

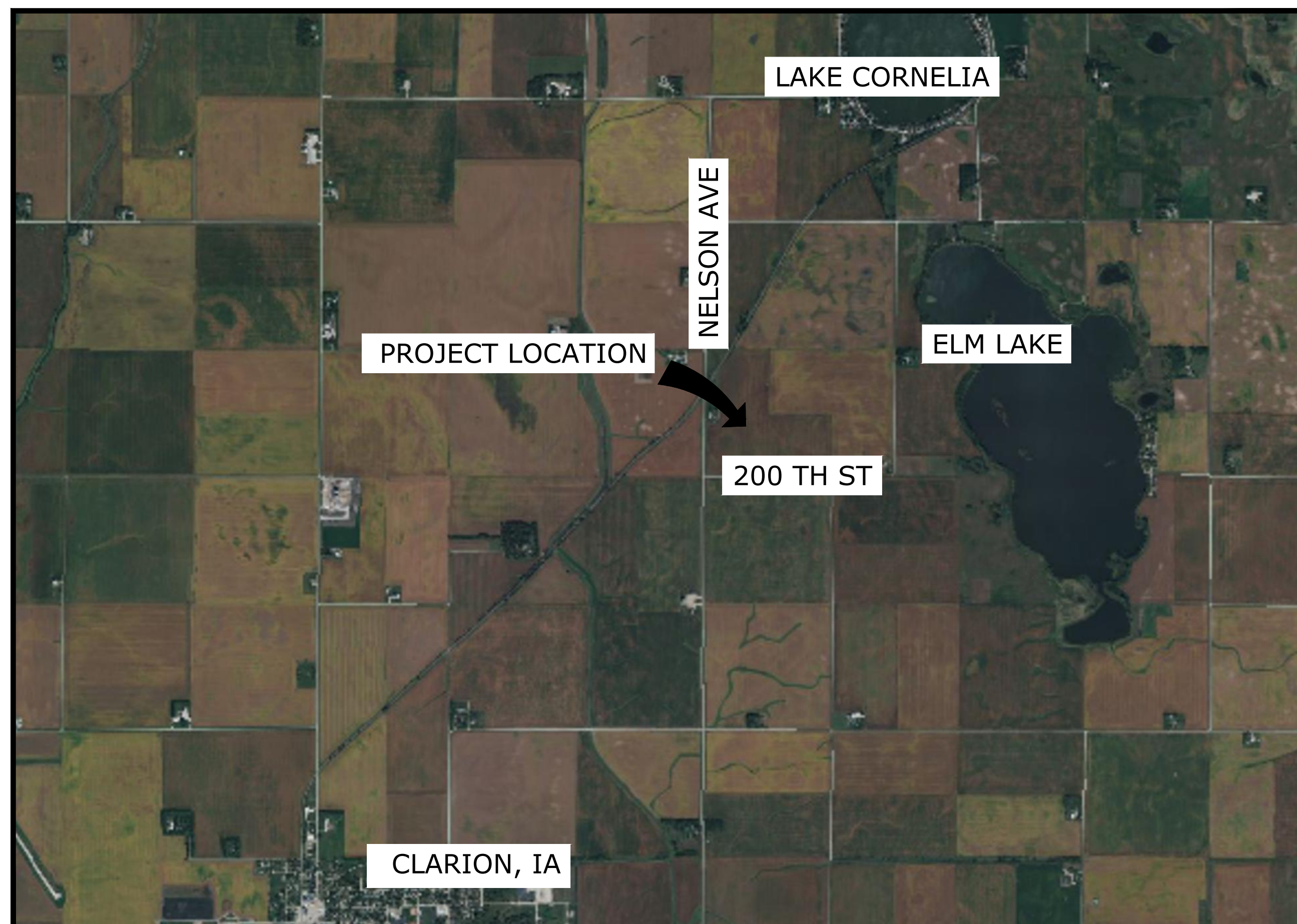
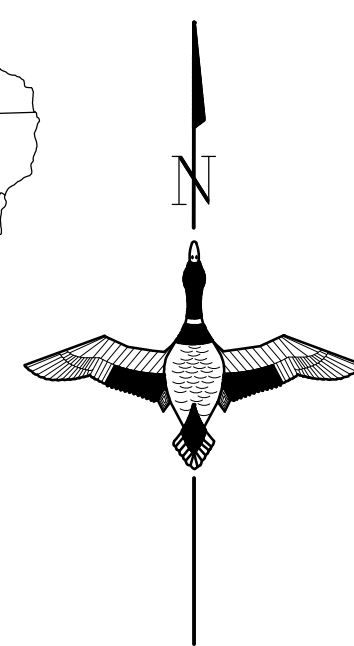
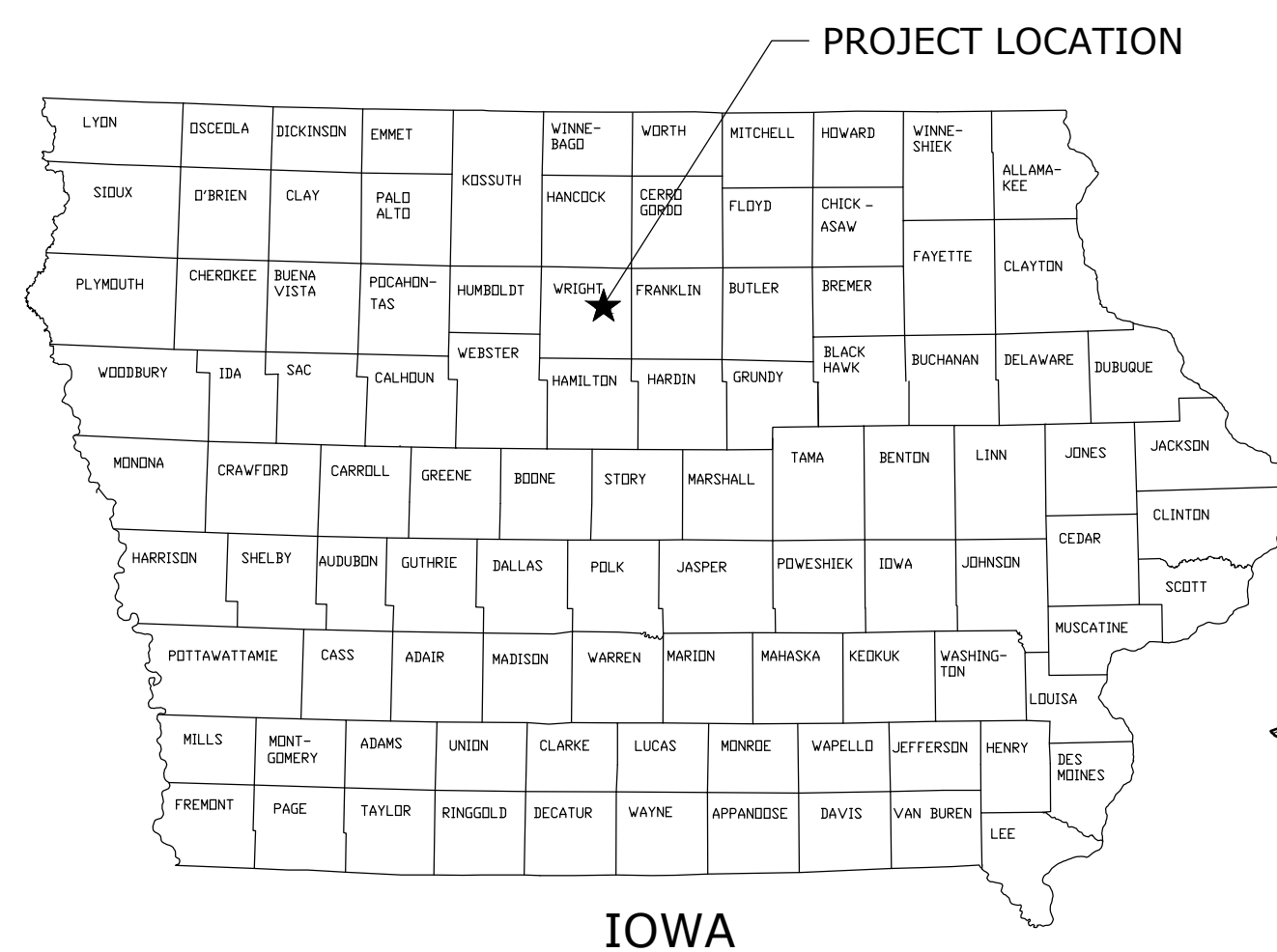


PROJECT NO. Wri922420D

WRIGHT COUNTY
S20, T92N, R24W
IOWA

IN COOPERATION WITH

IOWA DEPARTMENT OF AGRICULTURE AND LAND STEWARDSHIP
IOWA ENGINEERING JOB CLASS IV



PROJECT LOCATION MAP

SCALE: 1" = 2000'

