

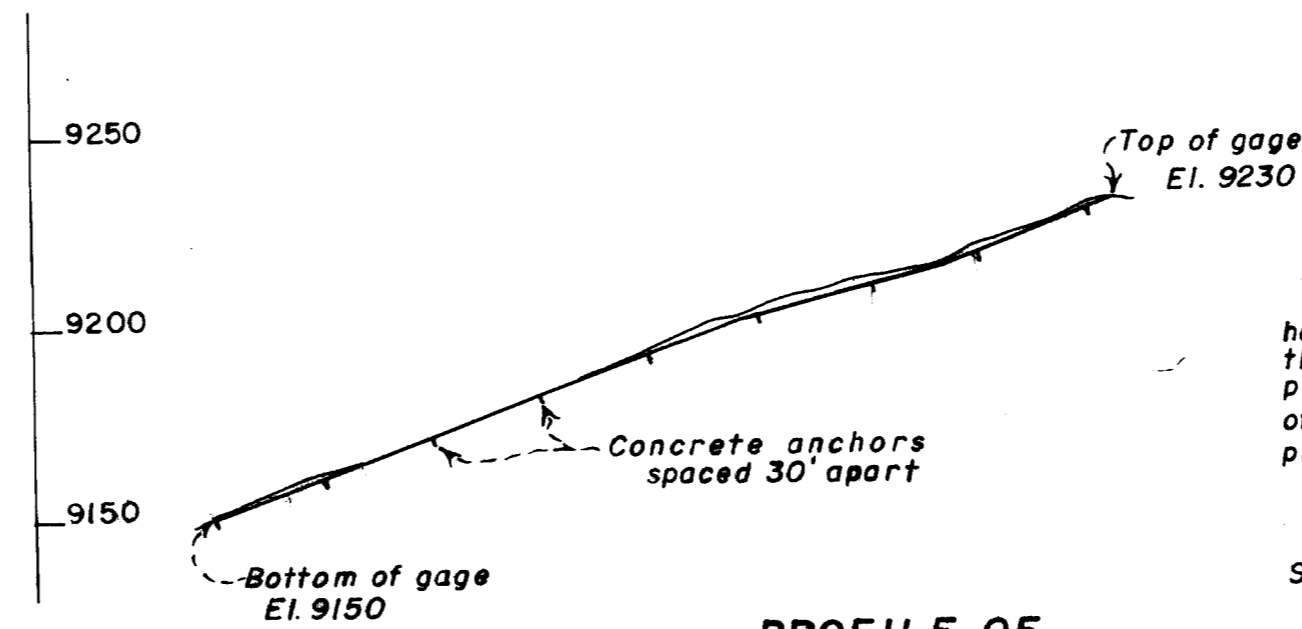
**ENGINEER'S CERTIFICATE**

Jay R. Bingham being duly sworn, certifies that he was employed to prepare plans and specifications for the dam proposed to be constructed in connection with the appropriation of water under application No. 16063, that these plans consisting of 3 sheets number 1 to 3 inclusive, indicate the information to be submitted for approval of said plans.

*Jay R. Bingham*  
Notary Public

Subscribed and sworn to me this 15 day of May, 1961.

*John A. Lambert*  
Notary Public



**OWNER'S CERTIFICATE**

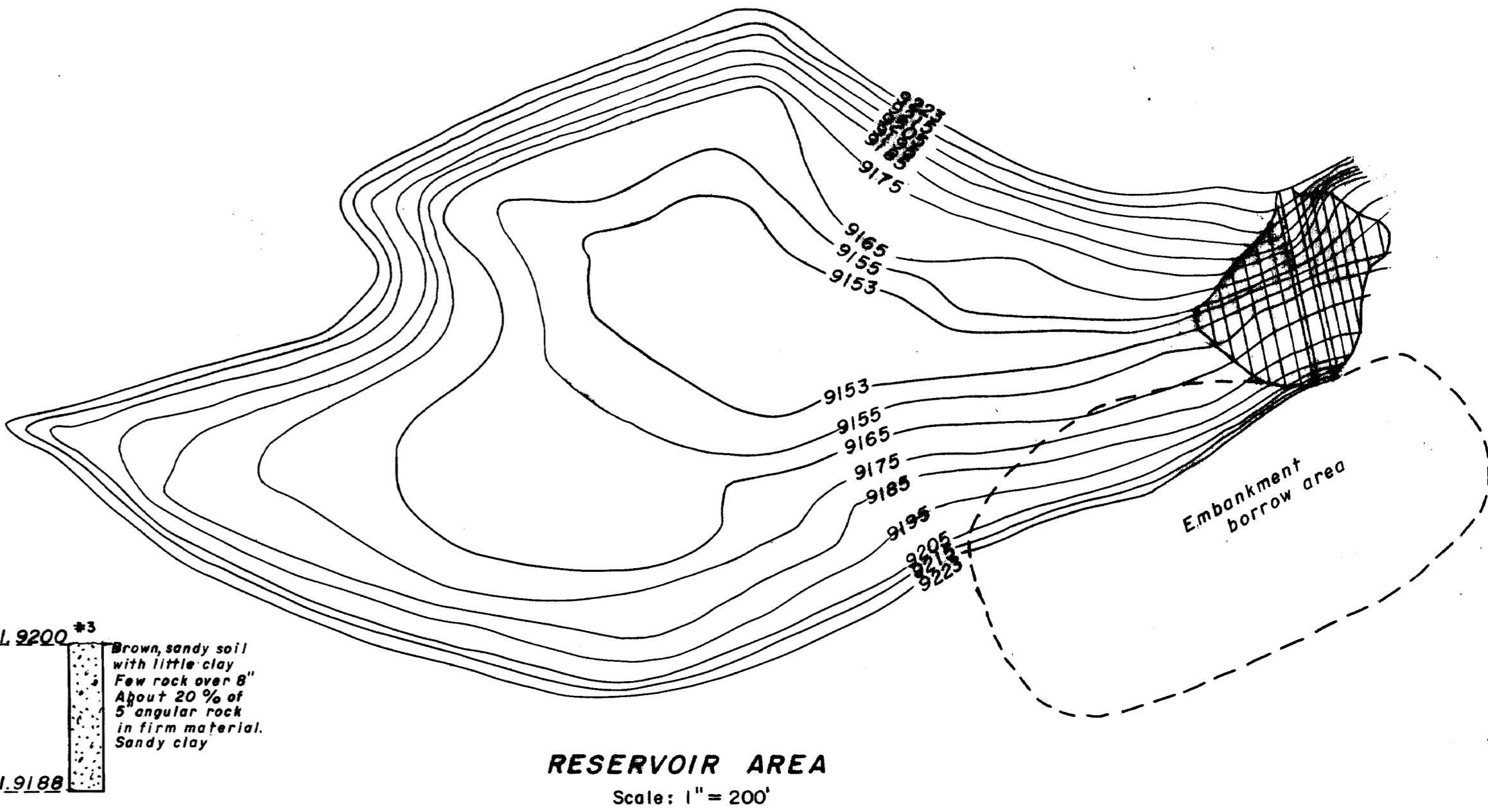
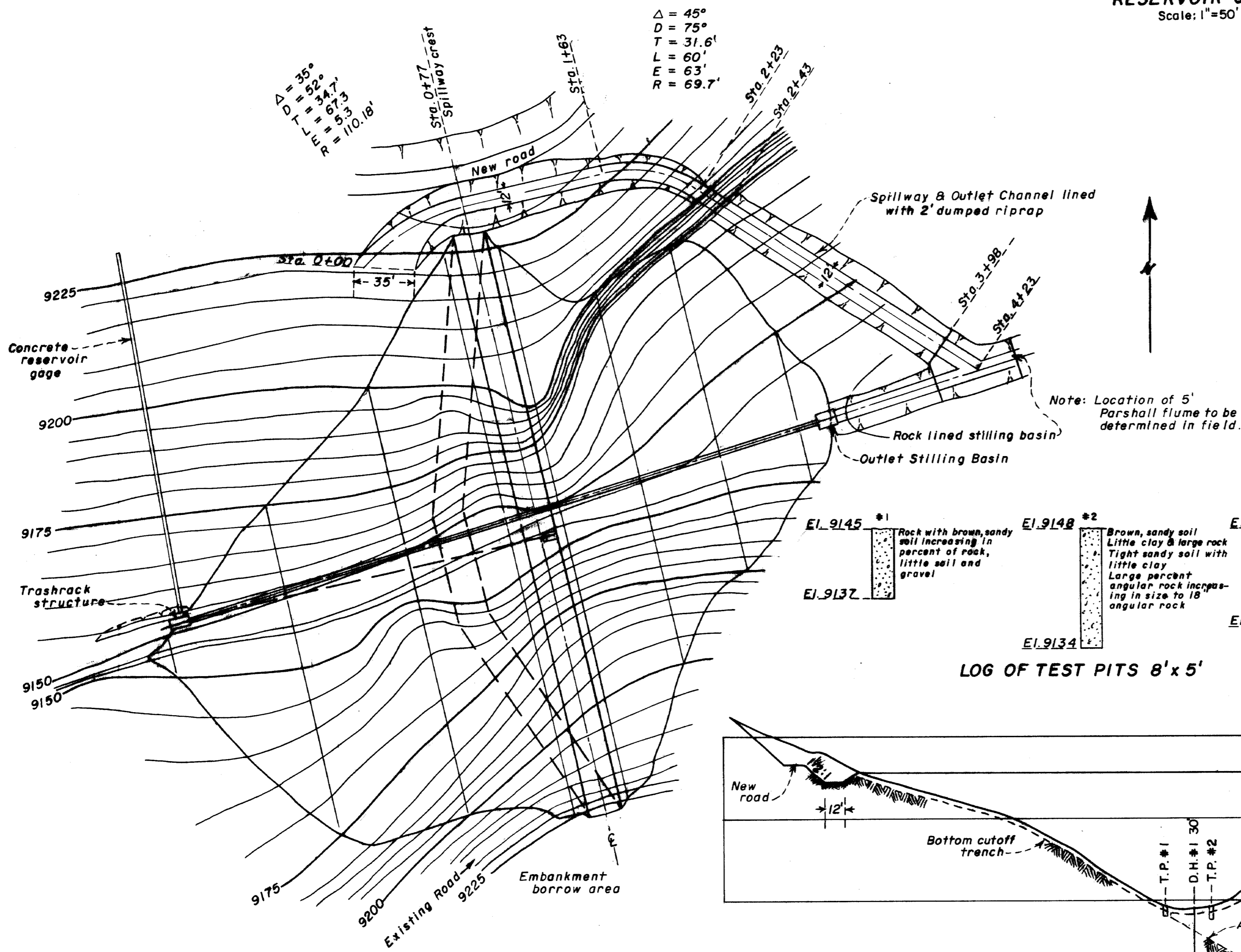
John A. Lambert being first duly sworn, certifies that he is president of the South Kamas-Washington Irrigation Co. and that the company employed Jay R. Bingham to prepare the accompanying plans for the dam to be constructed in connection with appropriation of water under application No. 16063 and that he hereby accepts these plans.

*John A. Lambert*  
Notary Public

Subscribed and sworn to before me this 30 day of June 1961.

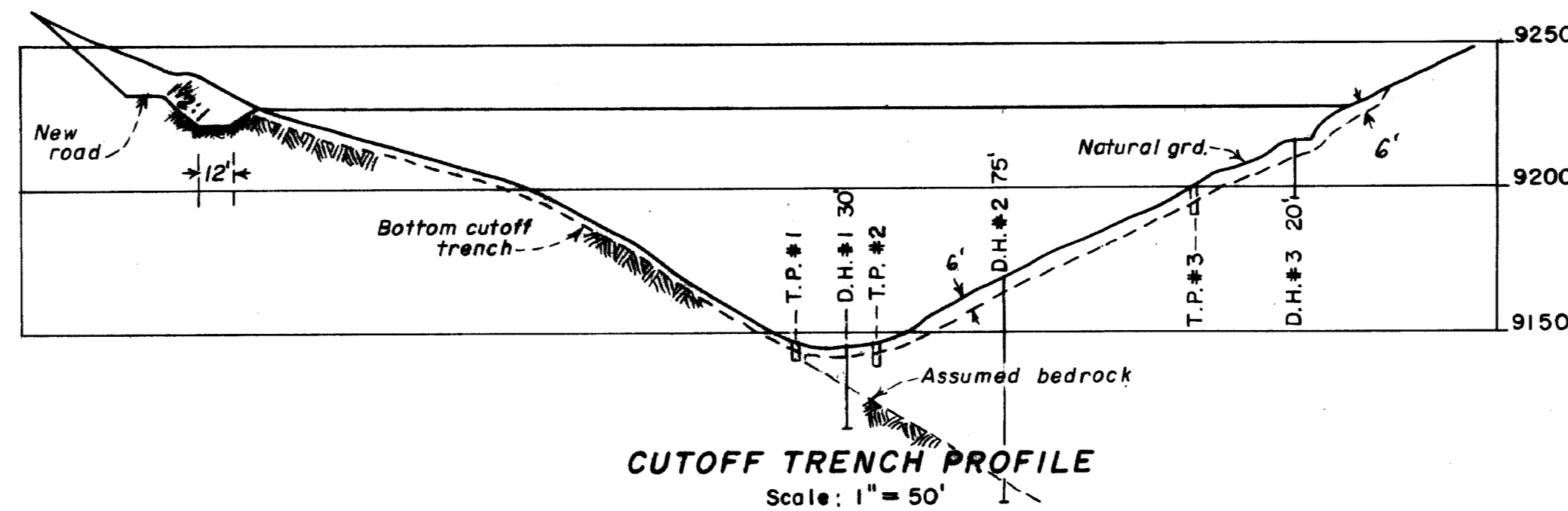
**AREA - CAPACITY TABLE**

Contour Elev.	Area at Contour (Acres)	Vert. Int. (Ft)	Volume between Contours (Ac. Ft.)	Reservoir Capacity at Contour (Ac. Ft.)
9153	3.29	2	10	10
9155	6.44	10	95	105
9165	12.65	10	150	255
9175	17.36	10	192	447
9185	21.08	10	226	673
9195	24.05	10	255	928
9205	27.02	10	280	1208
9215	28.91	8	239	1447
9223	30.92			



**LOG OF TEST PITS 8' x 5'**

EL. 9145	EL. 9148	EL. 9200
Rock with brown, sandy soil increasing in percent of rock, little soil and gravel	Brown, sandy soil Little clay & large rock Tight sandy soil with little clay Large percent angular rock increasing in size to 18" angular rock	Brown, sandy soil with little clay Few rock over 8" About 20% of 5" angular rock in firm material. Sandy clay
EL. 9137	EL. 9134	EL. 9188



