

File: C:\Archive C Drive\4317A-Dwire Yard\Draw As-Built\4317-Dwire Yard As-Built-10-3-24.dwg Plotstamp: 11/17/2024 11:50 AM

POND CERTIFICATION

FOREBAY INLETS

DESIGNED INVERT 18" IN (E) = 6530.10', SURVEY INVERT 18" IN (E) = 6530.16'
 DESIGNED FLOOR (E) = 6530.00', SURVEY FLOOR (E) = 6530.08'
 DESIGNED FLOOR (NW) = 6527.94', SURVEY FLOOR (NW) = 6527.86'
 DESIGNED FLOOR (N) = 6528.87', SURVEY FLOOR (N) = 6528.86'

OUTLET STRUCTURE

DESIGNED LF CHANNEL INVERT IN = 6527.50', SURVEY INVERT IN = 6527.19'
 DESIGNED 24" INVERT OUT (W) = 6526.92', SURVEY 24" INVERT OUT (W) = 6526.96'
 DESIGNED TOP CONC. BOX/GRATE = 6532.01', SURVEY TOP CONC. GRATE = 6532.26'

SPILLWAY (EDB)

DESIGNED SPILLWAY ELEVATION = 6533.15', SURVEY SPILLWAY ELEVATION = 6533.76'

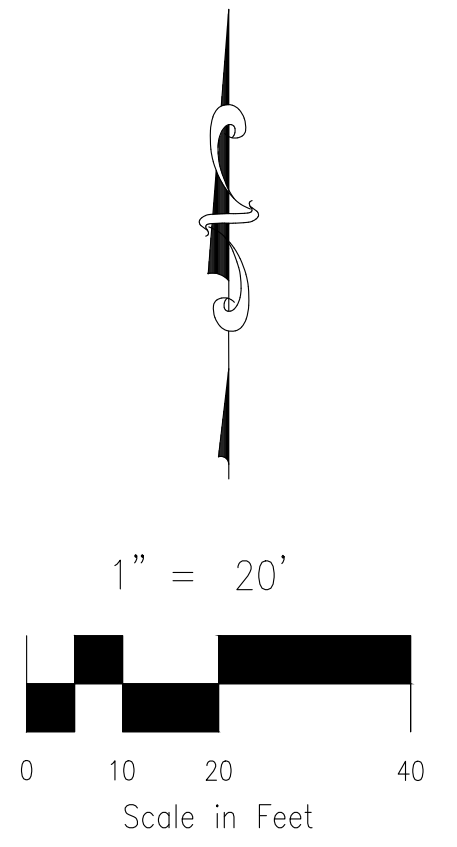
VOLUME

DESIGNED VOLUME = 2.352 ACRE FEET @ 6533.15' (100 YR SURFACE)
 PROVIDED VOLUME = 2.352 ACRE FEET @ 6533.31' (100 YR SURFACE)

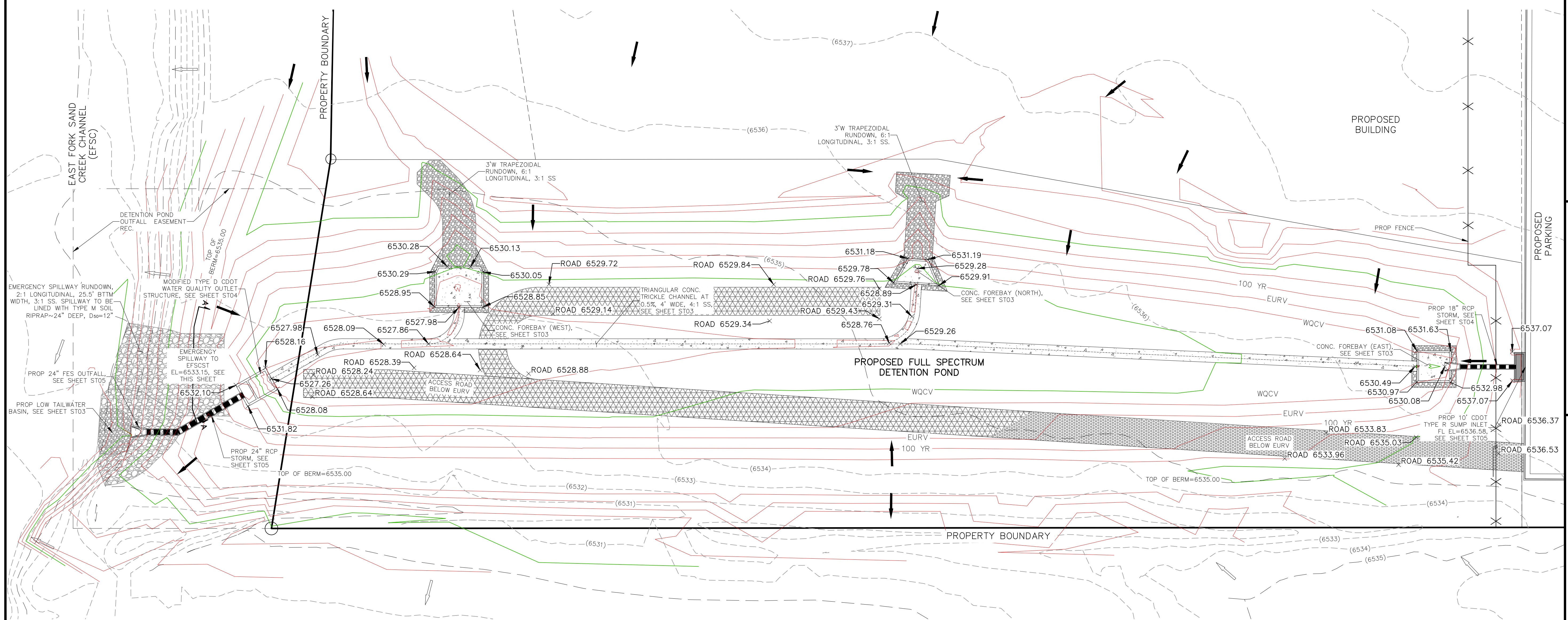
AS-BUILT FULL SPECTRUM DETENTION POND DATA	
WQ WATER SURFACE EL=6530.33	WQ VOLUME=0.456 AC-FT
EURV WATER SURFACE EL=6532.21	EURV VOLUME=1.523 AC-FT
100-YR WATER SURFACE EL=6533.31	SPILLWAY CREST EL=65.
SPILLWAY	TOP OF EMBANKMENT EL=65.
100-YR VOLUME=2.352 AC-FT	100-YR INFLOW=60.4 CFS
100-YR RELEASE=18.2 CFS	

LEGEND

- EX EXISTING
- PROP PROPOSED
- ASBUILT MAJ CONT
- ASBUILT MIN CONT
- EXIST MAJ CONT
- EXIST MIN CONT
- 100 YR 100YR FLOODPLAIN
- RIPRAP TYP.
- STABILIZED MAINTENANCE ROAD ABOVE EURV
- STABILIZED MAINT. ROAD BELOW EURV
- CONCRETE LOW FLOW CHANNEL
- SC250 EROSION CONTROL MATTING
- EX. FLOW ARROW
- PROP. FLOW ARROW
- PROPERTY LINE
- PROP STORM SEWER PIPE



AS BUILT



FULL SPECTRUM DETENTION POND SITE PLAN

SCALE 1"=20'

DWIRE STORAGE YARD		DATE: 05/18/2022	
FULL SPECTRUM DETENTION POND SITE PLAN		SCALE: HORIZONTAL: 1"=20' VERTICAL: N/A	
PROJECT NO. 43-117		DESIGNED BY: CMN	
DRAWN BY: CMN		CHECKED BY: WAS	
SHEET 3 OF		ST02AB	

CIVIL CONSULTANTS, INC.

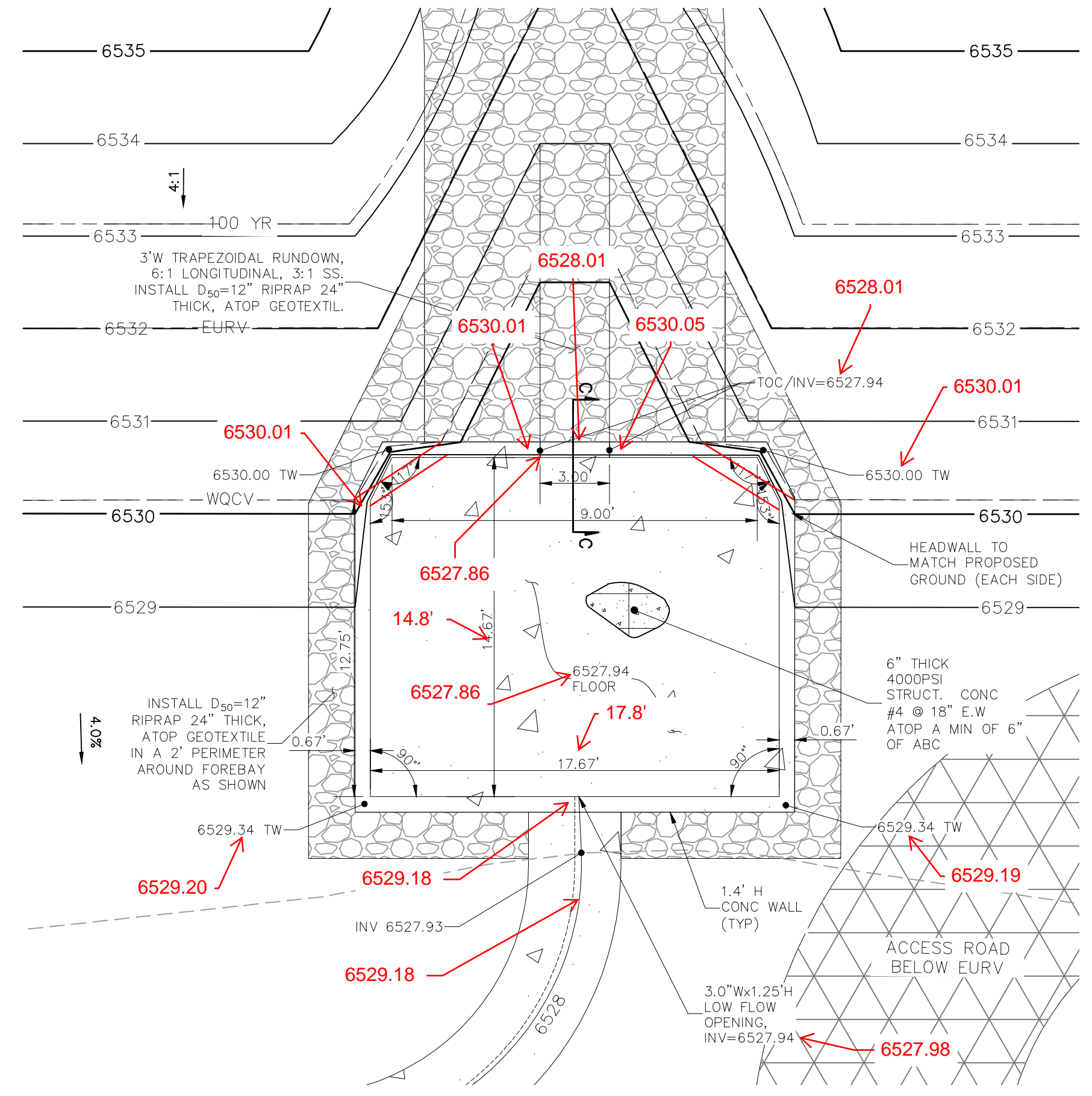
212 N. WASHATCH AVE., STE. 305
 COLORADO SPRINGS, CO 80903
 PHONE: 719.955.5485

FOR AND ON BEHALF OF	MRS. CIVIL CONSULTANTS, INC.
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REVISIONS:	DATE:
NO.	BY:
DESCRIPTION:	APPROV. BY:

