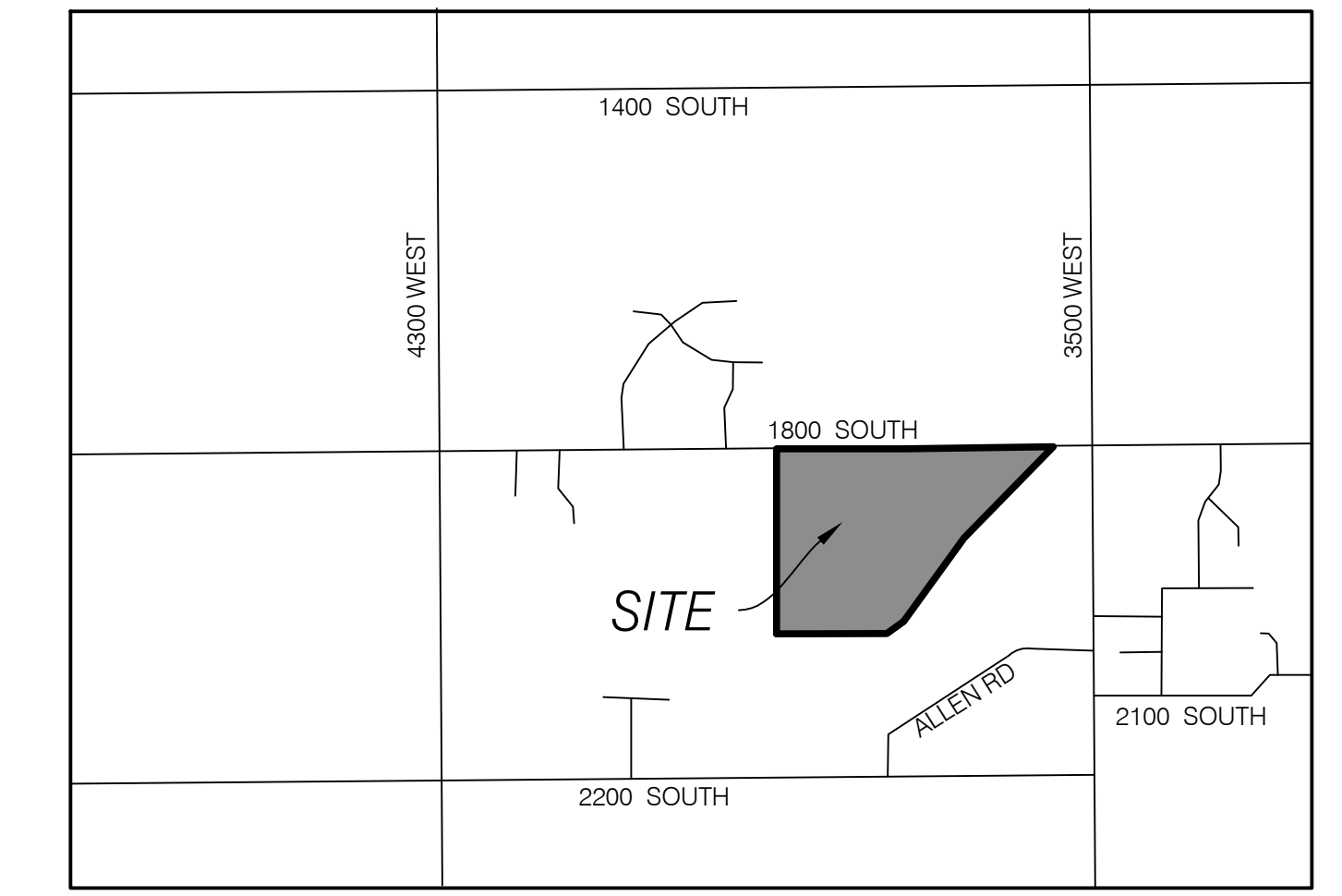
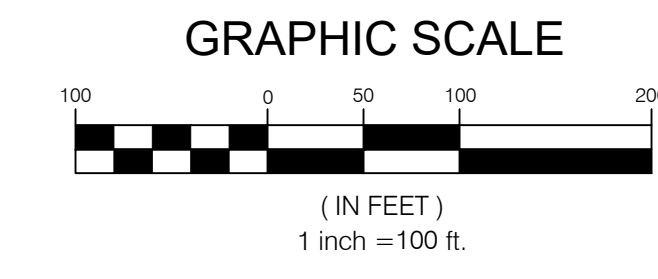
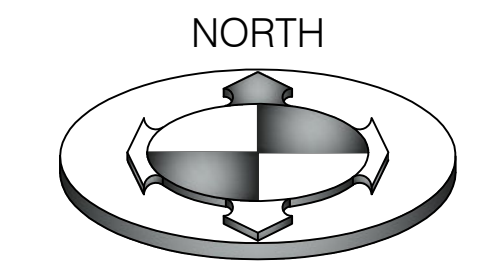
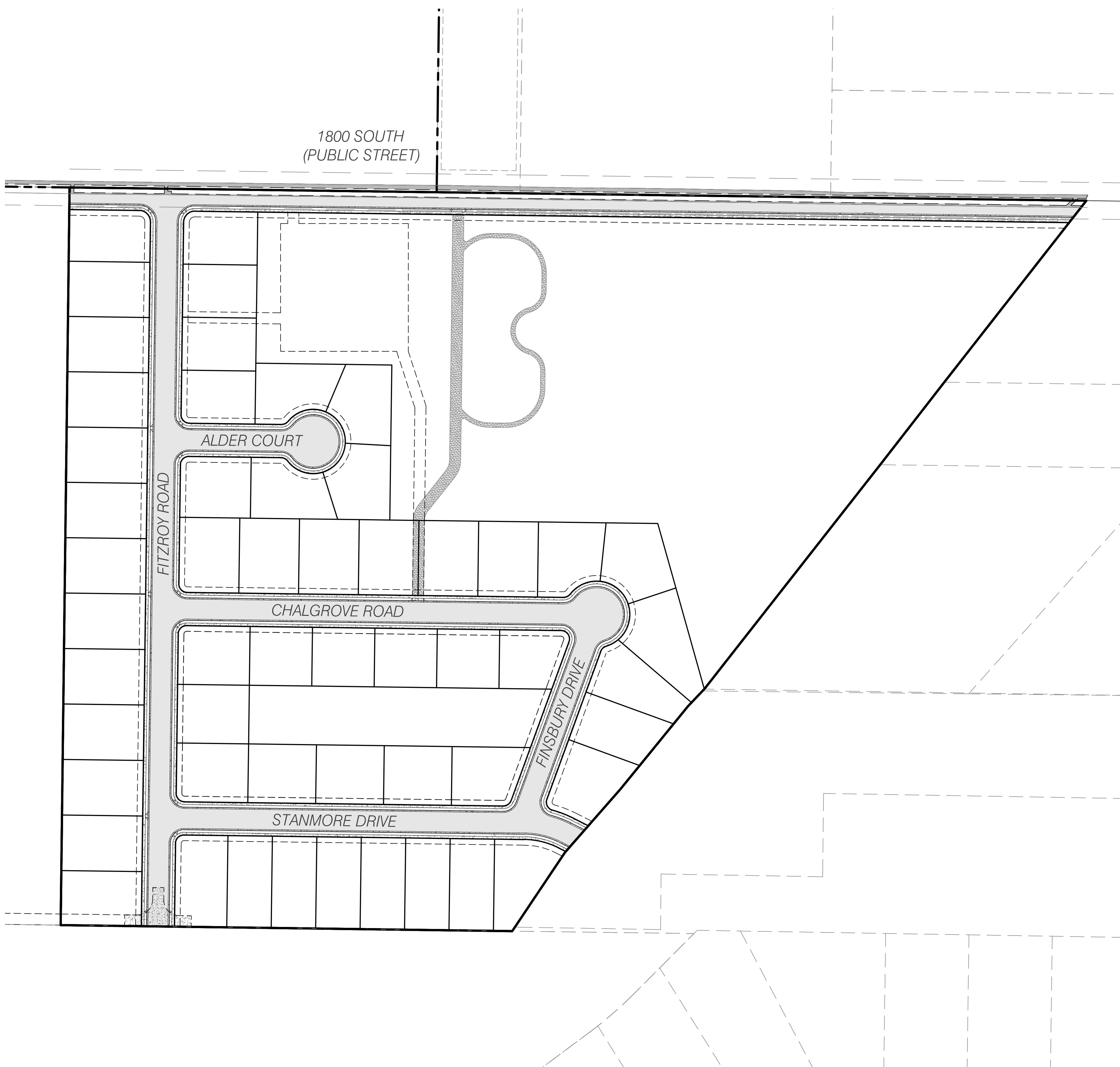