**DAM**  
Scale: 1"=50'

STATE OF UTAH  
UTAH WATER AND POWER BOARD  
SOUTH KAMAS IRR. CO. & WASHINGTON IRR. CO

**LITTLE DEER CREEK DAM  
PLAN, PROFILE & STRUCTURES**

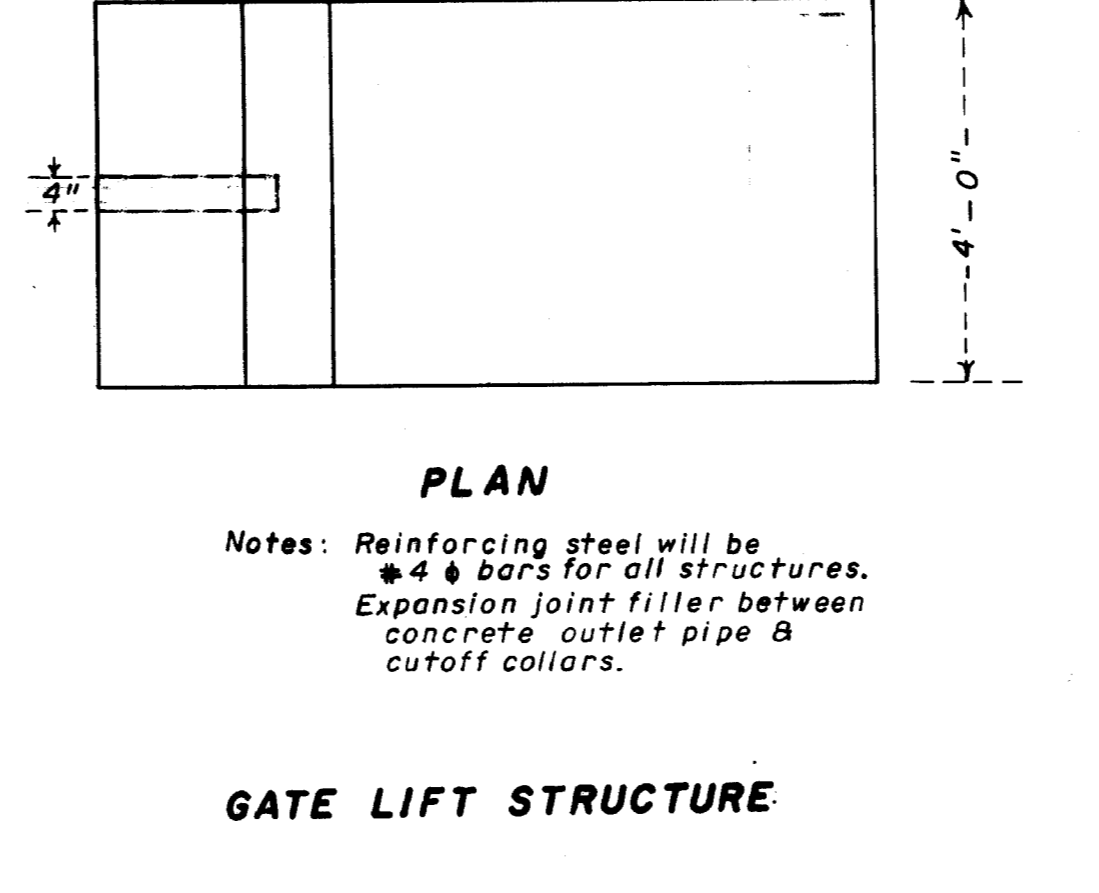
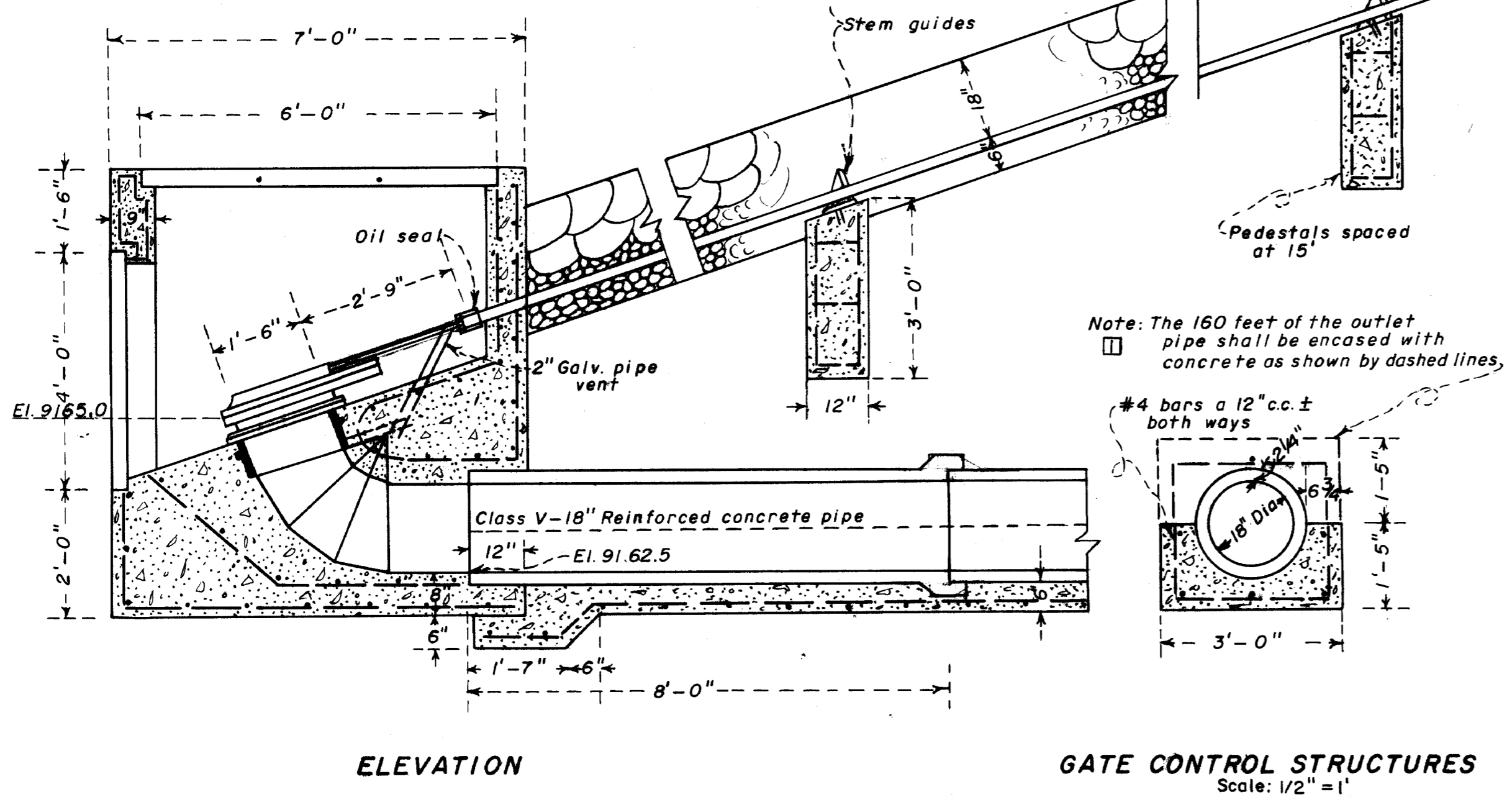
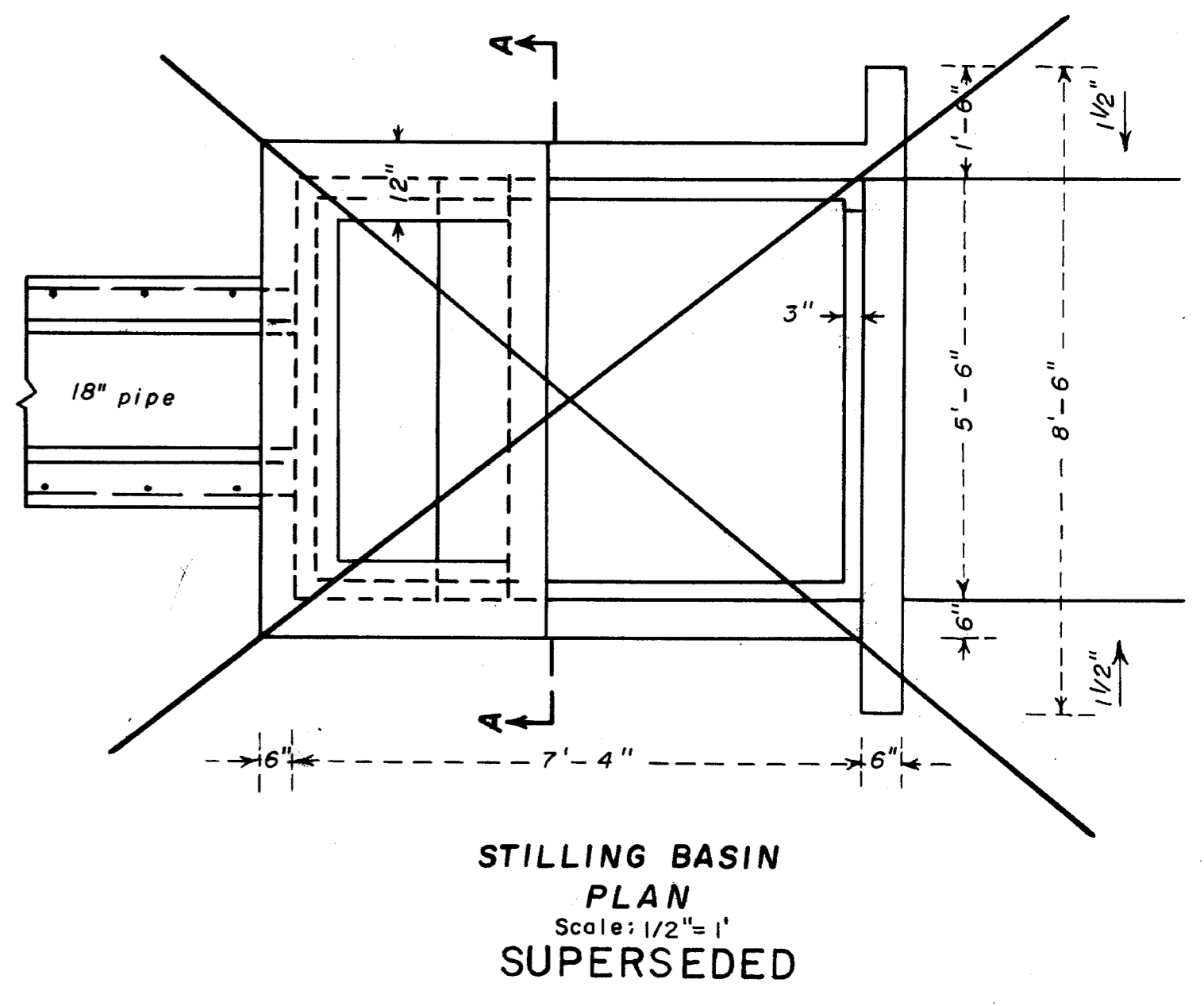
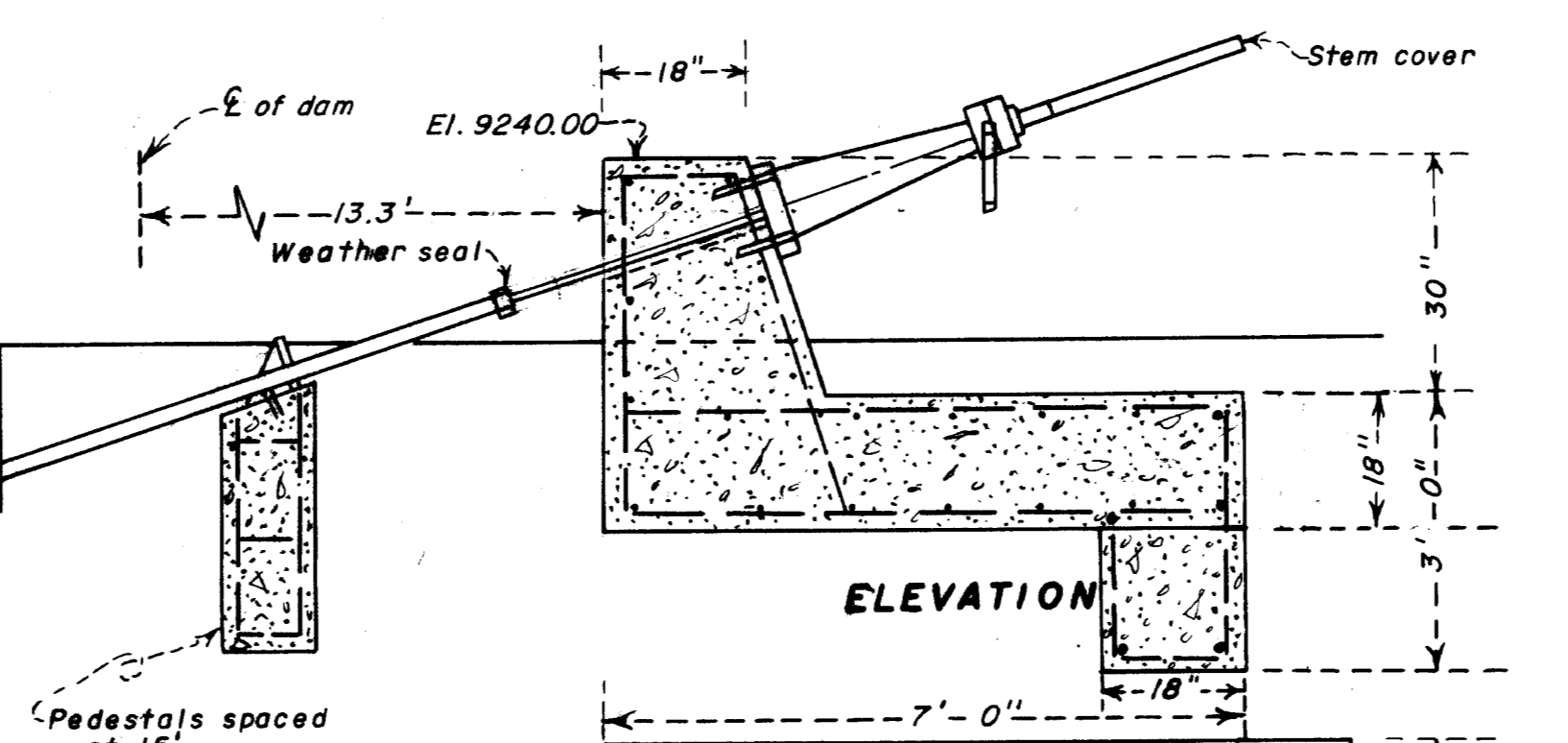
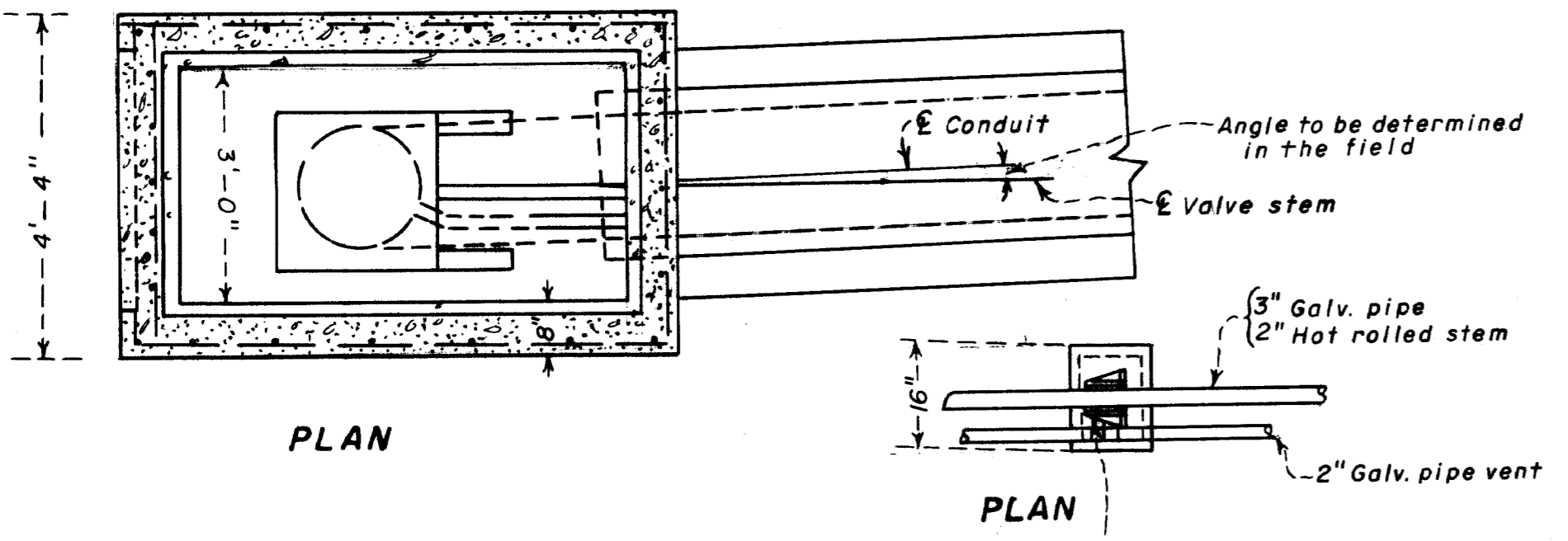
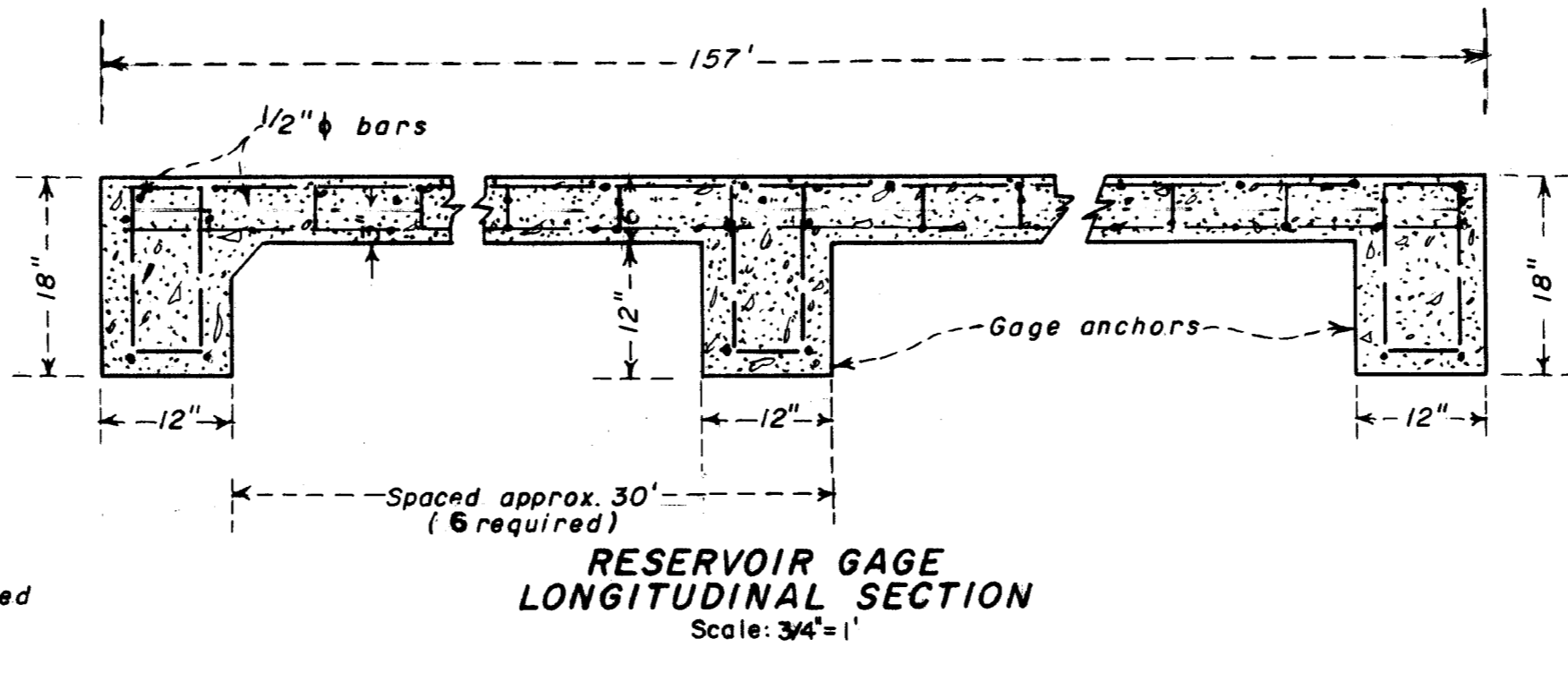