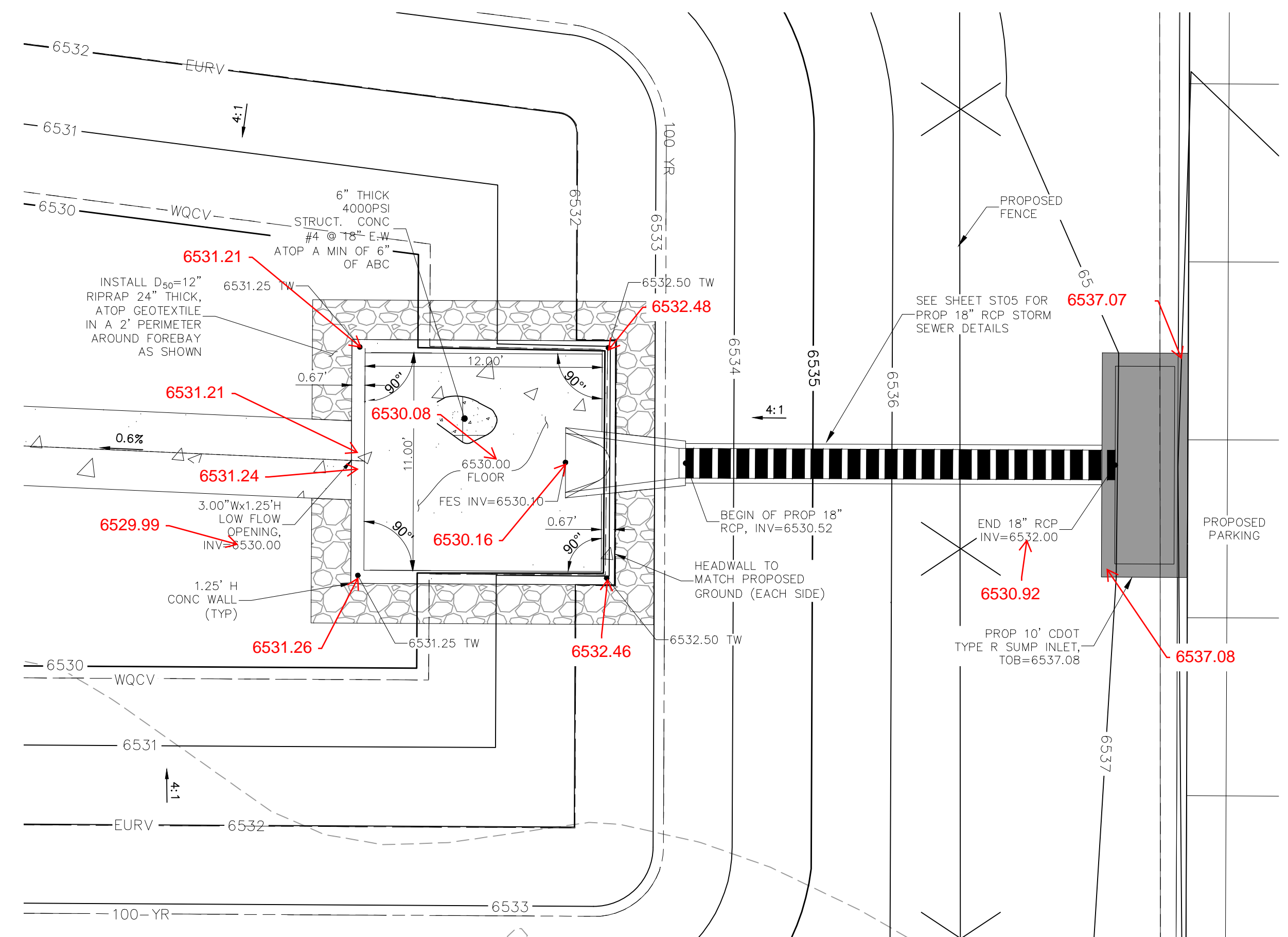
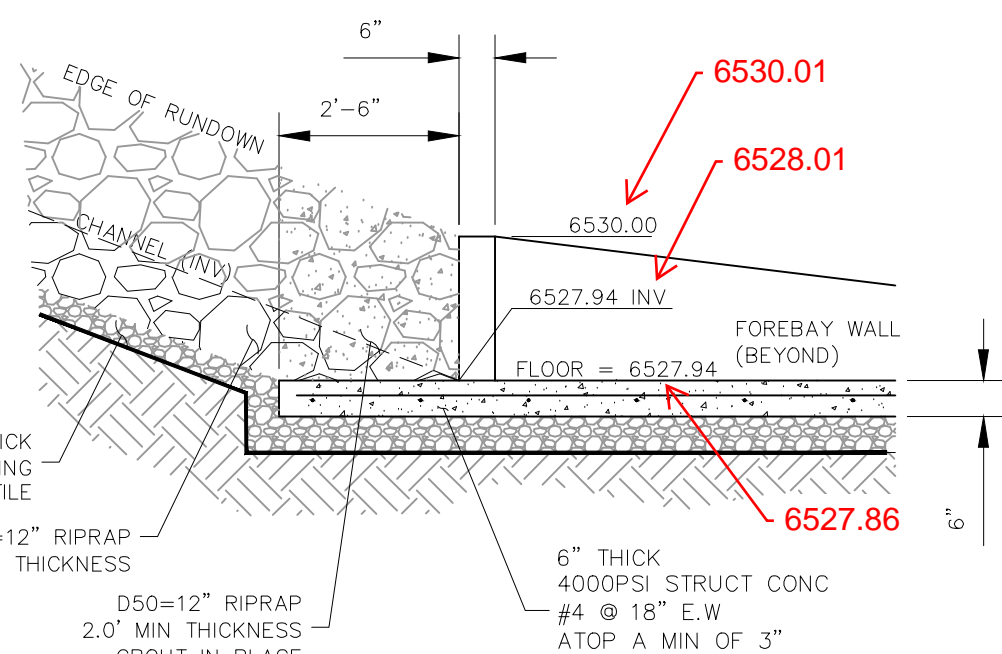
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CAUTION



