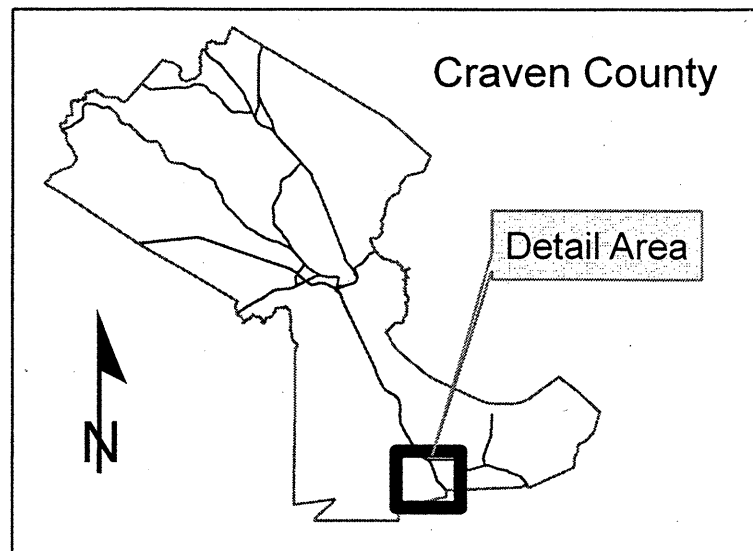
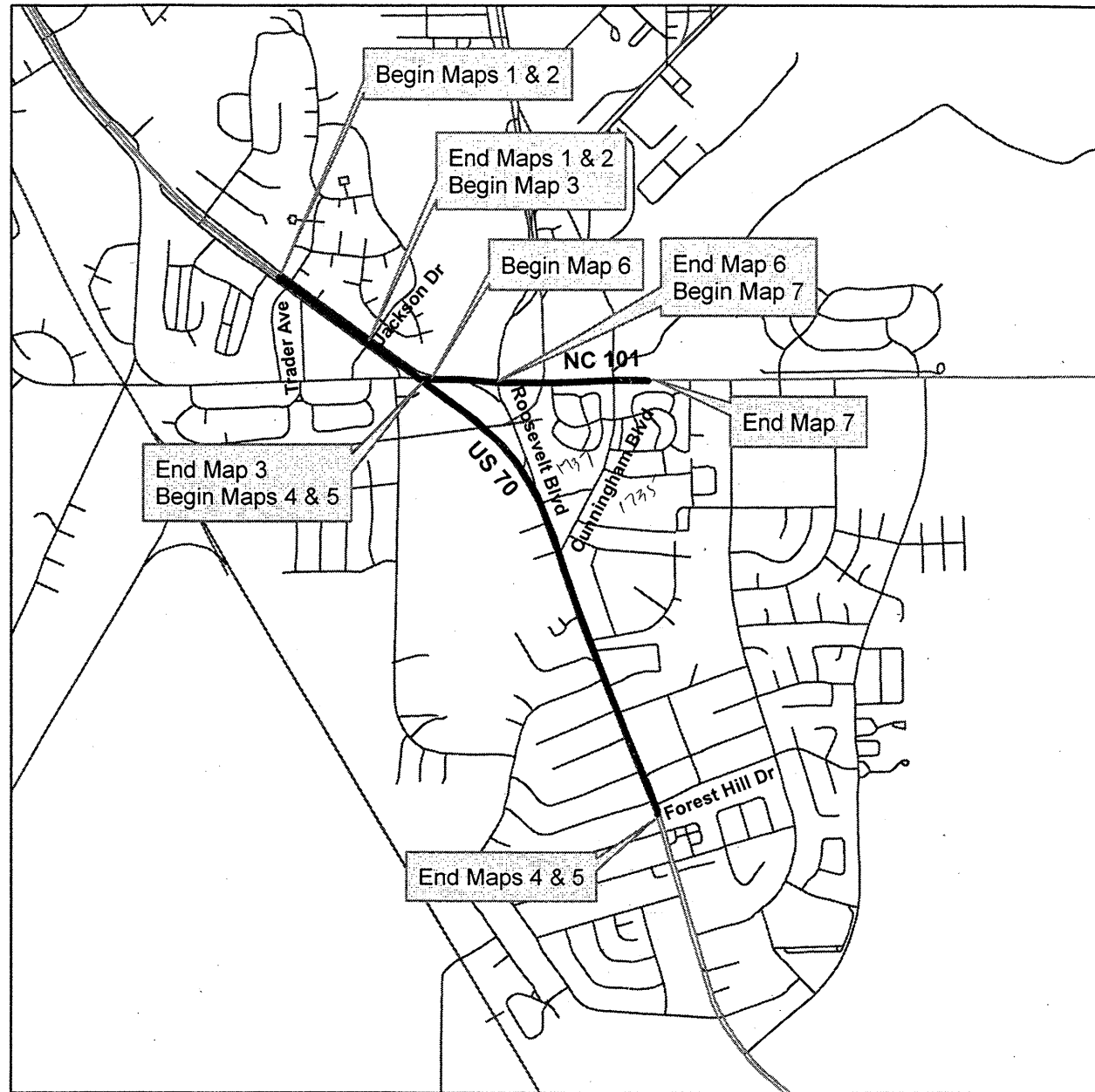
Gas Valve	⊙
Gas Meter	⊙
Recorded U/G Gas Line	-----
Designated U/G Gas Line (S.U.E.*)	-----
Above Ground Gas Line	-----