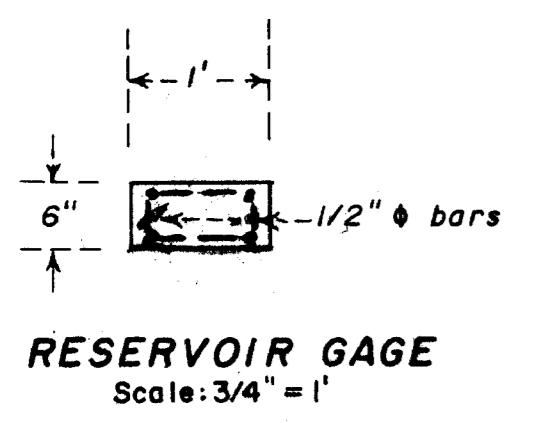
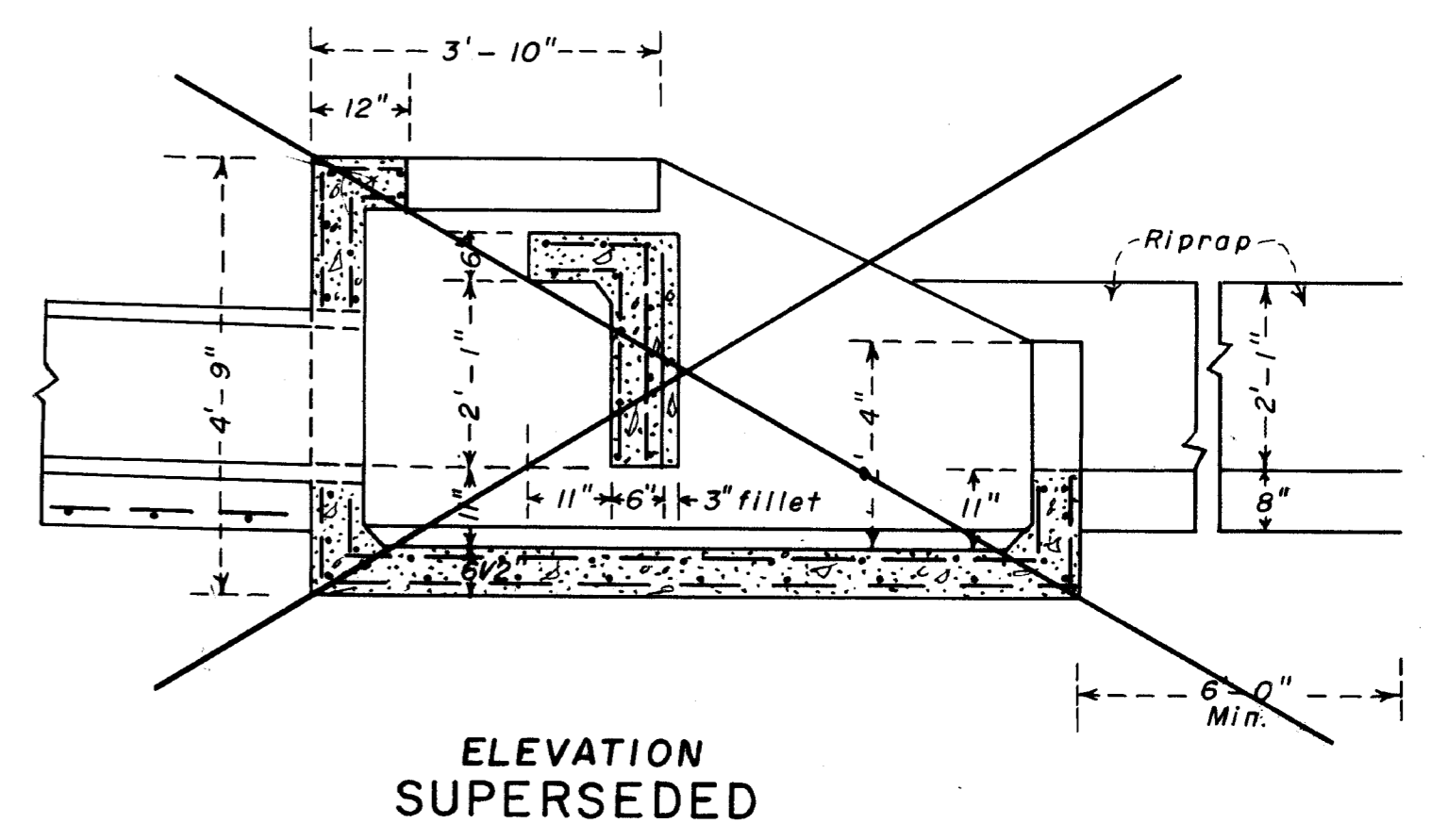
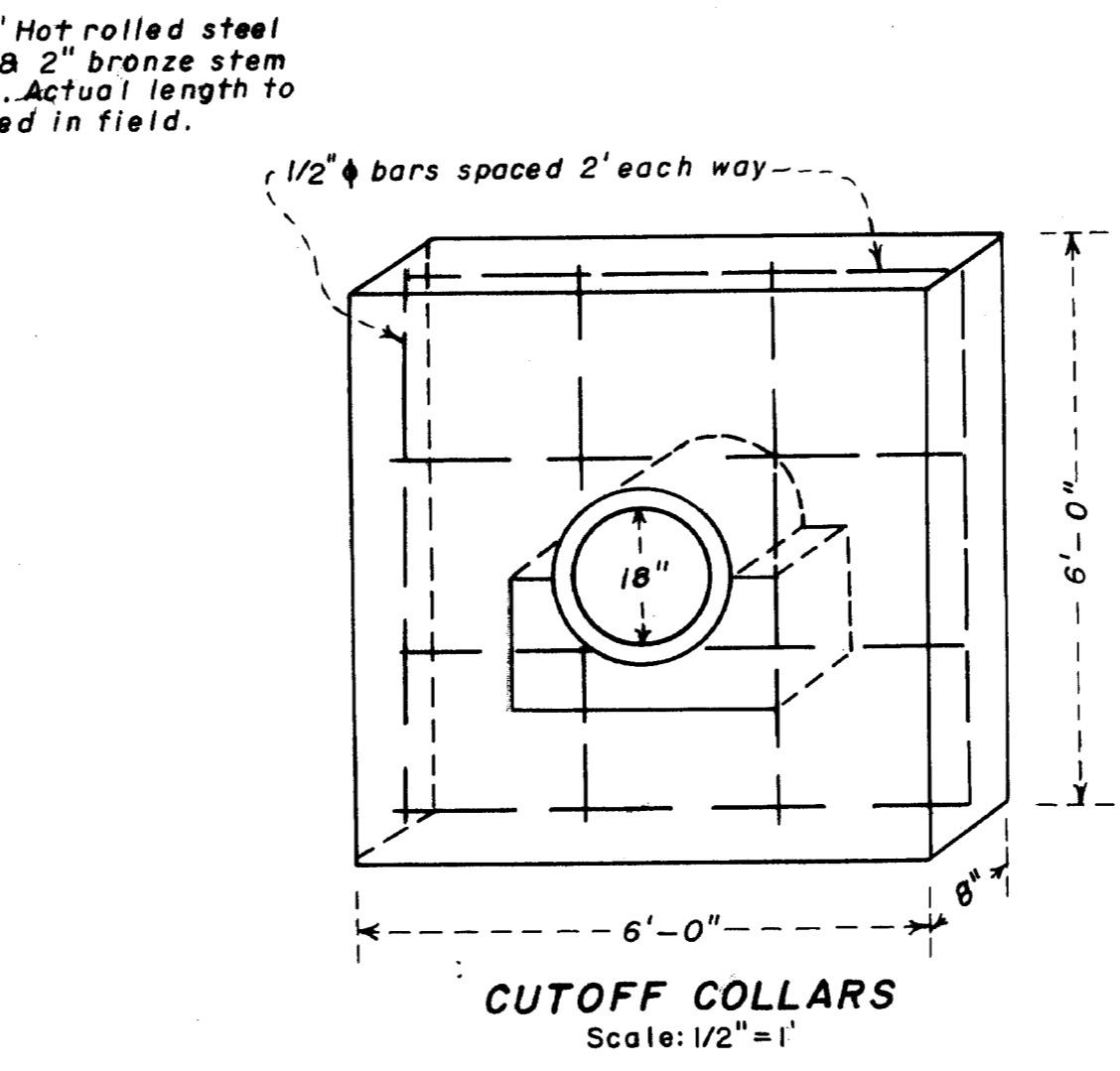
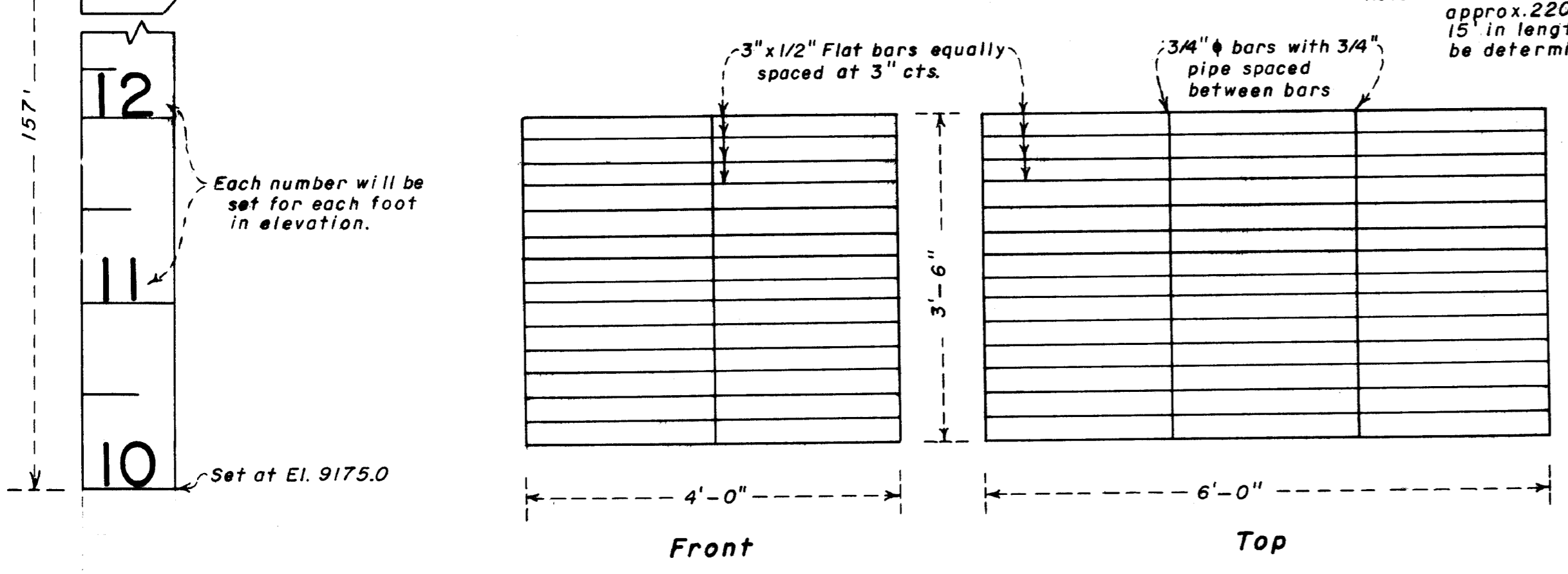
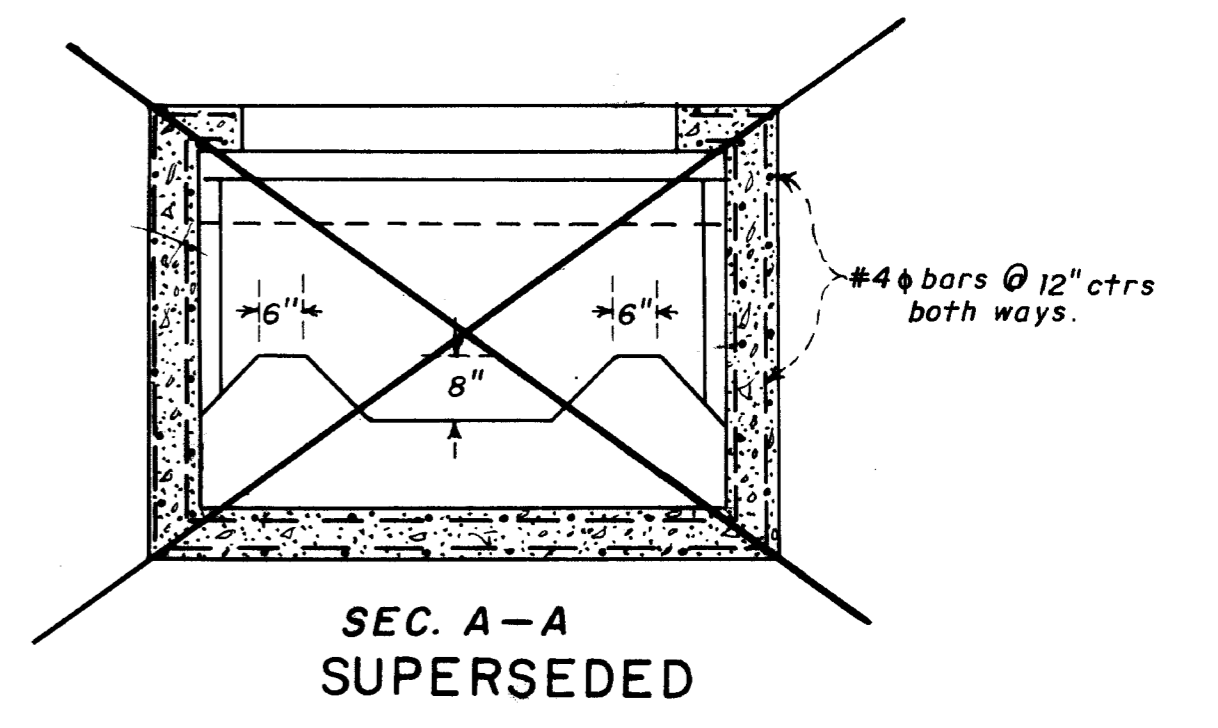
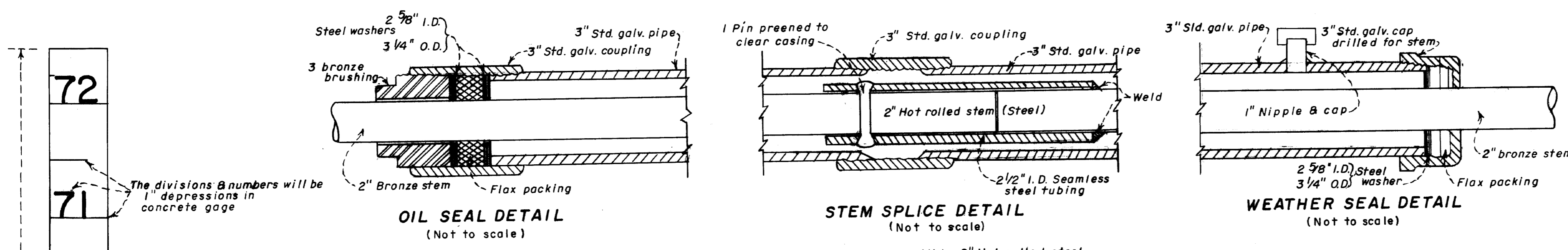
SCALE As shown COUNTY Wasatch  
DRAWN R.H.Z. SUBMITTED *Ray M. Jorgensen*  
TRACED A.B.F. RECOMMENDED  
CHECKED *Ray M. Jorgensen* APPROVED *Jay R. Bingham*