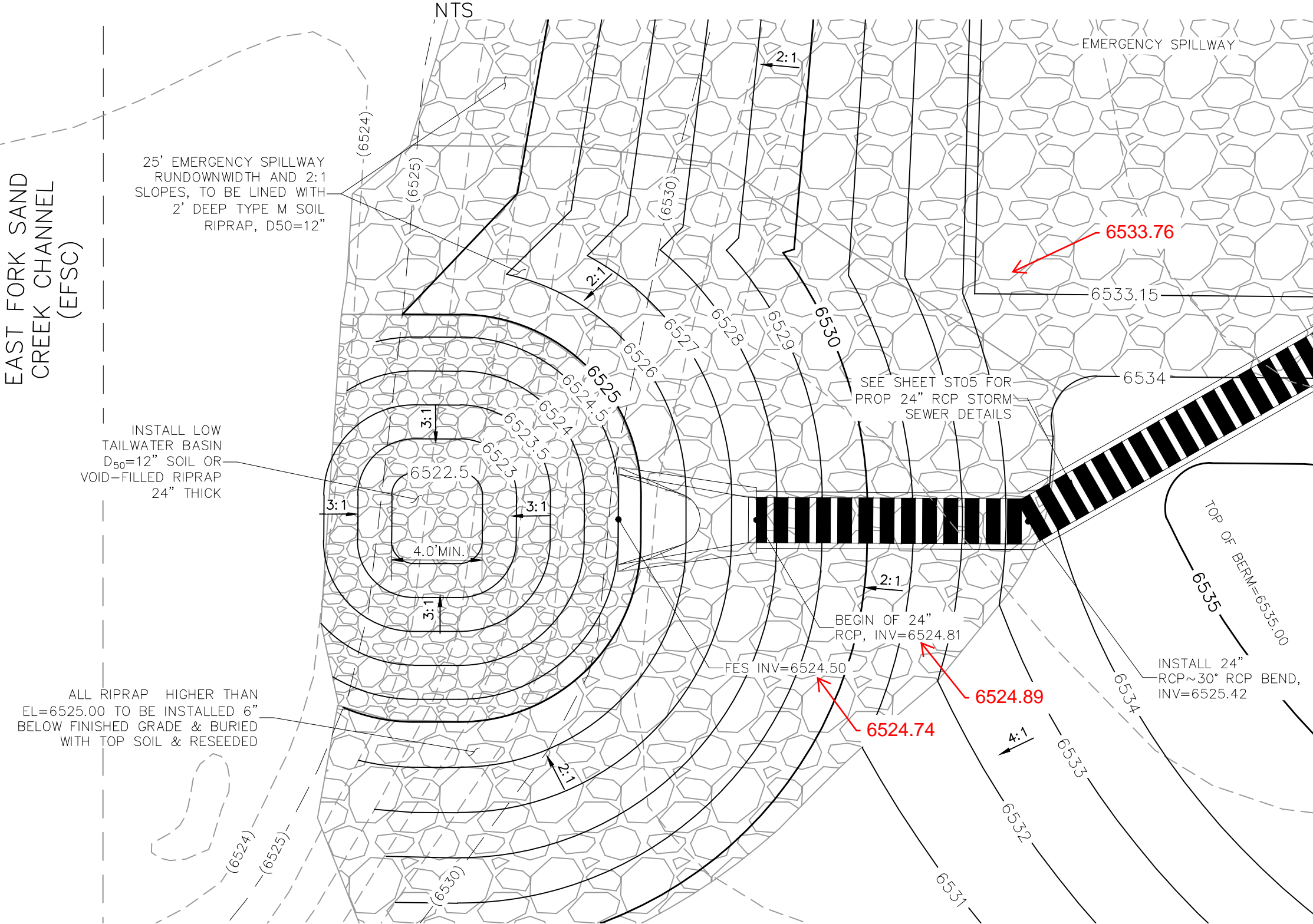
WEST FOREBAY
NTS

**SECTION C-C
W FOREBAY RIPRAP RUNDOWN/FOREBAY INTERFACE**
NOT TO SCALE

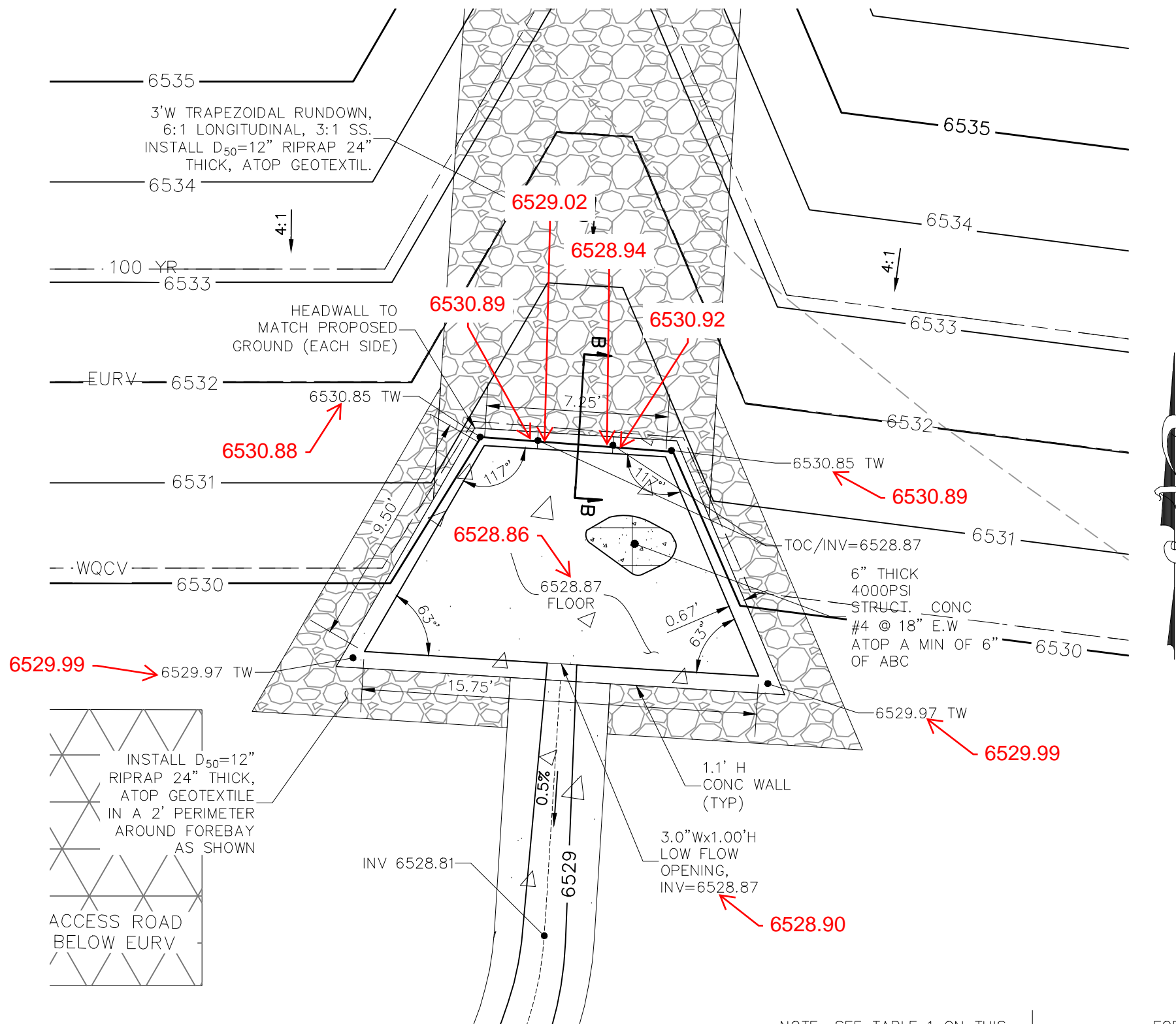


EAST FOREBAY & 18" STORM SEWER
NTS

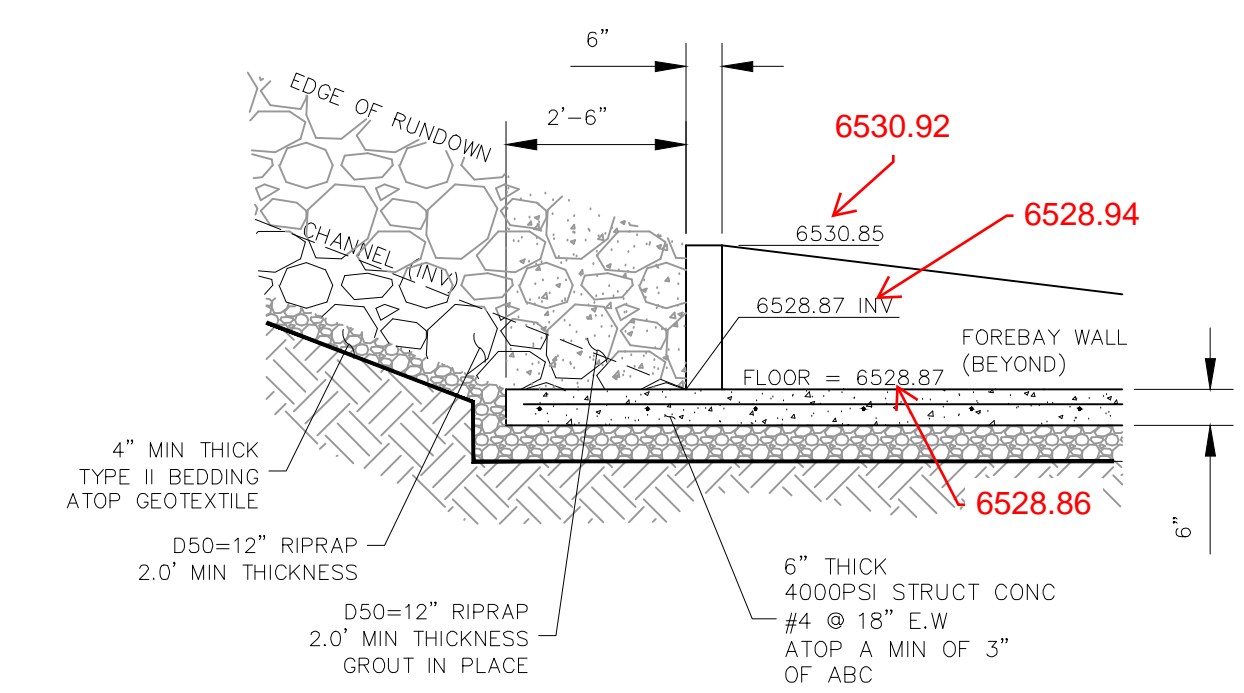
**AS-BUILT
ENGINEERING RECORD DRAWINGS**



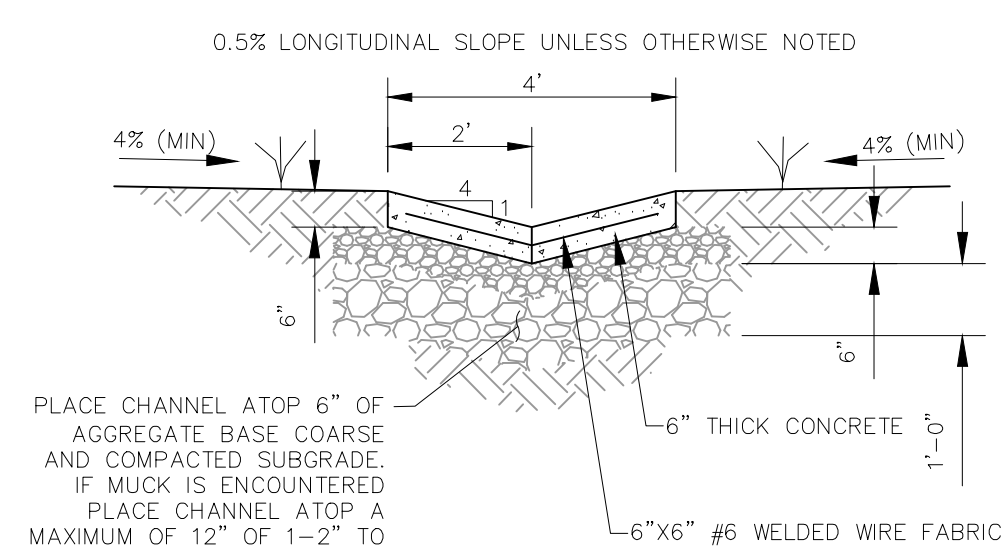
24" RCP OUTFALL TO EFSC
NTS



NORTH FOREBAY
NTS

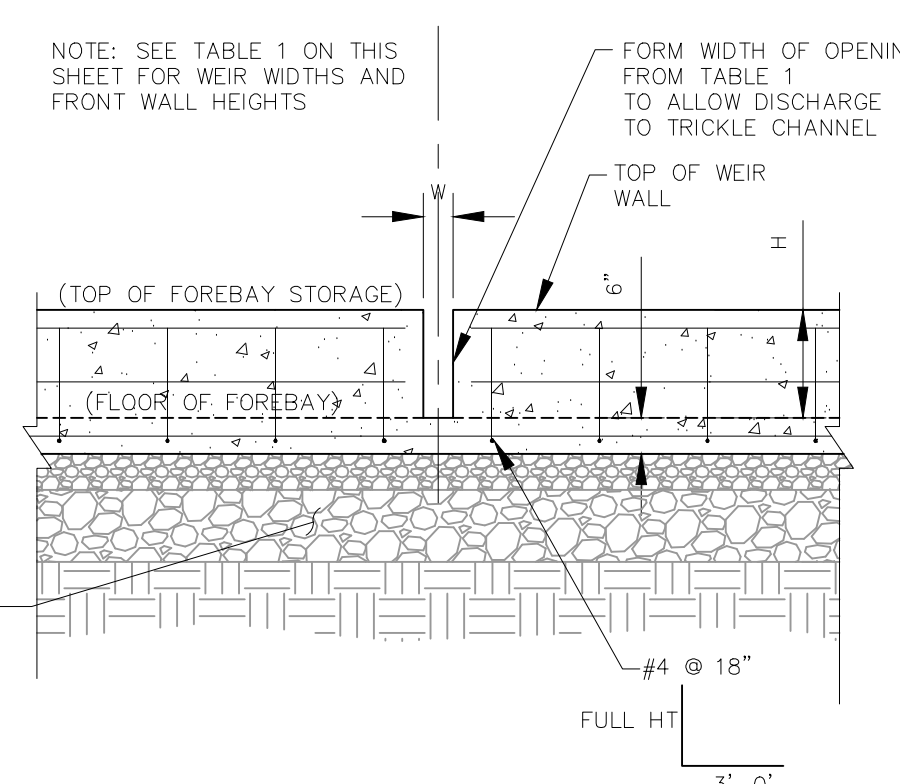


**SECTION B-B
N FOREBAY RIPRAP RUNDOWN/FOREBAY INTERFACE**
NOT TO SCALE



LOW FLOW CHANNEL TYPICAL SECTION
NOT TO SCALE

FOREBAY	WIDTH (W)	HEIGHT (H)
WEST	3.0' IN	1.4 FT
NORTH	3.0' IN	1.10 FT
EAST	3.0' IN	1.25 FT



TYPICAL FOREBAY FRONT WALL W/NOTCH
NOT TO SCALE

LEGEND

- EX EXISTING
- PROP PROPOSED
- PROP MAJ CONT
- PROP MIN CONT
- EXIST MAJ CONT
- EXIST MIN CONT
- 100 YR 100YR FLOODPLAIN
- RIPRAP TYP.
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- SC250 EROSION CONTROL MATTING
- EX. FLOW ARROW
- PROP. FLOW ARROW
- PROPERTY LINE
- PROP STORM SEWER PIPE EPC 3/17/2021

STATEMENT:
THE CITY OF COLORADO SPRINGS RECOGNIZES THE DESIGN ENGINEER AS HAVING RESPONSIBILITY FOR THE DESIGN; THE CITY HAS LIMITED ITS SCOPE OF REVIEW ACCORDINGLY. RESUBMITTAL REQUIRED IF CONSTRUCTION HAS NOT COMMENCED WITHIN 180 DAYS AFTER APPROVAL DATE.

FOR LOCATING & MARKING GAS, ELECTRIC, WATER & TELEPHONE LINES

FOR BURIED UTILITY INFORMATION 48 HRS BEFORE YOU DIG CALL 1-800-922-1987

DWIRE STORAGE YARD

FSD FOREBAY AND OUTFALL DETAILS

PROJECT NO. 43-117 DATE: 05/21/2020 SHEET 3 OF 6 ST03

DESIGNED BY: CMN DRAWN BY: CMN CHECKED BY: N/A

20 BOULDER CRESCENT SUITE 110
COLORADO SPRINGS, CO 80903
PHONE: 719.555.4485

CIVIL CONSULTANTS, INC.

FOR AND ON BEHALF OF M&S CIVIL CONSULTANTS, INC.