**SANITARY SEWER:**

Sanitary Sewer Manhole	⊙
Sanitary Sewer Cleanout	⊙
U/G Sanitary Sewer Line	-----
Above Ground Sanitary Sewer	-----
Recorded SS Forced Main Line	-----
Designated SS Forced Main Line (S.U.E.*)	-----

**MISCELLANEOUS:**

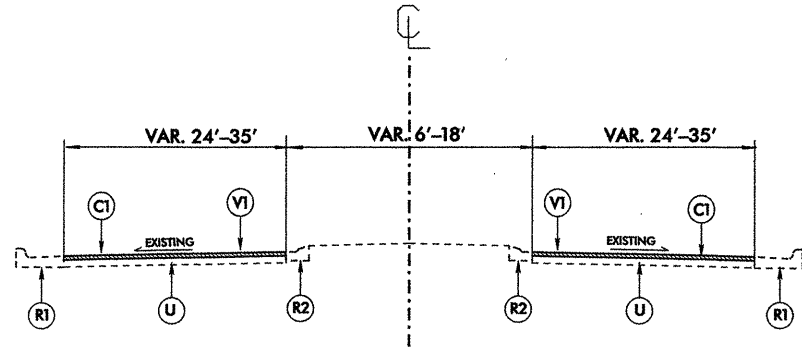
Utility Pole	●
Utility Pole with Base	⊠
Utility Located Object	⊙
Utility Traffic Signal Box	⊠
Utility Unknown U/G Line	-----
U/G Tank; Water, Gas, Oil	⊠
A/G Tank; Water, Gas, Oil	⊠
U/G Test Hole (S.U.E.*)	⊙
Abandoned According to Utility Records	AATUR
End of Information	E.O.I.



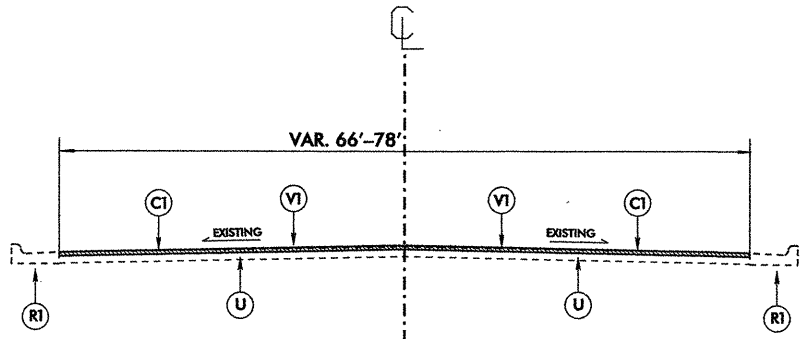
PROJECT W-5101  
US 70 / NC 101  
CONSTRUCT RAISED  
MEDIAN, MILL, AND  
RESURFACE

C1	PROP. APPROX. 1½" ASPHALT CONCRETE SURFACE COURSE, TYPE S9.5C, AT AN AVERAGE RATE OF 168 LBS. PER SQ. YD.
D1	PROP. APPROX. 4½" ASPHALT CONCRETE INTERMEDIATE COURSE, TYPE I19.0B, AT AN AVERAGE RATE OF 513 LBS. PER SQ. YD.
R1	EXISTING 2'-6" CONCRETE CURB AND GUTTER.
R2	EXISTING 1'-6" CONCRETE CURB AND GUTTER.
R3	PROP. 1'-6" CONCRETE CURB AND GUTTER.
R4	PROP. 5" CONCRETE MONOLITHIC ISLAND (SURFACE MOUNTED).
T	EARTH MATERIAL.
U	EXISTING PAVEMENT.
V1	PROP. APPROX. 1½" MILLING ASPHALT PAVEMENT.
V2	REMOVAL OF EXISTING ASPHALT PAVEMENT.

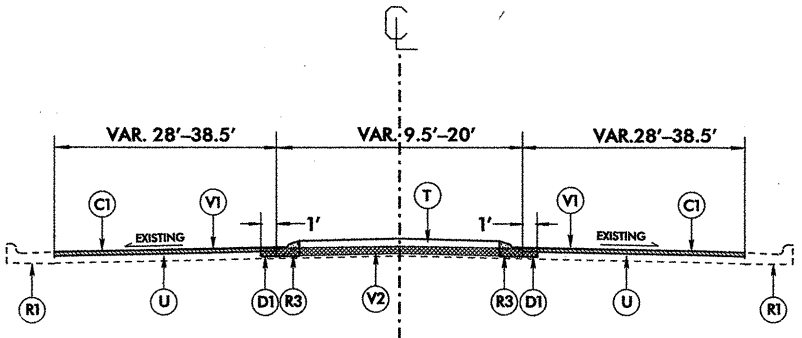
NOTE: PAVEMENT EDGE SLOPES ARE 1:1 UNLESS SHOWN OTHERWISE.



