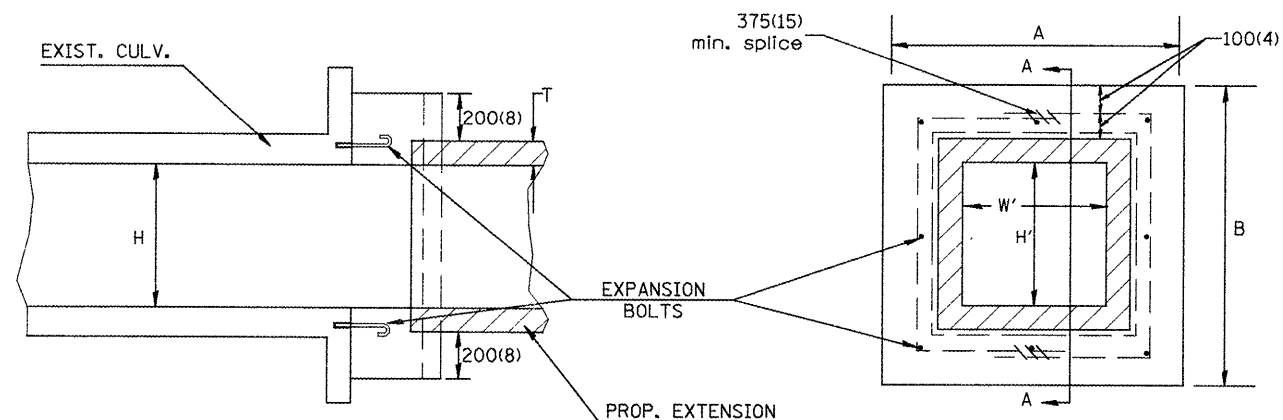
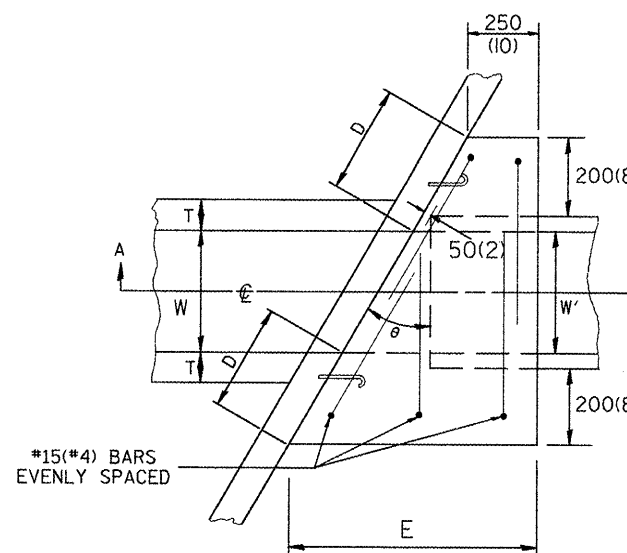


F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
22	135W-24 RS-5	FULTON	282	164
STA.		TO STA.		
FED. ROAD DIST. NO.		ILLINOIS FED. AID PROJECT		

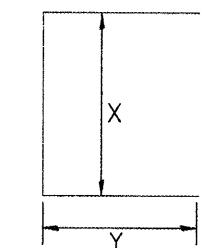


SECTION A - A

END VIEW



PLAN VIEW



#15(\*4) BAR  
FIVE REQUIRED  
PER COLLAR

$$D = \frac{200(8)+T}{\cos\theta}$$

$$E = [W+410(16)+2T]\tan\theta+250(10)$$

$$X = B-200(8)$$

$$Y = \frac{W/2 + T + 100(4)}{\cos\theta} + 90(7\frac{1}{2})$$

LOCATION	EACH COLLAR															SKEW ANGLE θ		
	EXIST. BOX		PROP. BOX			CLASS SI CONCRETE m <sup>3</sup> (CU. YD.)						REBARS KG(LBS.)	M20(3/4) EXPANSION BOLTS EACH	EXT. LENGTH			END SEC.	
	W	H	W'	H'	T		A	B	E	X	Y			LT.	RT.			

GENERAL NOTES

- The collar shall be constructed entirely of CLASS SI CONCRETE and in accordance with the applicable portions of section 503 of the Standard Specifications. Reinforcement bars shall conform to section 508.
- Expansion bolts shall consist of approved expansion anchors, and M20(3/4) hook bolts which conform to section 1006.08. These bolts shall extend at least 200(8) into the new concrete.

All dimensions are in millimeters (Inches) unless otherwise noted.

QUANTITIES	
CALC. BY:	DATE:
CHECKED BY:	DATE:
QUANTITY CALCULATIONS ARE ON FILE AT THE DISTRICT 4 OFFICE, BUREAU OF PROJECT IMPLEMENTATION, DOCUMENTATION SECTION	

DATE	REVISIONS	BY
1-1-97	RENUM. J-12.06, NEW REVISION BOX, REVISED TITLE BOX, ADDED QUANTITY CALCULATION BOX.	T.P.

ILLINOIS DEPARTMENT OF TRANSPORTATION  
**DISTRICT CADD STANDARD**  
**PRECAST SKEWED BOX CULVERT EXTENSION COLLAR**  
 CADD STD. NO. 540106-D4 DRAWN BY CADD  
 SCALE: NOT DRAWN TO SCALE CHECKED BY