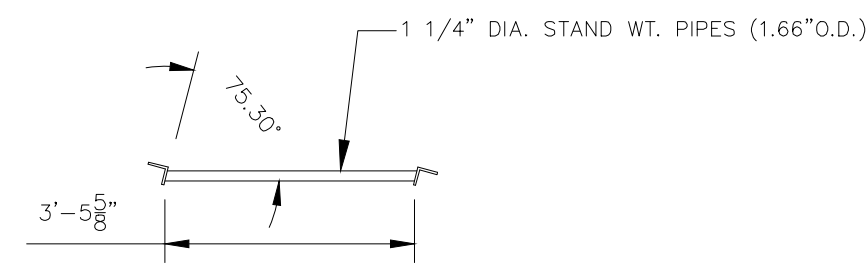
PROF. A. SANCHEZ, COLORADO P.E. NO. 37160

REGISTERED PROFESSIONAL ENGINEER
NO. 37160
1-29-21

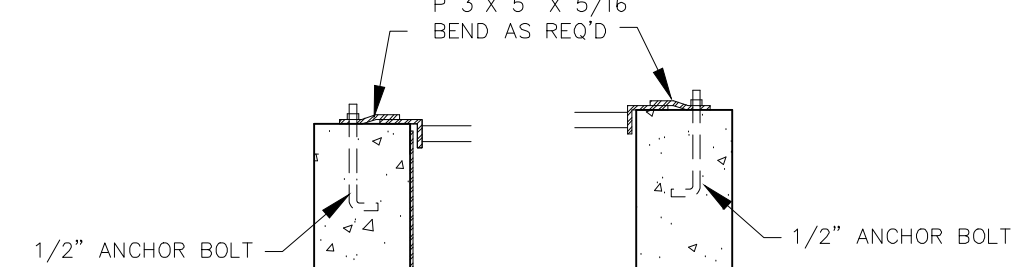
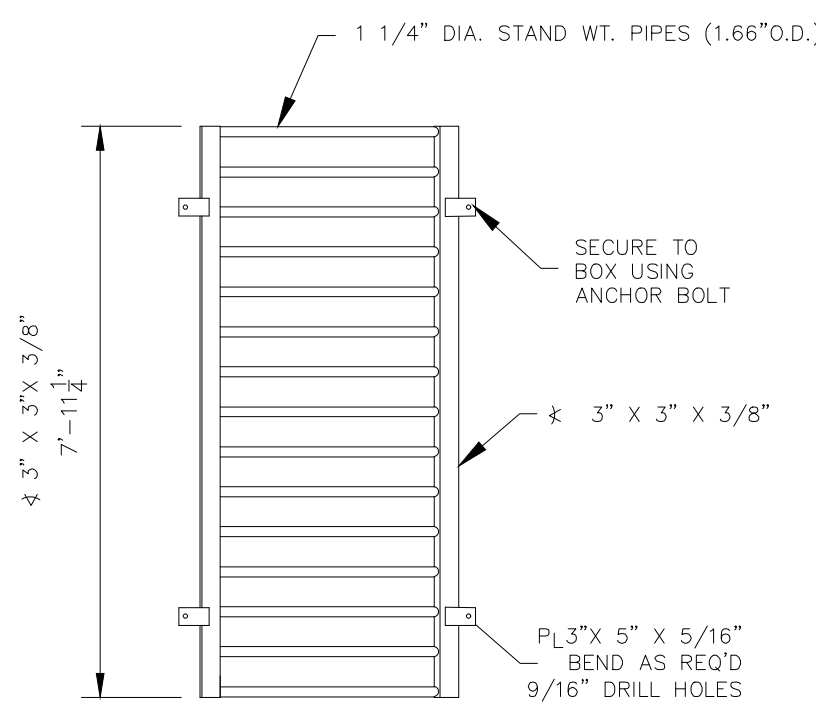
REVISIONS: NO. DATE: BY: DESCRIPTION:

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CAUTION



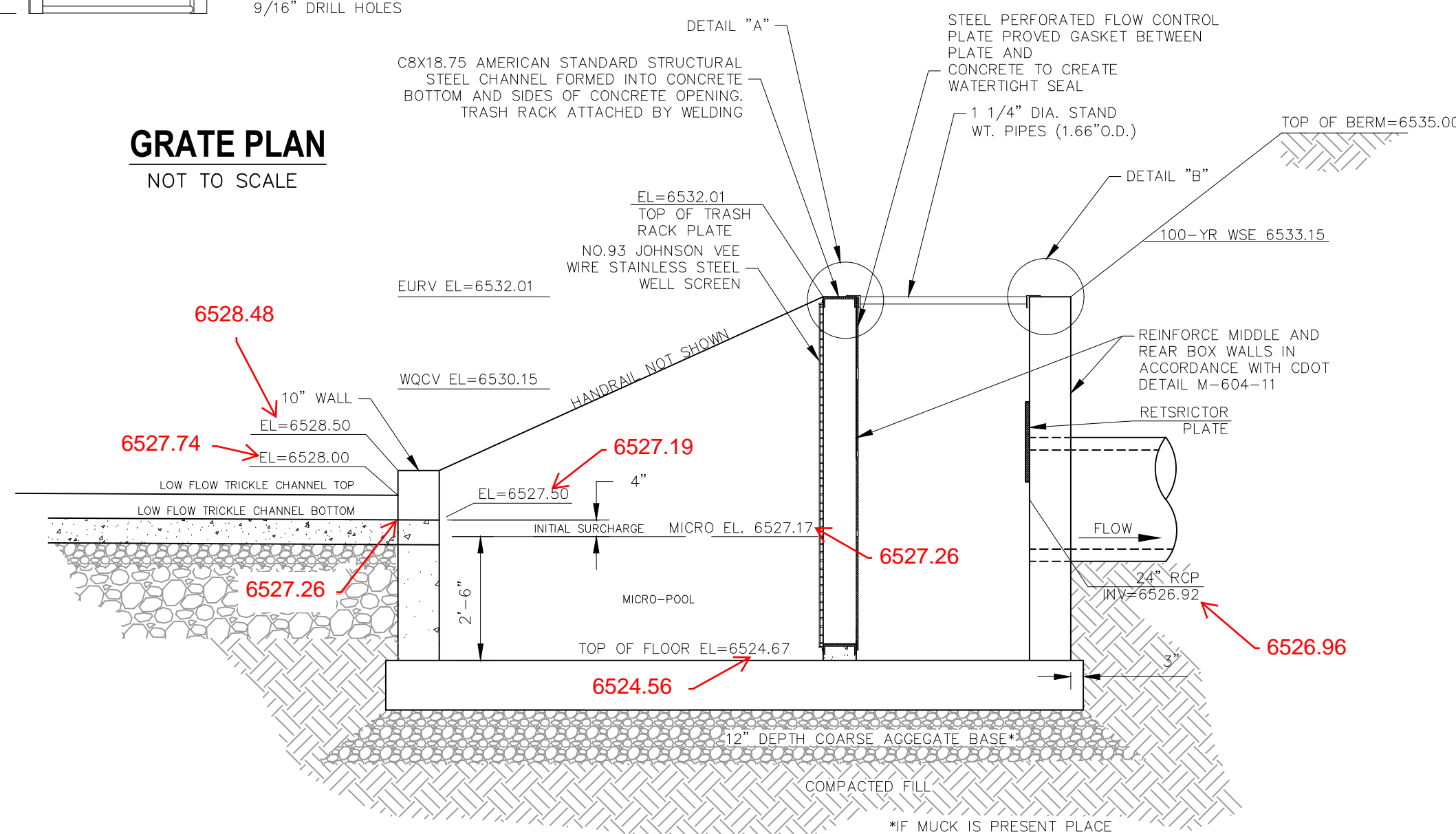
SECTION
NOT TO SCALE



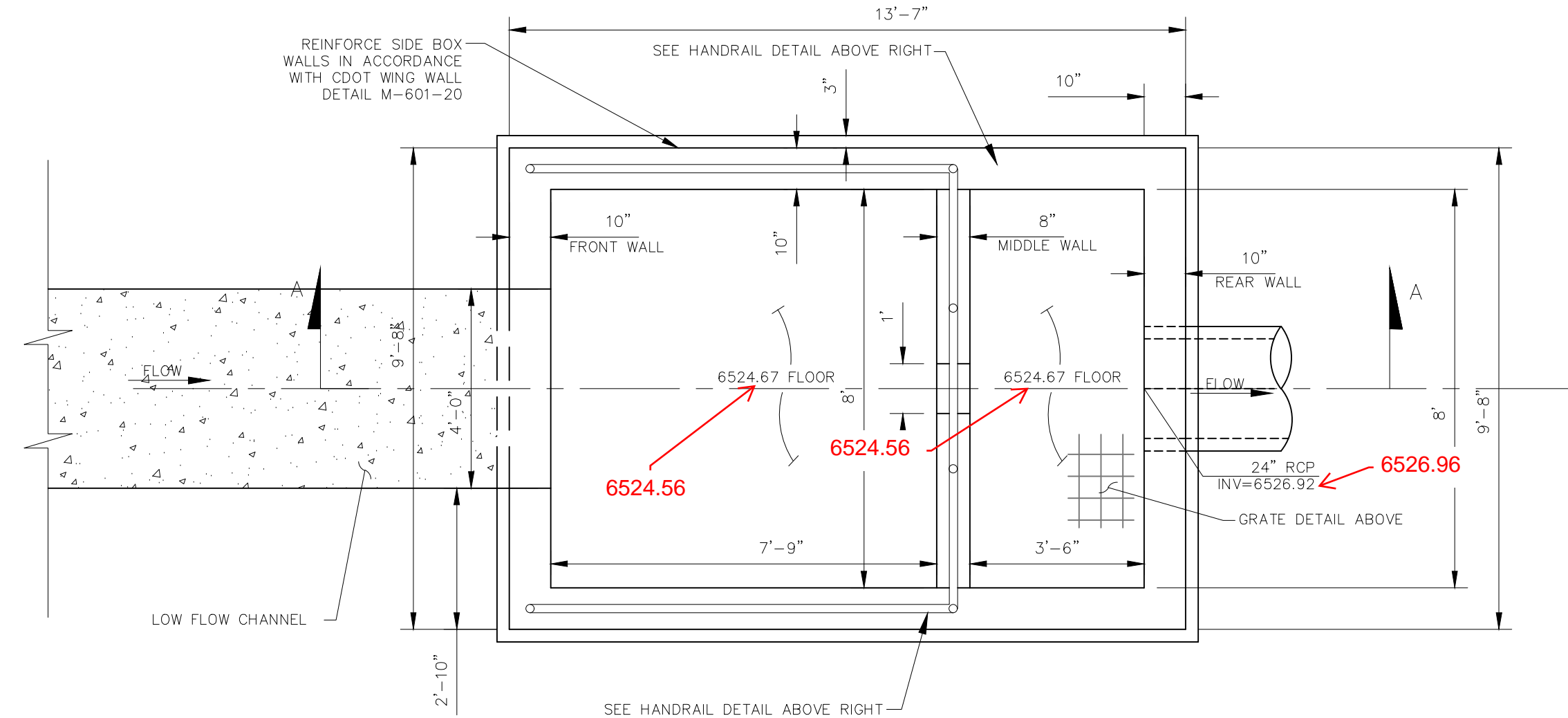
GRATE DETAIL "A"

GRATE DETAIL "B"