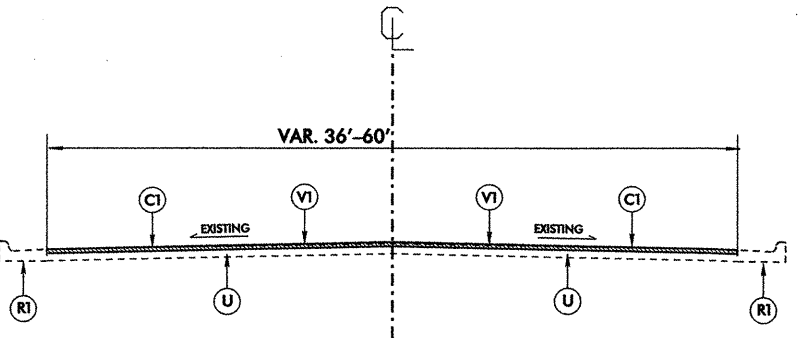
TYPICAL SECTION #1  
US 70, FROM TRADER AVE. TO JACKSON DR.



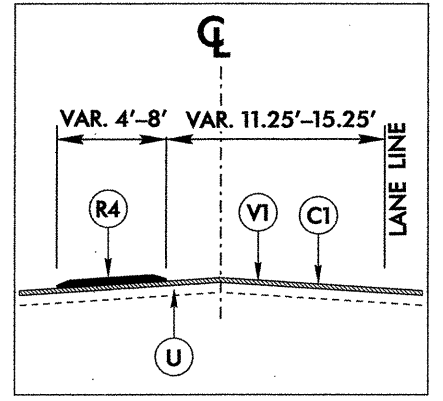
TYPICAL SECTION #2  
US 70, FROM JACKSON DR. TO NC 101



TYPICAL SECTION #3  
US 70, FROM NC 101 TO FOREST HILL DR.



TYPICAL SECTION #4  
NC 101, FROM US 70 TO CUNNINGHAM BLVD.



USE WITH TYPICAL SECTION NO. 3  
ISLAND DETAIL REVERSE FOR WESTBOUND TURN LANE

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 Harron Bullard 8/1/2008 11:47

### SUMMARY OF QUANTITIES

PROJECT NO	COUNTY	MAP NO	ROUTE	DESCRIPTION	TYP NO	LENGTH MI	WIDTH FT	BORROW CY	REMOVAL OF EXISTING ASPHALT PVT SY	1½" MILLING SY	INTER-MEDIATE COURSE, H19.0B TONS	SURFACE COURSE, S9.5C TONS	ASPHALT BINDER FOR PLANT MIX, PG 64-22 TONS	ASPHALT BINDER FOR PLANT MIX, PG 70-22 TONS	1-6" CURB & GUTTER LF	5" MONO CONC ISLAND (SURFACE) SY	SEED & MULCHING AC	FLASHING ARROW PANELS EA	CHANGE-ABLE MESSAGE SIGNS EA	DRUMS EA	TMIA EA	PORTABLE LIGHTING LS
2.CR.10251.9	Craven	1	EBL, TRADER-JACKSON	EBL US 70, TRADER AVE TO JACKSON DR	1	0.33	24			4,646		474		29								
		2	WBL, TRADER-JACKSON	WBL US 70, TRADER AVE TO JACKSON DR	1	0.33	24			4,646		435		26								
		3	JACKSON-101	US 70, JACKSON DR TO NC 101	2	0.19	66			7,357		747		45								
		4	EBL, 101-FOREST HILL	US 70 EBL, NC 101 TO FOREST HILL DR	3	1.34	28			22,012		2,179		131								
		5	WBL, 101-FOREST HILL	WBL US 70, NC 101 TO FOREST HILL DR	3	1.34	28			22,012		2,182		131								
		6	101, 70-ROOSEVELT	NC 101, US 70 TO ROOSEVELT BLVD	4	0.22	48			6,195		598		36								
		7	101, ROOSEVELT TO CUNNINGHAM	NC 101, ROOSEVELT BLVD TO CUNNINGHAM BLVD	4	0.32	36			6,758		617		37								
TOTAL FOR PROJ NO. 2.CR.10251.9						2.4				73,626	0	7,232	0	435								
41858.3.1	Craven	1	US 70 MEDIAN, NC 101-FOREST HILL DR	RAISED MEDIAN, US 70 FROM NC 101 TO FOREST HILL DR	3	1.34	76	2,481	9,759		277		13		8,272	1,299	1.54	2	2	150	2	1
TOTAL FOR PROJ NO. 41858.3.1						1.34		2,481	9,759	0	277	0	13	0	8,272	1,299	1.54	2	2	150	2	1
GRAND TOTAL						3.74		2,481	9,759	73,626	277	7,232	13	435	8,272	1,299	1.54	2	2	150	2	1