DATE Mar. 1961 APPLICATION 16063 SHT 1 OF 3

Little Deer Creek Res

D-436-p 144

Mar 31, 1961  
May 23, 1961  
*Wayne D. Cuddle*  
STATE ENGINEER



As constructed. August 1962  
Revised August 1961

STATE OF UTAH  
UTAH WATER AND POWER BOARD  
SOUTH KAMAS IRR. CO. & WASHINGTON IRR. CO.

**LITTLE DEER CREEK DAM  
OUTLET CONDUIT & STRUCTURES**

SCALE As shown COUNTY Wasatch

DRAWN R.H.Z. SUBMITTED Roy H. Zenger

TRACED A.B.E. RECOMMENDED

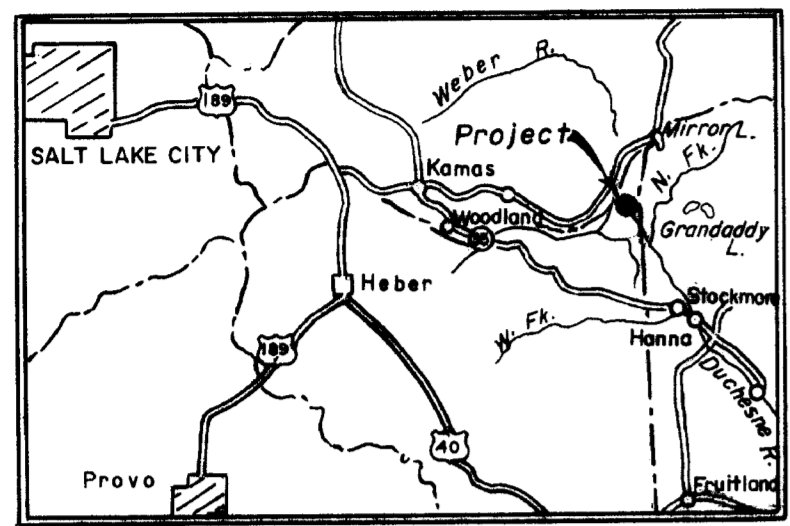
CHECKED R.H.Z. APPROVED Roy H. Zenger

DATE Mar. 1961 APPLICATION 16063 SHT 2 OF 4

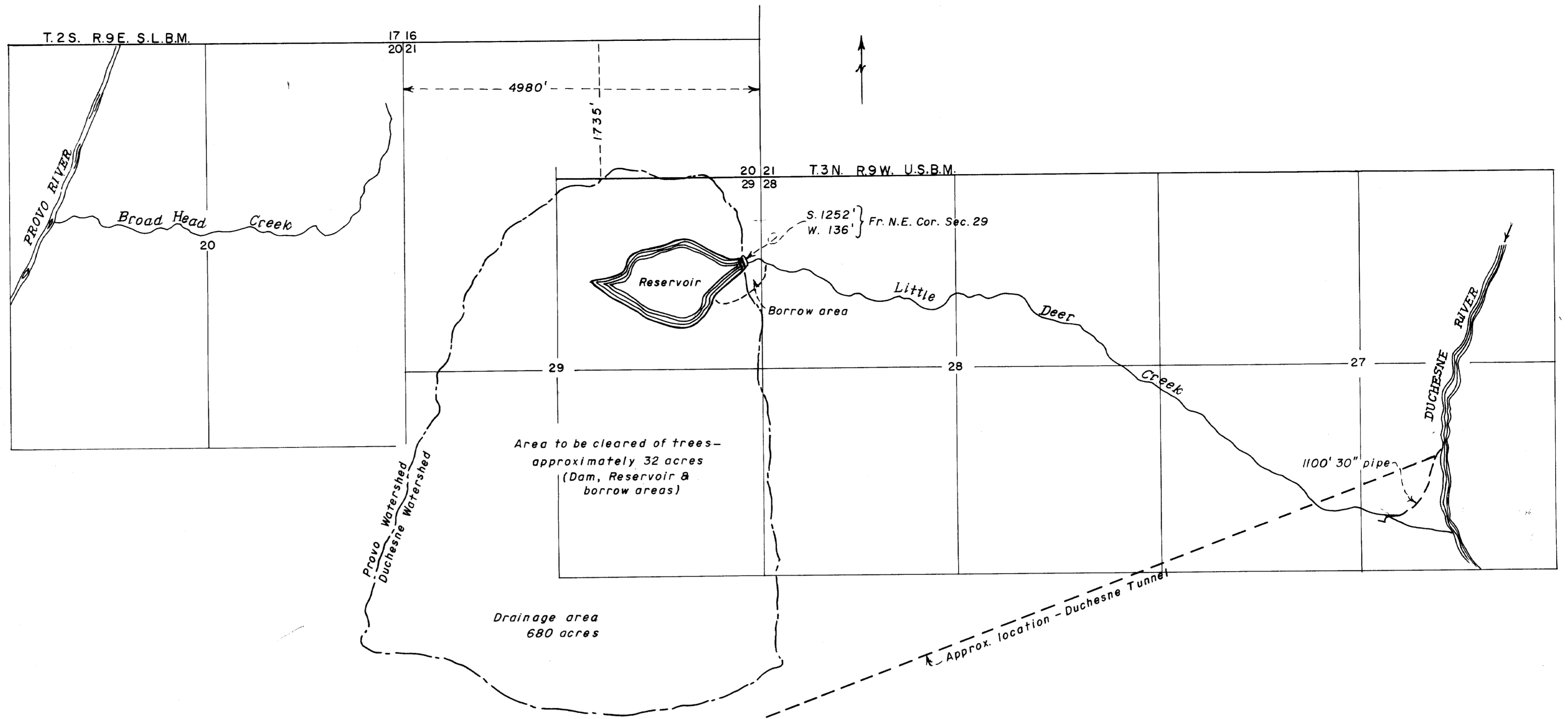
Mar 31, 1961

May 23, 1961  
Roy H. Zenger  
STATE ENGINEER

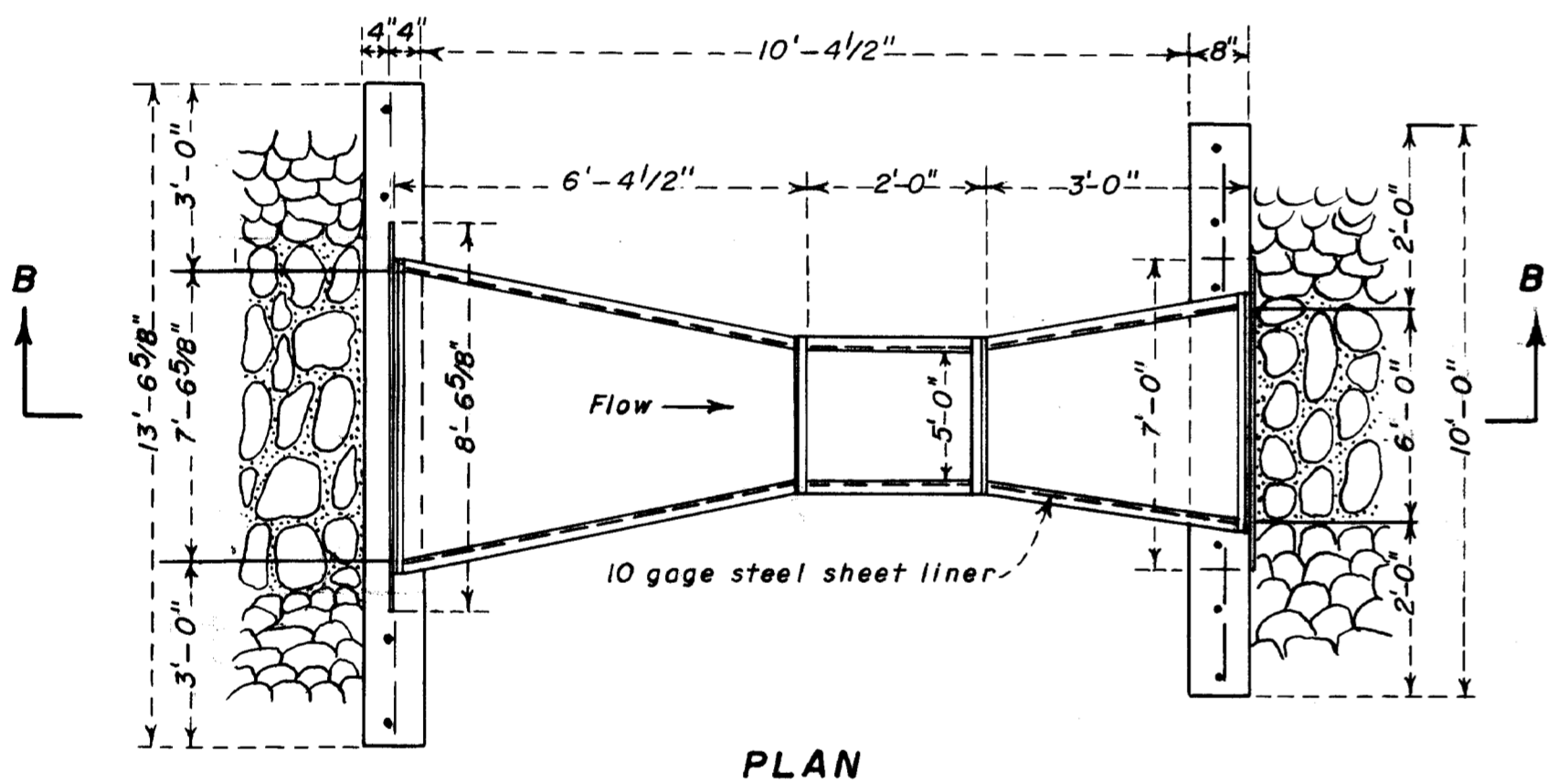
Little Deer Creek Res D-11-36-p 142



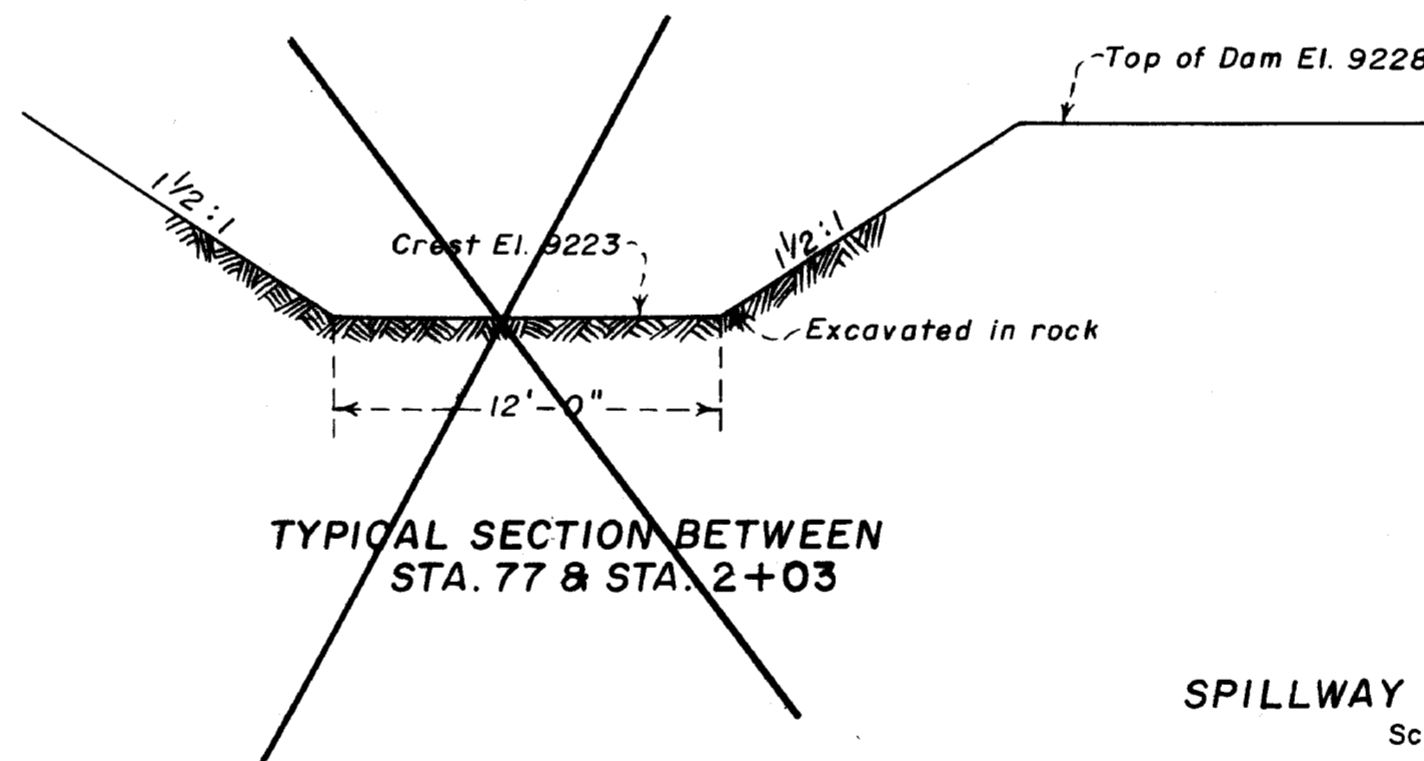
LOCATION MAP  
SCALE 0 10 20 30



VICINITY MAP  
Scale: 1"=1000'



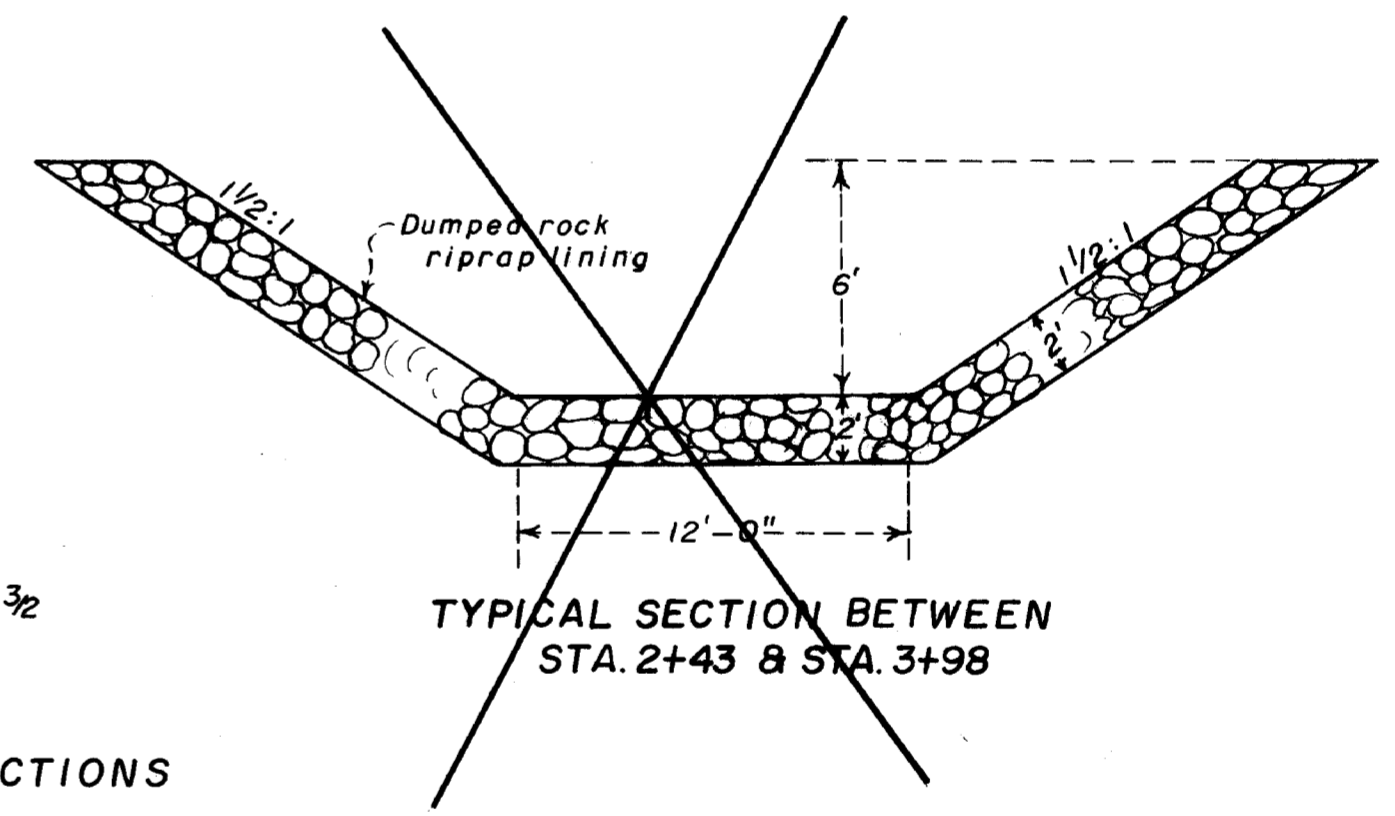
PLAN



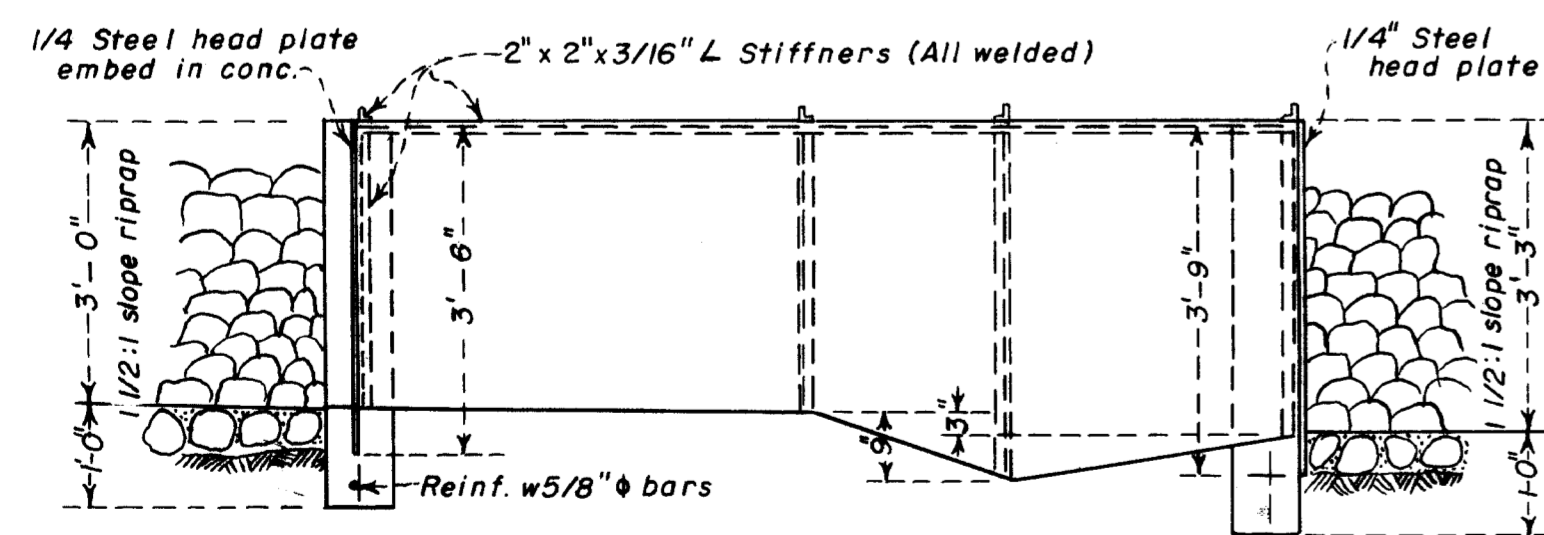
TYPICAL SECTION BETWEEN STA. 77 & STA. 2+03  
SUPERSEDED

Assumed  
C = 3.00  
H = 2'  
L = 12'  
Crest Q = CLH<sup>3/2</sup>

SPILLWAY CROSS SECTIONS  
Scale: 1"=6'



TYPICAL SECTION BETWEEN STA. 2+43 & STA. 3+98  
SUPERSEDED



SEC. B-B  
PARSHALL FLUME DETAILS  
Scale: Not to scale

Note: One flume required to be located below Outlet of Dam.

