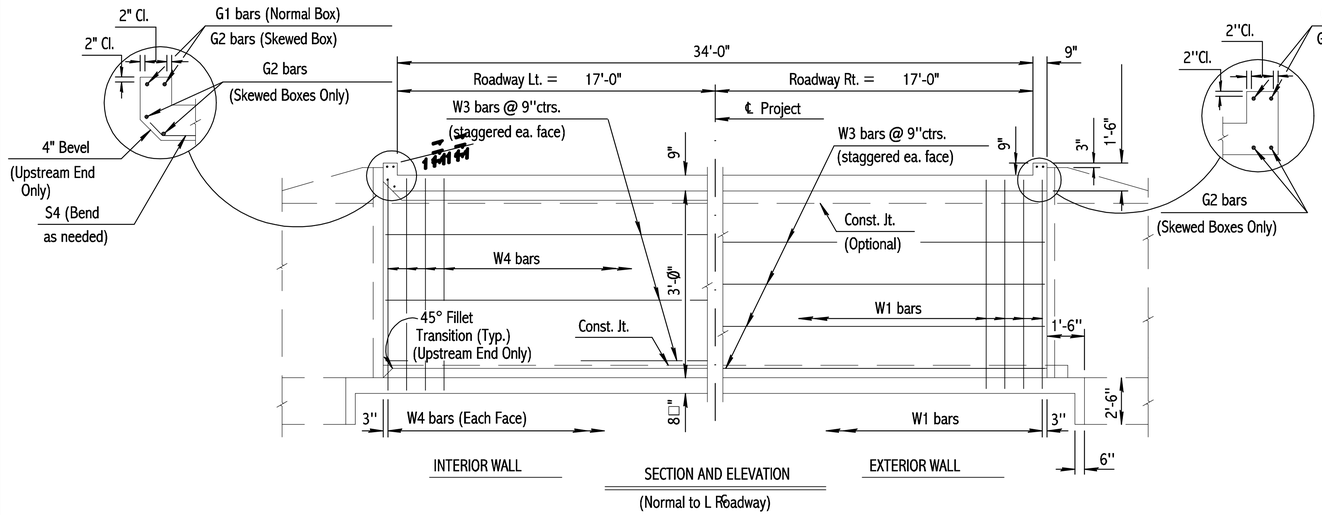
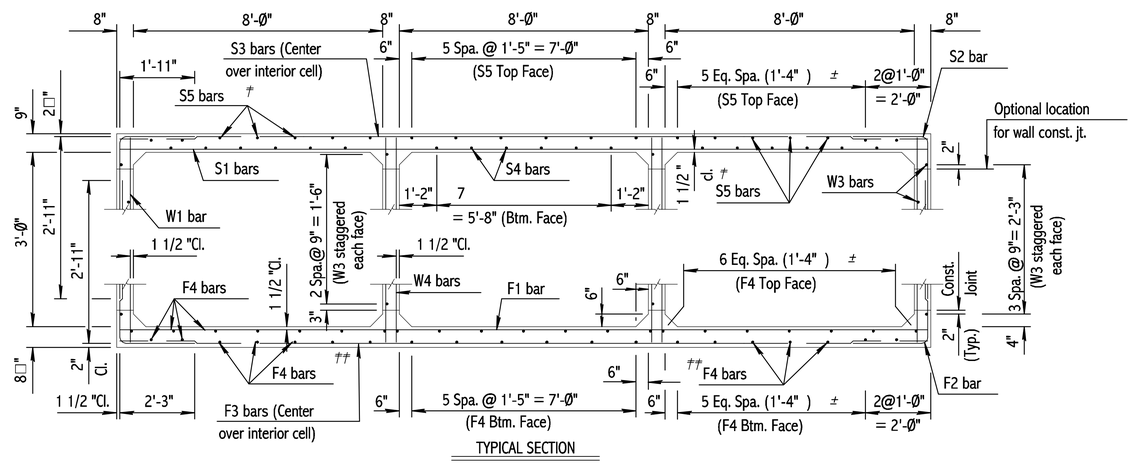
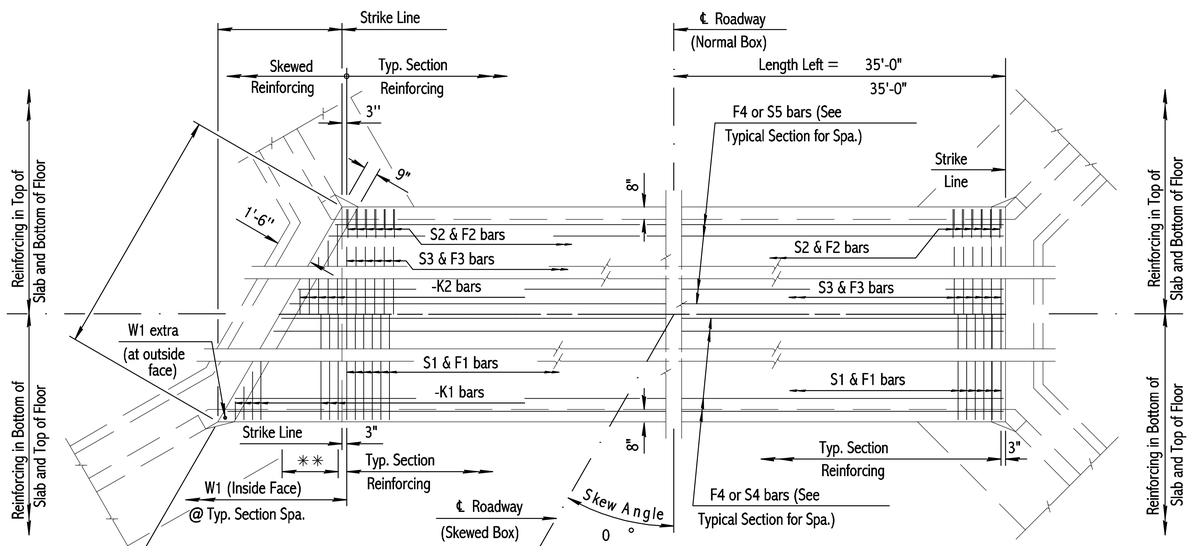
STATE	PROJECT NO.	YEAR	SHEET NO.	TOTAL SHEETS
KANSAS	0			





