

06-13-14 LETTING ITEM 168

INDEX OF SHEETS

Sheet No.	Description
1	COVER SHEET
2	TYPICAL CROSS SECTION AND DETAILS
3	DETAIL

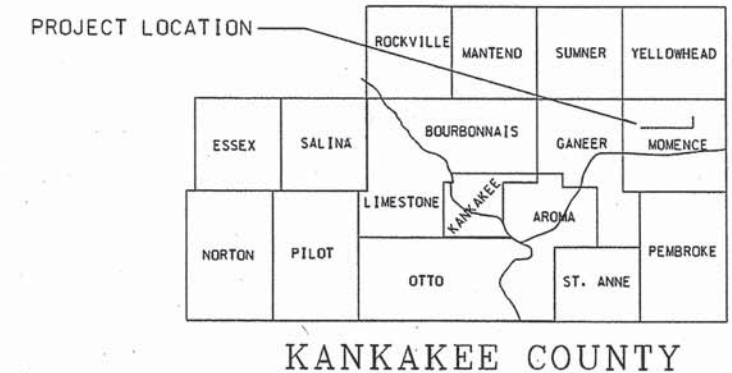
**STANDARDS**

701306-03	TRAFFIC CONTROL
701901-03	TRAFFIC CONTROL

STATE OF ILLINOIS  
DEPARTMENT OF TRANSPORTATION  
COUNTY OF KANKAKEE  
DEPARTMENT OF HIGHWAYS  
PLANS FOR PROPOSED  
FEDERAL AID SECONDARY PROJECT  
SECTION 09-00036-02-RS  
F.A.S. 314 ( CH.13 )  
PROJECT RS - 0314 (106)  
JOB NO. C-93-069-13