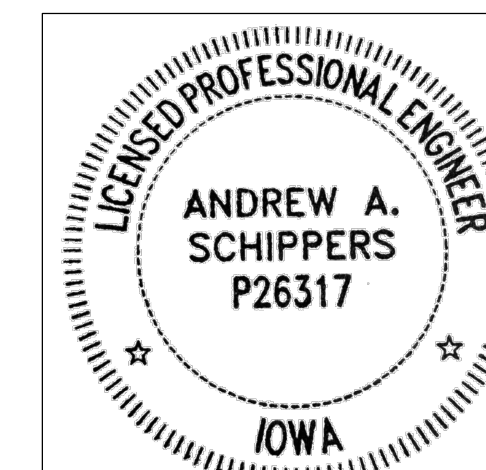
SHEET INDEX	
001	COVER SHEET
002	SPECIFICATIONS, QUANTITIES, & NOTES
051	TOPOGRAPHY & EXISTING CONDITIONS
101	SITE PLAN
201	EMBANKMENT PLAN & PROFILE
202	RIPRAP & DRAW-DOWN PLAN
203	INLET CHANNEL PLAN & PROFILE
204	WETLAND PROFILES
205	TILE #1 PLAN & PROFILE
206	TILE #2 PLAN & PROFILE
207	TILE #3 PLAN & PROFILE
208	TILE #4 PLAN & PROFILE
301	SHEET PILE DETAILS
302	CONSTRUCTION DETAILS
303	WATER CONTROL STRUCTURE SHEET 1
304	WATER CONTROL STRUCTURE SHEET 2
305	FILTER DIAPHRAGM DETAILS
401	SEEDING PLAN

To the best of my professional knowledge, judgement, and belief, these plans meet applicable NRCS Standards

I hereby certify that this engineering document was prepared by me or under my direct personal supervision and that I am a duly licensed Professional Engineer under the laws of the State of Iowa.

Andrew Schippers, P.E. _____ Date _____

My license number is P26317
My license renewal date is December 31, 2025
Pages of sheets covered by this seal: 1 - 18 (C001-C401)



UTILITIES NOTE:
BEFORE THE START OF CONSTRUCTION, THE OWNER OF ANY UTILITIES INVOLVED MUST BE NOTIFIED. THE EXCAVATOR/CONTRACTOR IS RESPONSIBLE FOR GIVING THIS NOTICE BY CALLING "IOWA ONE CALL" AT (800) 292-8989 AT LEAST 48 HOURS PRIOR TO ANY EXCAVATION.
TICKET #: _____



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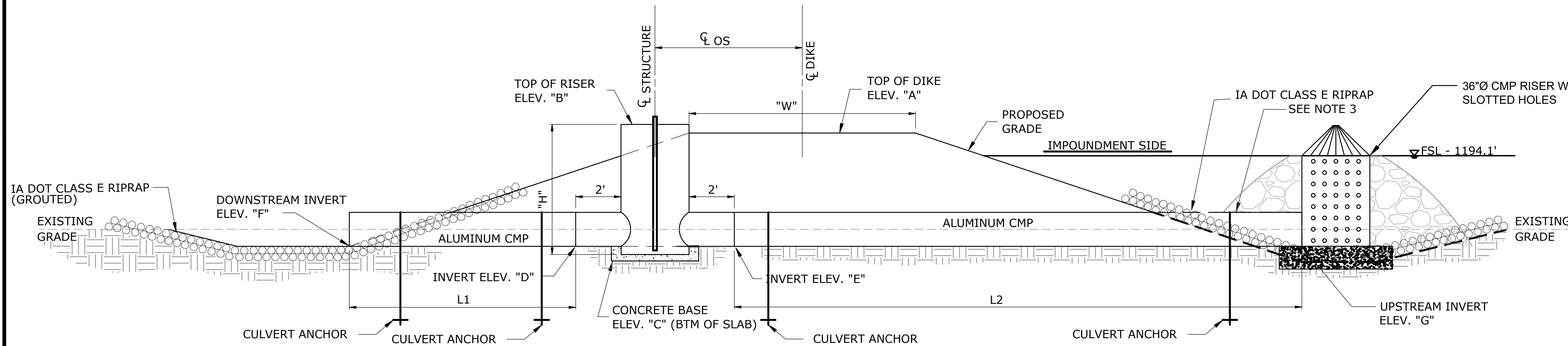
COVER SHEET
PROJECT NO. WRI922420D
WRIGHT COUNTY
IOWA

Revision	Sheet	Revisions	Date	By
1		NRCS/DALS REVIEW UPDATES	9-19-24	A.S.

CAD FILE: Wright - Peterson C001 Cover & Specs
DESIGNED BY: A.S.
DRAWN BY: C.K.
SURVEYED BY: A.S., J.W.
REVIEWER: T.P.
DATE: 6-19-24
PROJECT NUMBER: IA-340-8
C001

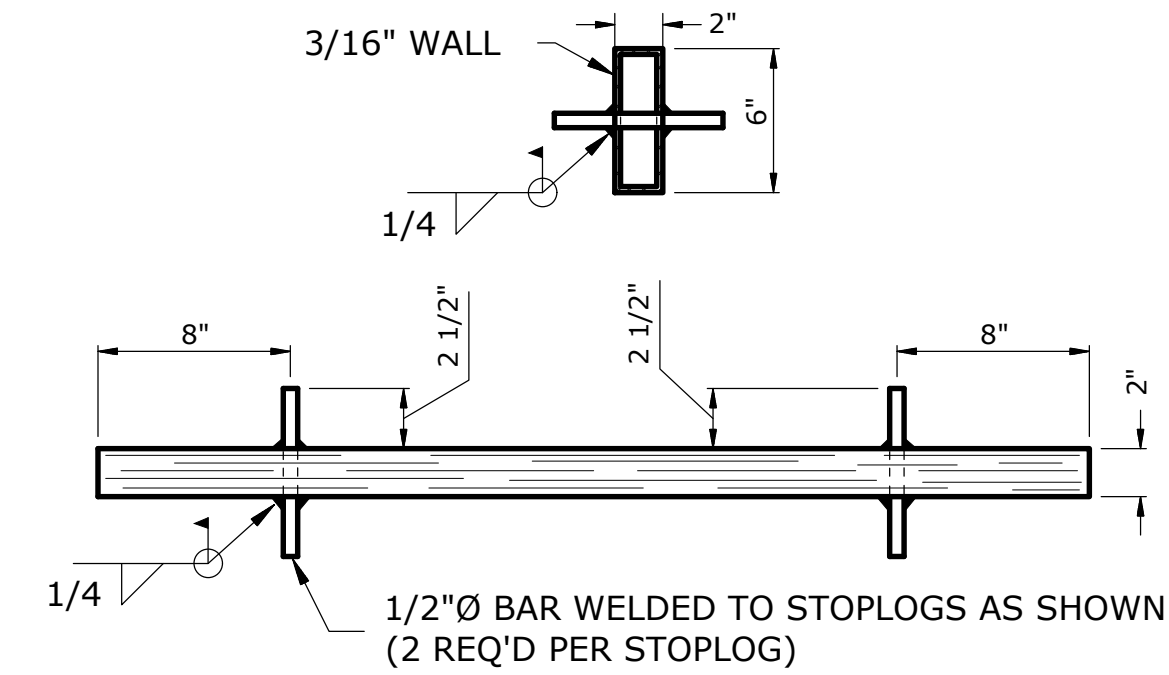
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PROFILE OF ALUMINUM CMP WATER CONTROL STRUCTURE
NOT TO SCALE

STRUCTURE	PIPE		RISER		TOP OF DIKE EL. "A"	TOP OF RISER EL. "B"	CONCRETE BASE EL. "C"	INLET I.E. EL. "D"	OUTLET I.E. EL. "E"	UPSTREAM INV. "G"	DOWNSTREAM INV. "F"	TOP WIDTH "W"	INLET LENGTH "L1"	OUTLET LENGTH "L2"	CL-CL OFFSET	RISER HEIGHT "H"	NO. OF STOPLOGS
	SIZE	GA.	SIZE	GA.													
WCS 1	15"	12	48"	12	1198.7'	1199.0	1191.8	1192.8	1192.8	1192.8'	1192.8'	12'	40'	17'	10'	6.7'	13