### THERMOPLASTIC QUANTITIES

PROJECT NO	COUNTY	MAP NO	ROUTE	DESCRIPTION	4686000000-E		4695000000-E		4697000000-E	4705000000-E	4710000000-E	4721000000-E		4725000000-E								
					4" X 120 M WHITE THERMO LF	4" X 120 M YELLOW THERMO LF	8" X 90 M WHITE THERMO LF	8" X 90 M YELLOW THERMO LF	8" X 120 M WHITE THERMO LF	16" X 120 M WHITE THERMO LF	24" X 120 M WHITE THERMO LF	THERMO RXR 120 M EA	THERMO MSG SCHOOL 120 M EA	THERMO MSG ONLY 120 M EA	THERMO LT ARROW 90 M EA	THERMO STR ARROW 90 M EA	THERMO STR & RT ARROW 90 M EA	THERMO RT ARROW 90 M EA	THERMO STR & LT ARROW 90 M EA			
2.CR.10251.9	Craven	1	EBL, TRADER-JACKSON	EBL US 70, TRADER AVE TO JACKSON DR	975	60					110			4	4	4						
		2	WBL, TRADER-JACKSON	WBL US 70, TRADER AVE TO JACKSON DR	686	60					75			2	2	2						
		3	JACKSON-101	US 70, JACKSON DR TO NC 101	1,161	1,580					88			7	4	4						
		4	EBL, 101-FOREST HILL	US 70 EBL, NC 101 TO FOREST HILL DR	2,667				405	88	275	4	6	11	8	4						
		5	WBL, 101-FOREST HILL	WBL US 70, NC 101 TO FOREST HILL DR	3,052		436			88	367	4	6	13	16				5	1		
		6	101, 70-ROOSEVELT	NC 101, US 70 TO ROOSEVELT BLVD	1,110	2,010	440				83			16	8	3			6	2		
		7	101, ROOSEVELT TO CUNNINGHAM	NC 101, ROOSEVELT BLVD TO CUNNINGHAM BLVD	1,274	4,300	340	48		176	236	8		16	8	4	2		6			
TOTAL FOR PROJ NO. 2.CR.10251.9					10,925	8,010	1,216	48	405	352	1,234	16	12	32	53	41	16	17	3			
					18,935		1,264					60		130								
41858.3.1	Craven	1	US 70 MEDIAN, NC 101-FOREST HILL DR	RAISED MEDIAN, US 70 FROM NC 101 TO FOREST HILL DR																		
TOTAL FOR PROJ NO. 41858.3.1																						
GRAND TOTAL					10,925	8,010	1,216	48	405	352	1,234	16	12	32	53	41	16	17	3			
					18,935		1,264					60		130								


