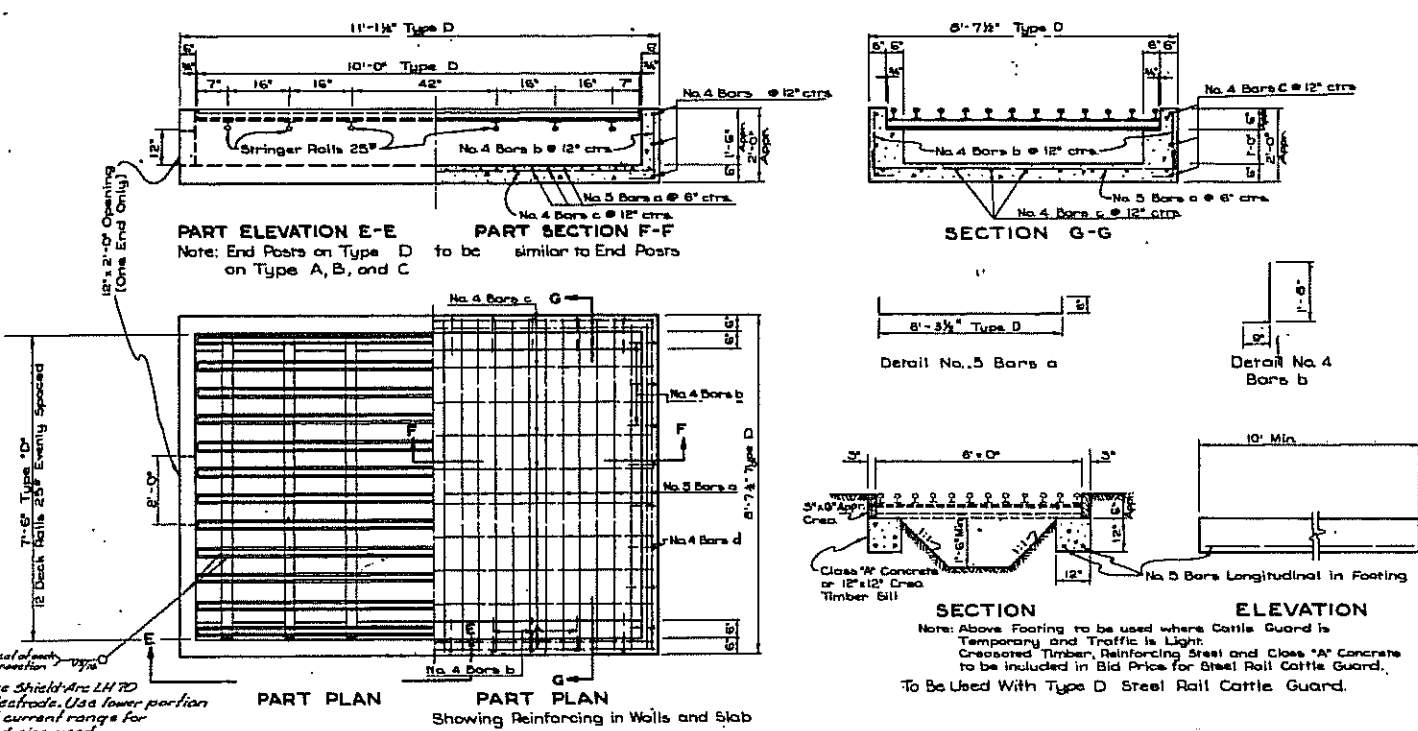
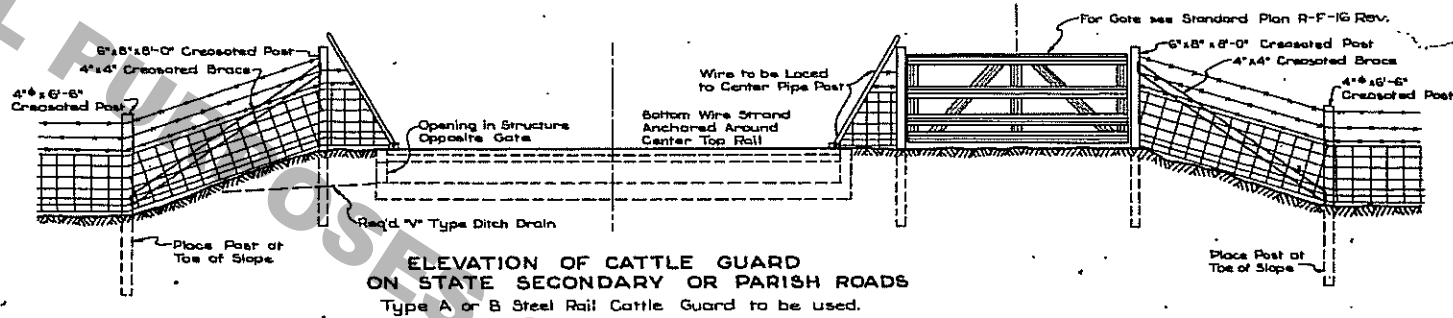