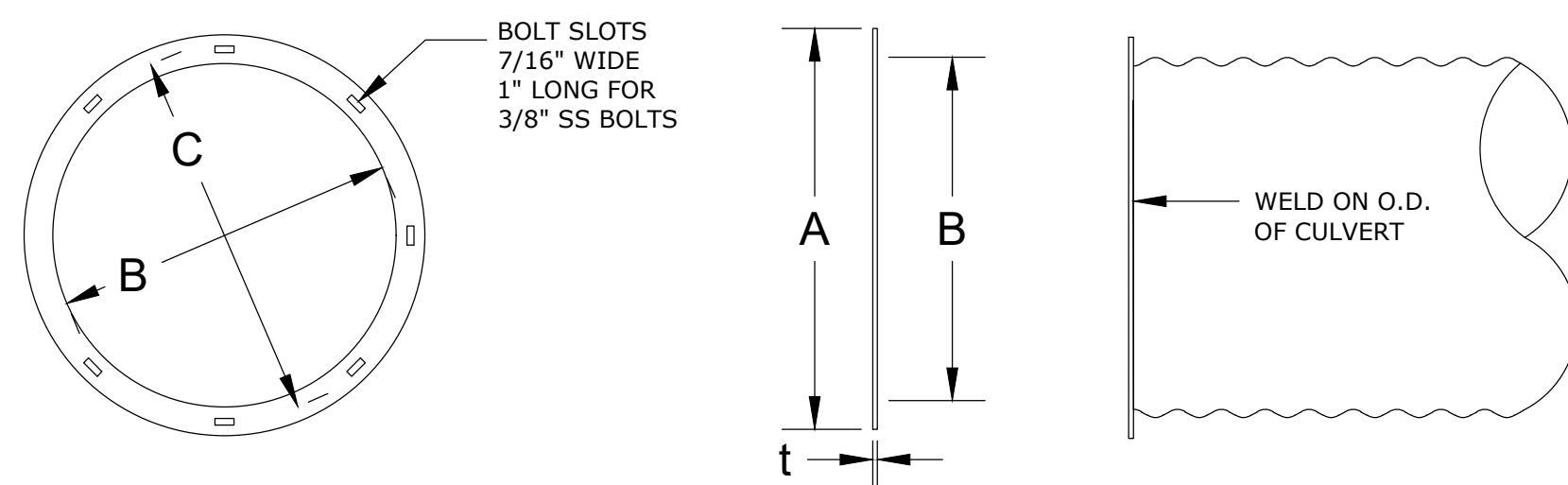


- NOTE: 1. WELD 1/2" BAR IN STOPLOGS.
2. STOPLOGS SHALL BE 1" SHORTER THAN WIDTH BETWEEN STOPLOG GUIDES.
3. FABRICATOR TO PROVIDE 1-2" & 1-3" STOPLOG IN ADDITION TO STOPLOGS SPECIFIED.

ALUMINUM STOPLOG DETAIL
NOT TO SCALE

NOTES:

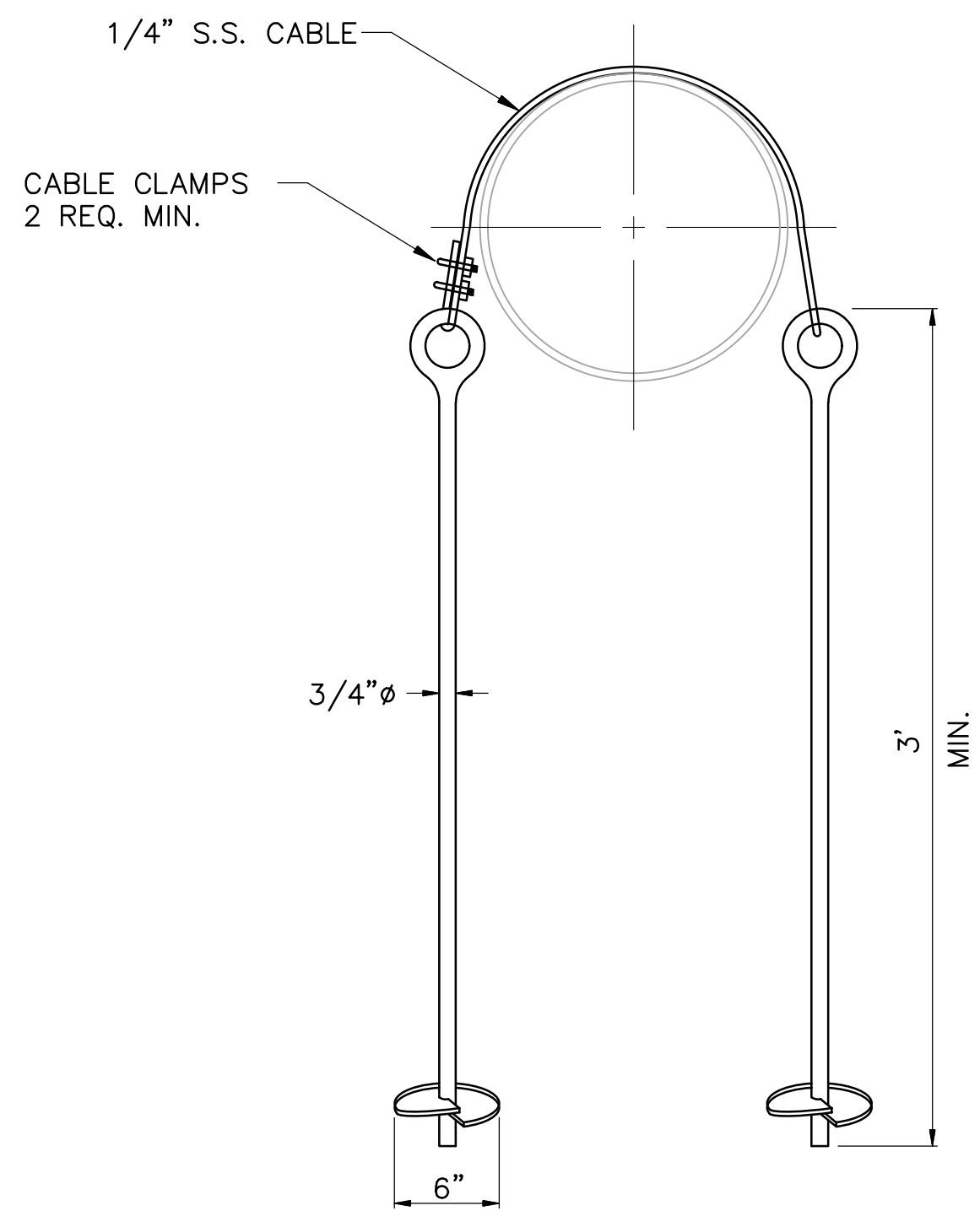
- "H" INCLUDES 0.5' OF RISER EMBEDDED IN CONCRETE
- ALL METAL PIPE SHALL BE CONNECTED WITH FLANGE COUPLERS
- DOWNSTREAM PIPE OUTLET SHALL CONFORM TO SLOPE FOR PIPE DIAMETERS 30" AND LARGER
- INLET AND/OR OUTLET PIPES GREATER THAN 20 LF. SHALL BE FABRICATED USING MULTIPLE SECTIONS NOT TO EXCEED 20 LF., CONNECTED W/ FLANGE COUPLERS. A FULL 20' SECTION MUST BE UTILIZED AS THE END SECTION OF PIPE.
- CONTRACTOR SHALL FIELD CHECK ALL EXISTING ELEVATIONS PRIOR TO CONSTRUCTION AND MAKE ADJUSTMENTS, IF NEEDED.