F.A.S. ROUTE NO.	SEC.	COUNTY	NO. SHEETS	SHEET NO.
314	*	Kankakee	3	1

ILLINOIS PROJECT  
\* 09-00036-02-RS

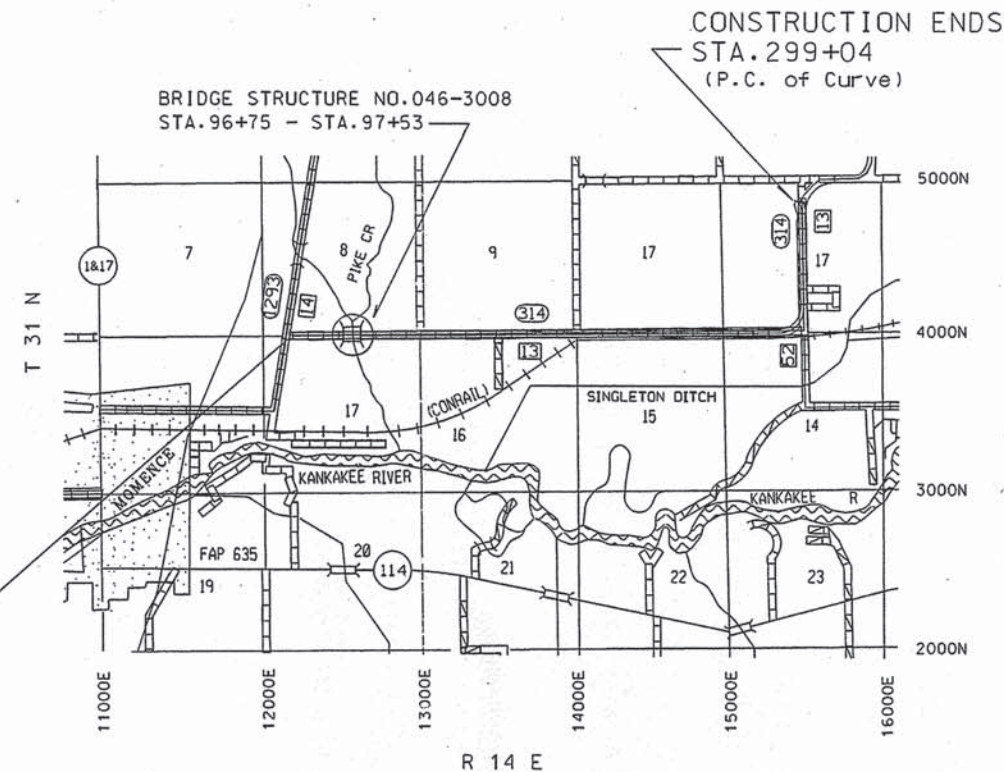


**SUMMARY OF QUANTITIES**

CODE NO.	Description	Quantity	Unit
*X4060110	BITUMINOUS MATERIALS (PRIME COAT)	33049	POUNDS
*40600627	LEVELING BINDER (MACHINE METHOD), IL9.5FG, N 50	2789	TON
40600982	HOT-MIX ASPHALT SURFACE REMOVAL-BUTT JOINT	593	SO YD
40600990	TEMPORARY RAMP	58	SO YD
*40603310	HOT-MIX ASPHALT SURFACE COURSE, MIX "C", N50	3410	TON
40800050	INCIDENTAL HOT-MIX ASPHALT SURFACING	91	TON
44000155	HOT-MIX ASPHALT SURFACE REMOVAL 1 1/2"	461	SO YD
*48101200	AGGREGATE SHOULDERS, TYPE B	3529	TON
67100100	MOBILIZATION	1	L SUM
70100460	TRAFFIC CONTROL AND PROTECTION, STANDARD 701306	1	L SUM
*70300100	SHORT TERM PAVEMENT MARKING	4478	FOOT
*20048665	RAILROAD PROTECTIVE LIABILITY INSURANCE	1	L SUM

Construction Code 0005

- \* Special Provisions
- \*\* Specialty Item



CONSTRUCTION STARTS  
STA. 74+39  
(EAST EDGE OF PAVEMENT C.H.14)

CONSTRUCTION ENDS  
STA. 299+04  
(P.C. of Curve)

LOCATION MAP  
NO SCALE

NET LENGTH = 22.465 LIN FT = 4.255 MILES

THE ACCEPTANCE OF THIS PROJECT IS BASED ON THE MINIMUM DESIGN CRITERIA FOR LOCAL AGENCY PAVEMENT PRESERVATION POLICY ( L.A.F.O. ) PROJECTS

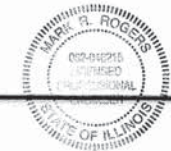
CLASS III ROAD  
CURRENT A.D.T. = 1300  
DESIGN A.D.T. = 1408  
DESIGN SPEED = 55 M.P.H.



STATE OF ILLINOIS  
DEPARTMENT OF TRANSPORTATION  
DIVISION OF HIGHWAYS

Submitted 03/24 2014

*Mark R. Rogers*  
Mark R. Rogers, P.E.  
County Engineer



4/7 2014

*Donald R. Ernst*  
Donald R. Ernst  
District 3 Local Roads and Streets Engineer

4/7 2014  
Releasing for Bid Based on Limited Review

*Paul A. Loete*  
Paul A. Loete  
Deputy Director of Highways, Region Two Engineer