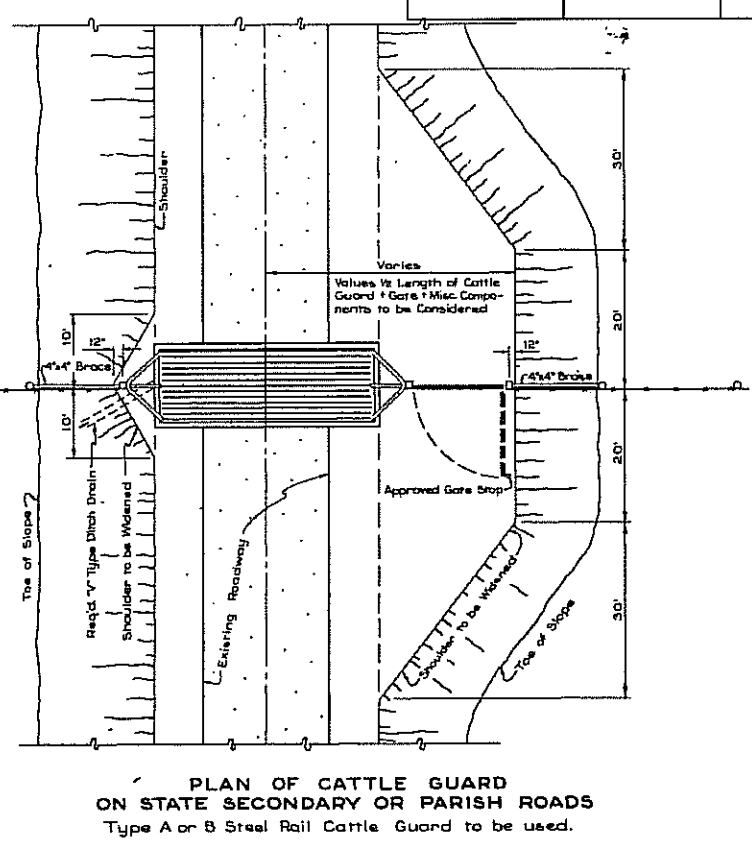