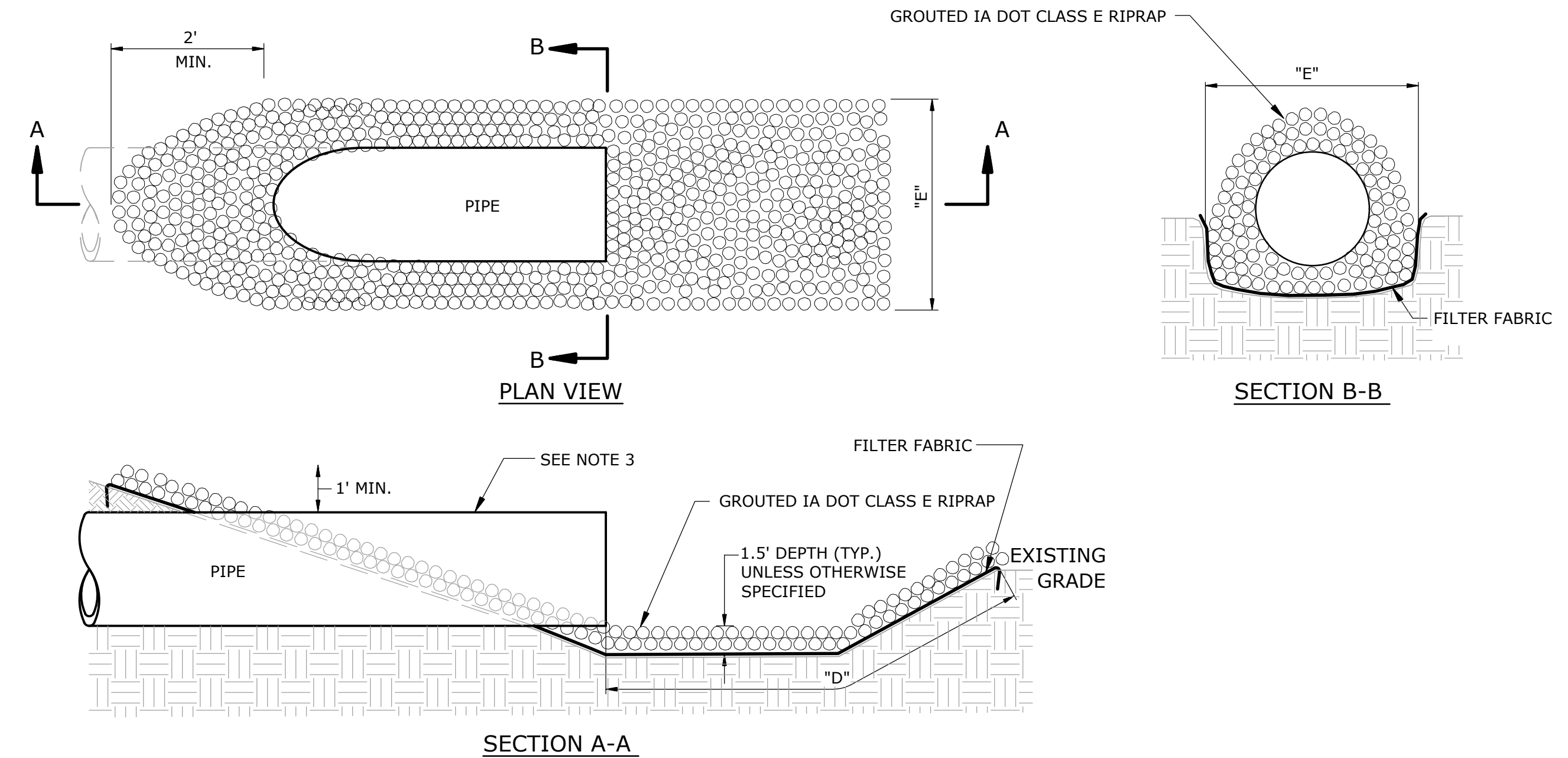
BASIC SIZE IN.	ALUM.	O.D. (A) FLANGE	I.D. (B) FLANGE	NO. HOLES	BOLT CIR. DIA. (C)	GASKET NO SECT
6	3/16	10	6	6	8	1
8	3/16	12	8	6	10	1
12	3/16	16	12	10	14	1
15	3/16	19	15	12	17	1
18	3/16	22	18	14	20	1
21	3/16	25	21	16	23	1
24	3/16	28	24	18	26	1
30	3/16	34	30	22	32	2
36	3/16	40	36	26	38	2
42	1/4	46	42	30	44	2
48	1/4	52	48	34	50	2

- NOTES: 1. 6" - 36" FLANGES CUT FROM 3/16 ALUMINUM PLATE.
2. GASKETS DIE CUT FROM 1/8" PVC NITRILE FOAM ENSOLETTE AND MACHED TO CORRESPONDING FLANGE DIMENSIONS (BXD)(E) & NO HOLES.
3. 2 WASHERS PER SLOT.

FLANGE COUPLER DETAIL
NOT TO SCALE



CULVERT ANCHOR
NOT TO SCALE



NOTES:

- IF THE RIPRAP CLASS DESIGNATION IS NOT SPECIFIED ON THE CONSTRUCTION PLANS, IA DOT CLASS E RIPRAP SHALL BE UTILIZED. THE ROCK SHALL BE APPROVED BY THE ENGINEER PRIOR TO INSTALLATION.
- UNLESS OTHERWISE SPECIFIED, FILTER FABRIC SHALL BE UTILIZED IN THE INSTALLATION OF RIPRAP.
- DOWNSTREAM CMP PIPE OUTLET SHALL CONFORM TO SLOPE FOR PIPE DIAMETERS 30" AND LARGER.

OUTLET AND RIPRAP DETAIL
NOT TO SCALE

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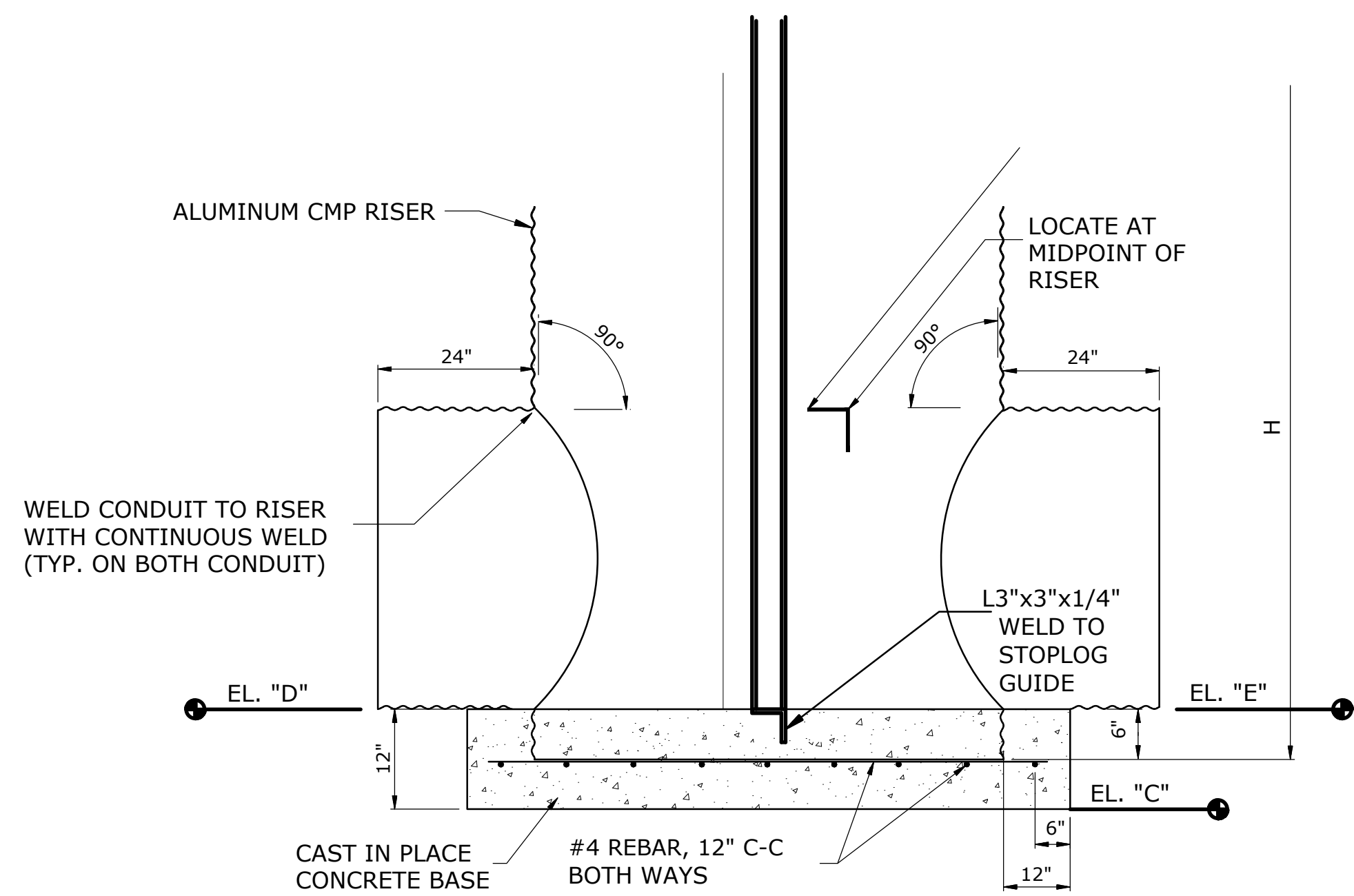
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AFFIX SEAL: DUCKS UNLIMITED, INC.
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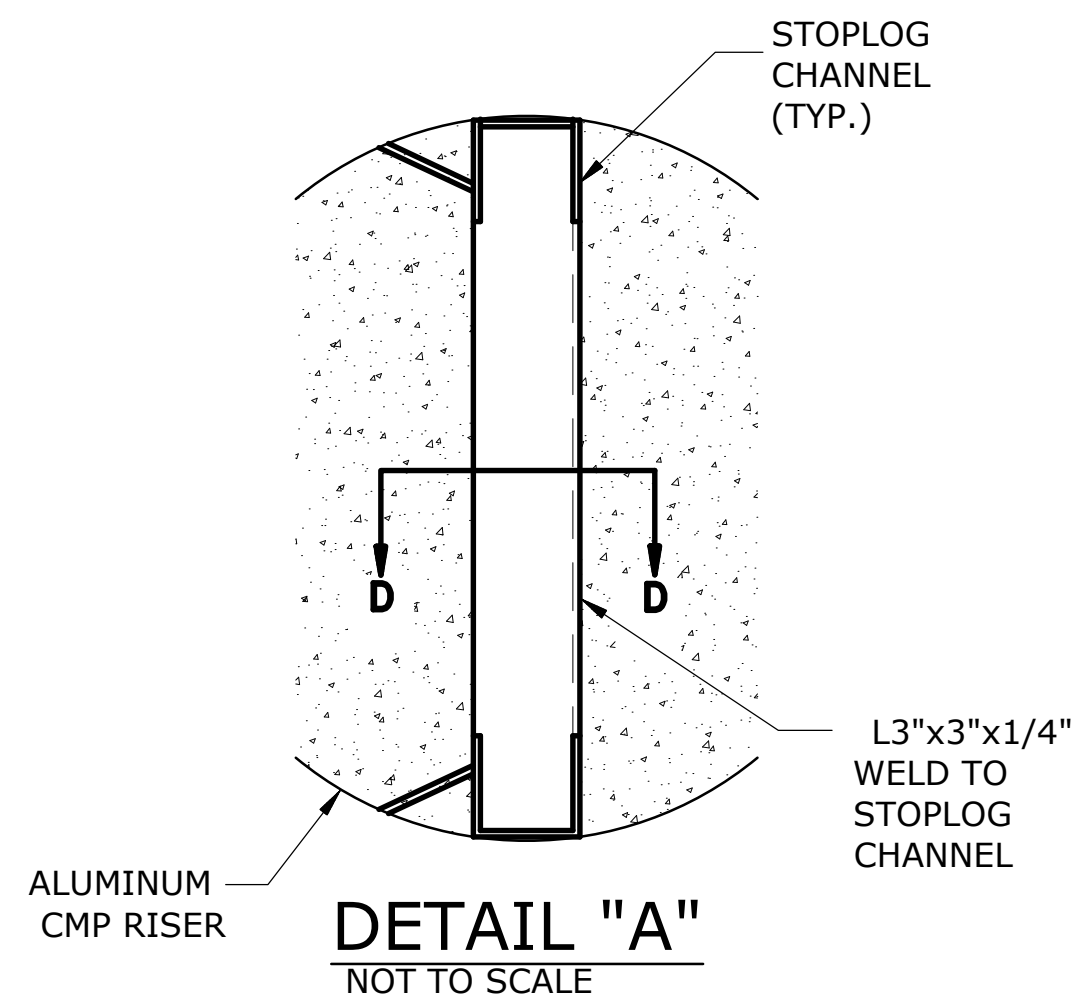
WATER CONTROL STRUCTURE
SHEET 1
PROJECT NO. WR1922420D
WRIGHT COUNTY
IOWA