WINSTON PARK

LOCATED IN THE NORTHEAST QUARTER OF SECTION 28,
TOWNSHIP 6 NORTH NORTH, RANGE 2 WEST,
SALT LAKE BASE AND MERIDIAN
WEBER COUNTY, UTAH



VICINITY MAP
N.T.S.

PRELIMINARY DRAWING INDEX

COVER	COVER SHEET
CGN.01	GENERAL NOTES, LEGEND AND ABBREVIATION
CSP.01	SITE PLAN
CSP.02	SITE PLAN
CUP.01	UTILITY PLAN
CUP.01	UTILITY PLAN
CGD.01	GRADING & DRAINAGE PLAN
CGD.02	GRADING & DRAINAGE PLAN
CPP.01	ROADWAY PLAN & PROFILE
CPP.02	ROADWAY PLAN & PROFILE
CPP.03	ROADWAY PLAN & PROFILE
CPP.04	ROADWAY PLAN & PROFILE
CPP.05	ROADWAY PLAN & PROFILE
CPP.06	ROADWAY PLAN & PROFILE
CPP.07	SEWER PLAN & PROFILE
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CPP.09	IRRIGATION PLAN & PROFILE
CEP.01	EROSION CONTROL PLAN
CEP.02	EROSION CONTROL DETAILS
CDT.01	DETAILS & NOTES
CDT.02	DETAILS & NOTES
CDT.03	DETAILS & NOTES
CDT.04	DETAILS & NOTES
CDT.05	DETAILS & NOTES