GRATE PLAN
NOT TO SCALE

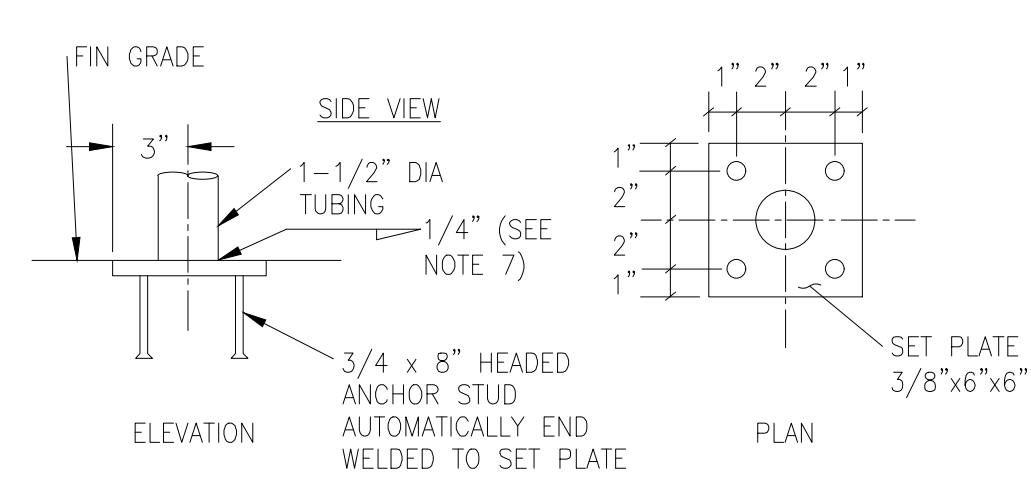


SECTION A-A
NOT TO SCALE



FDS POND WATER QUALITY OUTLET STRUCTURE

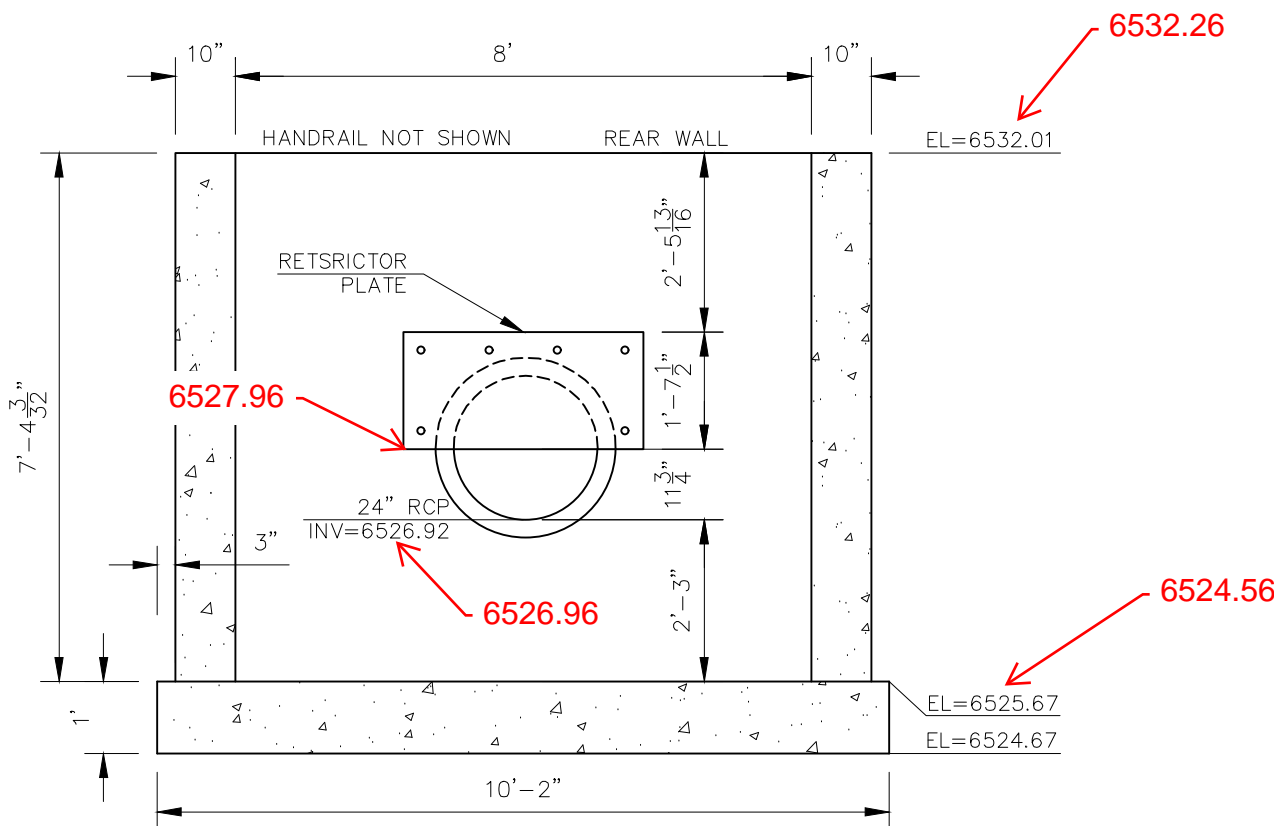
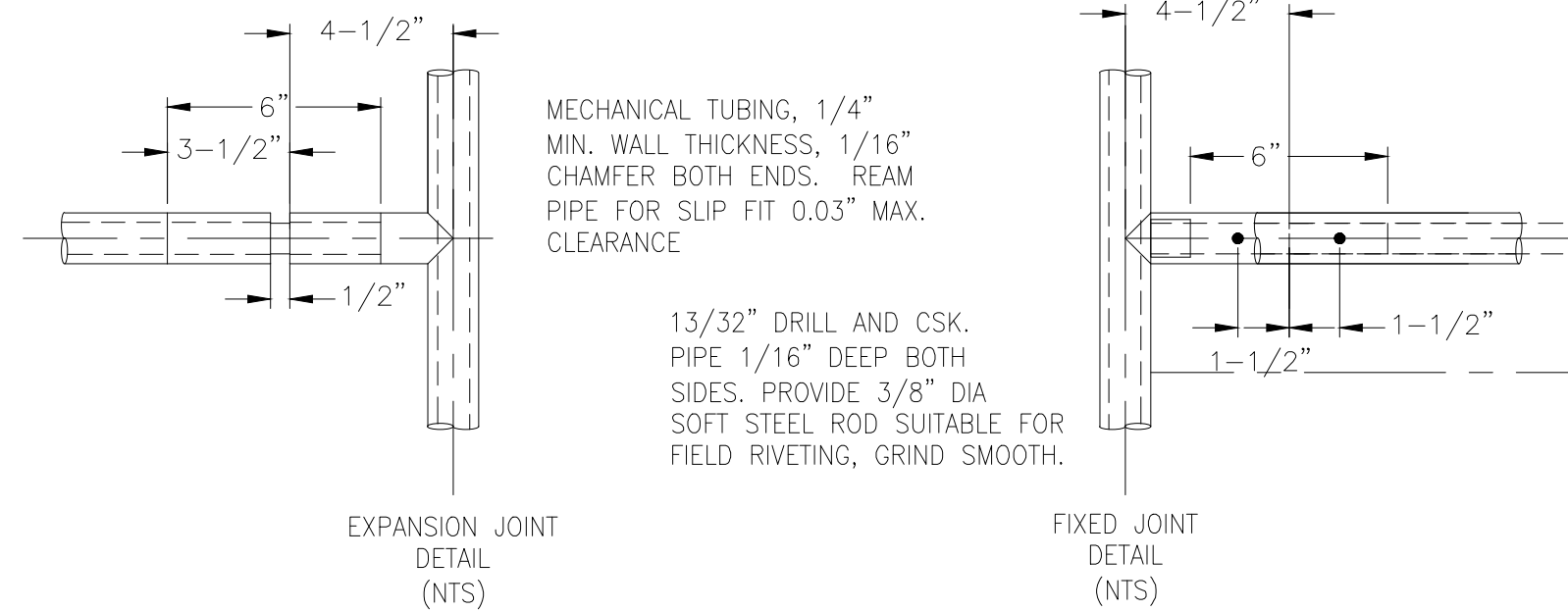
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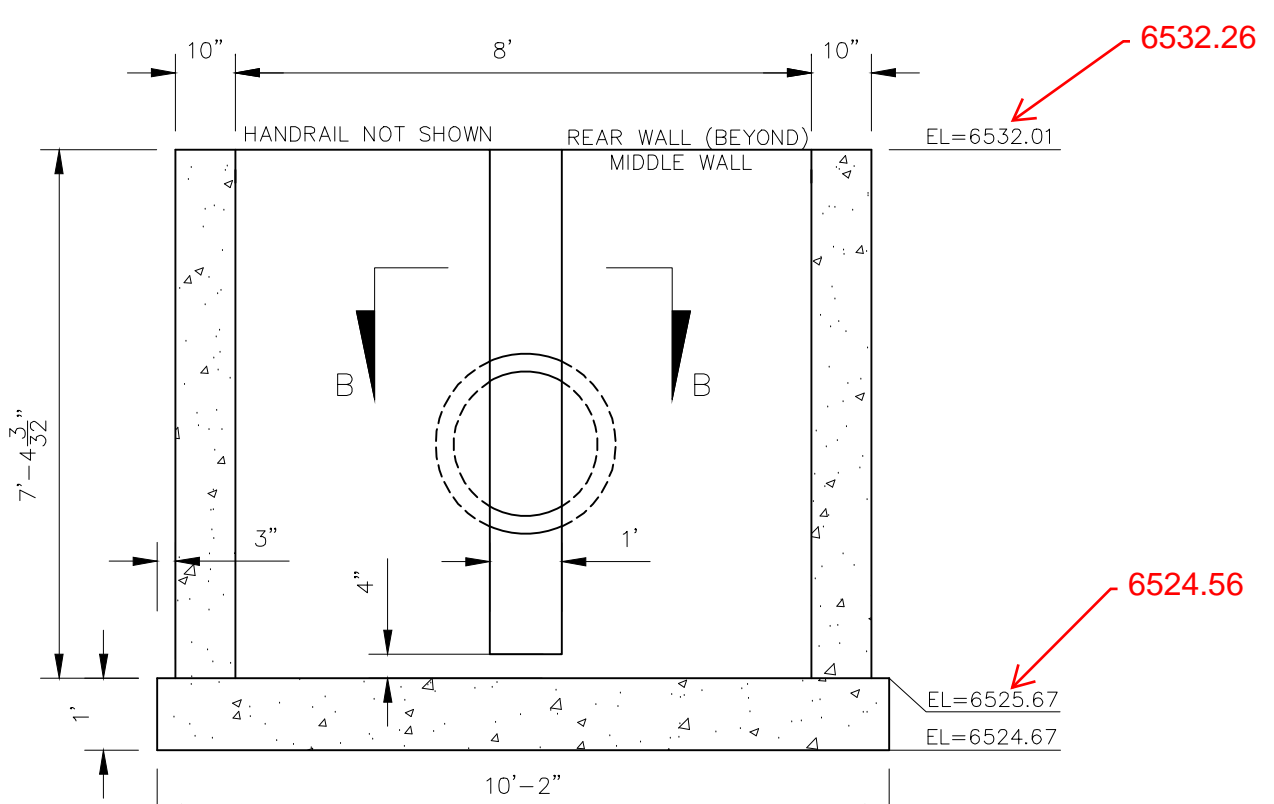
HANDRAIL ASSEMBLY DETAILS
NOT TO SCALE

- 1) WELD PLATES MAY BE SUBSTITUTED FOR PIPE EMBEDMENT.
- 2) CONTRACTOR TO SUBMIT SHOP DRAWINGS TO ENGINEER OF RECORD FOR APPROVAL PRIOR TO FABRICATION.
- 3) DESIGN CRITERIA SHALL BE IN ACCORDANCE WITH AASHTO STANDARDS.
- 4) HANDRAIL DESIGN SHALL BE COMPATIBLE WITH THE DESIGN OF THE WINGWALLS AND HEADWALLS.
- 5) RAILING POSTS SHALL BE SET TO NORMAL TO GRADE. RAILS SHALL RUN PARALLEL TO THE SLOPES OF THE TOP OF WALLS.
- 6) ALL RAILS SHALL BE FREE OF ANY SHARP EDGES OR CORNERS.