### PAINT QUANTITIES

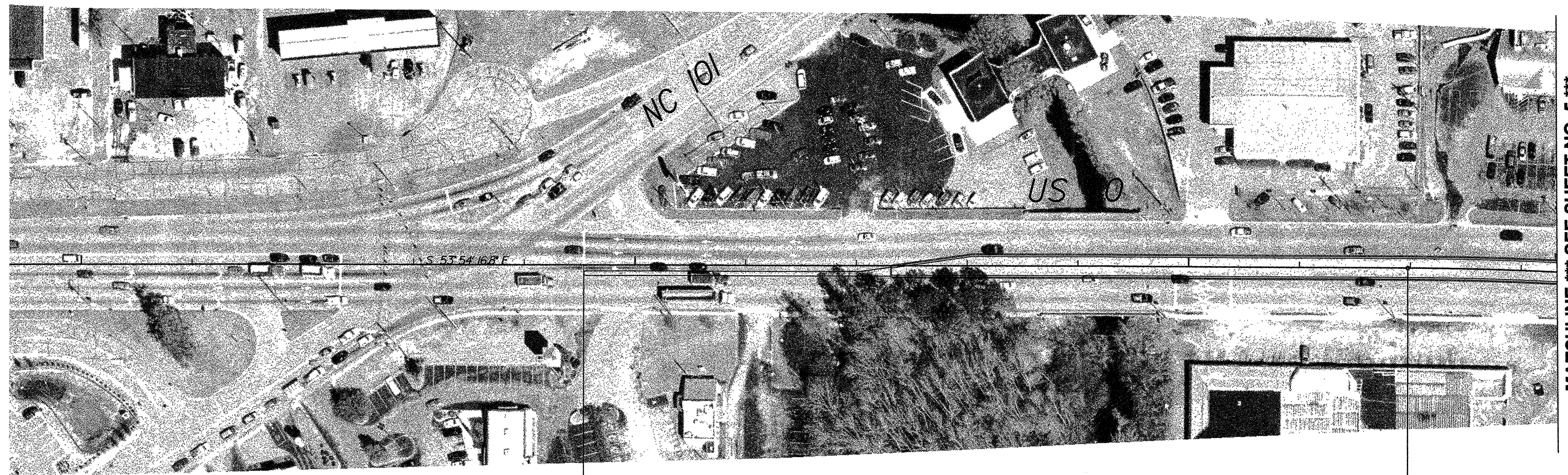
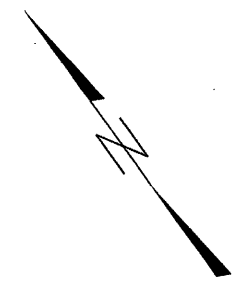
PROJECT NO	COUNTY	MAP NO	ROUTE	DESCRIPTION	4810000000-E		4820000000-E		4830000000-E	4835000000-E	4840000000-N			4845000000-N							
					4" WHITE PAINT LF	4" YELLOW PAINT LF	8" WHITE PAINT LF	8" YELLOW PAINT LF	16" WHITE PAINT LF	24" WHITE PAINT LF	PAINT MSG RXR EA	PAINT MSG SCHOOL EA	PAINT MSG ONLY EA	PAINT LT ARROW EA	PAINT STR ARROW EA	PAINT STR & RT ARROW EA	PAINT RT ARROW EA	PAINT STR & LT ARROW EA			
2.CR.10251.9	Craven	1	EBL, TRADER-JACKSON	EBL US 70, TRADER AVE TO JACKSON DR	975	60				110				4	4	4					
		2	WBL, TRADER-JACKSON	WBL US 70, TRADER AVE TO JACKSON DR	686	60				75				2	2	2					
		3	JACKSON-101	US 70, JACKSON DR TO NC 101	1,161	1,580				88				7	4	4					
		4	EBL, 101-FOREST HILL	US 70 EBL, NC 101 TO FOREST HILL DR	2,667		405		88	275	4	6		11	8	4					
		5	WBL, 101-FOREST HILL	WBL US 70, NC 101 TO FOREST HILL DR	3,052		436		88	367	4	6		13	16			5	1		
		6	101, 70-ROOSEVELT	NC 101, US 70 TO ROOSEVELT BLVD	1,110	2,010	440			83			16	8	3			6	2		
		7	101, ROOSEVELT TO CUNNINGHAM	NC 101, ROOSEVELT BLVD TO CUNNINGHAM BLVD	1,274	4,300	340	48		176	236	8		16	8	4	2		6		
TOTAL FOR PROJ NO. 2.CR.10251.9					10,925	8,010	1,621	48	352	1,234	16	12	32	53	41	16	17	3			
					18,935		1,669				60		130								
41858.3.1	Craven	1	US 70 MEDIAN, NC 101-FOREST HILL DR	RAISED MEDIAN, US 70 FROM NC 101 TO FOREST HILL DR																	
TOTAL FOR PROJ NO. 41858.3.1																					
GRAND TOTAL					10,925	8,010	1,621	48	352	1,234	16	12	32	53	41	16	17	3			
					18,935		1,669				60		130								

8/17/99

REVISIONS

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PROJECT REFERENCE NO. <i>W-5101</i>	SHEET NO. 4
RW SHEET NO.	
ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER
	
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BEGIN STATE PROJECT W-5101  
 POT -L- 19+53.76


PC -L- 26+97.69

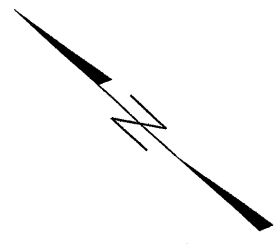
MATCHLINE \*\*\* SEE SHEET NO. 5 \*\*\*

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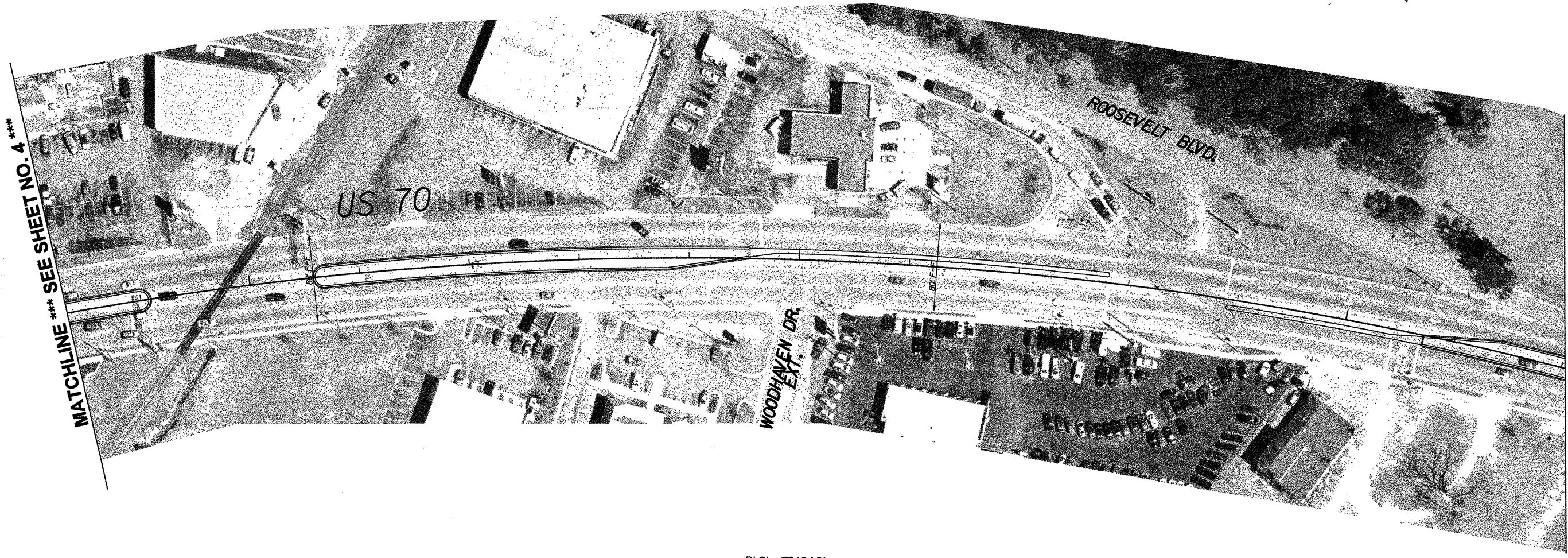
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W-5101		5	
RW SHEET NO.			
ROADWAY DESIGN ENGINEER		HYDRAULICS ENGINEER	
			