OWNER: IGOR MAKSYMIW
EMAIL: igormaksymiw@aol.com

PRELIMINARY CIVIL CONSTRUCTION PLANS

BENCHMARK CIVIL

NOT FOR CONSTRUCTION

BENCHMARK ENGINEERING & LAND SURVEYING

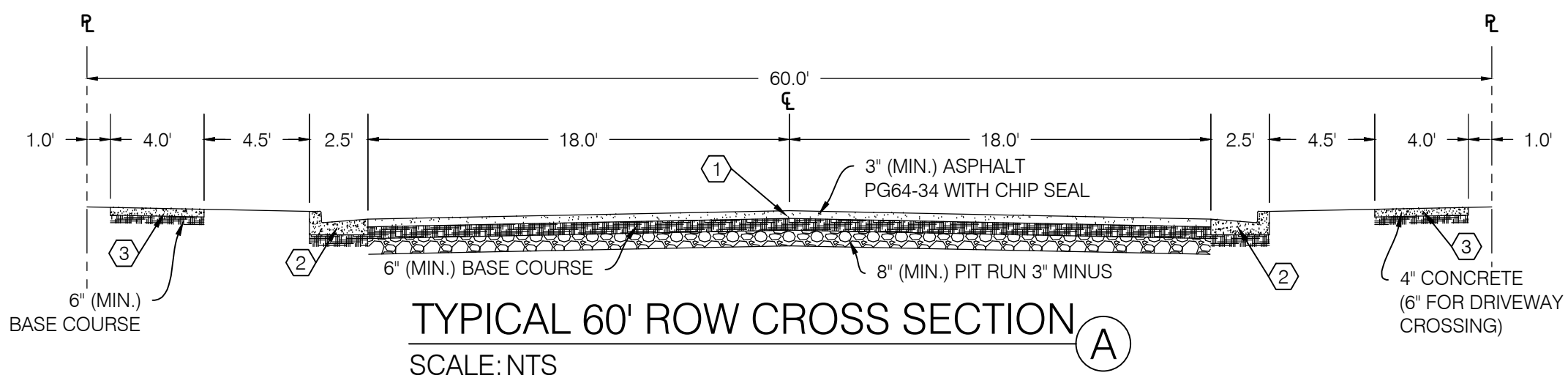
9138 SOUTH STATE STREET SUITE # 100
SANDY, UTAH 84070 (801) 542-7192
www.benchmarkcivil.com

WINSTON PARK 3701 W 1800 S WEBER COUNTY, UTAH		DRAWN: JHO	DESIGN: TJB	CHECK: AGA	PROJECT NO: 2006142
		DATE: 06/02/2020	DATE: 03/12/2021	DATE: 03/12/2021	
No.	DATE	DESCRIPTION			
1	03/25/21	REVISED PER COUNTY, WATER & IRRIGATION COMMENTS			
2	05/12/21	REVISED PER COUNTY, WATER & IRRIGATION COMMENTS			