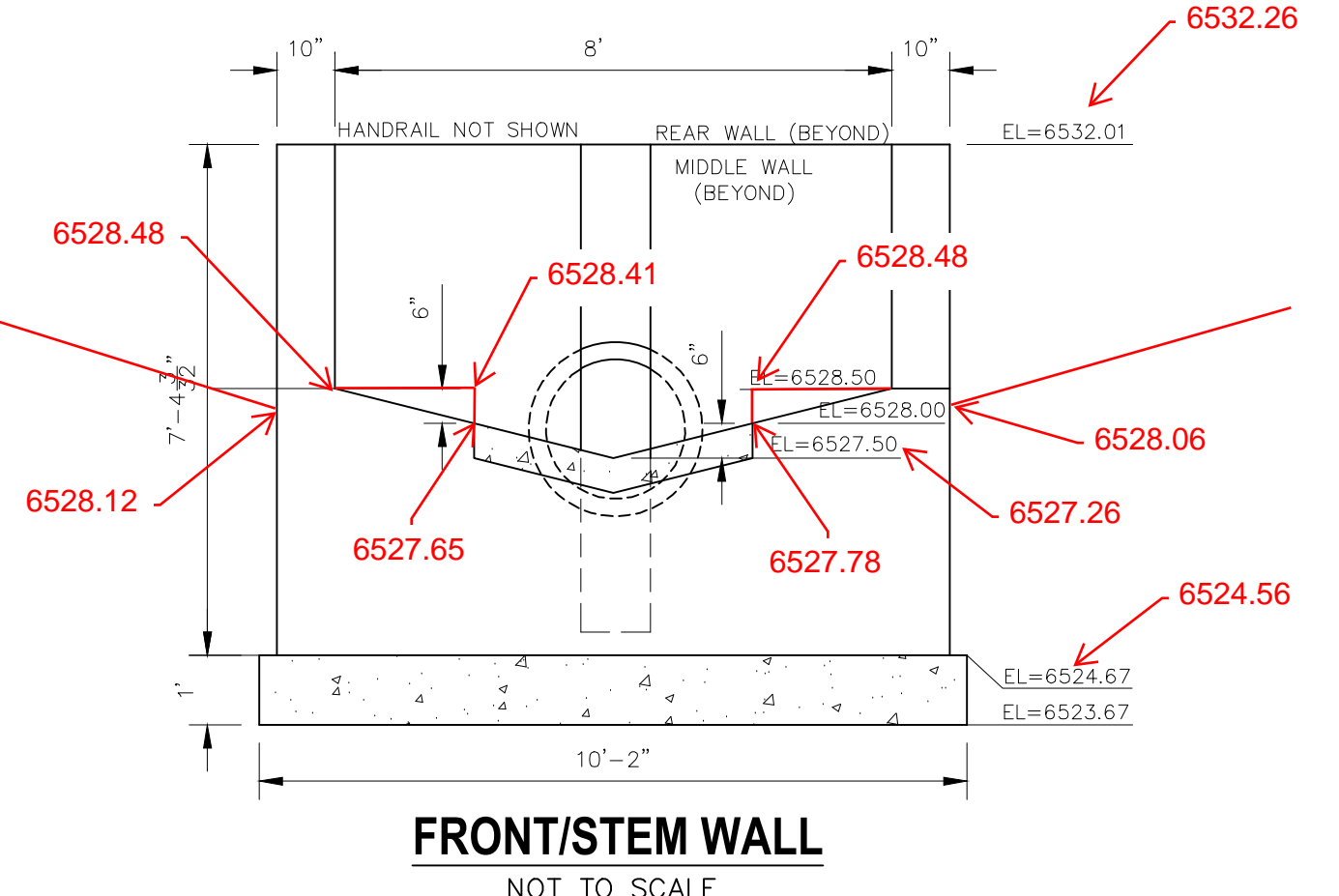
HANDRAIL ASSEMBLY DETAILS
NOT TO SCALE



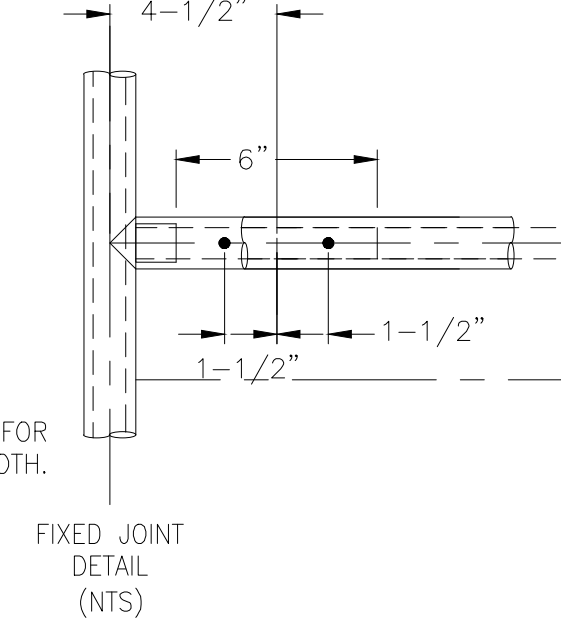
REAR WALL
NOT TO SCALE



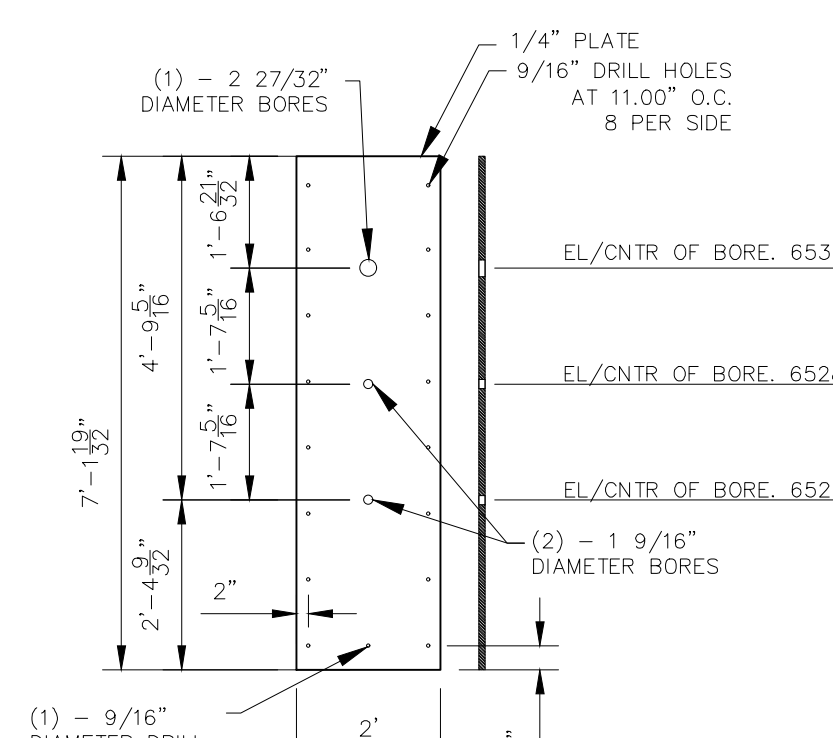
MIDDLE WALL
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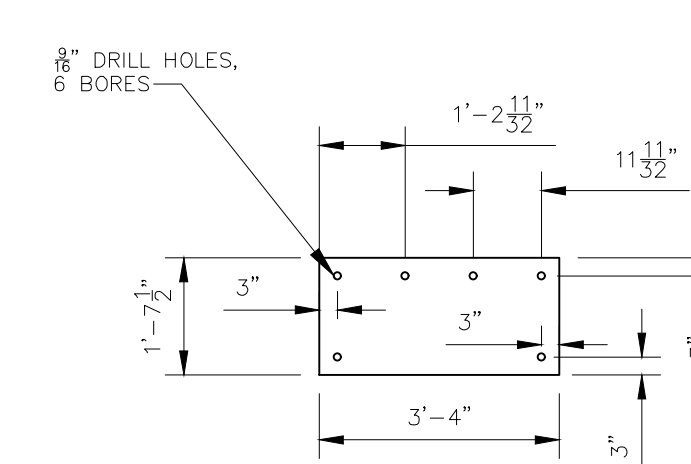
FRONT/STEM WALL
NOT TO SCALE



FIXED JOINT DETAIL (NTS)

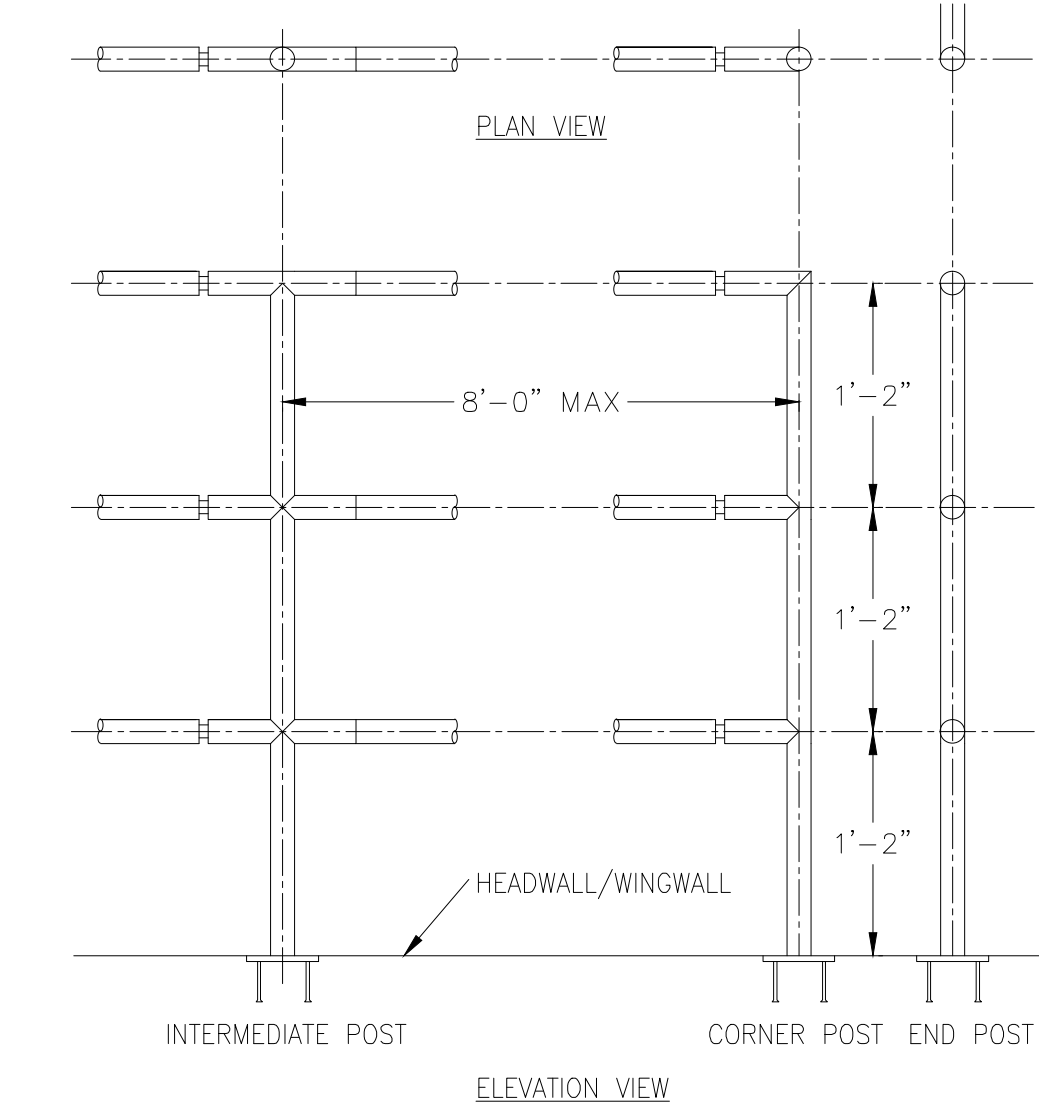


ORIFICE PLATE
NOT TO SCALE

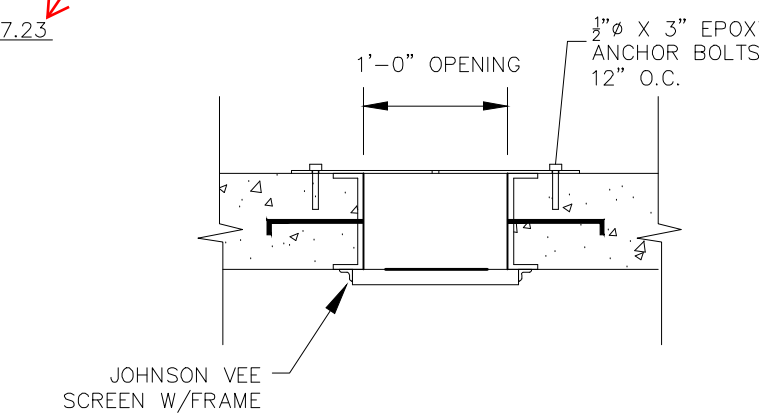


RESTRICTOR PLATE
NOT TO SCALE

NOTE:
ALL GRATES, IMBEDS, AND FASTENERS SHALL BE FABRICATED USING GALVANIZED STEEL, UNLESS OTHERWISE NOTED.
ALL GRATE DIMENSIONS TO BE FIELD VERIFIED PRIOR TO FABRICATION. ALL GRATE MATERIAL SHALL BE GALVANIZED.