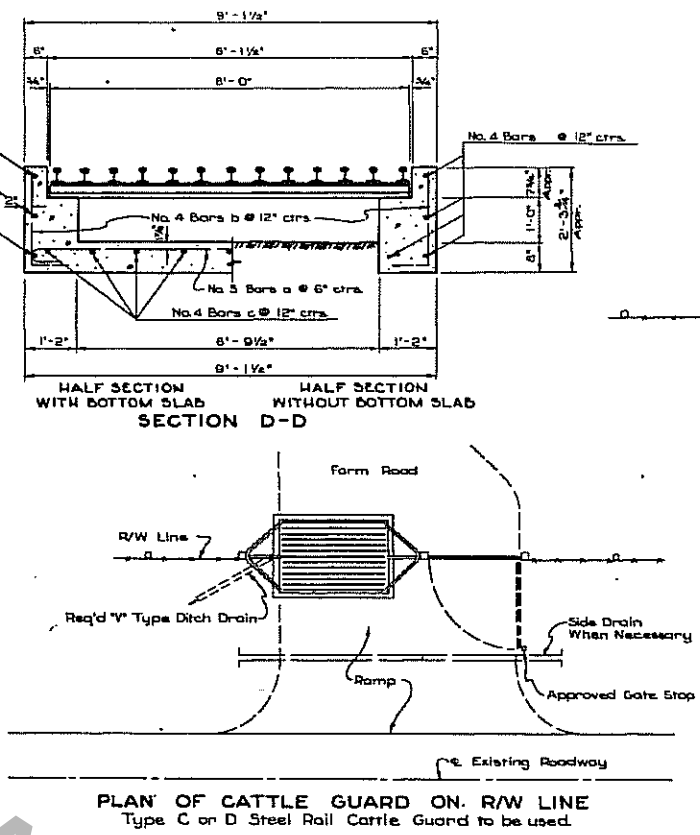
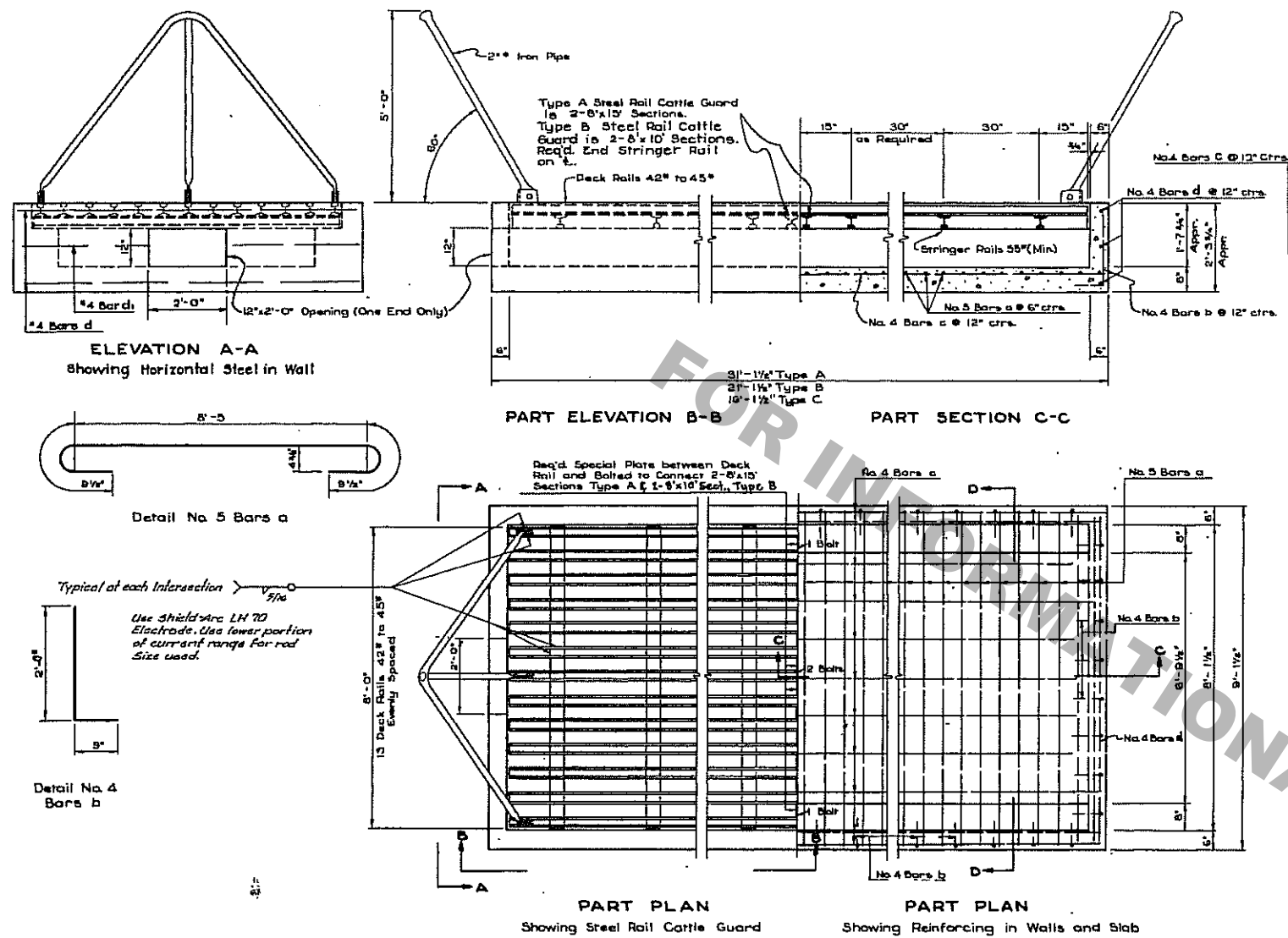