COVER

1 OF 24





TYPICAL 60' ROW CROSS SECTION (A)
SCALE: NTS

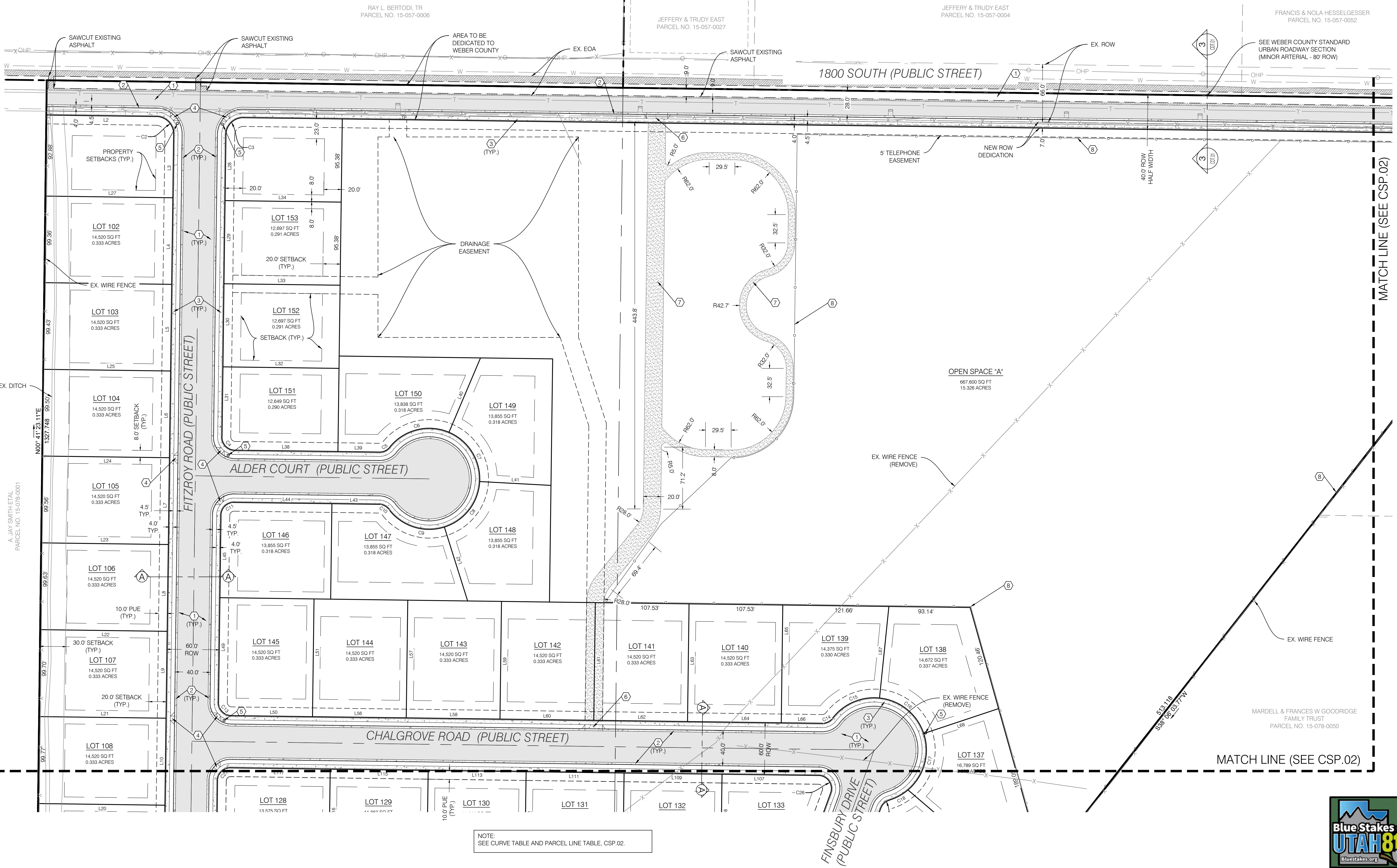
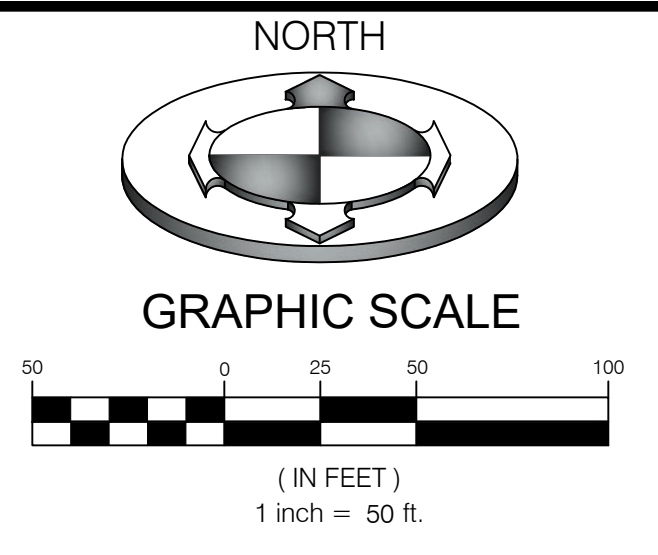
CONSTRUCTION KEY NOTE REFERENCE		
NO.	DESCRIPTION	DETAIL
1	ASPHALT PAVEMENT (PG64-34) WITH CHIP SEAL PER WEBER COUNTY PUBLIC STDS.	1/CDT.01
2	CONCRETE CURB AND GUTTER PER WEBER COUNTY PUBLIC STDS.	2/CDT.01
3	SIDEWALK PER WEBER COUNTY PUBLIC STDS.	2/CDT.01
4	ADA RAMP PER APWA #235.1 WITH GRAY CAST-IN-PLACE TRUNCATED DOMES	
5	LIGHTPOLE (TO BE OWNED AND MAINTAINED BY HOA)	
6	"TYPE B" DRIVE APPROACH PER WEBER COUNTY PUBLIC STDS.	3/CDT.01
7	GRAVEL ACCESS ROAD/PATHWAY	1/CDT.01
8	NEW FENCE	

AREA TABLE		
PARTICULARS	S.F.	%
BUILDING*	162,000	9.5
HARDSCAPE*	237,126	13.8
LANDSCAPE	1,313,176	76.7
DEDICATED	301,208	N/A
TOTAL	1,712,302	100

*BUILDING AND HARDSCAPE AREAS ASSUME A BUILDING FOOTPRINT OF 3,000 S.F. AND A HARDSCAPE OF 500 S.F. PER LOT (54 LOTS).

NOTE: SAWCUT WIDTH, LOCATIONS AND TIE-IN ELEVATIONS IN EXISTING HARDSCAPE ARE APPROXIMATE. CONTRACTOR TO FIELD VERIFY LOCATION AND EXTENT OF SAWCUTTING PRIOR TO CONSTRUCTION. NOTIFY CIVIL ENGINEER IF REVISIONS ARE REQUIRED. SEE NOTE 58 ON CGN.01 FOR FURTHER DETAIL.

NOTE: ALL WORK DONE IN PUBLIC ROADS TO BE DONE IN STRICT ACCORDANCE WITH WEBER COUNTY STANDARDS & SPECIFICATIONS.



RAY L. BERTOLDI, TR
PARCEL NO. 15-057-0006

JEFFERY & TRUDY EAST
PARCEL NO. 15-057-0027

JEFFERY & TRUDY EAST
PARCEL NO. 15-057-0004

FRANCIS & NOLA HESSELGESSER
PARCEL NO. 15-057-0032

SEE WEBER COUNTY STANDARD
URBAN ROADWAY SECTION
(MINOR ARTERIAL - 80' ROW)

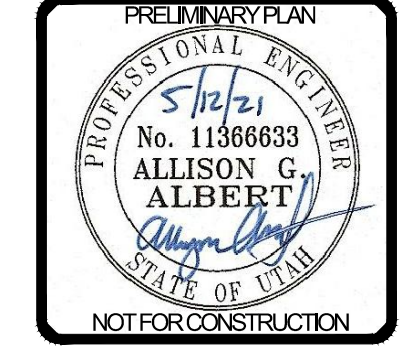
MATCH LINE (SEE CSP.02)

MATCH LINE (SEE CSP.02)

NOTE:
SEE CURVE TABLE AND PARCEL LINE TABLE, CSP.02.