AARON BULLARD			



30

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PI Sta 37+04.21  
 $\Delta = 34^{\circ} 26' 17.1''$  (RT)  
 $D = 145' 51.0''$   
 $L = 1,952.08'$   
 $T = 1,006.53'$   
 $R = 3,247.74'$



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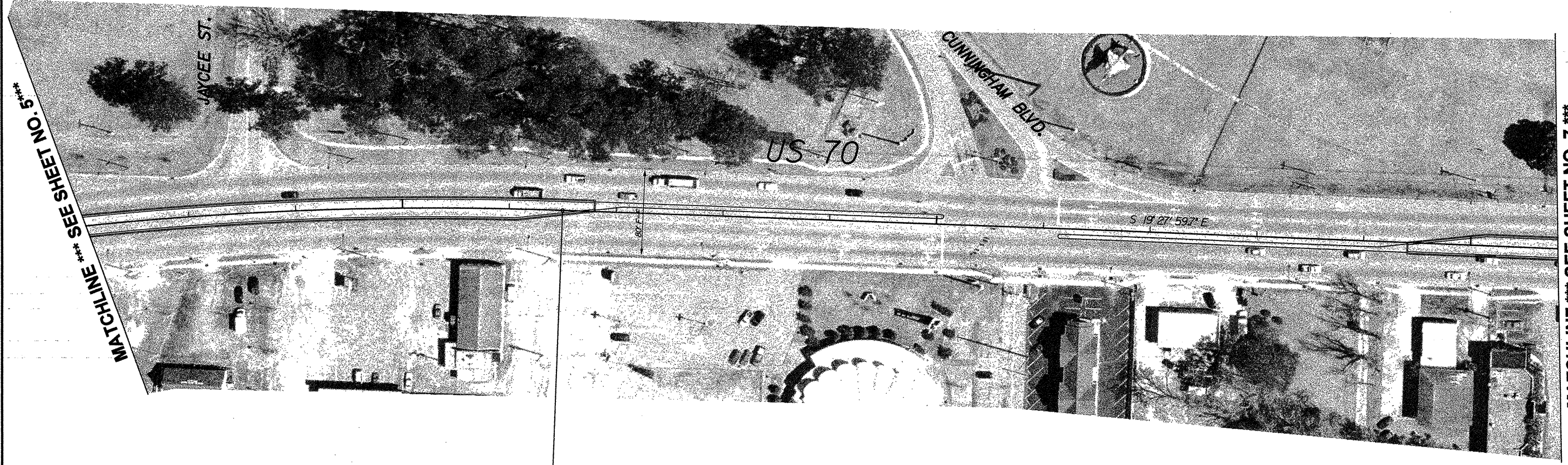
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RW SHEET NO.		
ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER	
		
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MATCHLINE \*\*\* SEE SHEET NO. 5 \*\*\*