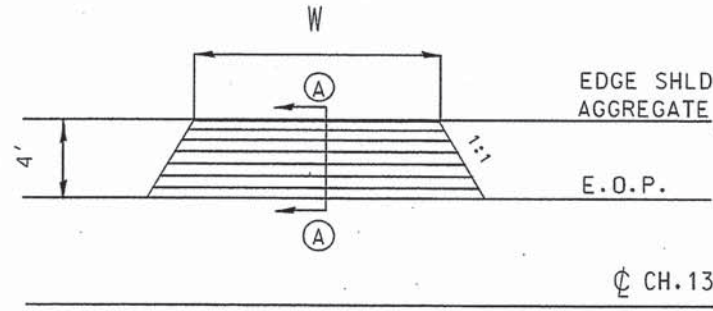
CONTRACT NO. 87565

J.U.L.I.E. 1-800-892-0123

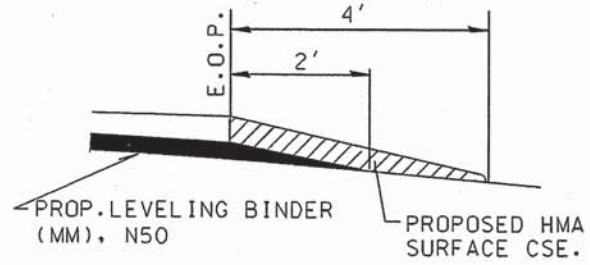


### TYPICAL ENTRANCE DETAIL

W :WIDTH OF APPROACH PADS IS ESTIMATED AT 20' PER ENTRANCE . THE ACTUAL CONSTRUCTED WIDTH MAY VARY AS DIRECTED BY THE ENGINEER TO FIT THE EXISTING ENTRANCES .



SECTION A-A



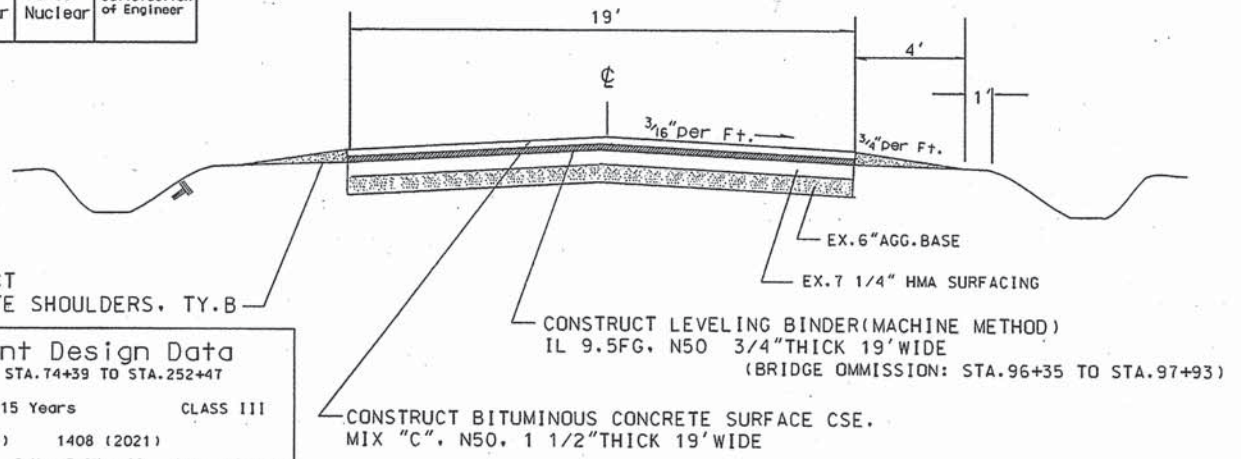
ESTIMATED QUANTITIES- 25 ENTRANCES		
ITEM	UNIT	QUANTITY
BITUMINOUS MATERIALS ( PRIME COAT )	POUNDS	100
LEVELING BINDER(MM) IL9.5FG, N50	TON	10
HMA SURFACE COURSE, MIX C, N50	TON	25

SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
99-00036-02-RS	KANKAKEE	3	2

### TYPICAL CROSS SECTIONS

STA 74+39 TO STA 252+47

	HMA Level Binder	HMA Surface	Incidental HMA
PG Grade	PG 64-22	PG 64-22	PG 64-22
Design Air Voids	4.0% N50	4.0% N50	4.0% N50
Mixture Composition	IL9.5FG	IL9.5	IL9.5
Friction Aggregate		Mixture C	
Density Test Method	Cores/ Nuclear	Cores/ Nuclear	Satisfaction of Engineer