HANDRAIL ASSEMBLY DETAILS
NOT TO SCALE



SECTION B-B
NOT TO SCALE

TRASH SCREEN DETAIL
NOT TO SCALE

AS-BUILT ENGINEERING RECORD DRAWINGS

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DWIRE STORAGE YARD

FSD OUTLET STRUCTURE DETAILS

PROJECT NO. 43-117 DATE: 11/16/2020

SCALE: HORIZONTAL: N/A VERTICAL: N/A

DESIGNED BY: CMN DRAWN BY: CMN CHECKED BY: WAS

SHEET 4 OF 6 ST04

20 BOULDER CRESCENT SUITE 110
COLORADO SPRINGS, CO 80903
PHONE: 719.555.5485

M&S CIVIL CONSULTANTS, INC.

FOR AND ON BEHALF OF M&S CIVIL CONSULTANTS, INC.

MARCIL A. SANCHEZ, COLORADO P.E. NO. 37160

REGISTERED PROFESSIONAL ENGINEER

37160

1-29-21

REVISIONS:

NO.	DATE	BY	DESCRIPTION

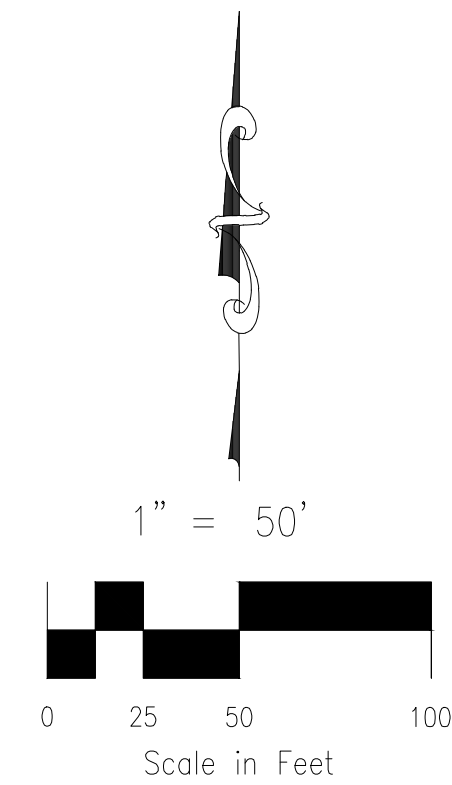
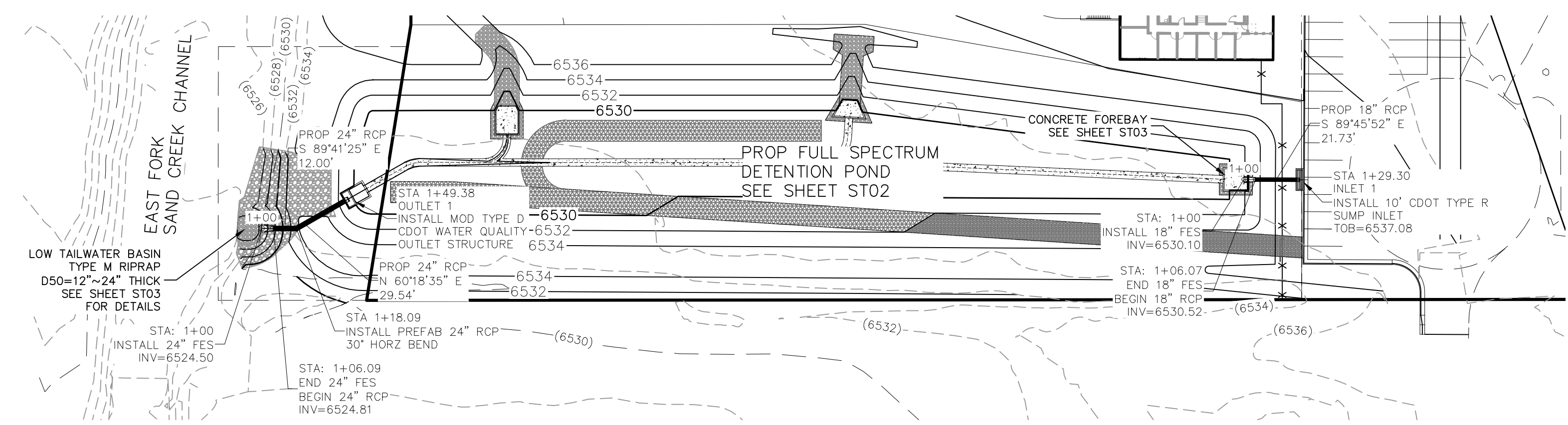
APPROV. BY: DATE:

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CAUTION

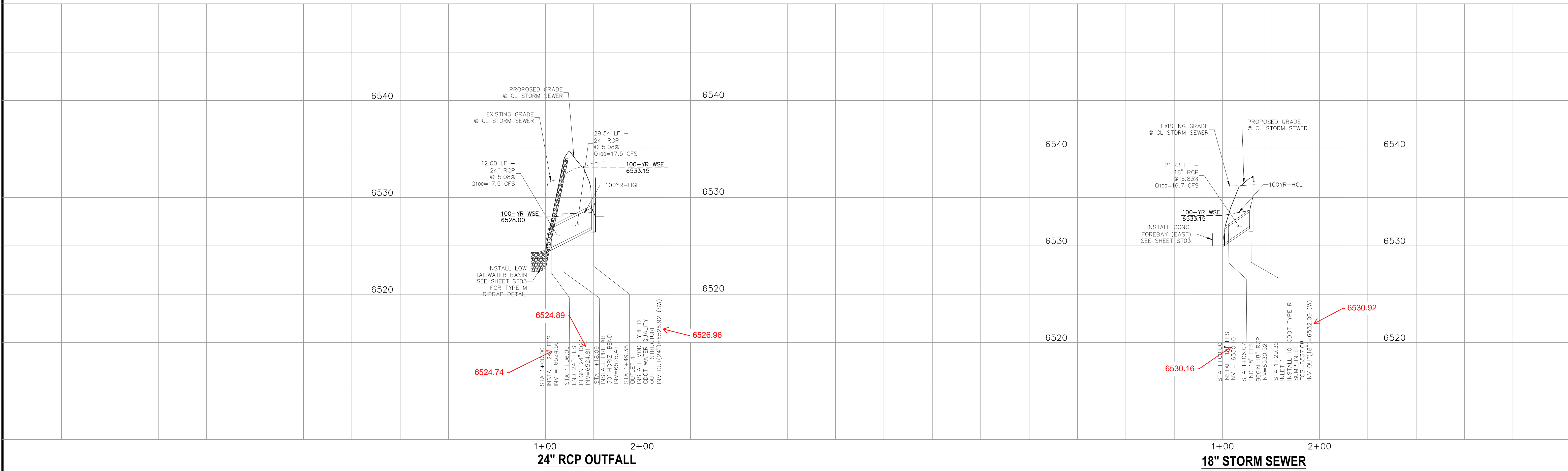
EPC 3/17/2021

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**24" RCP OUTFALL
STA 1+00.00 TO STA 1+49.38**

**18" STORM SEWER
STA 1+00.00 TO STA 1+29.30**



AS-BUILT ENGINEERING RECORD DRAWINGS

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**DWIRE STORAGE YARD
STORM SEWER PLAN AND PROFILE**

PROJECT NO. 43-117
DATE: 11-16-20
SCALE: HORIZONTAL: 1"=50'
VERTICAL: 1"=5'

DESIGNED BY: GT
DRAWN BY: JWP
CHECKED BY: GT

SHEET 5 OF 6
ST05

20 BOULDER CRESCENT, SUITE 110
COLORADO SPRINGS, CO 80903
PHONE: 719.555.4485

M&S CIVIL CONSULTANTS, INC.

FOR AND ON BEHALF OF
M&S CIVIL CONSULTANTS, INC.

Virgil A. Sanchez, Colorado P.E. No. 37160

NO.	DATE	BY	DESCRIPTION	APPROVED BY	DATE

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CAUTION

GENERAL NOTES

- ALL EXPOSED CONCRETE CORNERS SHALL BE CHAMFERED 3/4" IN.
- WINGWALL FOOTINGS AND FLOOR OF BOX CULVERT SHALL BE PLACED MONOLITHICALLY.
- DIMENSIONS "L", "W", "R", "H", "T", "D", "S", "M" AND ANGLES FOR WINGWALLS SHALL BE AS SHOWN ON THE PLANS.
- REINFORCING STEEL SHALL BE GRADE 60.
- THE MINIMUM SPACING LENGTH FOR COMMON BAR SIZES SHALL BE:

BAR	#4	#5	#6
SPACING LENGTH	1'-3"	1'-7"	2'-0"

DESIGN TABLE

CONC. CU. YD./L.F.	0.161	0.210	0.259	0.308	0.358	0.407	0.457	0.506	0.556	0.604
REIN. LB./L.F.	8.0	9.3	10.7	12.1	14.3	16.4	18.4	21.0	23.6	26.6

* DOES NOT INCLUDE TOE WALL QUANTITIES

DESIGN EXAMPLE

TYPICAL SECTION

TYPICAL CULVERT LAYOUT

DETAIL "A"

BOX ELEVATION

DESIGN DATA:

UNIT STRESSES: $f_c = 24,000$ PSI
 $f_s = 1,200$ PSI
 $n = 9$

EQUIVALENT FLUID PRESSURE = 36 LBS./CU. FT.
 MAXIMUM TOE PRESSURE = 1.70K/50. FT.

ALL CONSTRUCTION JOINTS SHALL BE THOROUGHLY CLEANED BEFORE CONCRETE IS POURED.

WINGWALL AND APRON CONCRETE SHALL BE CONCRETE CLASS B, OR D (BOX CULVERT) FOR CBC'S. CONCRETE CLASS B, OR D (WALL) FOR PIPES.

LINE LOAD SURCHARGE HAS NOT BEEN CONSIDERED. WALLS WITHIN 1/2 OF THE EDGE OF THE ROADWAY SHOULDER WALL REQUIRE A SPECIAL DESIGN IN ACCORDANCE WITH AASHTO STANDARD SPECIFICATIONS FOR HIGHWAY BRIDGES.

LINE LOAD SURCHARGE HAS NOT BEEN CONSIDERED. WALLS WITHIN 1/2 OF THE EDGE OF THE ROADWAY SHOULDER WALL REQUIRE A SPECIAL DESIGN IN ACCORDANCE WITH AASHTO STANDARD SPECIFICATIONS FOR HIGHWAY BRIDGES.

