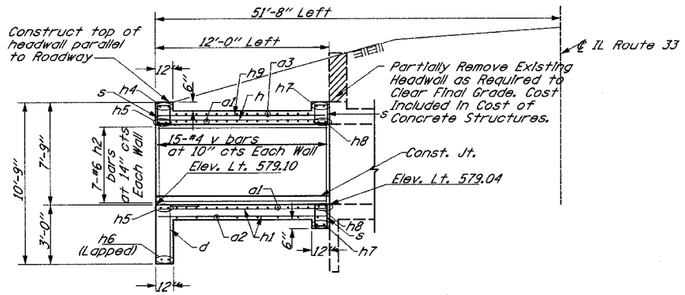
F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
95	*	EFFINGHAM	409	147
FED. ROAD DIST. NO. 7	ILLINOIS	FED. AID PROJECT		

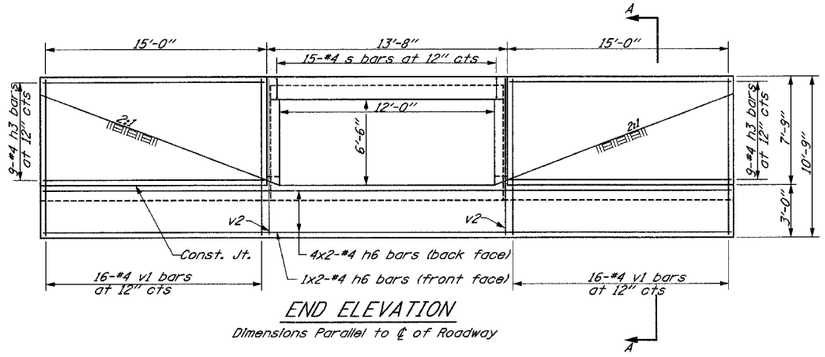
* (6,7)Y, RS-1, 6B-1, 7B-1, TBR-2

CONTRACT NO. 94356



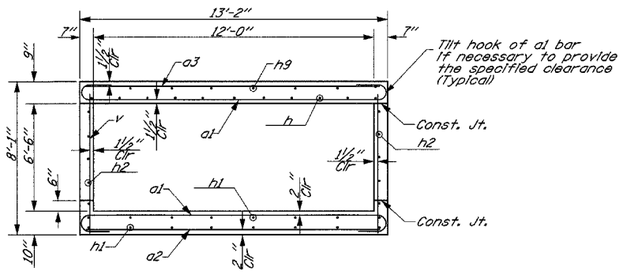
HALF LONG SECTION

Dimensions at Rt L to ℄ Roadway

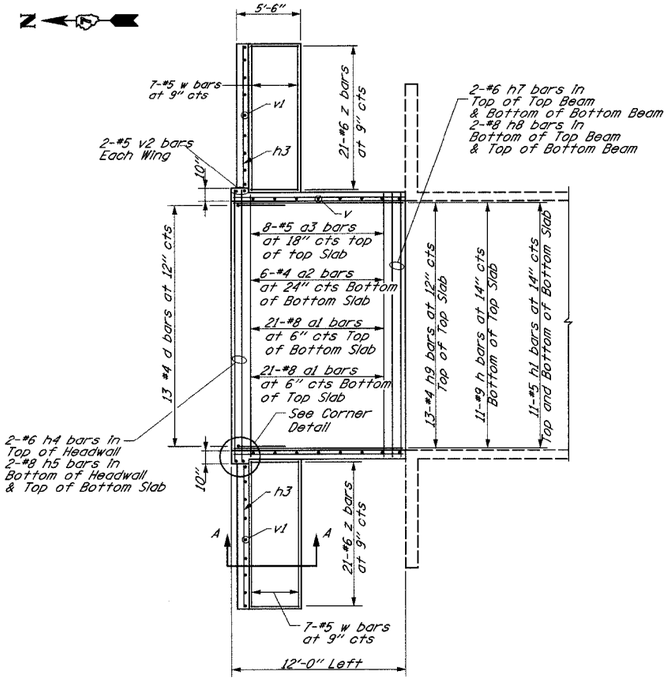


END ELEVATION

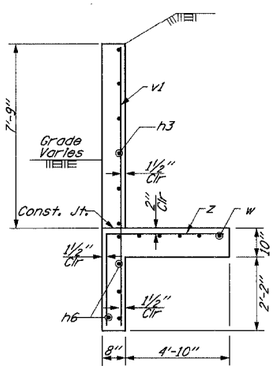
Dimensions Parallel to ℄ of Roadway



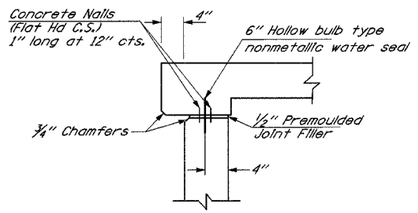
SECTION THRU BARREL



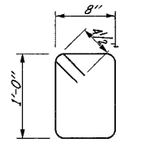
PLAN SHOWING REINFORCEMENT



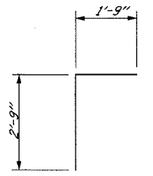
SECTION A-A



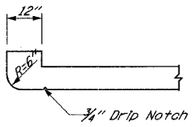
CORNER DETAIL



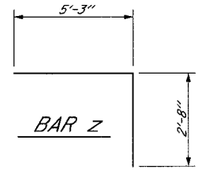
STIRRUP s



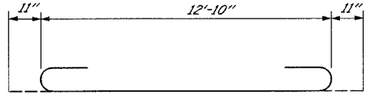
BAR d



SECTION THRU HEADWALL



BAR z



BAR a1

BILL OF MATERIAL

Bar	No.	Size	Length
a1	42	#8	14'-8"
a2	6	#4	12'-3"
a3	8	#5	12'-3"
d	13	#4	4'-6"
h	11	#9	11'-8"
h1	22	#5	11'-8"
h2	14	#6	11'-8"
h3	18	#4	14'-8"
h4	2	#6	13'-4"
h5	4	#8	13'-4"
h6	10	#4	23'-4"
h7	4	#6	12'-10"
h8	4	#8	12'-10"
h9	13	#4	11'-8"
s	43	#4	4'-1"
v	30	#4	7'-9"
v1	32	#4	10'-6"
v2	4	#5	10'-6"
w	14	#5	14'-8"