**Pavement Design Data**  
SEGMENT#1 STA. 74+39 TO STA. 252+47

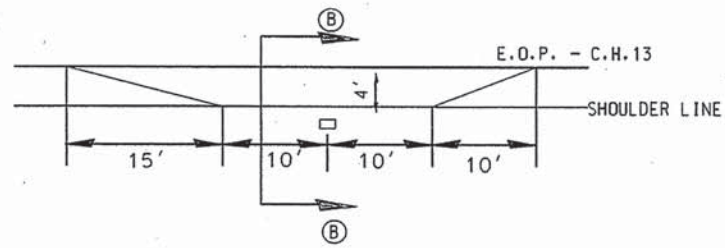
Design Period = 15 Years CLASS III  
 ADT = 1300 (2013) 1408 (2021)  
 P.V. = 88% = 1239 S.U. = 7.0% = 99 M.U. = 5% = 70  
 T.F. = 0.285  
 Dt = 2.24

Pavement Structure Number

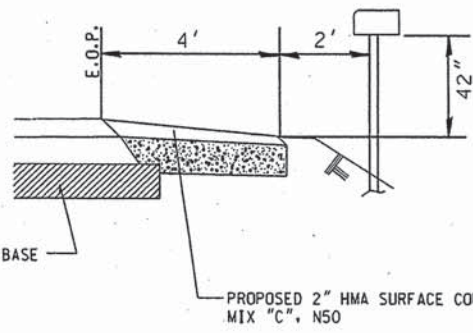
Ex. 6" Agg. Base (crushed)	6	x 0.08 =	0.48
Ex. 2" Bit. Conc. Subclass B-4	2	x 0.17 =	0.34
Ex. 1" Bit. Leveling Binder	1	x 0.17 =	0.17
Ex. 2" CL. B Bit. Surfacing	2	x 0.20 =	0.40
Ex. 2 1/4" Bit. Conc. Surface CL. I	2.25	x 0.25 =	0.56
Prop. 2 1/4" Bit. Conc. Surface CL. I	2.25	x 0.33 =	0.74
			<u>2.69</u>

Marshall Stability ≥ 1700

### TYPICAL MAILBOX TURNOUT DETAIL



SECTION B-B



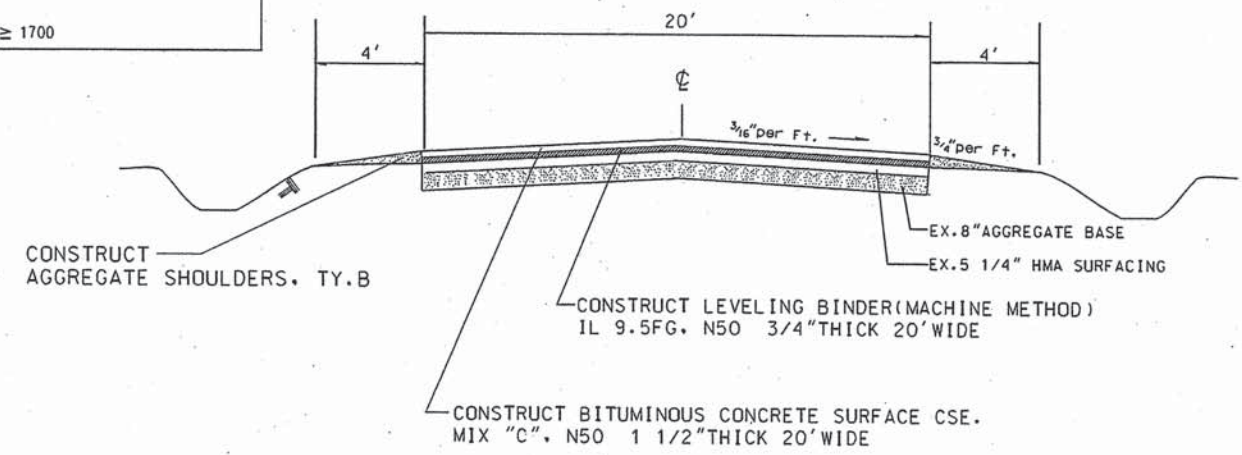
**MAILBOX TURNOUT SCHEDULE**

STATION	SIDE	STATION	SIDE
89+11	RT	244+10	RT
100+81	RT	246+91	RT
120+28	RT	256+13	LT
204+37	RT	261+96	LT
207+39	RT	263+46	LT
230+97	RT	277+82	LT
235+46	RT	283+19	LT
236+88	RT	287+55	LT
240+09	RT	291+14	RT