MATCHLINE \*\*\* SEE SHEET NO. 7 \*\*\*

PT -L- 46+49.77

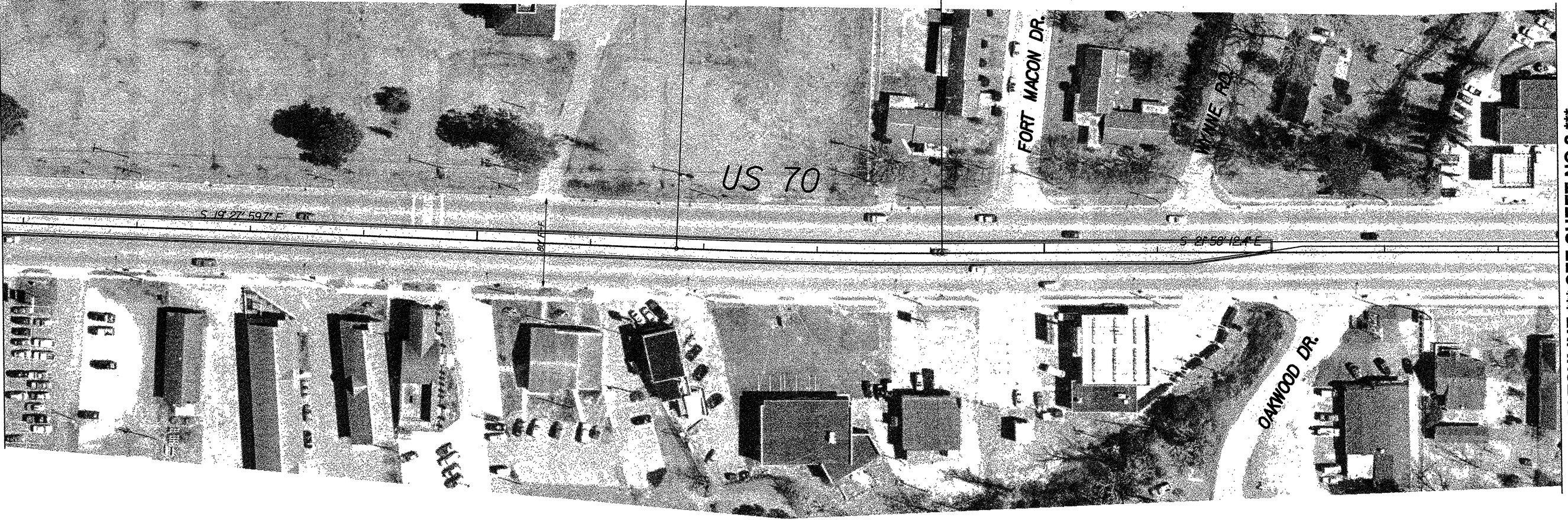
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RW SHEET NO.			
ROADWAY DESIGN ENGINEER		HYDRAULICS ENGINEER	
			
		elb708	



MATCHLINE \*\*\* SEE SHEET NO. 6 \*\*\*




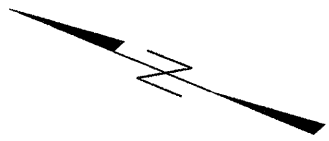
MATCHLINE \*\*\* SEE SHEET NO. 8 \*\*\*

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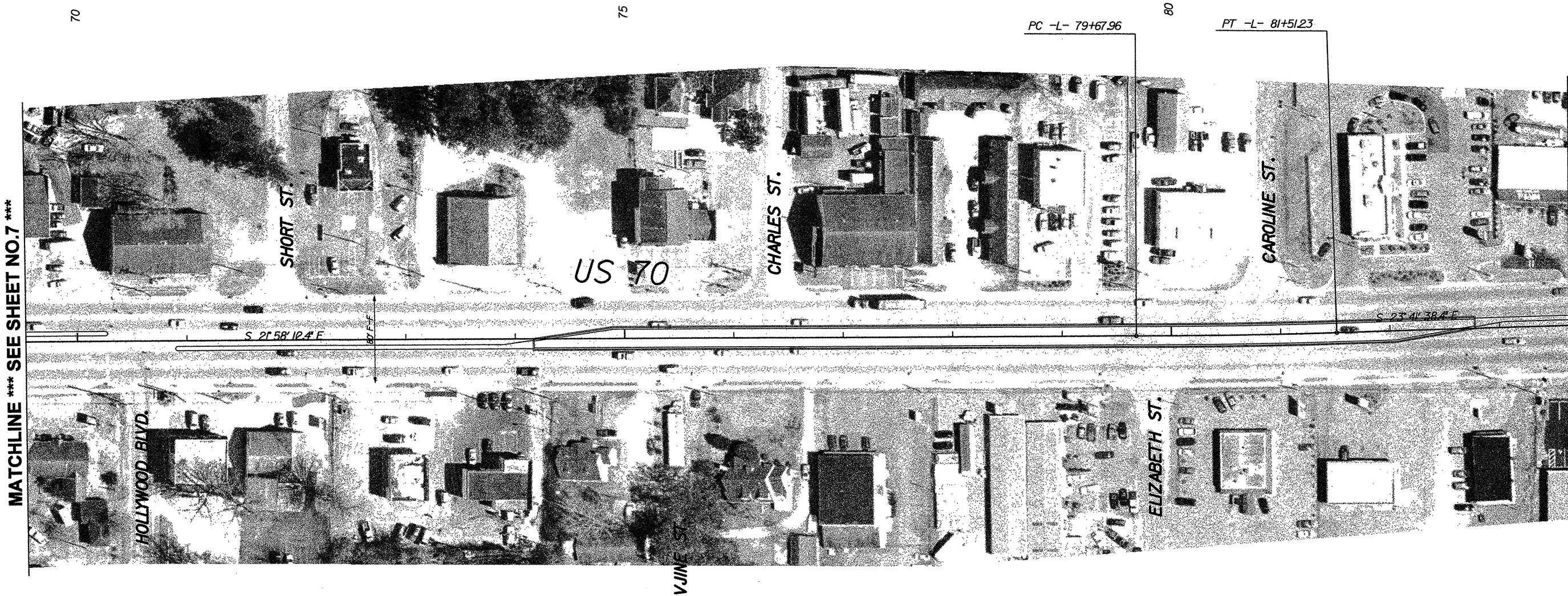
REVISIONS