UNLESS OTHERWISE SHOWN ON PLANS

Computer File Information

Creation Date: 07/04/06 Initials: SRJ
 Last Modification Date: 07/04/06 Initials: LTA
 Full Path: www.dot.state.co.us/DesignSupport/
 Drawing File Name: 640120101.dwg
 CAD Ver: MicroStation V8 Scale: Not to Scale Units: English

Sheet Revisions

Date:	Comments:

Colorado Department of Transportation

4201 East Arkansas Avenue
 Denver, Colorado 80222
 Phone: (303) 757-9083
 Fax: (303) 757-9820

Project Development Branch SRJ/LTA

WINGWALLS FOR PIPE OR BOX CULVERTS

STANDARD PLAN NO. M-601-20

Issued By: Project Development Branch on July 04, 2006

Sheet No. 1 of 1

GENERAL NOTES

- CONCRETE SHALL BE CLASS B. INLET MAY BE CAST-IN-PLACE OR PRECAST.
- SEE PLANS FOR SIZE AND LOCATION OF PIPE.
- STRUCTURAL STEEL FOR GRATES AND SHALL BE INSTALLED MONOLITHICALLY AND SHALL BE IN ACCORDANCE WITH SUBSECTION 712.06.
- STANDARD INLET GRATES SHALL BE USED ON ALL TYPE D INLETS UNLESS CLOSE MESH GRATES ARE SPECIFIED ON THE PLANS.
- STEPS SHALL BE FORMED WHEN INLET DIMENSION "H" IS EQUAL TO OR GREATER THAN 3 FT.-6 IN. AND SHALL CONFORM WITH AASHTO M 199.
- REINFORCING BARS SHALL BE EPOXY COATED AND DEFORMED #4 AND SHALL HAVE A 2 IN. MINIMUM CLEARANCE, CUT OR BEND BARS AROUND PIPE AS REQUIRED.

GRATE INSTALLATION DETAIL

TRANSVERSE CROSS SECTION

LONGITUDINAL CROSS SECTION

LEVEL GRATE INSTALLATION

TRANSVERSE CROSS SECTION

LONGITUDINAL CROSS SECTION

SLOPING GRATE INSTALLATION

SECTION D-D

SECTION E-E

PLAN VIEW

QUANTITIES FOR ONE INLET

"H" FT.	CONCRETE CU. YDS.	STEEL LBS.	CIRCULAR PIPE RANGE INSIDE DIA. IN. - "D"
3.0	1.5	127	18
3.5	1.7	140	18-24
4.0	1.9	157	18-30
4.5	2.0	179	18-36
5.0	2.2	187	18-42
5.5	2.4	208	18-42
6.0	2.6	215	18-42
6.5	2.8	236	18-42
7.0	2.9	243	18-42
7.5	3.1	264	18-42
8.0	3.3	271	18-42
8.5	3.5	292	18-42
9.0	3.6	299	18-42
9.5	3.8	320	18-42
10.0	4.0	327	18-42

CONCRETE AND STEEL QUANTITIES ARE FOR ONE ENTIRE INLET BEFORE DEDUCTION FOR VOLUME OCCUPIED BY PIPE. WEIGHT OF STEEL INCLUDES A RING FOR THE MAXIMUM PIPE DIAMETER.

Computer File Information

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 Last Modification Date: 07/04/06 Initials: LTA
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Sheet Revisions

Date:	Comments:

Colorado Department of Transportation

4201 East Arkansas Avenue
 Denver, Colorado 80222
 Phone: (303) 757-9083
 Fax: (303) 757-9820

Project Development Branch SRJ/LTA

INLET, TYPE D

STANDARD PLAN NO. M-604-11

Issued By: Project Development Branch on July 04, 2006

Sheet No. 1 of 1

GENERAL NOTES

- FOR LENGTH (L) GREATER THAN 5 FT. PROVIDE MAINTENANCE ACCESS AT BOTH ENDS.
- ADDITIONAL MANHOLE RING AND COVER REQUIRED WHEN L=10 FT. OR MORE. CUT REINFORCEMENT BAR ACCORDINGLY.
- WHEN A TYPE R INLET IS USED WITH MOUNTABLE CURB AND GUTTER, 5 FT. TRANSITION SHALL BE CONSTRUCTED. TRANSITION SHALL BE PAID FOR AS CURB AND GUTTER.
- MEET SHAPE OF NORMAL BARRIER CURB AND GUTTER HERE.
- FOR A 1'-0" PAN SLOPE 2" PER FT.
- A 2 IN. DIAMETER TEMPORARY HOLE FOR DRAINAGE SHALL BE PLACED AT SUBGRADE ELEVATION OR A MINIMUM THREE INCHES BELOW ROAD BASE. THE HOLE SHALL BE PLUGGED WITH CONCRETE BEFORE ACCEPTANCE OF THE INLET.
- MANHOLE RING AND COVER, STATION POINT AND OUTFLOW PIPE SHALL BE LOCATED AT THE SAME END OF THE INLET.

TRANSITION CURB

SECTION A-A REGULAR INLET

SECTION A-A INLET WITH DROP BOX

SECTION B-B END VIEW

SECTIONS C-C & D-D

GENERAL NOTES

FOR LENGTH (L) GREATER THAN 5 FT. PROVIDE MAINTENANCE ACCESS AT BOTH ENDS.

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MEET SHAPE OF NORMAL BARRIER CURB AND GUTTER HERE.

FOR A 1'-0" PAN SLOPE 2" PER FT.

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MANHOLE RING AND COVER, STATION POINT AND OUTFLOW PIPE SHALL BE LOCATED AT THE SAME END OF THE INLET.

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Project Development Branch SRJ/LTA

CURB INLET TYPE R

STANDARD PLAN NO. M-604-12

Issued By: Project Development Branch on July 04, 2006

Sheet No. 1 of 2

GENERAL NOTES

- CONCRETE SHALL BE CLASS B. INLET MAY BE CAST-IN-PLACE OR PRECAST.
- CONCRETE WALLS SHALL BE FORMED ON BOTH SIDES AND SHALL BE 8 IN. THICK.
- INLET STEPS SHALL BE IN CONFORMANCE WITH AASHTO M 199.
- CURB FACE ASSEMBLY SHALL BE GALVANIZED AFTER WELDING.
- EXPOSED CONCRETE CORNERS SHALL BE CHAMFERED 3/4" IN. CURB AND GUTTER CORNERS SHALL BE FINISHED TO MATCH THE EXISTING CURB AND GUTTER BEHIND THE TRANSITION GUTTER.
- REINFORCING BARS SHALL BE DEFORMED AND SHALL HAVE A 2 IN. MINIMUM CLEARANCE. ALL REINFORCING BARS SHALL BE EPOXY COATED.
- DIMENSIONS AND WEIGHTS OF TYPICAL MANHOLE RING AND COVER ARE NOMINAL.
- MATERIAL FOR MANHOLE RINGS AND COVERS SHALL BE GRAY OR DUCTILE CAST IRON IN ACCORDANCE WITH SUBSECTION 712.06.
- SINCE PIPE ENTRIES INTO THE INLET ARE VARIABLE, THE DIMENSIONS SHOWN ARE TYPICAL. ACTUAL DIMENSIONS FOR CONCRETE AND REINFORCEMENT SHALL BE AS REQUIRED IN THE WORK. QUANTITIES INCLUDE VOLUMES OCCUPIED BY PIPES.
- STRUCTURAL STEEL SHALL BE GALVANIZED AND SHALL BE IN ACCORDANCE WITH SUBSECTION 712.06.

TABLE ONE ~ BAR LIST FOR CURB INLETS, TYPE "R"

MARK	BAR # OR SIZE	O.C. SPACING	ALL INLETS		INLETS: H ≤ 5 FT.		INLETS: H > 5 FT.	
			L = 5 FT.	L = 10 FT.	L = 5 FT.	L = 10 FT.	L = 5 FT.	L = 10 FT.
401	4	11"	15	21	26	11	11	*
402	4	11"	7	13	18	7	7	*
403	4	9"	7	13	18	7	7	*
405	4	6"	11	21	26	11	11	*
406	4	6"	7	13	18	7	7	*
407	4	9"	7	13	18	7	7	*
408	4	12"	3	6	11	3	3	*
409	4	8"	6	11	16	6	6	*
410	4	11"	3	6	11	3	3	*
411	4	11"	3	6	11	3	3	*
412	4	11"	3	6	11	3	3	*
413	4	9"	7	13	18	7	7	*
501	5	5 1/2"	11	22	33	11	11	*
502	5	5 1/2"	7	14	21	7	7	*
503	5	5 1/2"	5	10	15	5	5	*
504	5	5 1/2"	3	6	9	3	3	*
601	6	2 1/2"	2	4	6	2	2	*

* VARIABLE REFER TO TABLE TWO.
 * INCLUDE #4, 18 IN. BARS (SEE CHANNEL LAYOUT).

TABLE TWO ~ BARS AND CHANNELS VARIABLE WITH "H"

"H"	LENGTH	NO. REQ'D.		L = 5 FT.		L = 10 FT.		L = 15 FT.	
		REGULAR	DROP BOX	CONC. CU. YDS.	STEEL LBS.	CONC. CU. YDS.	STEEL LBS.	CONC. CU. YDS.	STEEL LBS.
3'-0"	2'-8"	10	7	3.2	285	5.3	497	7.4	706
3'-6"	3'-2"	10	7	3.4	305	5.7	528	7.9	747
4'-0"	3'-8"	12	9	3.7	326	6.0	559	8.4	796
4'-6"	4'-2"	12	9	3.9	354	6.4	571	8.8	803
5'-0"	4'-8"	14	11	4.1	354	6.7	602	9.3	844
5'-6"	5'-2"	16	13	4.4	375	6.0	607	7.4	850
6'-0"	5'-8"	16	13	4.6	382	6.2	616	7.6	860
6'-6"	6'-2"	18	15	4.8	402	6.4	637	7.8	880
7'-0"	6'-8"	20	17	5.0	423	6.6	654	8.0	897
7'-6"	7'-2"	20	17	5.3	430	6.9	664	8.3	907
8'-0"	7'-8"	22	19	5.5	451	7.1	684	8.5	927
8'-6"	8'-2"	24	21	5.7	471	7.3	702	8.7	944
9'-0"	8'-8"	24	21	6.0	479	7.6	711	9.0	954
9'-6"	9'-2"	26	23	6.2	499	7.8	732	9.2	974
10'-0"	9'-8"	28	25	6.4	520	8.0	749	9.4	992
10'-6"	10'-2"	28	25	6.7	527	8.3	759	9.7	1001
11'-0"	10'-8"	30	27	6.9	547	8.5	779	9.9	1022

NOTES: FOR L=5 FT., L=10 FT., AND L=15 FT.
 REGULAR INLETS: TOTAL QUANTITIES NEEDED ARE OUTSIDE THE HEAVY BLACK LINE.
 DROP BOX INLETS: TOTAL QUANTITIES NEEDED ARE INSIDE THE HEAVY BLACK LINE.
 STEEL WEIGHTS DO NOT INCLUDE STRUCTURAL STEEL CHANNEL.

TABLE THREE ~ MANHOLE RING AND COVER

TYPE	LENGTH	WEIGHTS: COVER = 125 LBS. + RING = 135 LBS. TOTAL = 260 LBS.
TYPE I	30"	260
TYPE II	30"	260
TYPE III	30"	260
TYPE IV	30"	260
TYPE V	30"	260
TYPE VI	30"	260
TYPE VII	30"	260
TYPE VIII	30"	260
TYPE IX	30"	260
TYPE X	30"	260

PLAN VIEW

ELEVATION VIEW MANHOLE COVER (TYP.)

SECTION AT HOLE (TYP.)

CHANNEL LAYOUT DETAILS

BAR BENDING DIAGRAMS

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AS-BUILT ENGINEERING RECORD DRAWINGS

REVISIONS:

NO.	DATE:	DESCRIPTION:

DATE: 11/16/2020

SCALE: PROJECT NO. 43-117

HORIZONTAL: N/A

VERTICAL: N/A

DESIGNED BY: CMM

DRAWN BY: VAS

CHECKED BY: N/A

STANDARD DETAILS

DWIRE STORAGE YARD

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 COLORADO SPRINGS, CO 80903
 PHONE: 719.555.4485

CIVIL CONSULTANTS, INC.

FOR AND ON BEHALF OF M&S CIVIL CONSULTANTS, INC.

REGISTERED PROFESSIONAL ENGINEER
 NO. 137160
 EXPIRES 12-31-21

PROJECT NO. 43-117

DATE: 11/16/2020

SCALE: N/A

HORIZONTAL: N/A

VERTICAL: N/A

DESIGNED BY: CMM

DRAWN BY: VAS

CHECKED BY: N/A

SHEET 5 OF 5

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