STEEL RAIL CATTLE GUARD		CONCRETE STRUCTURE		BILL OF MATERIAL										DEFORMED REINFORC. STEEL		FABRICATED CARBON STEEL		CLASS A CONCRETE	
				NO.	FT.	IN.	NO.	FT.	IN.	NO.	FT.	IN.	NO.	FT.	IN.	POUNDS	POUNDS	CU. YDS.	
A	8' x 30'	9'-1 1/2" x 31'-1 1/2"		62	10	0	74	2	9	15	50	10	5	8	10	1125	* 6239	10.86	
B	8' x 20'	9'-1 1/2" x 21'-1 1/2"		42	10	0	54	2	9	15	20	10	5	8	10	780	* 5607	7.50	
C	8' x 15'	9'-1 1/2" x 16'-1 1/2"		32	10	0	44	2	9	15	15	10	5	8	10	607	* 5849	5.82	
D	7'-6" x 10'	8'-7 1/2" x 11'-1 1/2"		22	9	0 1/2	34	2	5	15	10	10	5	8	4	408	1375	3.16	

Note: Proj. Engineer to check size of Ralls and Dimensions before permitting Materials to be ordered. Quantities shown above are for cattle guards with Bottom Slab. Cattle Guard to be paid for as a Unit, Complete in Place. Quantities shown for Fab. Carbon Steel do not include R's, Fastenings, Bolts, Welds, etc.

APPROVED: *Dempsey D. V. R.* DATE: 3-24-77
CHIEF ENGINEER



DETAIL OF APPROACHES TO CATTLE GUARD
To be used on all Gravel Roads or as directed by Project Engineer.

DATE	DESCRIPTION	BY
1/19/68	Stringer Rail Weight	H.J.C.
5/17/68	Add Working Size & Note	W.E.M.
11/20/68	Gate Sid. Revised	W.E.M.
6/21/69	Quantities Revised	W.E.M.
4/2/69	Bottom Slab Types A, B, C	B.L.B.
2/2/69	Type 'C' Dimensions	B.L.B.
7/5/69	Type 'C' & 'D' Quantities	B.L.B.
7/5/69	Retraced Rollo	B.L.B.
DATE	REVISIONS	BY

R-M-37

STANDARD PLAN
PORTABLE STEEL RAIL CATTLE GUARD
8' SPAN; 15', 20' AND 30' LENGTHS
7'-6" SPAN; 10' LENGTH
42" TO 45" DECK RAILS

STATE OF LOUISIANA
DEPARTMENT OF HIGHWAYS

DESIGNED	DETAILED B.L.B.	TRACED Rollo
CHECKED	CHECKED	CHECKED
IN CHARGE OF		