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USER:NAME

PROJECT REFERENCE NO. W-5101	SHEET NO. 8
RW SHEET NO.	
ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER
 M. Aaron Bullard	



1" = 50'  
R = 6,091.20'



MATCHLINE \*\*\* SEE SHEET NO.7 \*\*\*

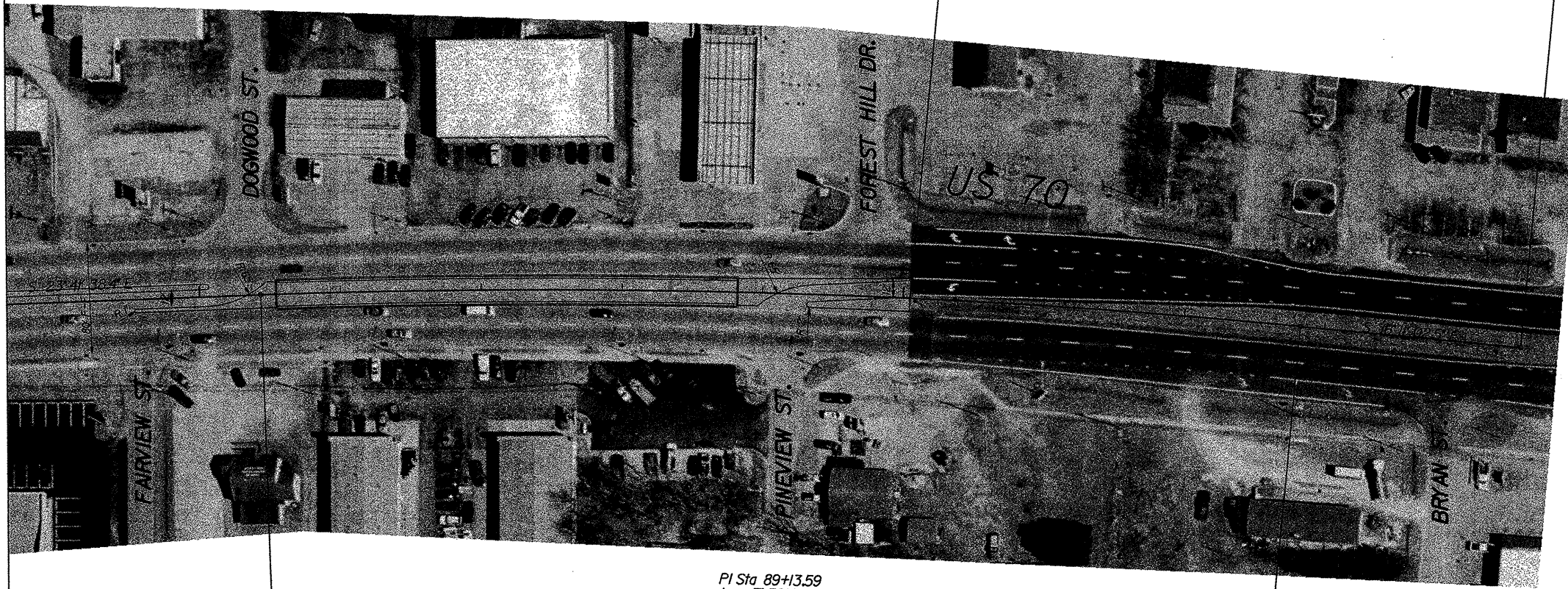
MATCHLINE \*\*\* SEE SHEET NO.9 \*\*\*

8/17/99

19-SEP-2008 09:25  
g:\projects\groven\have\lock\_meditan\have\medh\pn\_ddc2\_psh\_9.dgn  
b:\onbill\ad AT 12/21/2007

REVISIONS

MATCHLINE \*\*\*\* SEE SHEET NO.8 \*\*\*\*



85

90

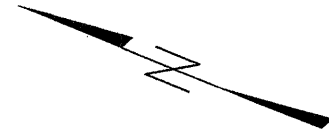
END STATE PROJECT W-5101  
POC -L- 90+04.69

POT -L- 94+39.66

PC -L- 85+43.44

PI Sta 89+13.59  
 $\Delta = 7^{\circ} 30' 35.9''$  (RT)  
D = 100' 57.3"  
L = 739.23'  
T = 370.14'  
R = 5,639.80'

PT -L- 92+82.67



PROJECT REFERENCE NO. W-5101	SHEET NO. 9
RW SHEET NO.	
ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER
	9/19/08