Revision	Sheet	Revisions	Date	By
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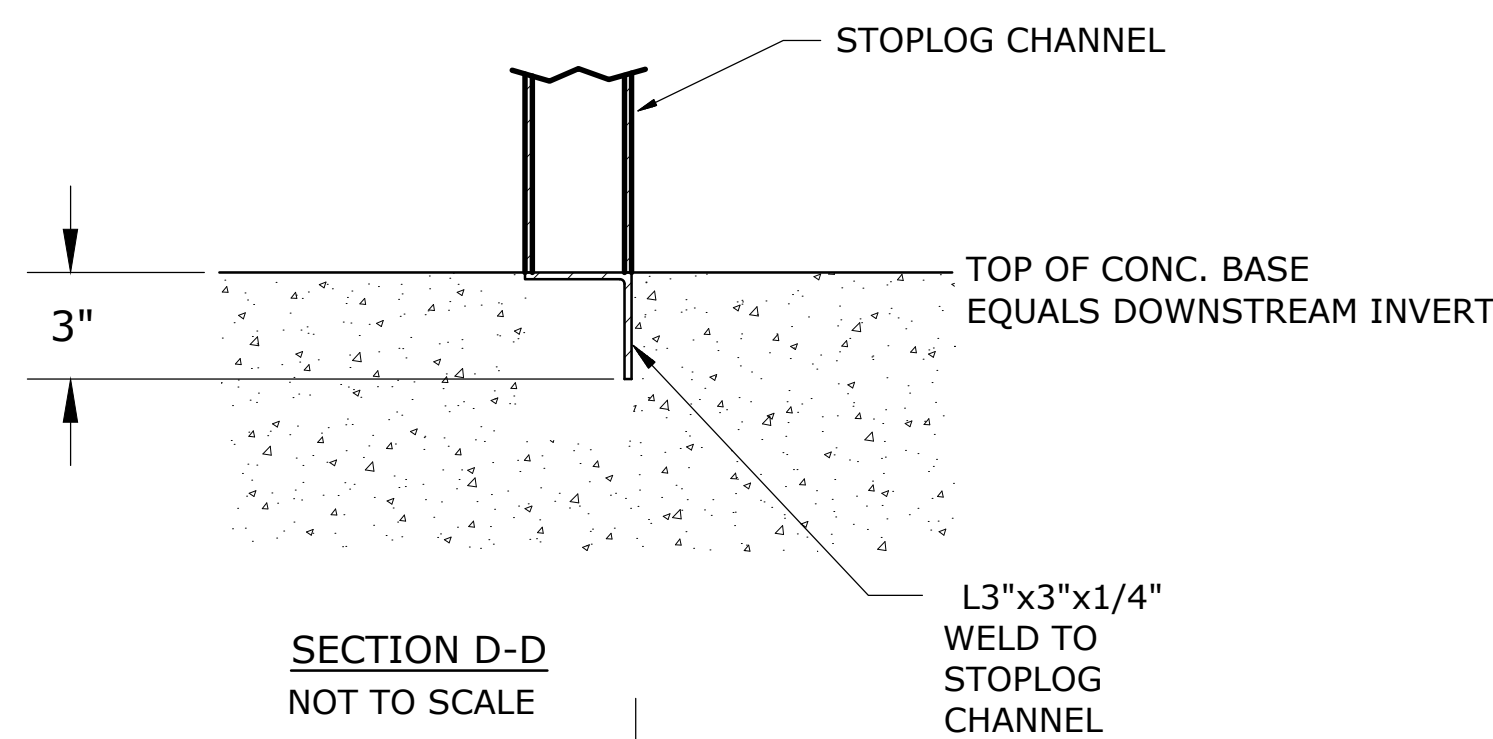
CAD FILE: WCS Details
 DESIGNED BY: A.S.
 DRAWN BY: C.K.
 SURVEYED BY: A.S., J.W.
 REVIEWER: T.P.
 DATE: 6-19-24
 PROJECT NUMBER: IA-340-8
C303



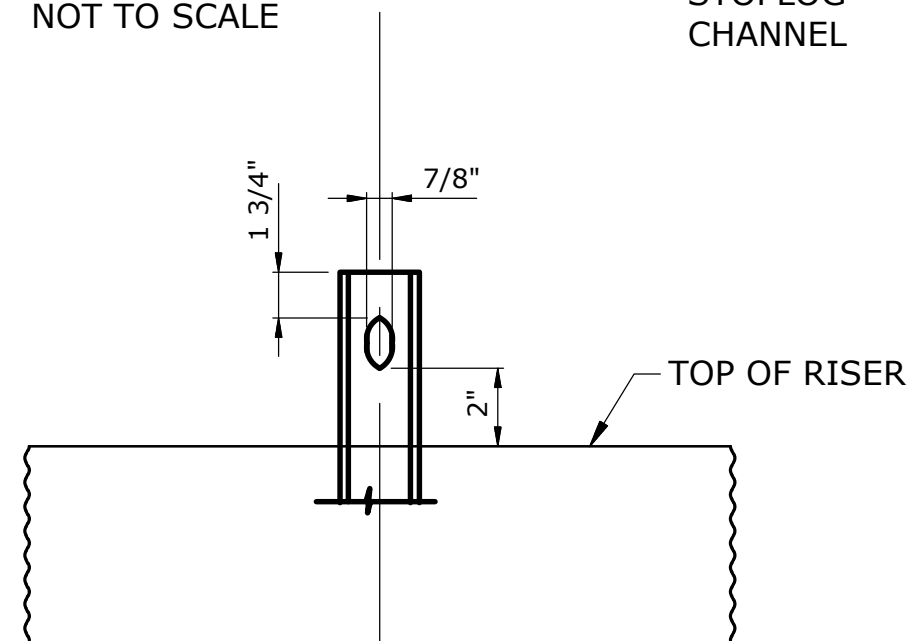
* SEE TABLE
TYP GATE CMP CONTROL STRUCTURE
NOT TO SCALE