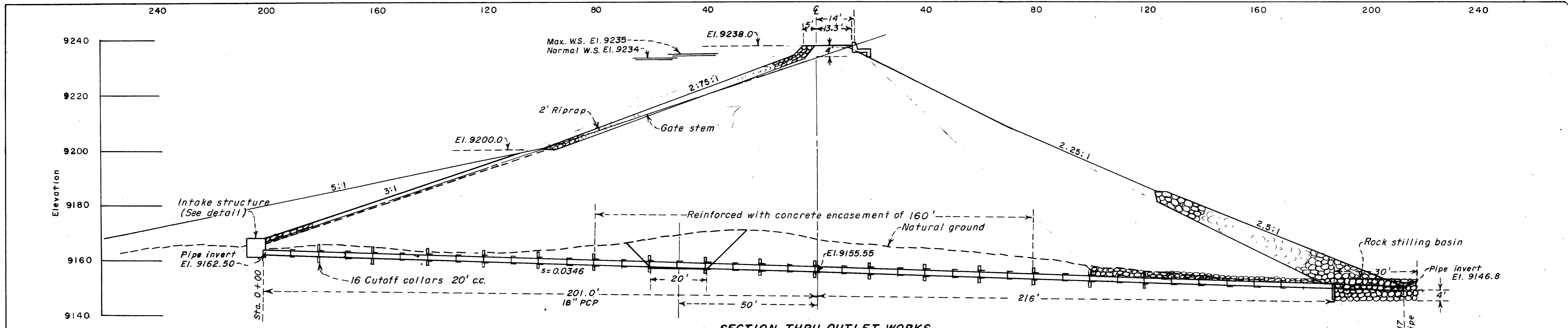
As constructed Aug. 1962

STATE OF UTAH UTAH WATER AND POWER BOARD SOUTH KAMAS IRR. CO. & WASHINGTON IRR. CO.		
<b>LITTLE DEER CREEK DAM MISCELLANEOUS ITEMS</b>		
SCALE As shown	COUNTY Wasatch	
DRAWN R.H.Z.	SUBMITTED Roy H. Jenger	
TRACED A.B.E.	RECOMMENDED	
CHECKED R.H.Z.	APPROVED Roy H. Jenger	
DATE Mar. 1961	APPLICATION 16063	SHT 3 OF 4

Mar 31, 1961

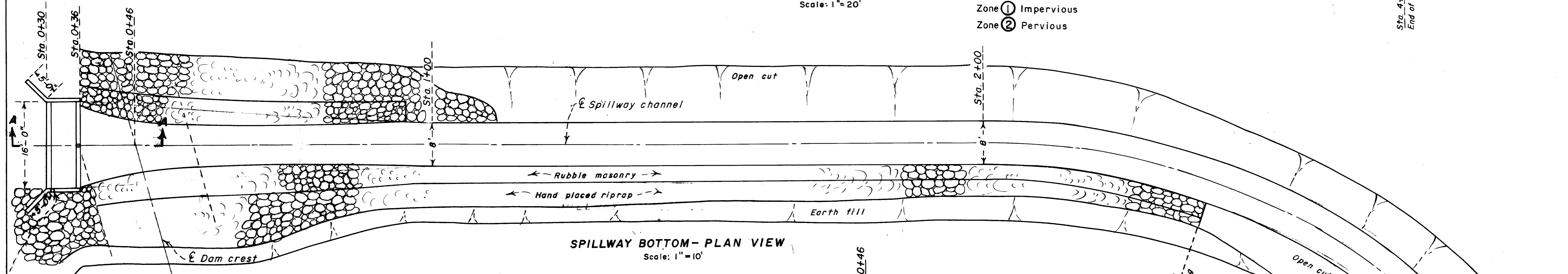
Little Deer Creek Res May 23, 1961  
Wayne D. Cribble  
STATE ENGINEER  
D-H-36 p 140



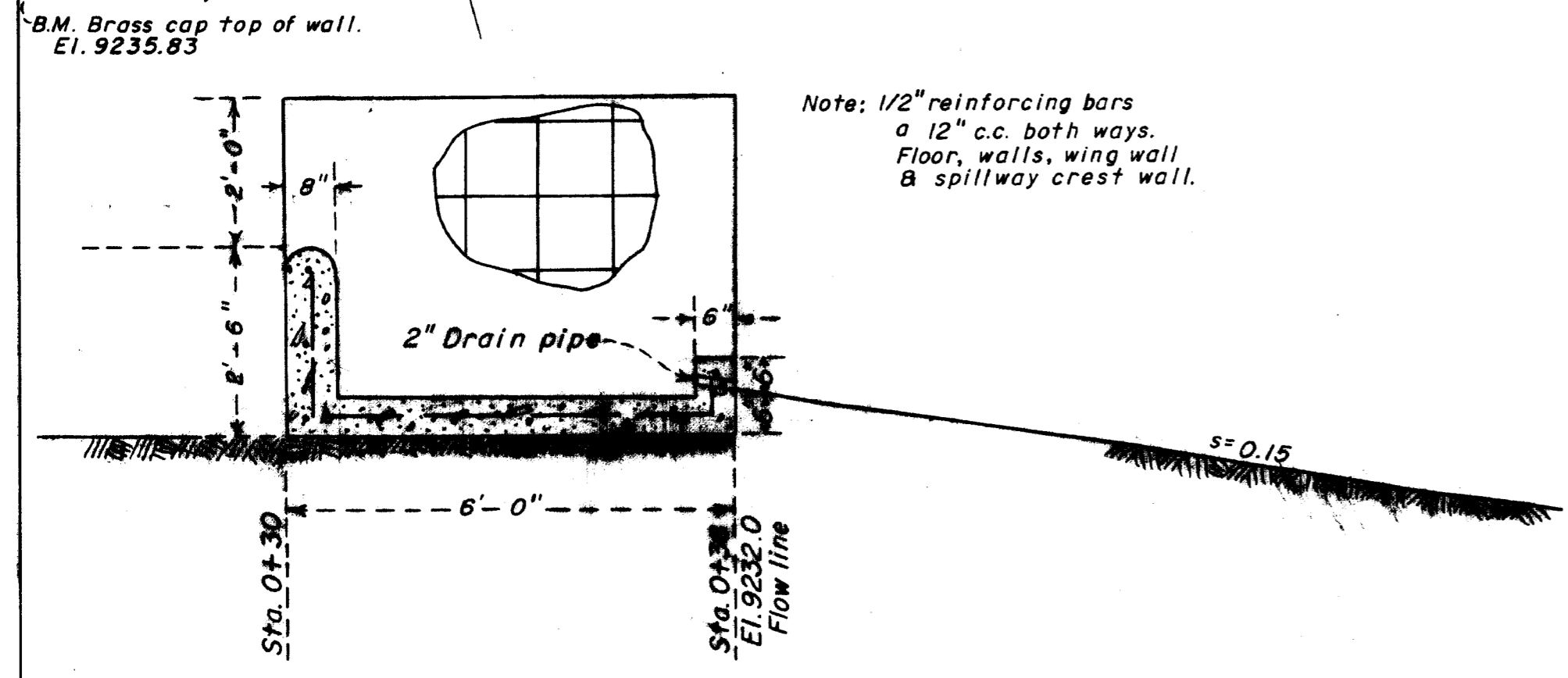


SECTION THRU OUTLET WORKS  
Scale: 1" = 20'

Zone ① Impervious  
Zone ② Pervious

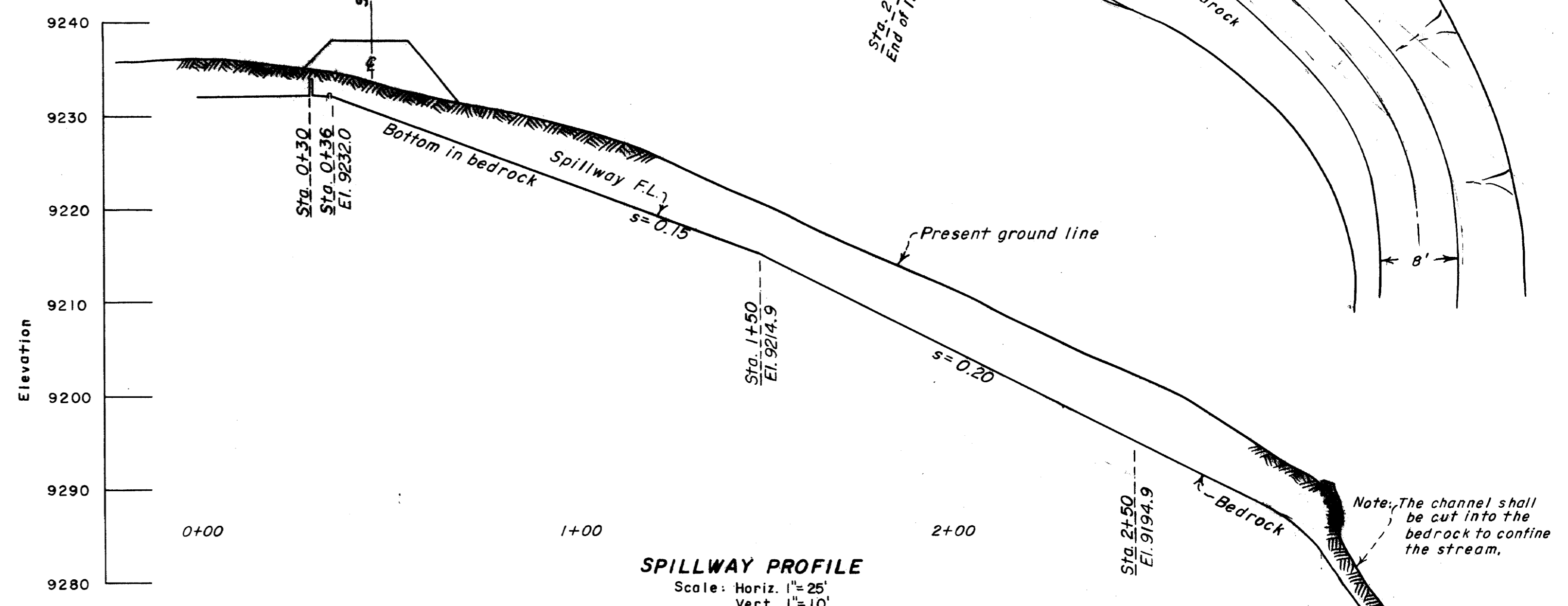


SPILLWAY BOTTOM-PLAN VIEW  
Scale: 1" = 10'



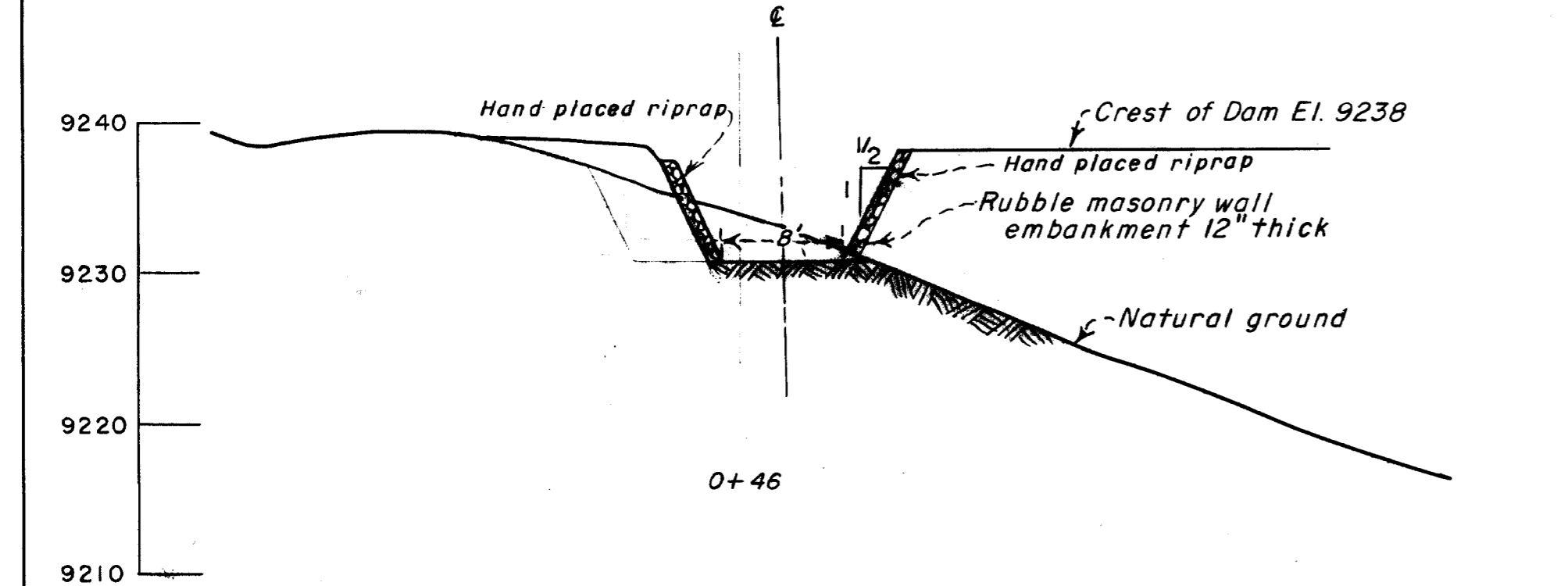
SECTION A-A  
SPILLWAY INLET  
Scale: 1" = 2'

Note: 1/2" reinforcing bars  
@ 12" c.c. both ways.  
Floor, walls, wing wall  
& spillway crest wall.

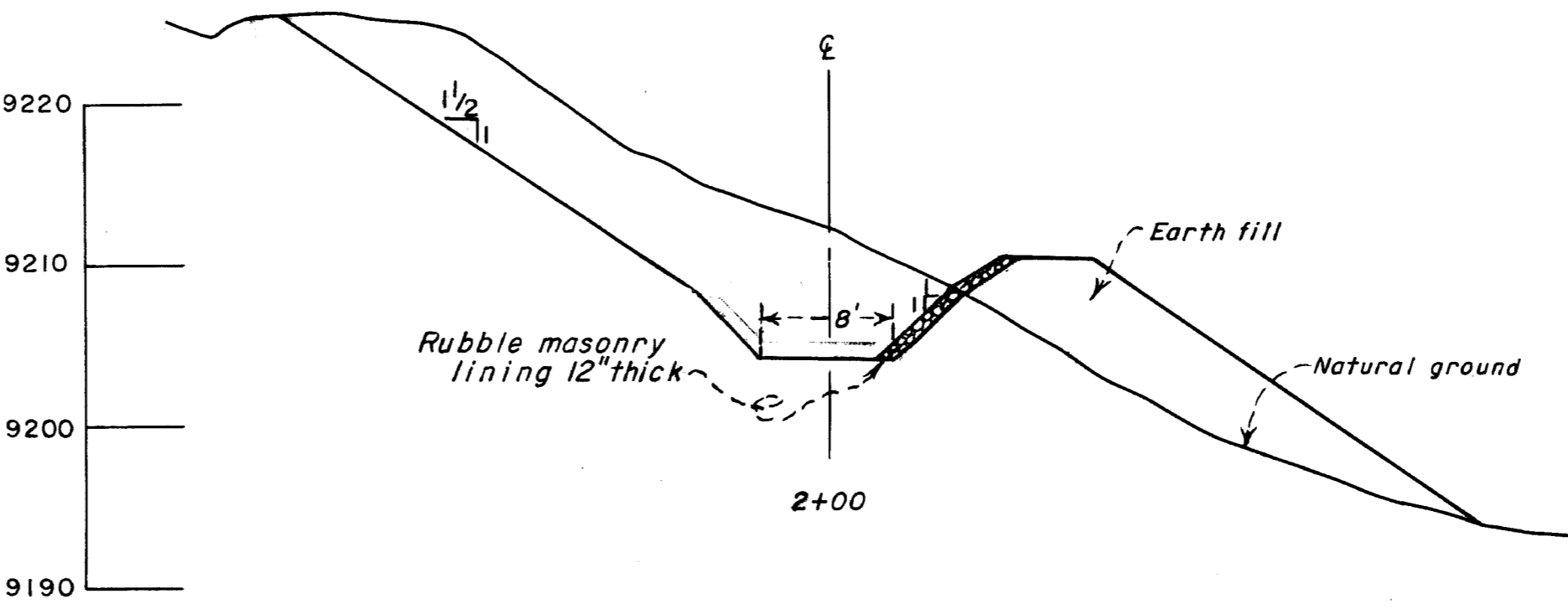


SPILLWAY PROFILE  
Scale: Horiz. 1" = 25'  
Vert. 1" = 10'

Note: The channel shall  
be cut into the  
bedrock to confine  
the stream.



TYPICAL SPILLWAY SECTIONS  
Scale: 1" = 10'



As constructed Aug. 1962  
Revised August 1961 New sheet. Replaces 1 of 3

STATE OF UTAH  
UTAH WATER AND POWER BOARD  
SOUTH KAMAS IRR. CO. & WASHINGTON IRR. CO.