NO.	DATE	DESCRIPTION
1	03/25/21	REVISED PER COUNTY, WATER & IRRIGATION COMMENTS
2	05/21/21	REVISED PER COUNTY, WATER & IRRIGATION COMMENTS

SCALE MEASURES: INCH ON FULL SIZE SHEETS
ADJUST ACCORDINGLY FOR REDUCED SIZE SHEETS

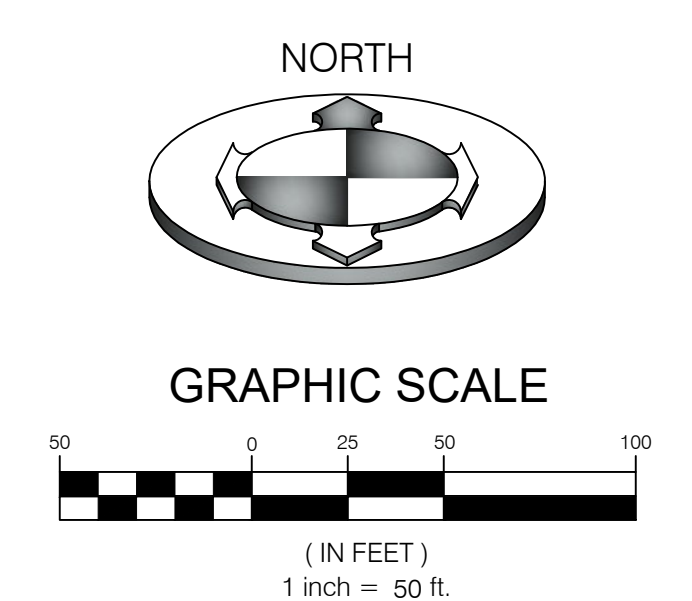
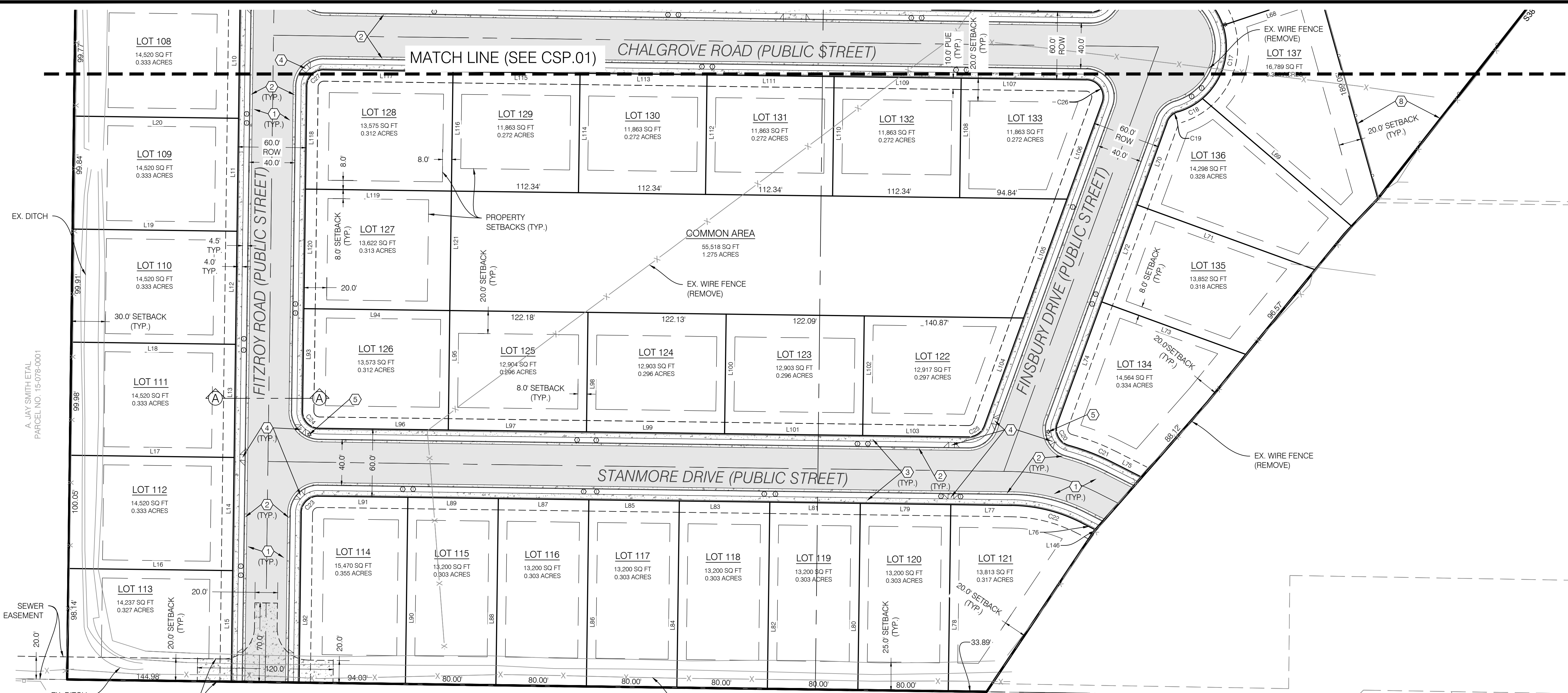