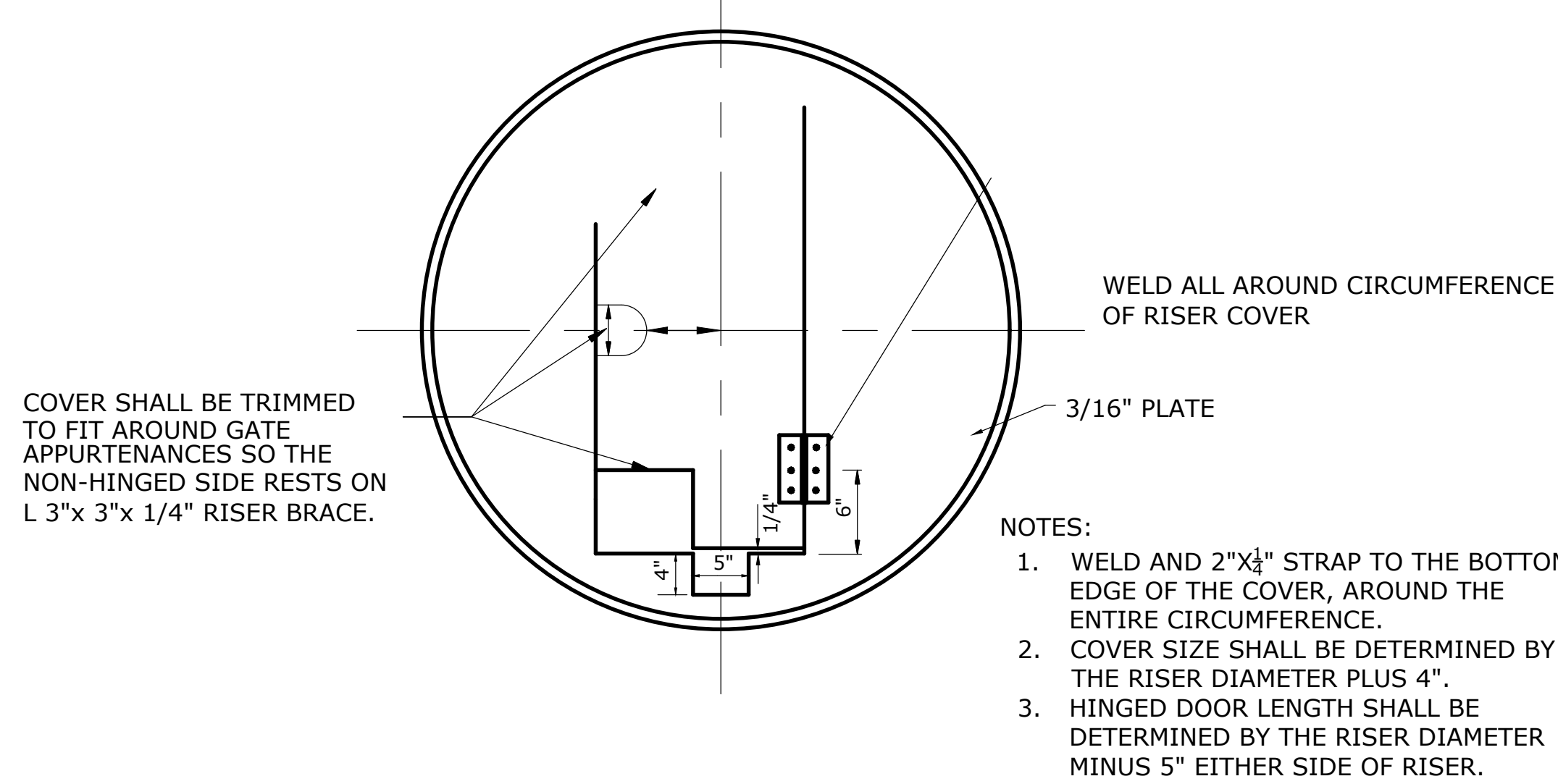
DETAIL "A"
NOT TO SCALE



SECTION D-D
NOT TO SCALE

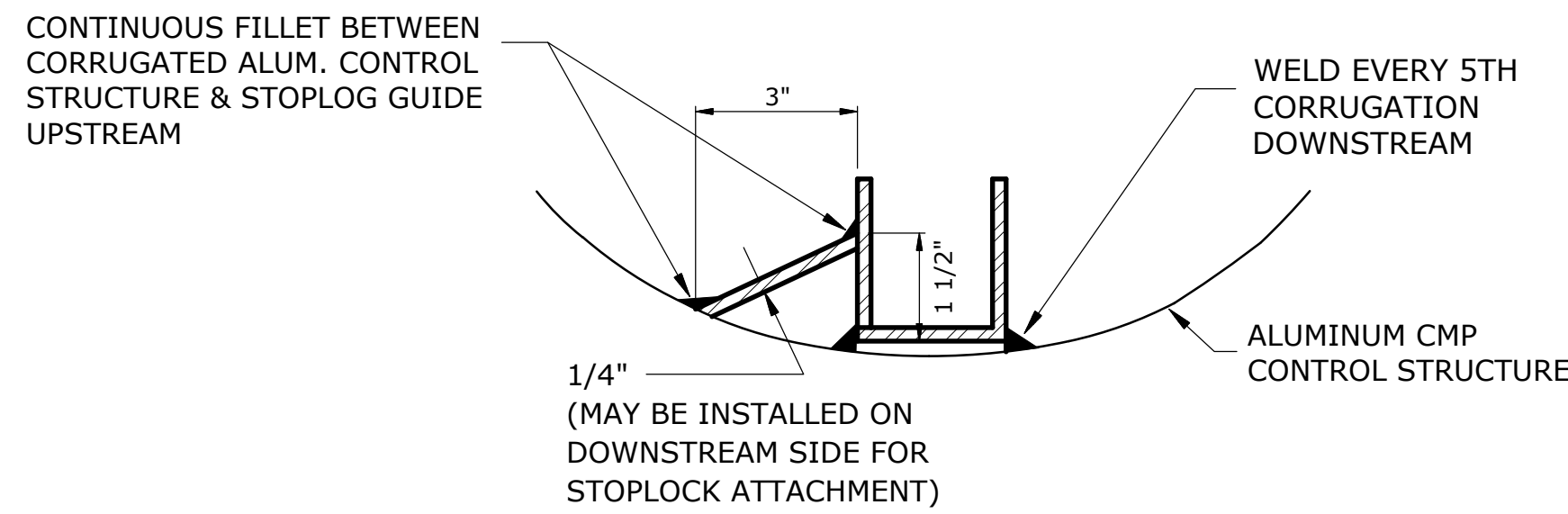


LOCKING ROD SLOT DETAIL
NOT TO SCALE

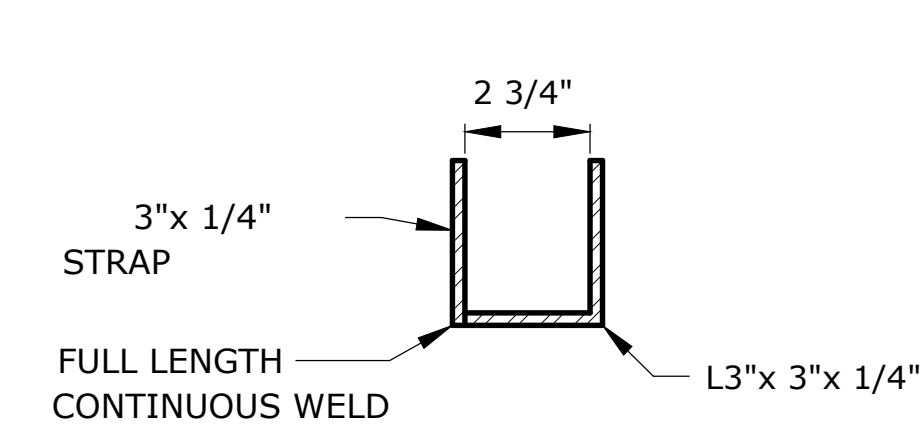


GATE RISER COVER DETAIL
NOT TO SCALE

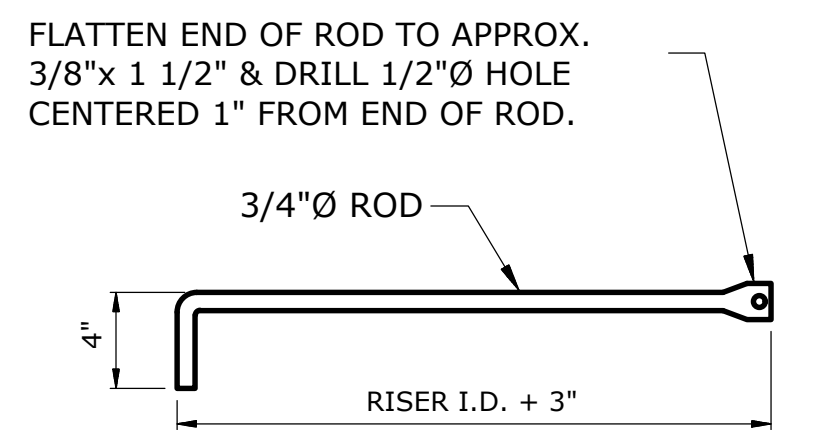
- NOTES:
1. WELD AND 2"x4" STRAP TO THE BOTTOM EDGE OF THE COVER, AROUND THE ENTIRE CIRCUMFERENCE.
 2. COVER SIZE SHALL BE DETERMINED BY THE RISER DIAMETER PLUS 4".
 3. HINGED DOOR LENGTH SHALL BE DETERMINED BY THE RISER DIAMETER MINUS 5" EITHER SIDE OF RISER.