**LITTLE DEER CREEK DAM  
OUTLET & SPILLWAY DETAILS**

SCALE As shown COUNTY Wasatch

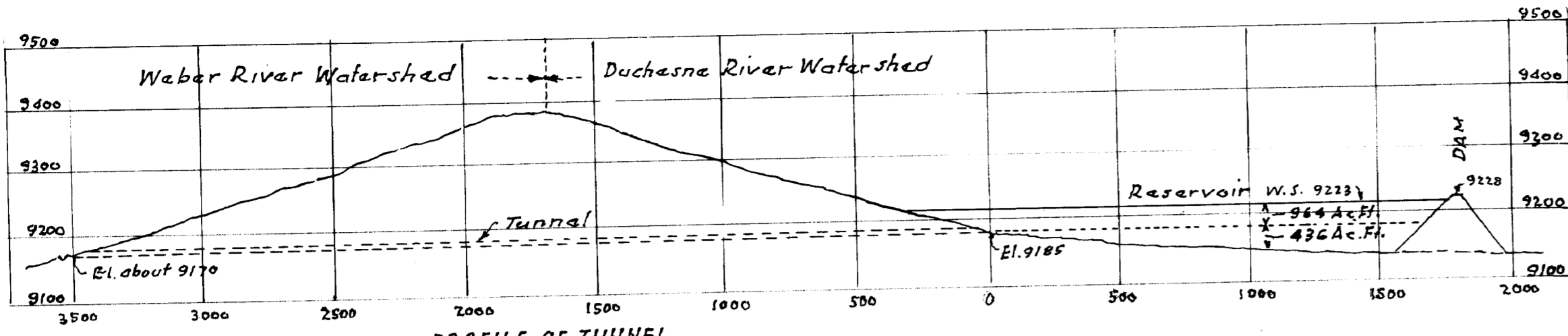
DRAWN E.L.B. SUBMITTED  
TRACED A.B.E. RECOMMENDED  
CHECKED APPROVED

DATE Aug. 1961 APPLICATION 16063 SHT 4 OF 4

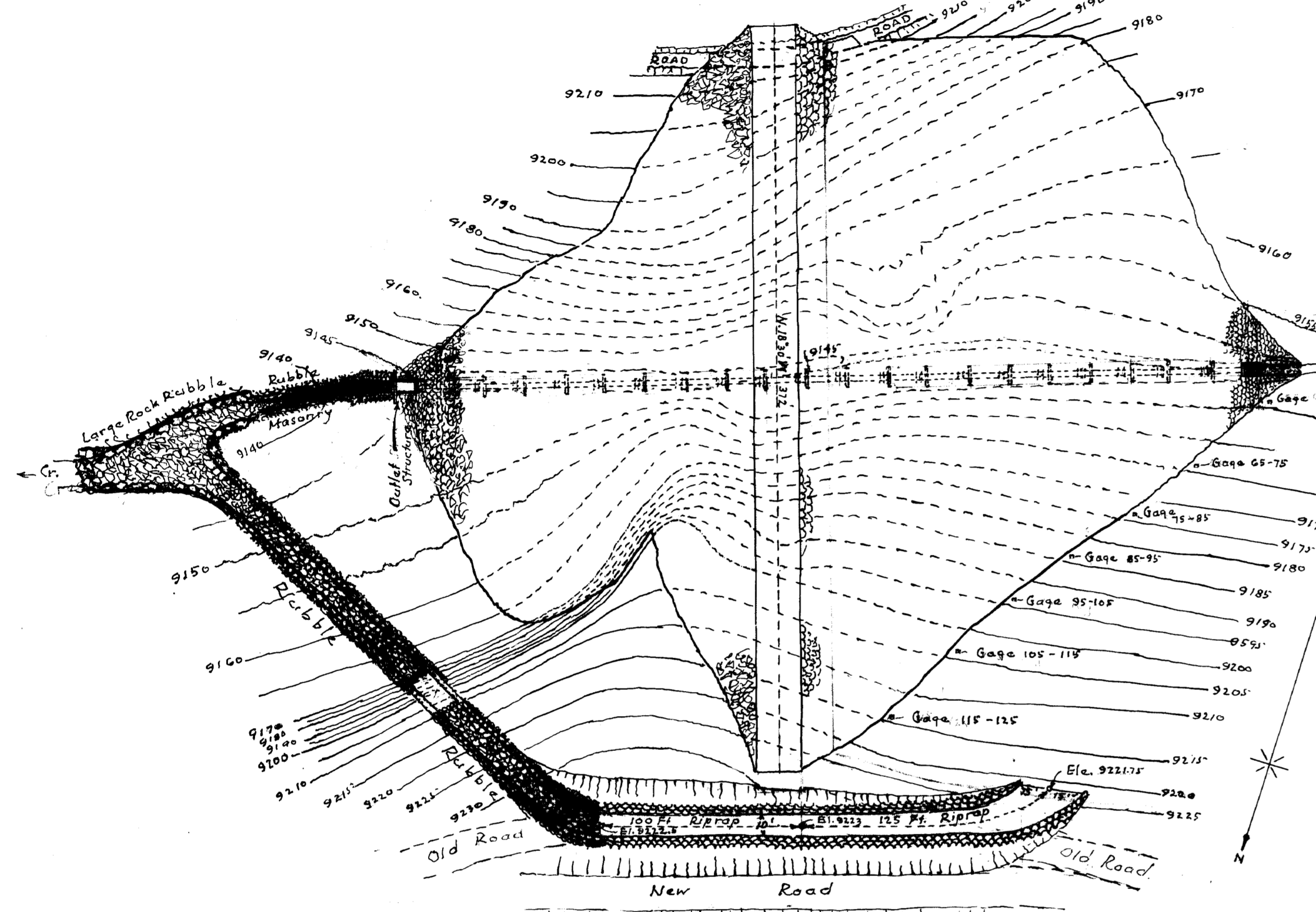
Wayne B. Criddle 8/31/61  
Little Deer Creek Res H. 36. 142a

AREA-CAPACITY TABLE

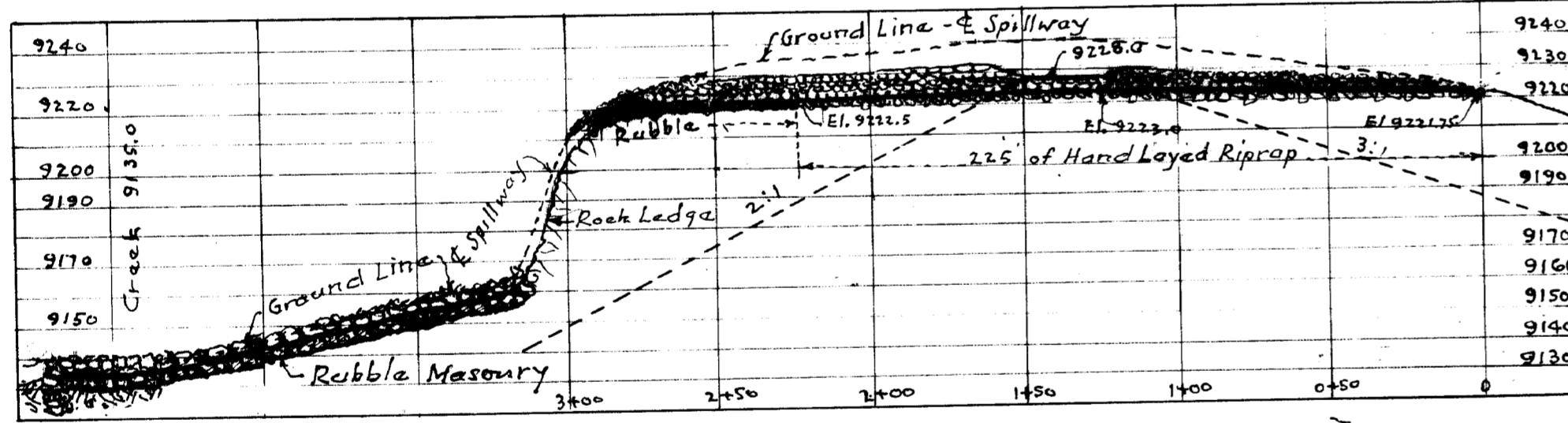
Contour	AREA		Contour Interval	Ac. Ft.	TOTAL Ac. Ft.
	Sq. In.	Acres			
9153	3.98	3.63	5.01	10	10
9155	7.0	6.40	9.40	10	104
9165	13.5	12.40	14.65	10	146
9175	18.4	16.90	18.60	10	186
9185	22.1	20.30	21.95	10	220
9195	25.7	23.60	25.0	10	250
9205	28.7	26.40	26.9	10	269
9215	29.8	27.4	28.1	8	275
9223	31.4	28.8			1400



PROFILE OF TUNNEL  
Hor. - 1" = 500 Ft.  
Vert. - 1" = 200 Ft.

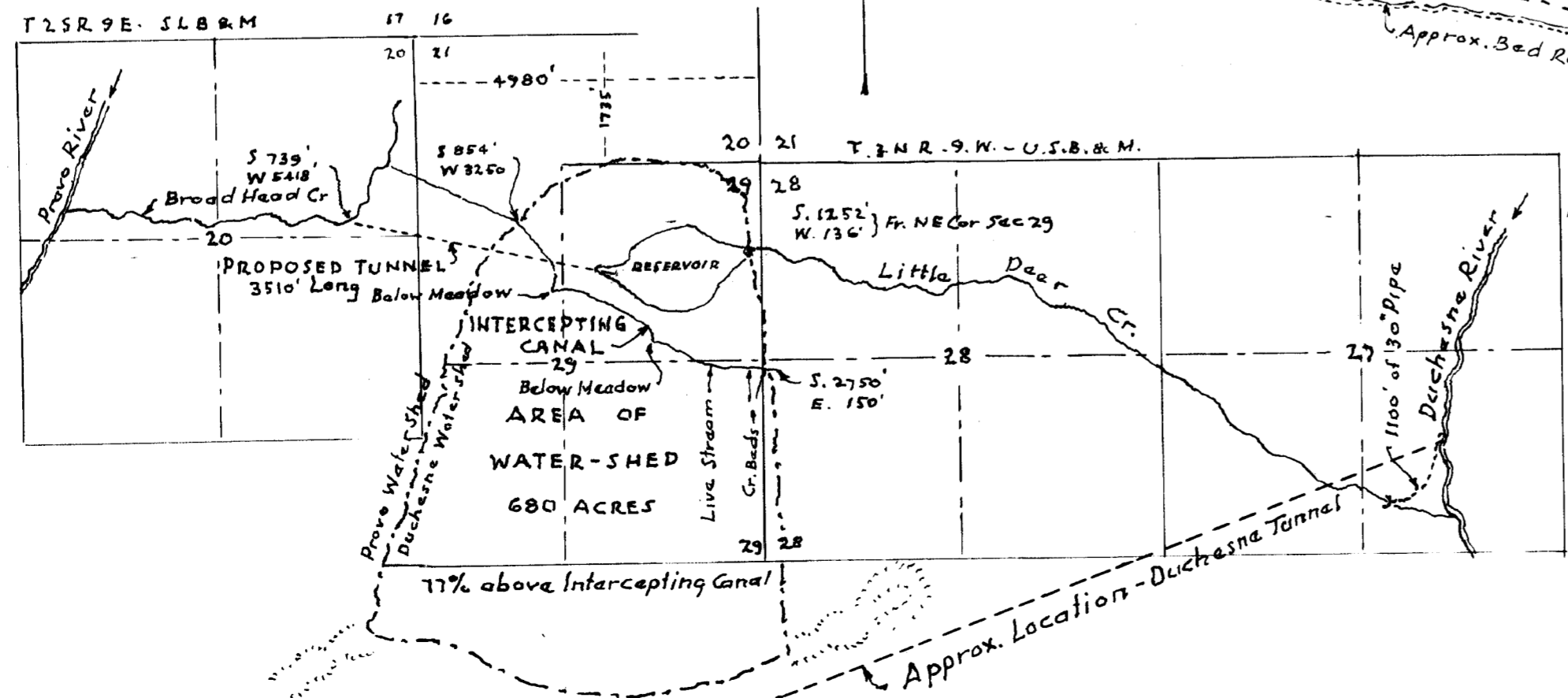


MAP OF DAM  
Scale: 1" = 50 Ft.

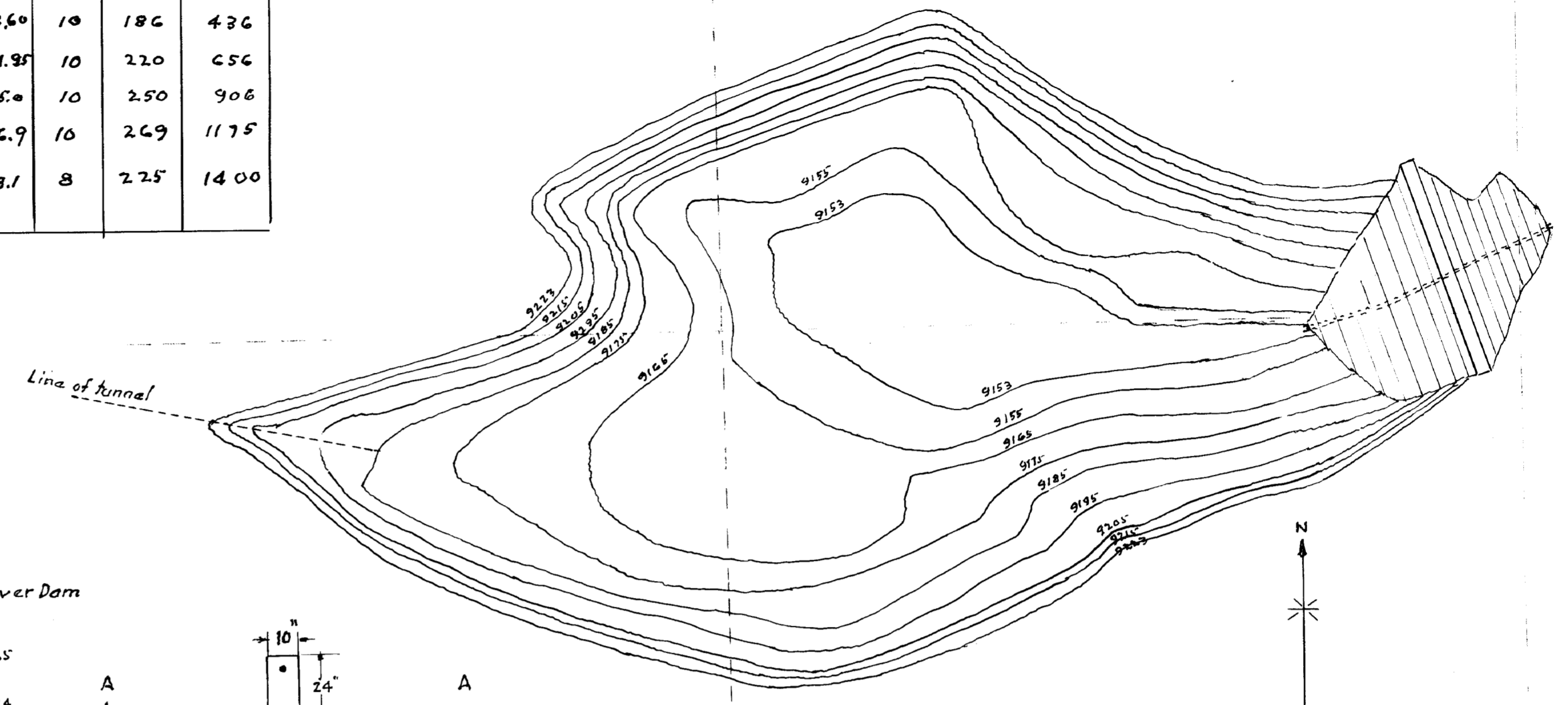


PROJECTION OF SPILLWAY  
Scale: Hor. - 1" = 50'  
Vert. - 1" = 50'

Hydraulics: 10' Channel, 12' Depth, 1:1 Side Slopes  
Area 11.05 Sq. Ft. - H.R. 0.86', S. 0.005', H 0.02, V. 4.6 f.p.s.  
Discharge 50.6 Sec. Ft.

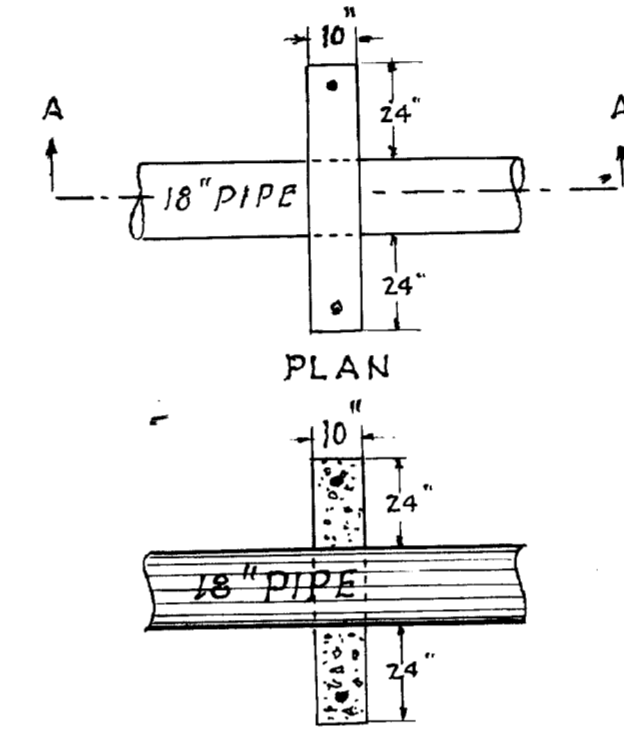


GENERAL MAP OF PROJECT  
Scale: 1" = 2000 Ft.

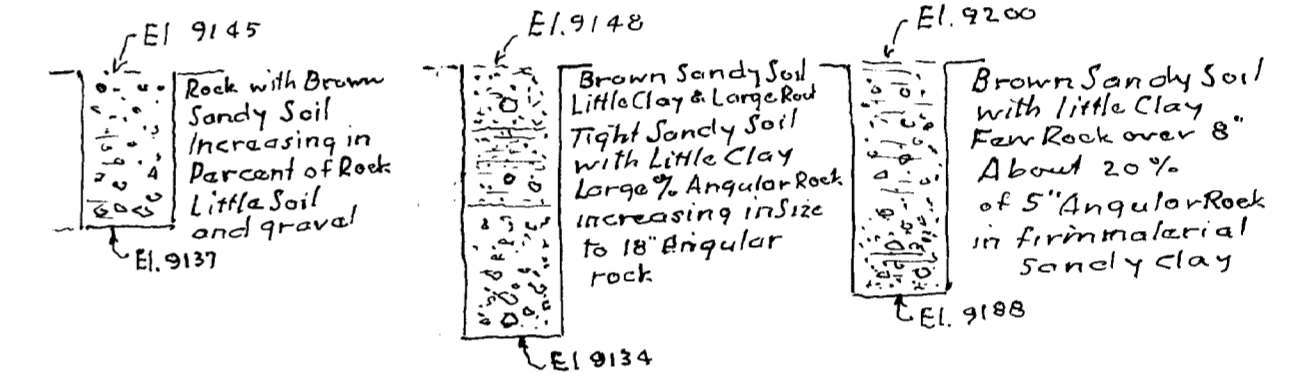


MAP OF RESERVOIR  
Scale: 1" = 200 Ft.