**ESTIMATED QUANTITIES - 18 MAILBOX TURNOUTS**

ITEM	UNIT	QUANTITY
BITUMINOUS MATERIALS (PRIME COAT)	POUNDS	117
HMA SURFACE COURSE, MIX C, N50	TON	29

STA 252+47 TO STA 299+04



**Pavement Design Data**  
SEGMENT#2 STA. 252+47 TO STA. 299+04

Design Period = 15 Years CLASS IV  
 ADT = 325 (2013) 377 (2021)  
 P.V. = 88% = 332 S.U. = 7% = 26 M.U. = 5% = 19  
 T.F. = 0.0135  
 Dt = 2.06

Pavement Structure Number

Ex. 8" Agg. Base (crushed)	8	x 0.08 =	0.64
Ex. 2" Bit. Seal Coat	2	x 0.15 =	0.30
Ex. 1" Bit. CL. I Surfacing	1	x 0.23 =	0.23
Ex. 2 1/4" Bit. Conc. Surface CL. I	2.25	x 0.25 =	0.56
Prop. 2 1/4" Bit. Conc. Surface CL. I	2.25	x 0.33 =	0.74
			<u>2.47</u>

Marshall Stability ≥ 1700

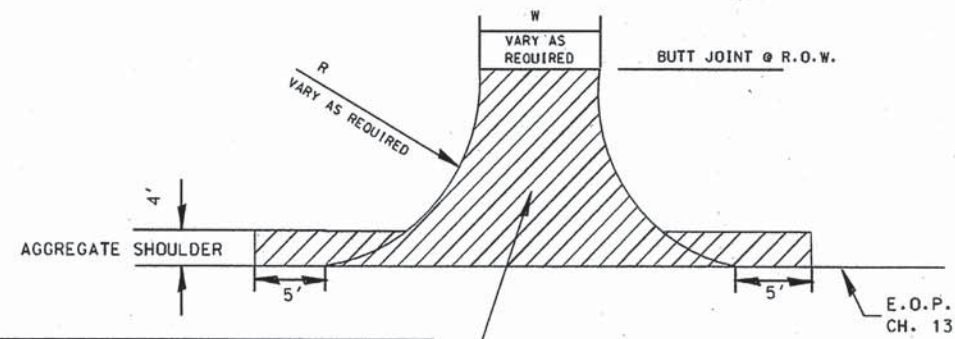
**ESTIMATED QUANTITIES ON TANGENTS**

ITEM	UNIT	QUANTITY
AGGREGATE SHOULDERS TY. B	TON	2598
BITUMINOUS MATERIALS (PRIME COAT)	GALLON	32,362
LEVELING BINDER (MM), N50	TON	2779
HMA SURF. CSE. MIX C, N50	TON	3356
SHORT-TERM PAVEMENT MARKING	FOOT	4478



SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
99-00036-02-RS	KANKAKEE	3	3