TYPICAL SECTION



∗∗ -F2 & -S2 bars
(Top of Slab & Btm. of Floor)

SKEWED BOX
(Lt. Skew Shown)

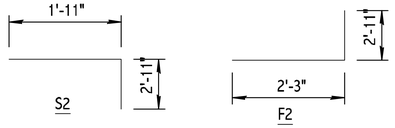
NORMAL BOX

PLAN

± Place when S3 bar extends to exterior walls.

±± Place when F3 bar extends to exterior walls.

Note: Use only cast-in-place construction at this location.



BENDING DIAGRAM

All Dimensions are out to out of bars.

GENERAL NOTES

LOADING: HS2Ø-44 AASHTO Specifications, 1983 Edition.
UNIT STRESSES: Class AAA Concrete; f'c = 4,ØØØ p.s.i.
Reinforcing Steel; fy = 6Ø,ØØØ p.s.i.
FILL HEIGHT: Unless otherwise noted, the Design Fill Height is measured from the riding surface at the culvert and shall include the surfacing.
CONCRETE: Class AAA Concrete shall be used throughout. Bevel all exposed edges with a 3/4 inch triangular moulding. Where Class AAA Concrete (AE) is specified, it shall be placed in the top slab above the Construction Joint.
REINFORCING: All reinforcing shall conform to ASTM A615, Grade 6Ø. All dimensions relative to reinforcing steel shall be to centerline of bar unless otherwise noted.
EXCAVATION: Excavation for culverts less than bridge length shall not be paid for directly but shall be subsidiary to Class AAA Concrete. Excavation for RCB Bridges shall be paid for as Class ||| Excavation.
SEAL COURSE: A Seal Course may be required by the Engineer. The Seal Course shall be unreinforced Concrete (Commercial Grade) to a minimum depth of 3 inches or as determined by the Engineer. Concrete for the seal course shall be paid for at the unit price set for Concrete for Seal Course.
FOUNDATION STABILIZATION: Foundation Stabilization may be required as directed by the Engineer. The depth of Foundation Stabilization shall be determined by the Engineer. Foundation Stabilization shall be paid for at the determined Unit Price set for Foundation Stabilization. See Auxiliary Details.
QUANTITIES: The quantities shown in the Culvert Summary include apron and/or soil saver quantities when their construction is required by the plans. Payment for additional quantities that result from including seal course and/or floating apron, as a change in original plans, shall be made at the Unit Price bid for the various items involved.
GRANULAR BACKFILL (WINGWALLS): Special backfill procedures may be required at the direction of the Engineer. See Auxiliary Details Sheet.
STRIKE LINE: Wingwalls and that portion of the RCB outside the Strike Line shall be constructed level. Footing for wingwalls shall be constructed with the culvert floor. See wingwall detail sheet.