NOTE:  
Inlet structure is of approximate location of Beaver Dam

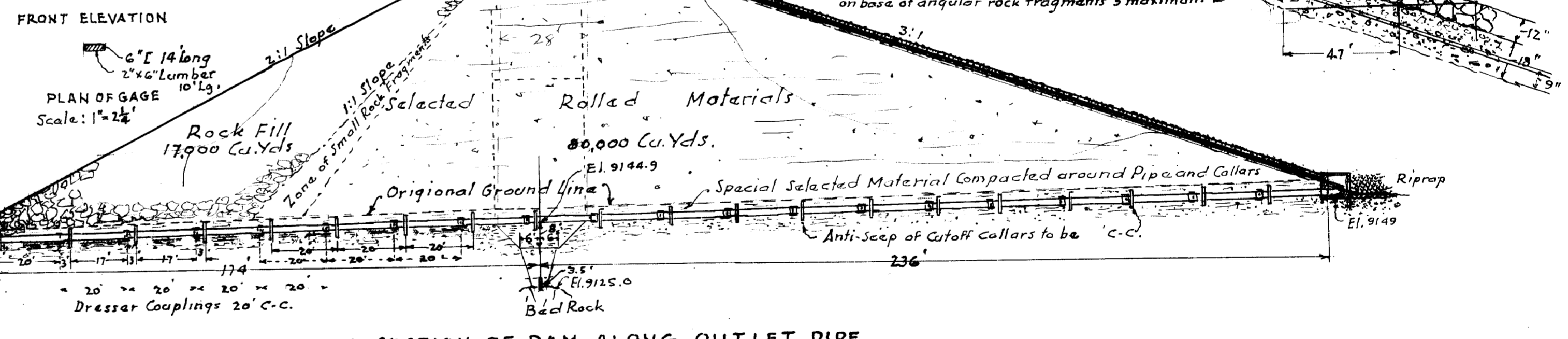


SECTION A-A  
DETAILS OF CONCRETE COLLARS  
Scale: 1" = 4 Ft.

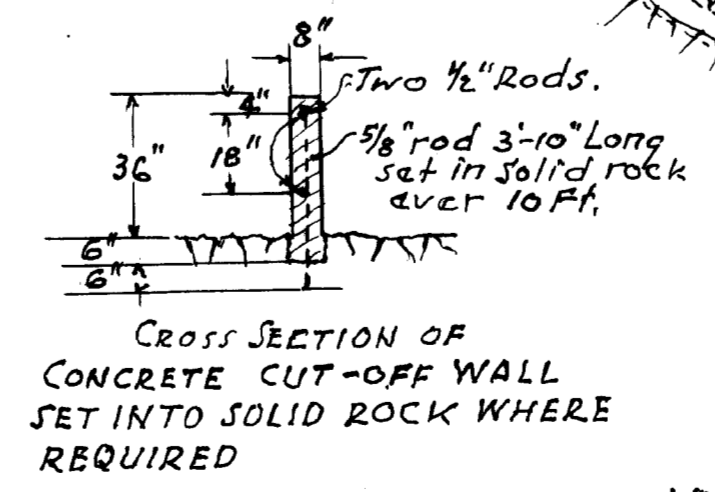


LOG OF TEST PITS 3' x 5'

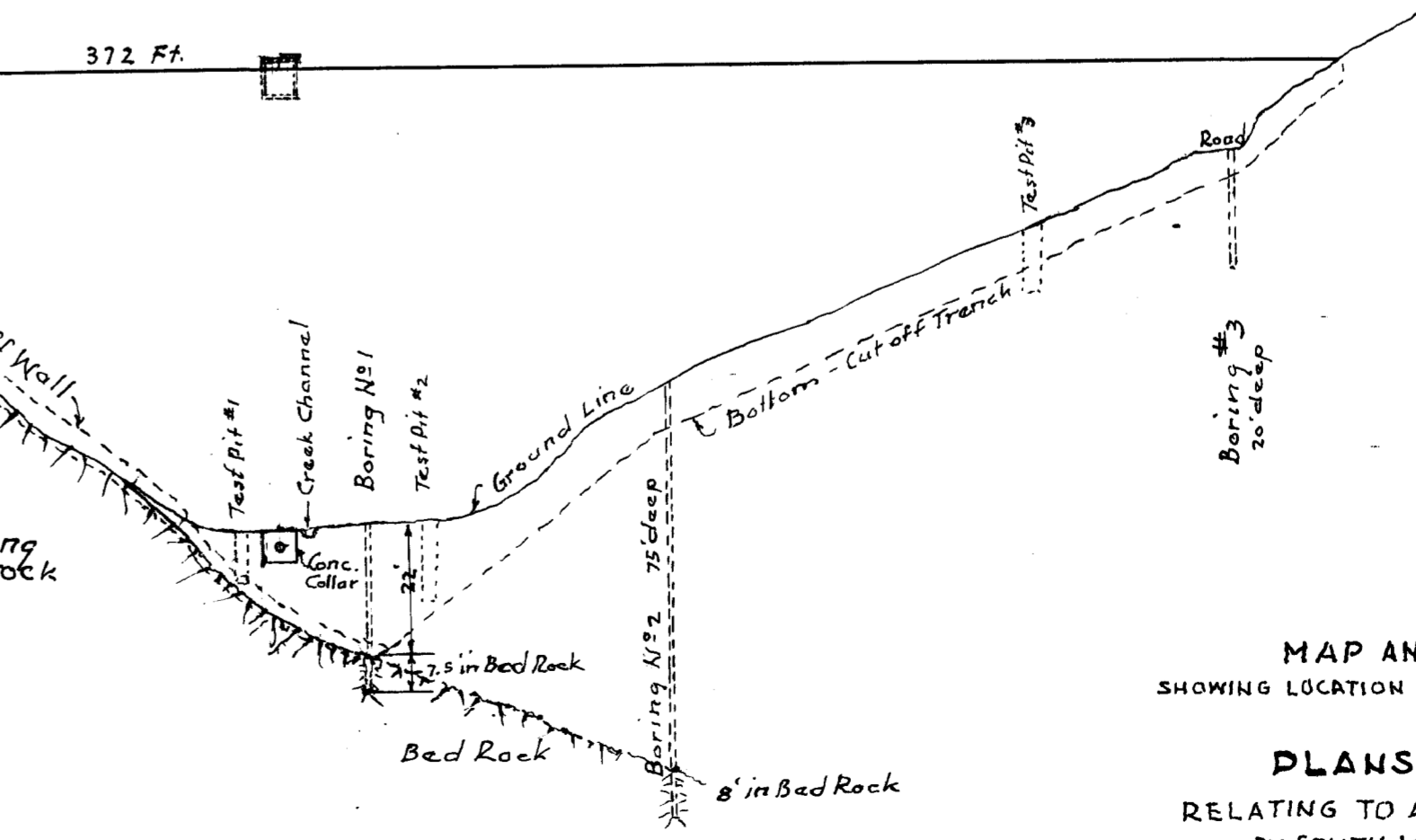
Reservoir Gage - 7 Units located as shown on Map of Dam



CROSS SECTION OF DAM ALONG OUTLET PIPE  
Scale: Hor. - 1" = 30 Ft.  
Vert. - 1" = 30 Ft.



CROSS SECTION OF CONCRETE CUT-OFF WALL  
SET INTO SOLID ROCK WHERE REQUIRED



LONGITUDINAL SECTION OF DAM  
Scale: Hor. - 1" = 30 Ft.  
Vert. - 1" = 30 Ft.

MAP AND DRAWINGS  
SHOWING LOCATION AND DETAILS OF PROJECT  
AND

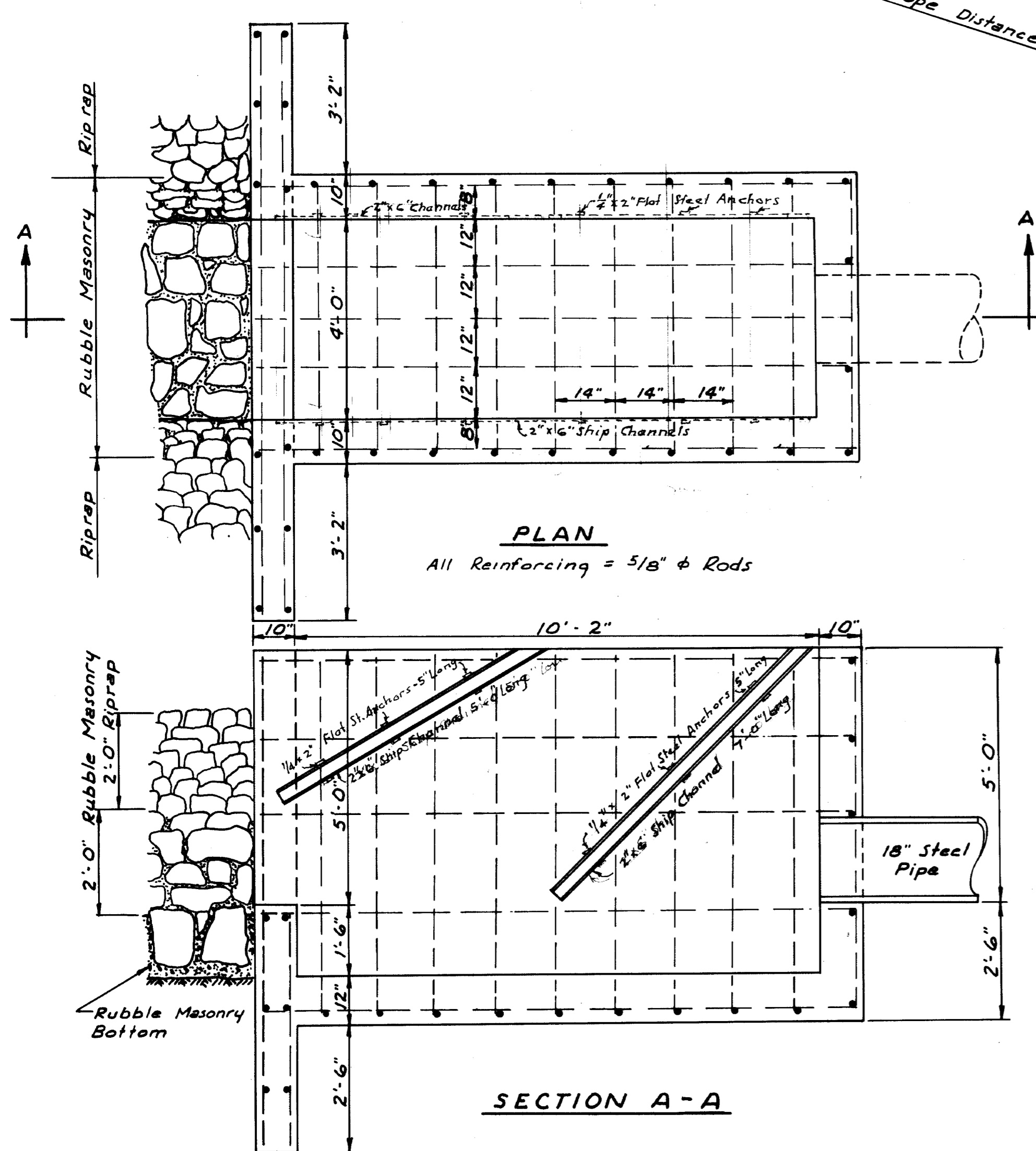
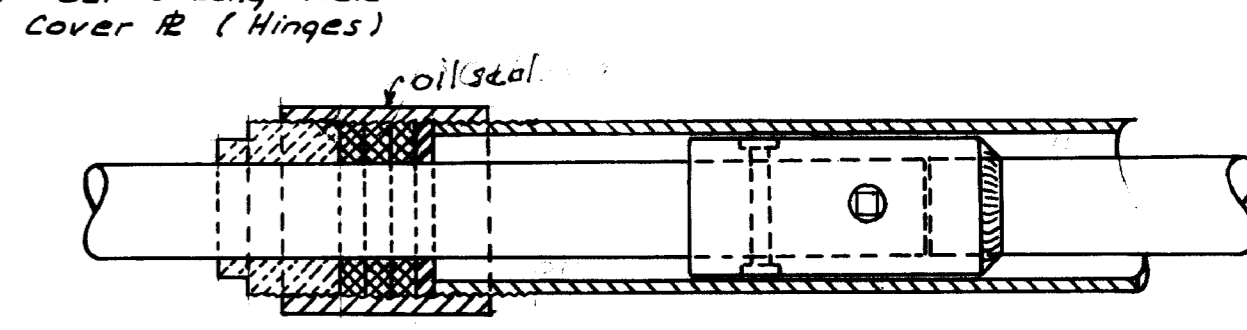
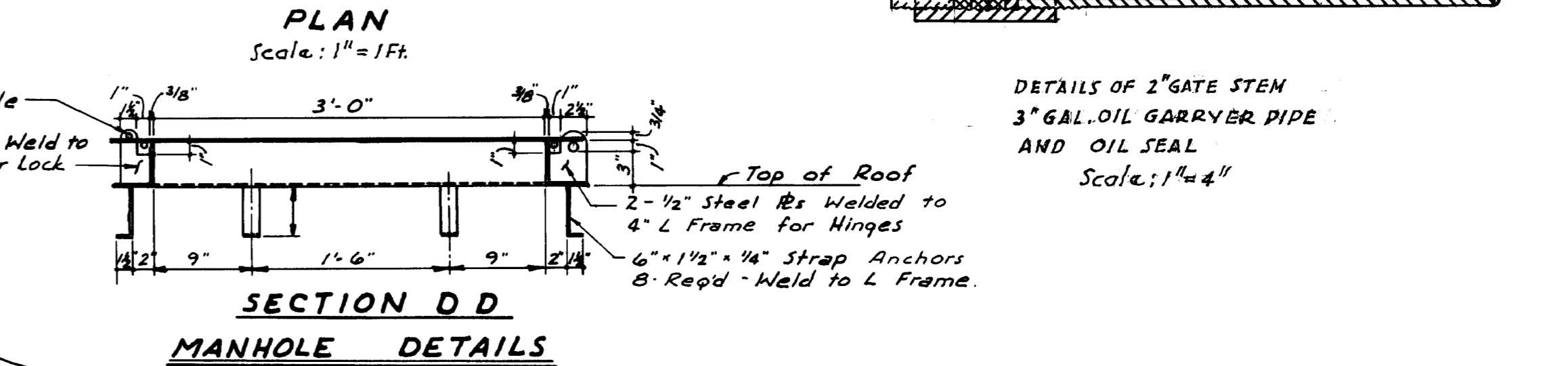
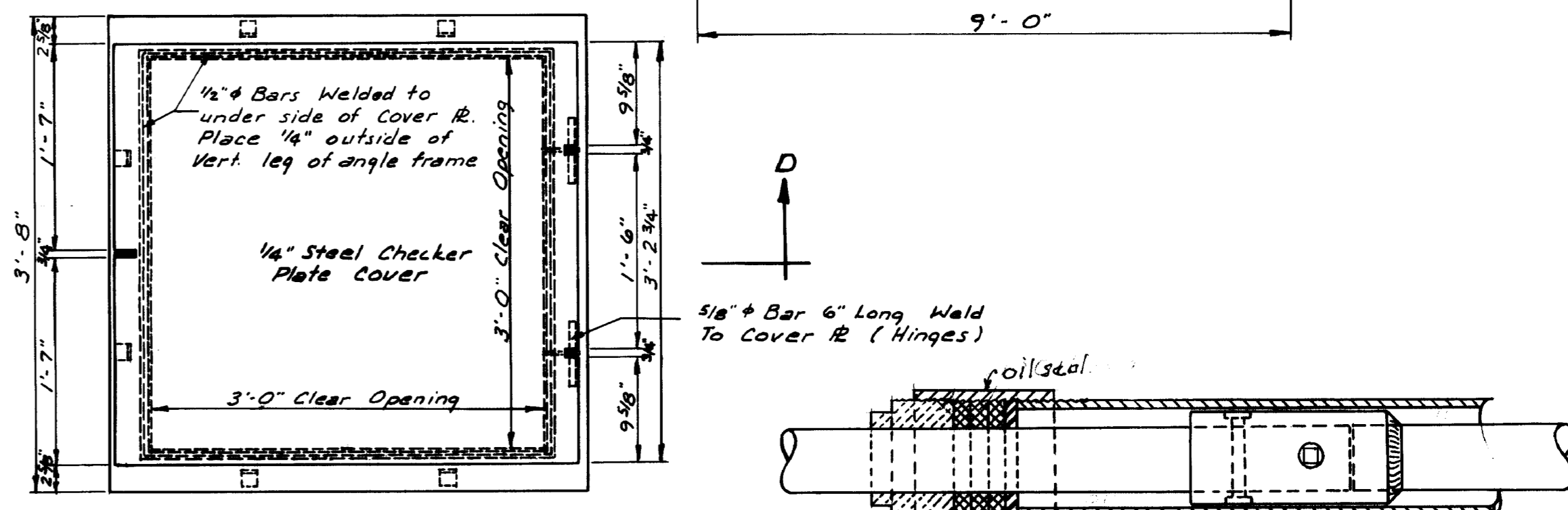
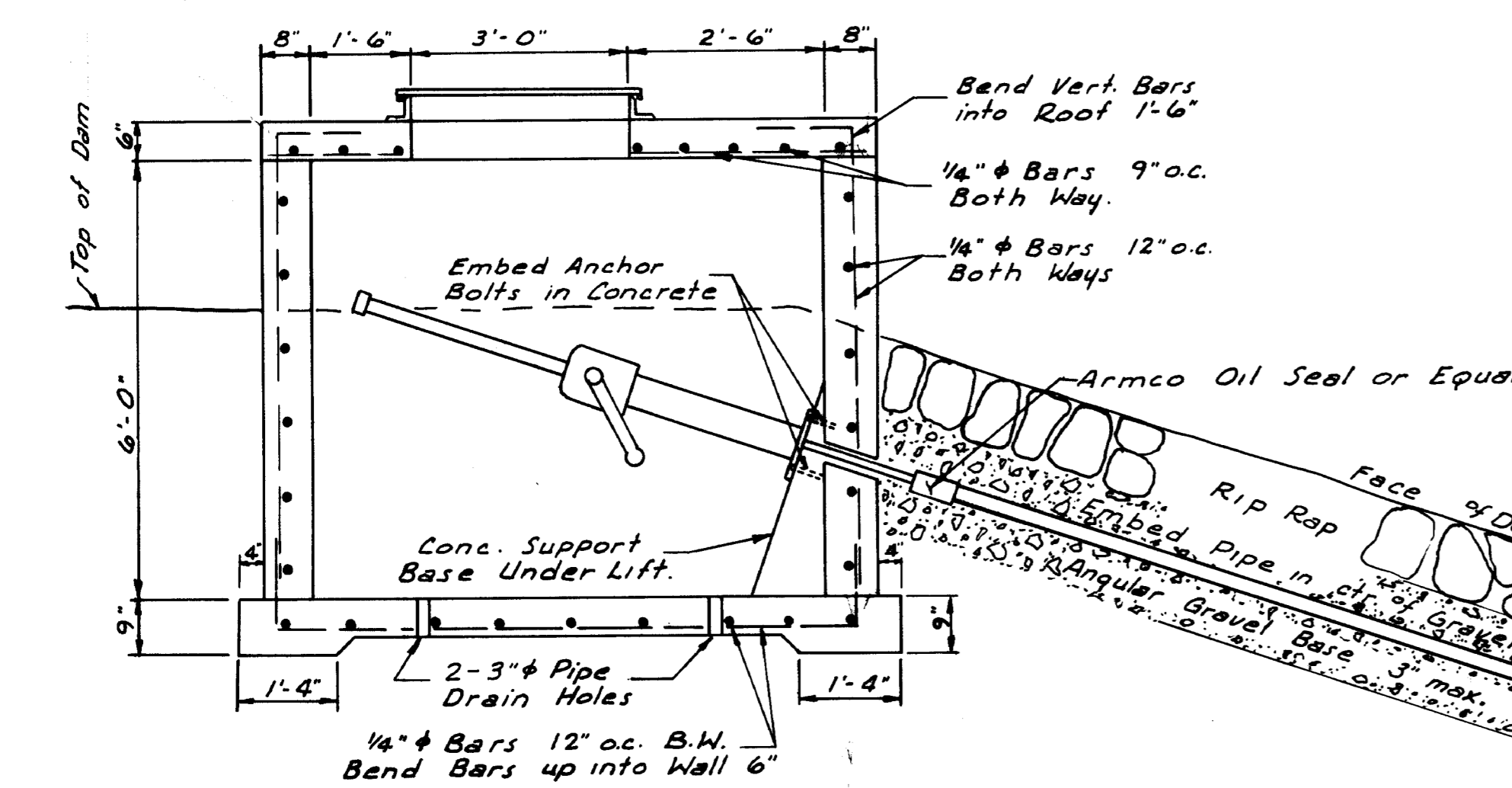
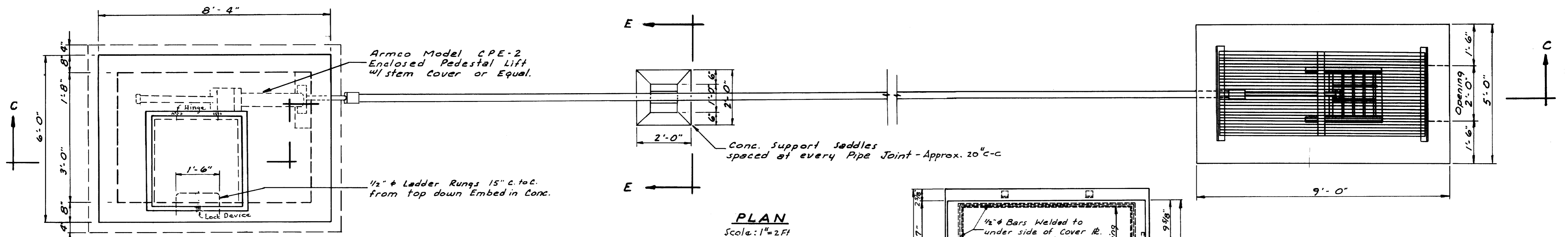
PLANS FOR DAM  
RELATING TO APPLICATION NO 10063  
BY SOUTH KAMAS IRRIGATION CO.  
WASATCH COUNTY-UTAH  
OCT. 1960