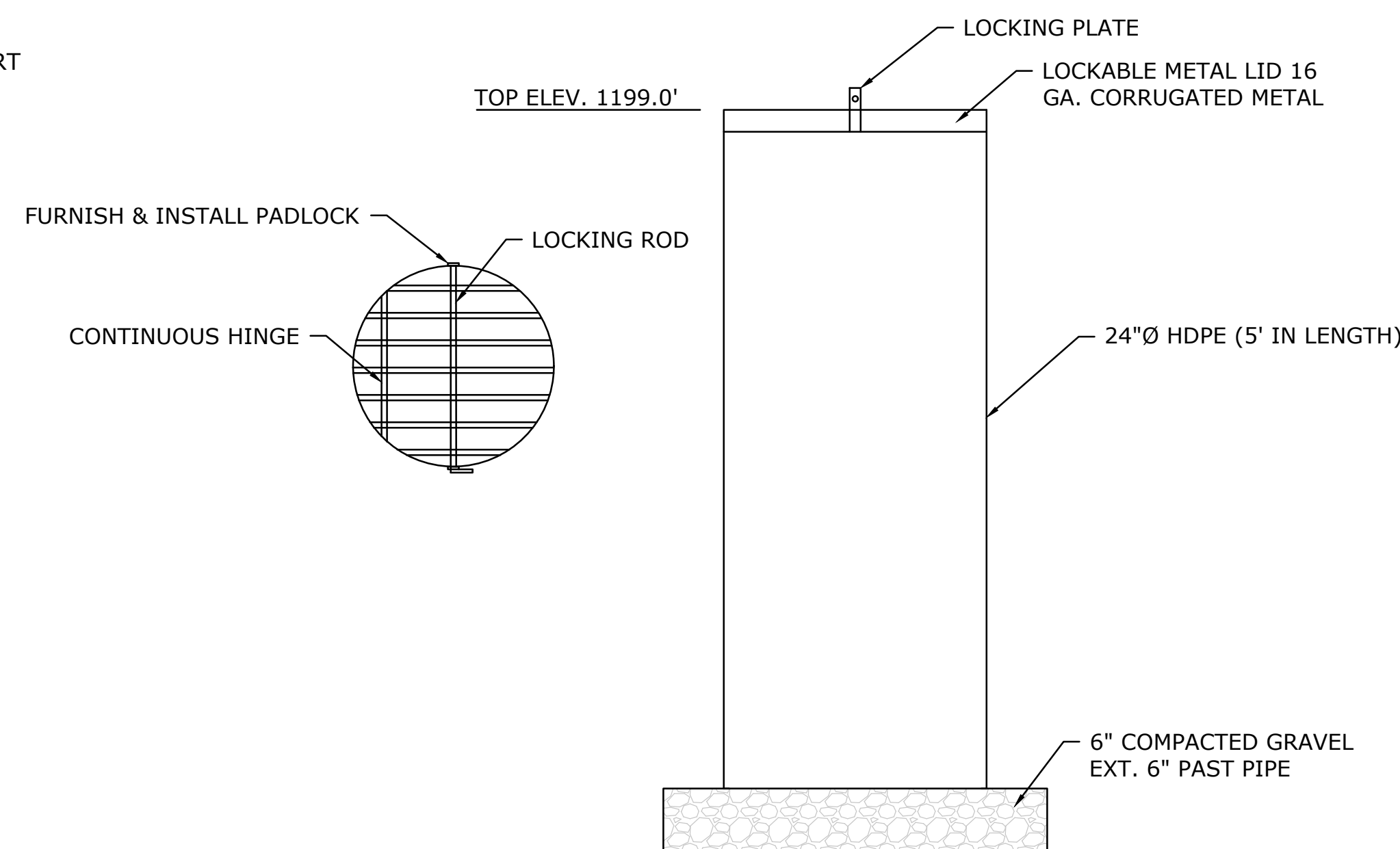
STOPLOG GUIDE DETAIL
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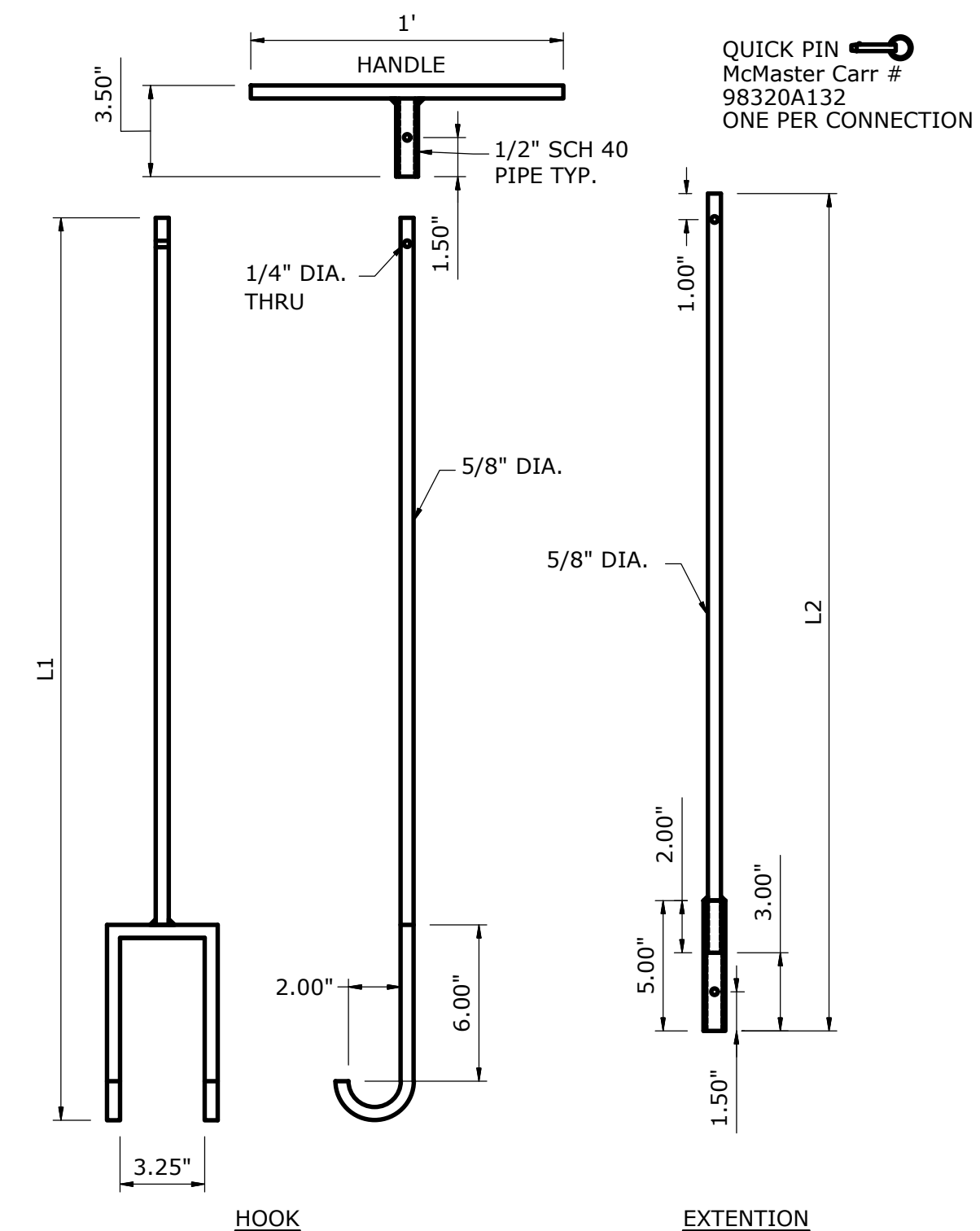
STOPLOG CHANNEL DETAIL
NOT TO SCALE