z	42	#6	7'-11"
Concrete Structures		Cu Yd	28.6
Reinforcement Bars		Pound	4866
Expansion Bolts ¾"		Each	26

NOTES:

Bench Mark: Chiseled "□" on Box Culvert Headwall 40' RT, Sta. 315+00.00, Elev. 586.73.

Design Fill Height <2' Lt.

Exposed edges shall be chamfered ¾".

Class SI Concrete shall be used throughout.

Reinforcement Bars shall conform to the requirements of AASHTO M31 or M322, Grade 60.

Bars indicated thus 12x4-#5 etc. indicates 12 lines of #5 bars with 4 lengths per line.

Nonmetallic water seal used in the wingwall joints shall extend from the top of the footing to within 6" of the top of the headwall.

For Backfilling and Embankment, see Standard Specifications.

Hooked Expansion Bolts shall consist of self-drilling expansion shields and hooked bolts. Hooked Bolts shall extend a minimum of 9" into new concrete.

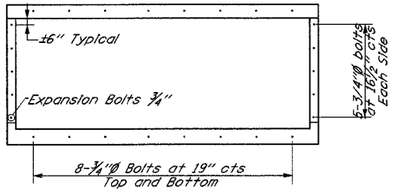
SPECIFICATION

1996 AASHTO with 1997, 1998, 1999, 2000 and 2002 Interims

DESIGN STRESSES

fy = 60,000 psi
f'c = 3,500 psi

LOADING HS 20-44



EXPANSION BOLT PLACEMENT DETAIL

REVISIONS NAME	DATE

ILLINOIS DEPARTMENT OF TRANSPORTATION

CULVERT EXTENSION DETAILS
℄ STA. 315+00.88 LT.
SHEET 4 OF 5

DRAWN BY BDM
CHECKED BY SJK
DATE 9/01