Feb. 3, 1961

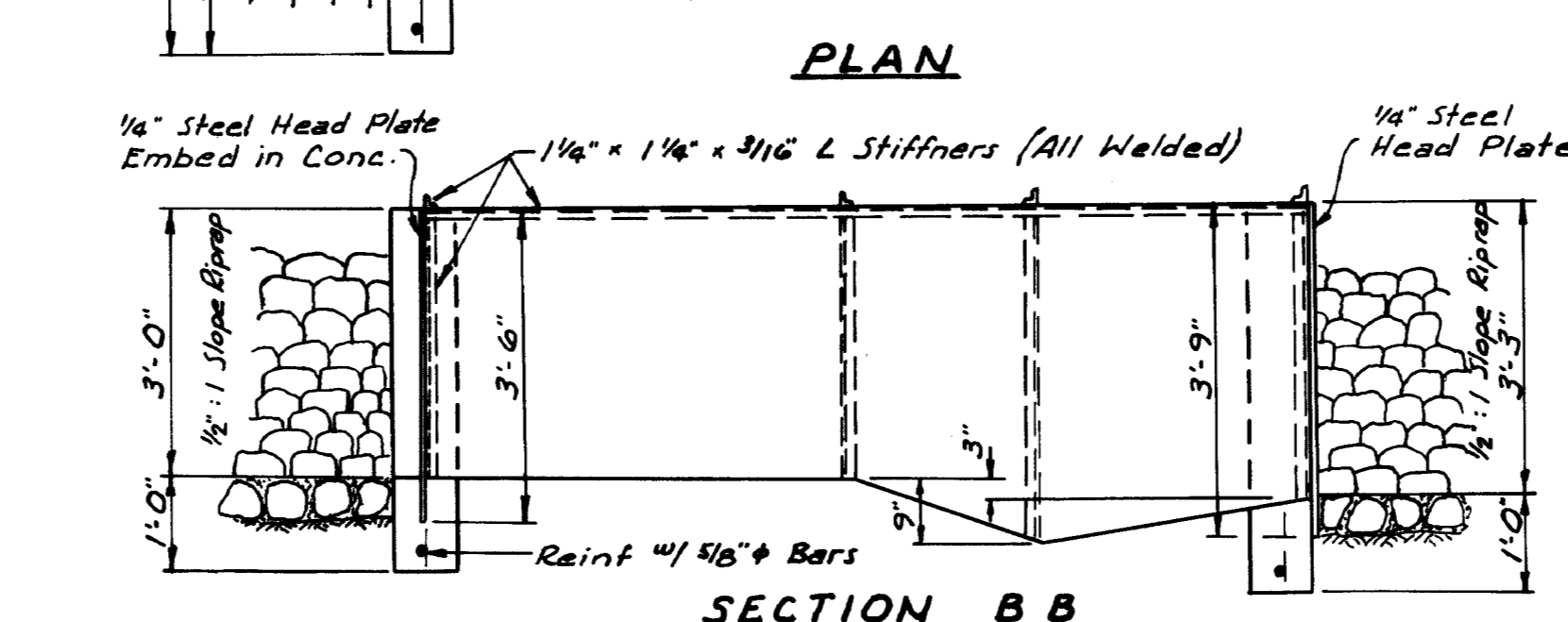
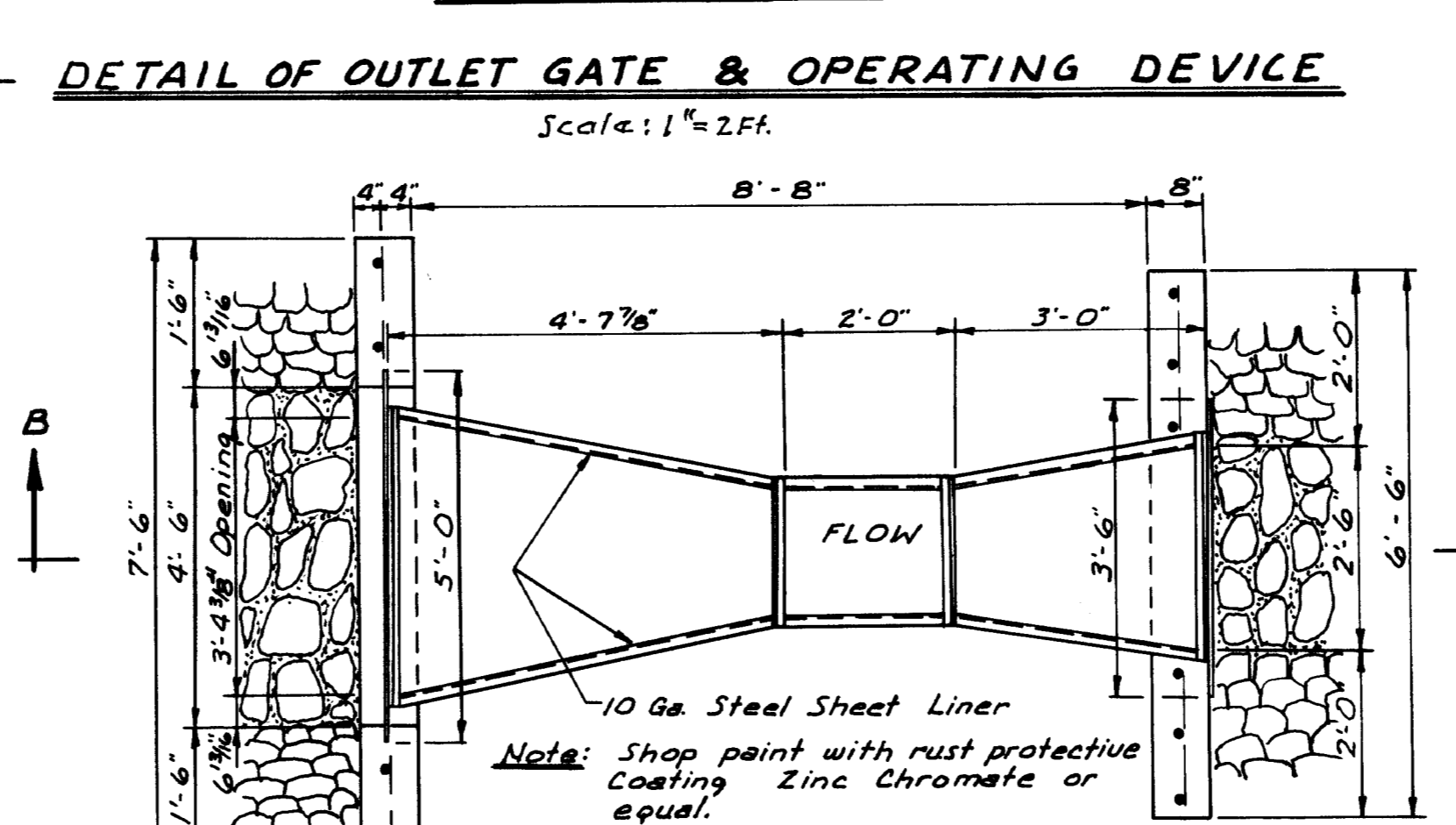
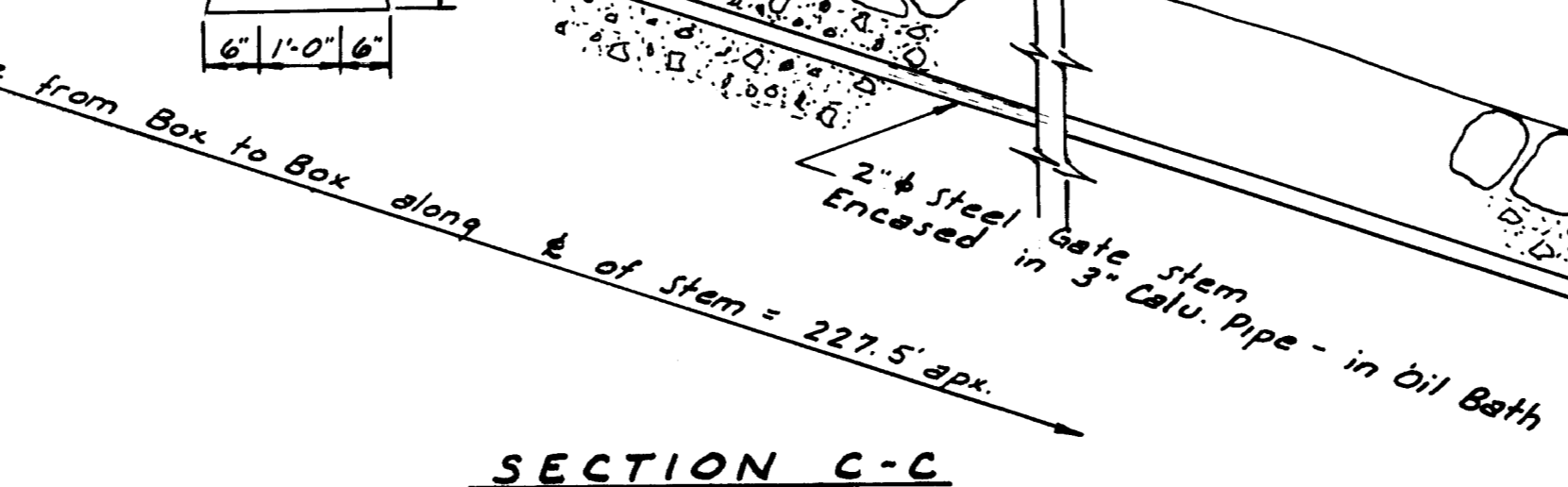
D. H. 36 p. 138

Hubert & Lamborn H.H. & Deer Creek Res APPLICATION NO 10063 SHEET 1 OF 2 SHEETS



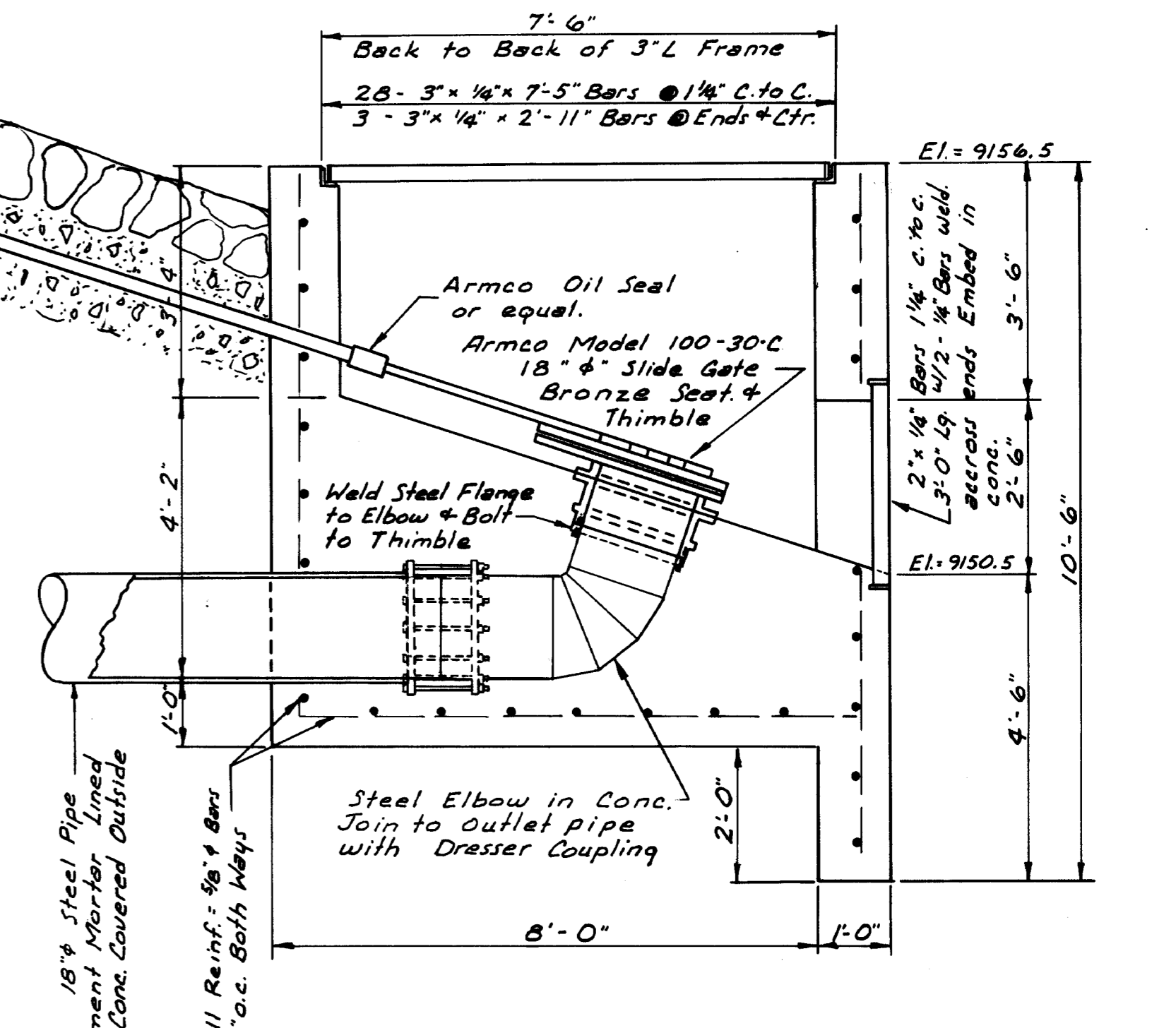


**DETAILS OF PIPE LINE OUTLET STRUCTURE**  
Scale: 1" = 2'



**PARSHALL FLUME DETAILS**  
Scale: 1" = 2'

**Note:** Three Flumes Required; To be located as follows; Below the outlet of the Dam, Below the outlet of the tunnel, and in the collecting channel before the Reservoir.



**DRAWINGS**  
SHOWING DETAILS OF STRUCTURES  
TO ACCOMPANY SPECIFICATIONS  
FOR THE CONSTRUCTION OF AN EARTH DAM  
RELATING TO WATER APPLICATION NO 16063  
BY SOUTH KANAS IRRIGATION COMPANY  
IN WASATCH CO. UTAH  
JANUARY 1961

Feb 8, 1961  
Hubert C. Lambert  
Little Deer Creek  
Res  
APPLICATION NO 16063  
D-H 36 p-139  
SHEET 2 OF 2 SHEETS