CULVERT SUMMARY

Flow Line Elev. Lt.	Flow Line Elev. Rt.	Crown Gr. Elev.	Design Fill Ht.	Skew	Left Wings	Right Wings	Scour Apron	Soil Saver	Concrete			Reinf. Steel (Gr. 6Ø)		
									Barrel (Cu.Yds.)	Wings (Cu.Yds.)	Total (Cu.Yds.)	Barrel (Lbs.)	Wings (Lbs.)	Total (Lbs.)
157.60	158.00	163.90	2	0	FLARED	FLARED	YES	NO	126.50	13.79	140.28	26626	824	27450

△ Epoxy Coated Bars
✳ See Bending Diagram

BAR SCHEDULE

F1				F2 ✳				F3				F4				△ S1				△ S2 ✳				△ S3				△ S4				△ S5		
Size	Spa.	No.	Length	Size	Spa.	No.	Length	Size	Spa.	No.	Length	Size	No.	Length		Size	Spa.	No.	Length	Size	Spa.	No.	Length	Size	Spa.	No.	Length	Size	No.	Length		Size	No.	Length
4	6□"	129	26'-4"	6	6"	280	5'-2"	6	6"	140	26'-4"	4	82	35'-6"		5	6□"	129	26'-4"	5	6"	280	4'-10"	6	6"	140	26'-4"	4	42	35'-6"		4	40	35'-6"

△ K1				△ K2				W1				W2				W3				W4				△G1			△ G2							
Size	Spa.	No.	Length	Size	Spa.	No.	Length	Size	Spa.	No.	Length	Size	Spa.	No.	Length	Size	No.	Length		Size	Spa.	No.	Length	Size	No.	Length	Size	No.	Length		Size	Spa.	No.	Length
N/A	N/A	N/A		N/A	N/A	N/A		4	1'-1	130	4'-2"	N/A	N/A	N/A	N/A	4	28	35'-6"		5	1'-1	260	4'-2"	5	4	26'-4"	N/A	N/A	N/A					

Minimum Splice Lengths	
#4	1'-4"
#5	1'-8"
#6	2'-Ø"

SUMMARY OF QUANTITIES		
Class AAA Concrete	80.8	C.Y.
Class AAA Concrete (AE)	59.5	C.Y.
Reinforcing Steel (Gr. 6Ø)	14900	Lbs.
Reinforcing Steel (Epoxy Coated)	12550	Lbs.
Class ||| Excavation		C.Y.
Foundation Stabilization (Set)	1	C.Y.
Concrete for Seal Course (Set)	1	C.Y.
Granular Backfill (Wingwalls) (Set)	1	C.Y.

NO.	DATE	REVISIONS	BY	APP'D

KANSAS DEPARTMENT OF TRANSPORTATION
Br. No. -87-.00(000) 1+00
TRIPLE 8 ft x 3 ft RFB

3.8.3 F Sedgwick Co.

FHWA APPROVAL		6-5-91	APP'D	KENNETH F. HURST
DESIGNED	DETAILED		QUANTITIES	TRACED
DESIGN CK.	DETAIL CK.		QUAN.CK.	TRACE CK.