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WINSTON PARK
3701 W 1800 S
WEBER COUNTY, UTAH

PROJECT NO. 2006142
SITE PLAN
CSP.01
3 OF 24



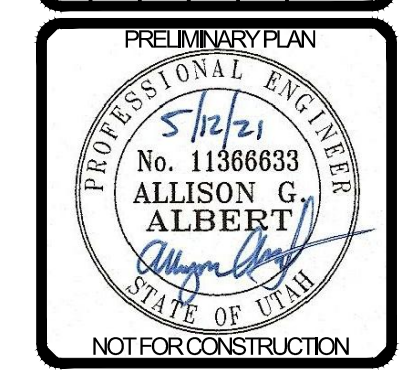


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NOTE: ALL WORK DONE IN PUBLIC ROADS TO BE DONE IN STRICT ACCORDANCE WITH WEBER COUNTY STANDARDS & SPECIFICATIONS.

NO.	DATE	DESCRIPTION
1	03/20/21	REVISED PER COUNTY WATER & IRRIGATION COMMENTS
2	05/21/21	REVISED PER COUNTY WATER & IRRIGATION COMMENTS

SCALE MEASURES: INCH ON FULL SIZE SHEETS
ADJUST ACCORDINGLY FOR REDUCED SIZE SHEETS



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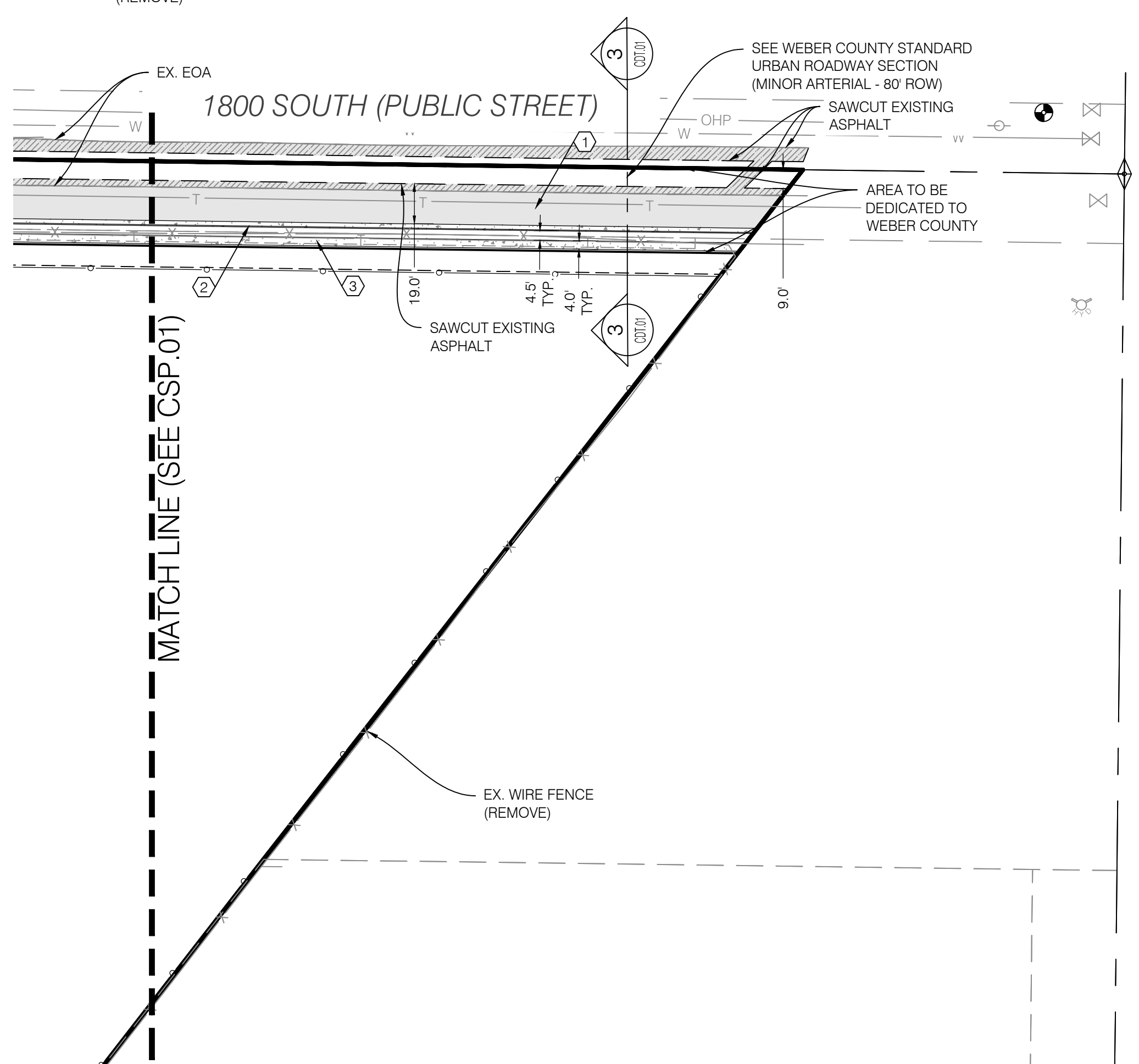
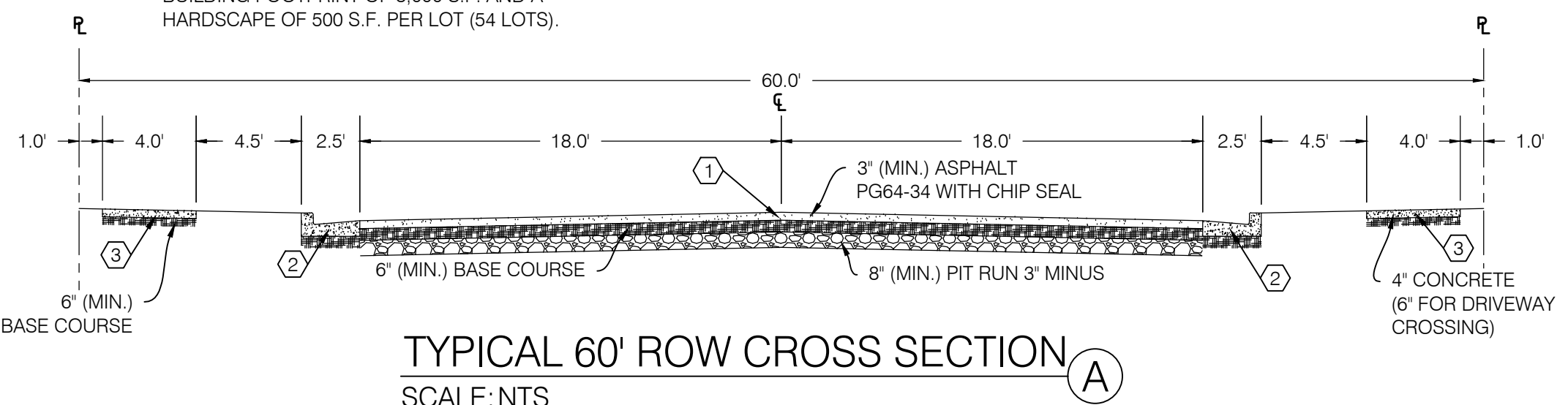
TEMPORARY VEHICULAR TURNAROUND EASEMENT IN FAVOR OF THE PUBLIC TO BE VACATED WHEN STREET CONTINUES SOUTH