LOCKING ROD DETAIL
NOT TO SCALE

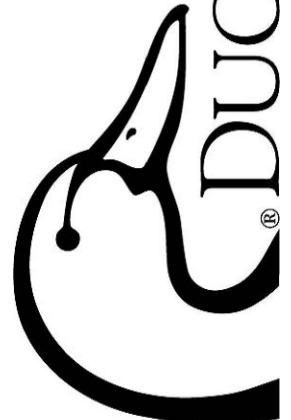


STOPLOG STORAGE BOX DETAIL
NOT TO SCALE



STOPLOG LIFTING HOOK DETAIL
NOT TO SCALE

NOTE: L1 AND L2 EQUAL HEIGHT OF RISER PLUS 1'
MAX LENGTH FOR EACH 5'. AFTER ADD A SECOND EXTENSION L3
2 PER STRUCTURE



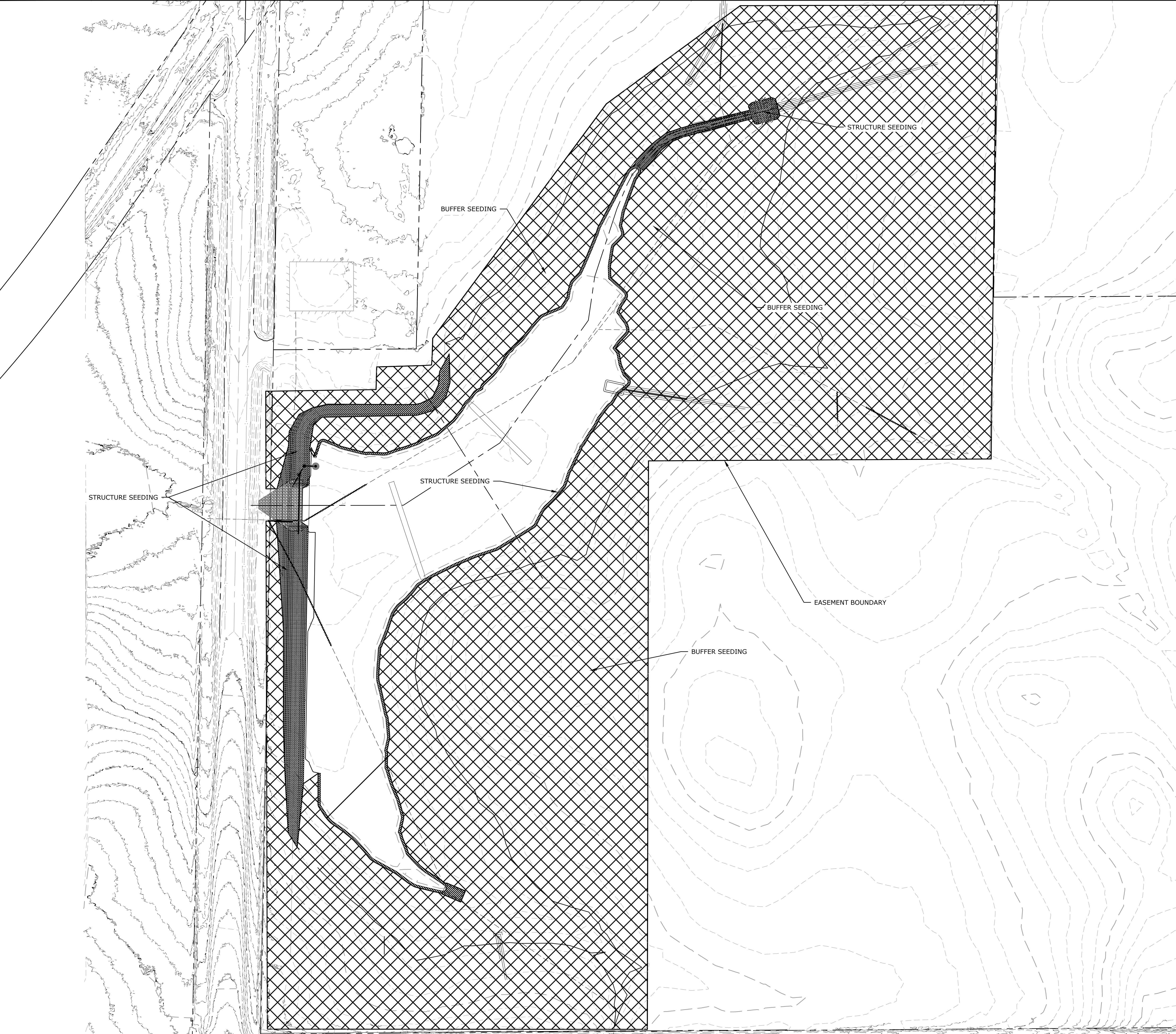
Revision	Sheet	Revisions	Date	By
1		NRCS/DALS REVIEW UPDATES	9-19-24	A.S.

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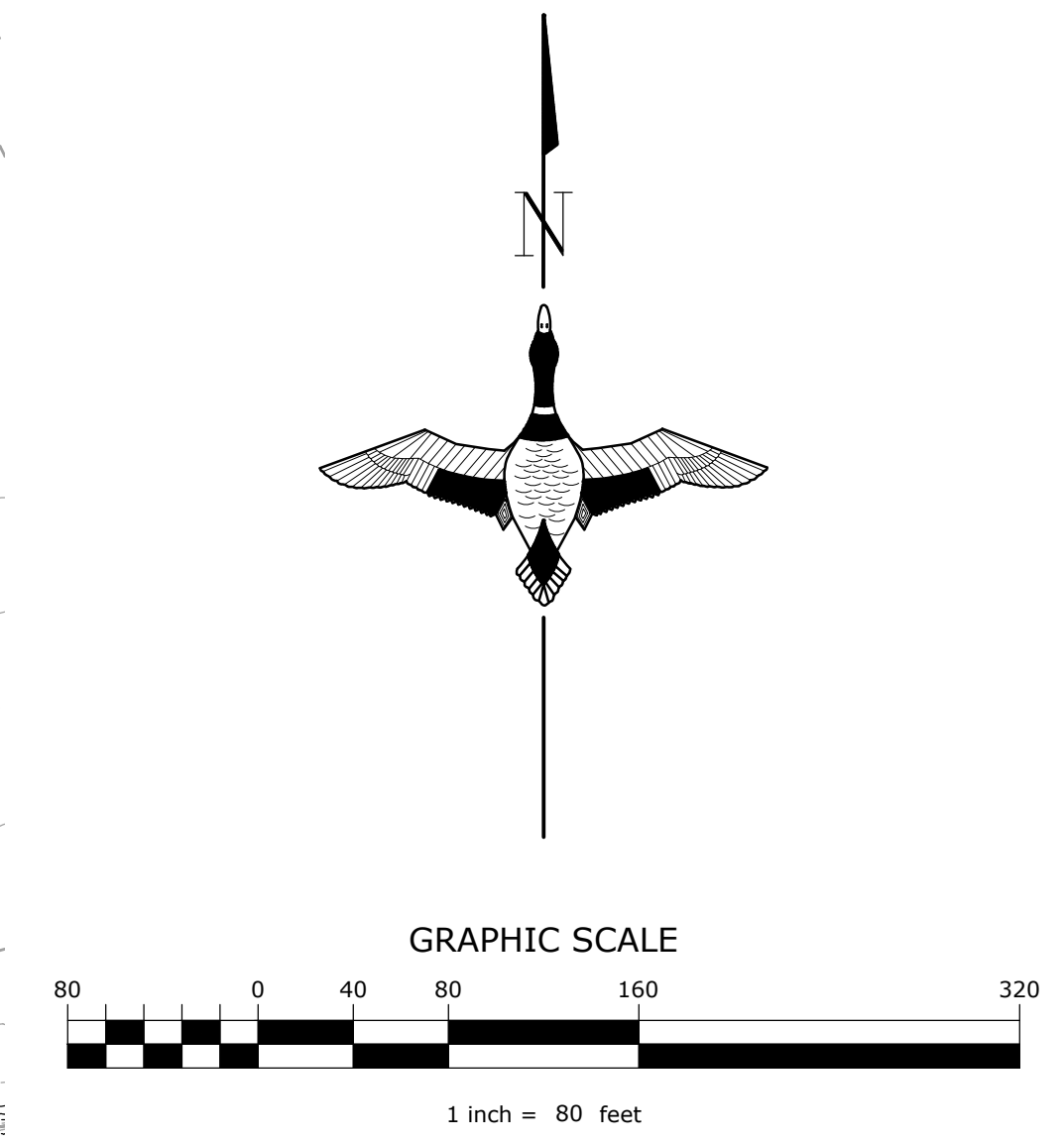


LEGEND

	STRUCTURE SEEDING
	BUFFER SEEDING

NOTE:
ALL DISTURBED AREAS SHALL BE SEEDED/MULCHED, AS NECESSARY. REFERENCE SPECIFICATION IA-6 (SEEDING AND MULCHING FOR PROTECTIVE COVER) FOR SEEDING MIXTURE TYPES AND APPLICATIONS STANDARDS. SEED MIX DESIGN SHALL BE SUBMITTED TO ENGINEER FOR APPROVAL AT LEAST 2 WEEKS BEFORE SEEDING.

NOTE:
BUFFER SEEDING: 25.2 ACRES
STRUCTURE SEEDING: 1.1 ACRES



SEEDING PLAN
PROJECT NO. WRI922420D
WRIGHT COUNTY
IOWA

Revision	Sheet	Revisions	Date	By
1		NICS/DALS REVIEW UPDATES	9-19-24	A.S.

CAD FILE:
Wright-Peterson-Site Plan

DESIGNED BY: A.S.
DRAWN BY: C.K.
SURVEYED BY: A.S., J.W.
REVIEWER: T.P.

DATE: 6-19-24
PROJECT NUMBER: IA-340-8
C401

NOT FOR CONSTRUCTION

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