# TYPICAL INTERSECTION DETAIL

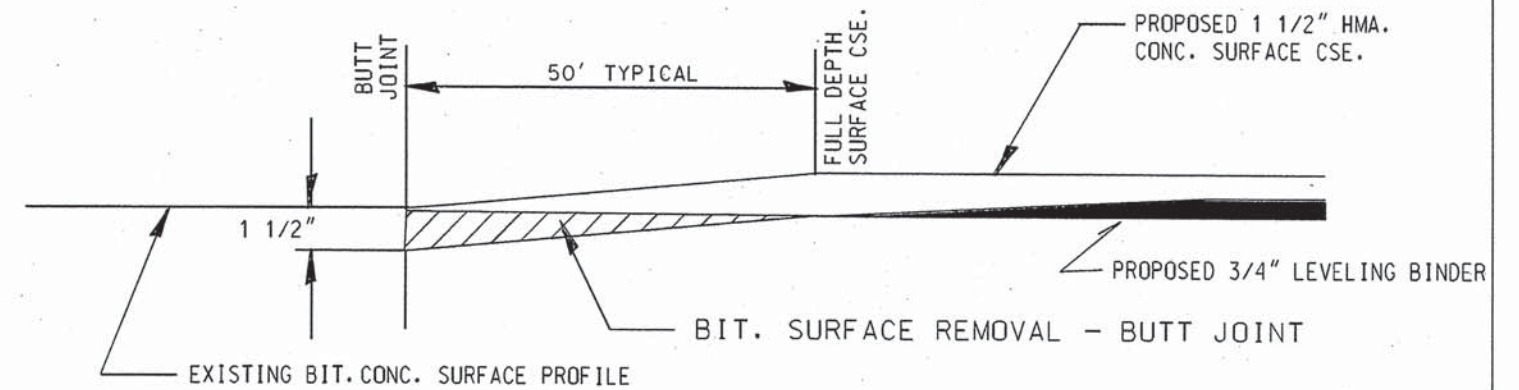


STATION	SIDE	WIDTH	RADIUS	INCIDENTAL BIT. SURFACING (TON)	BIT. MATERIALS (PRIME COAT) (POUNDS)	LOCATION
74+39	-	-	40	8	47	CH 14
119+40	LT	14	30	9	47	13000E
146+42	RT	10	30	8	47	13500E
172+48	LT	16	30	9	47	14000E
252+47	RT	18	30	35	188	15500E
260+00	RT	20	30	11	47	4140N
264+21	RT	20	30	11	47	4240N
TOTALS				91	470	