PJF CORP
PARCEL NO. 15-078-0006

NO.	DESCRIPTION	DETAIL
①	ASPHALT PAVEMENT (PG64-34) WITH CHIP SEAL PER WEBER COUNTY PUBLIC STDS.	1/CDT.01
②	CONCRETE CURB AND GUTTER PER WEBER COUNTY PUBLIC STDS.	2/CDT.01
③	SIDEWALK PER WEBER COUNTY PUBLIC STDS.	2/CDT.01
④	ADA RAMP PER APWA #235.1 WITH GRAY CAST-IN-PLACE TRUNCATED DOMES	
⑤	LIGHTPOLE (TO BE OWNED AND MAINTAINED BY HOA)	
⑥	TYPE 'B' DRIVE APPROACH PER WEBER COUNTY PUBLIC STDS.	3/CDT.01
⑦	GRAVEL ACCESS ROAD/PATHWAY	1/CDT.01
⑧	NEW FENCE	

PARTICULARS	S.F.	%
BUILDING*	162,000	9.5
HARDSCAPE*	237,126	13.8
LANDSCAPE	1,313,176	76.7
DEDICATED	301,208	N/A
TOTAL	1,712,302	100

*BUILDING AND HARDSCAPE AREAS ASSUME A BUILDING FOOTPRINT OF 3,000 S.F. AND A HARDSCAPE OF 500 S.F. PER LOT (54 LOTS).



CURVE #	LENGTH	RADIUS	DELTA	CHORD BEARING	CHORD DISTANCE
C1	77.39'	170.00'	26°04'54"	N 76°11'45" W	76.72'
C2	31.42'	20.00'	90°00'00"	N 44°15'08" W	28.28'
C3	31.42'	20.00'	90°00'00"	S 45°44'52" W	28.28'
C4	23.56'	15.00'	90°00'00"	S 44°15'08" E	21.21'
C5	13.60'	15.00'	51°56'37"	N 64°46'33" E	13.14'
C6	75.07'	58.00'	74°09'36"	S 75°53'03" W	69.94'
C7	70.98'	58.00'	70°06'57"	N 31°58'41" W	66.63'
C8	70.33'	58.00'	69°28'26"	N 37°49'01" E	66.10'
C9	71.00'	58.00'	70°08'15"	S 72°22'39" E	66.65'
C10	13.60'	15.00'	51°56'37"	N 63°16'50" W	13.14'
C11	23.56'	15.00'	90°00'00"	S 45°44'52" W	21.21'
C12	287.38'	58.00'	283°53'13"	N 00°44'52" E	71.51'
C13	23.56'	15.00'	90°00'00"	S 44°15'08" E	21.21'
C14	13.91'	15.00'	53°07'48"	N 64°10'57" E	13.42'
C15	61.00'	60.00'	58°15'11"	S 66°44'39" W	58.41'
C16	68.77'	60.00'	65°40'01"	N 51°17'46" W	65.06'
C17	71.36'	60.00'	68°08'43"	N 15°36'37" E	67.23'
C18	24.58'	60.00'	23°28'25"	N 61°25'11" E	24.41'
C19	13.91'	15.00'	53°07'48"	S 46°35'29" W	13.42'
C20	24.81'	15.00'	94°46'35"	S 27°21'43" E	22.08'
C21	40.47'	200.00'	11°35'42"	N 68°57'09" W	40.41'
C22	63.73'	140.00'	26°04'54"	N 76°11'45" W	63.18'
C23	23.57'	15.00'	90°00'57"	S 45°45'20" W	21.22'
C24	23.56'	15.00'	89°59'03"	S 44°14'40" E	21.21'
C25	18.52'	15.00'	70°44'14"	N 55°23'42" E	17.37'
C26	28.61'	15.00'	109°16'43"	N 34°36'47" W	24.47'
C27	23.56'	15.00'	90°00'00"	S 45°44'52" W	21.21'
C28	225.71'	60.00'	215°32'20"	N 34°36'47" W	114.28'
C29	18.43'	28.00'	37°42'19"	S 19°36'01" W	18.10'