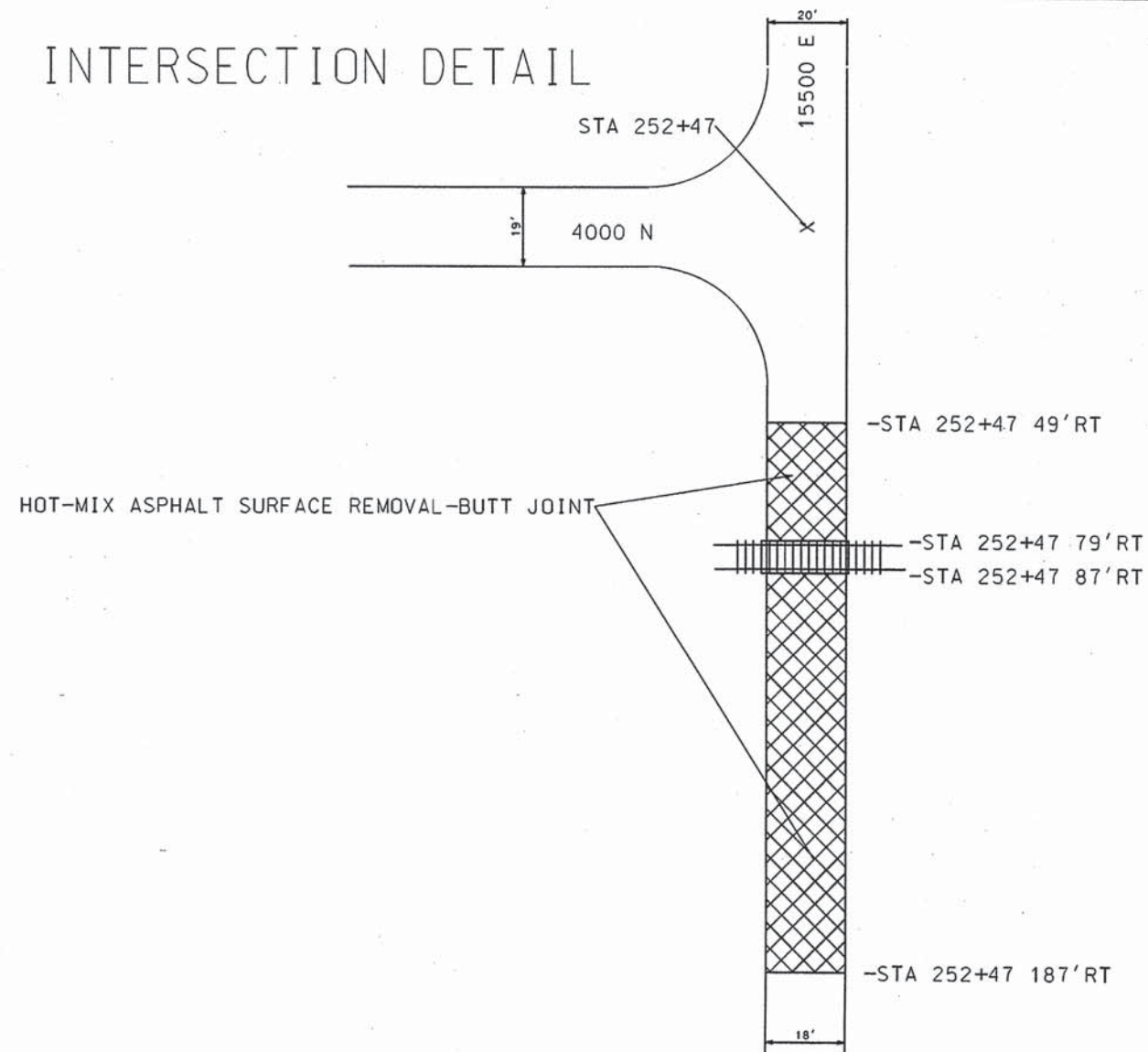
\* INCLUDES RADII ONLY  
TANGENT INCLUDED IN MAINLINE QUANTITIES.

CONSTRUCT 1 1/2" INCIDENTAL BITUMINOUS SURFACING

# TYPICAL BUTT JOINT DETAIL



# INTERSECTION DETAIL



# BITUMINOUS SURFACE REMOVAL AND TEMPORARY RAMP SCHEDULE

STA TO STA	BIT. SURFACE REMOVAL - BUTT JOINT	BIT. SURFACE REMOVAL - 1 1/2" (Sq. Yd.)	TEMPORARY RAMP (3' Wide)
74+39 - 74+89	121		33
96+45 - 97+83 *		461	
119+40 LT10' - LT30'	31		
172+48 LT10' - LT30'	35		
252+47 RT49' - R79' **	60		6
252+47 RT87' - R187' **	200		12
260+00 RT10' - RT30'	45		
264+21 RT10' - RT30'	45		
298+54 - 299+04	56		7
TOTALS	593	461	58

\* INCLUDES 60' APPROACH TAPER WEST AND EAST OF DECK (SEE GENERAL NOTE # 2)

\*\* OMISSION FOR RR CROSSING STA. 252+47 RT79' TO RT87'

### GENERAL NOTES:

- IT SHALL BE THE CONTRACTOR'S RESPONSIBILITY TO DETERMINE THE ACTUAL LOCATION OF ALL UTILITY LOCATIONS.
- BITUMINOUS SURFACE REMOVAL AT THE BRIDGE DECK (STA. 96+75 TO 97+53) SHALL BE AT A 1 1/2" DEPTH FOR THE FULL CURB TO CURB WIDTH (24') OF THE BRIDGE. THIS AREA SHALL BE RESURFACED WITH 1 1/2" OF BITUMINOUS CONCRETE SURFACE COURSE FOR THE FULL 24' WIDTH.