LINE #	BEARING	DISTANCE
L1	S 63°09'18" E	22.14'
L2	S 89°15'08" E	126.28'
L3	S 00°44'52" W	72.88'
L4	S 00°44'52" W	99.36'
L5	S 00°44'52" W	99.43'
L6	S 00°44'52" W	99.50'
L7	S 00°44'52" W	99.56'
L8	S 00°44'52" W	99.63'
L9	S 00°44'52" W	99.70'
L10	S 00°44'52" W	99.77'
L11	S 00°44'52" W	99.84'
L12	S 00°44'52" W	99.91'
L13	S 00°44'52" W	99.98'
L14	S 00°44'52" W	100.05'
L15	S 00°44'52" W	98.18'
L16	N 89°15'08" W	145.08'
L17	S 89°15'08" E	145.18'
L18	N 89°15'08" W	145.28'
L19	S 89°15'08" E	145.38'
L20	N 89°15'08" W	145.48'
L21	S 89°15'08" E	145.58'
L22	N 89°15'08" W	145.68'
L23	S 89°15'08" E	145.79'
L24	N 89°15'08" W	145.89'
L25	S 89°15'08" E	145.99'
L26	N 89°15'08" W	146.09'
L27	S 89°15'08" E	146.19'
L28	S 00°44'52" W	75.38'
L29	S 00°44'52" W	95.38'
L30	S 00°44'52" W	95.38'
L31	S 00°44'52" W	80.38'
L32	S 89°15'08" E	133.13'
L33	S 89°15'08" E	133.13'
L34	S 89°15'08" E	133.13'
L35	S 00°44'52" W	95.38'
L36	S 00°44'52" W	95.38'
L37	S 00°44'52" W	109.50'
L38	S 89°15'08" E	118.13'
L39	S 89°15'08" E	47.61'
L40	N 22°57'51" E	92.69'

WINSTON PARK
3701 W 1800 S
WEBER COUNTY, UTAH

PROJECT NO. 2006142

SITE PLAN

CSP.02
4 OF 24

CONSTRUCTION KEY NOTE REFERENCE		
NO	DESCRIPTION	DETAIL
1	8" PVC C-900 CULINARY WATER MAIN PER TAYLOR WEST WEBER WATER DISTRICT STDS.	
2	1" POLY WATER SERVICE LINE & METER PER TAYLOR WEST WEBER WATER DISTRICT STDS.	3/CDT.05
3	12" BUTTERFLY VALVE PER TAYLOR WEST WEBER WATER DISTRICT STDS.	1/CDT.05
4	12" PVC C-900 DR18 CULINARY WATER MAIN PER TAYLOR WEST WEBER WATER DISTRICT STDS.	
5	6" PVC C-900 FIRELINE PER TAYLOR WEST WEBER WATER DISTRICT STDS.	
6	FIRE HYDRANT PER TAYLOR WEST WEBER WATER DISTRICT STDS.	3/CDT.05
7	THRUST BLOCK PER TAYLOR WEST WEBER WATER DISTRICT STDS.	1/CDT.05
8	GATE VALVE PER TAYLOR WEST WEBER WATER DISTRICT STDS.	1/CDT.05
9	BLOW OFF VALVE PER TAYLOR WEST WEBER WATER DISTRICT STDS.	8/CDT.05
10	8" PVC SDR-35 SEWER MAIN PER WEBER COUNTY ENGINEERING STDS.	
11	4" PVC SDR-35 SEWER LATERAL (2% MIN SLOPE) PER WEBER COUNTY ENGINEERING STDS.	
12	4" SSMH PER WEBER COUNTY ENGINEERING STDS.	
13	5" SSMH PER WEBER COUNTY ENGINEERING STDS.	

CONSTRUCTION KEY NOTE REFERENCE		
NO	DESCRIPTION	DETAIL
14	12" PVC SDR-35 SEWER MAIN PER WEBER COUNTY ENGINEERING STDS.	
15	12" PVC C-900 PRESSURIZED IRRIGATION PIPE PER HOOPER IRRIGATION STDS.	3/CDT.02
16	8" PVC C-900 PRESSURIZED IRRIGATION PIPE PER HOOPER IRRIGATION STDS.	3/CDT.02
17	THRUST BLOCK PER HOOPER IRRIGATION STDS.	2/CDT.02
18	GATE VALVE PER HOOPER IRRIGATION STDS.	6/CDT.02
19	COMBO AIR VAC PER HOOPER IRRIGATION STDS.	1/CDT.02
20	1" POLY IRRIGATION SERVICE LINE & METER PER HOOPER IRRIGATION STDS.	5/CDT.02
21	8"x6" REDUCER	
22	8"x8"x8" TEE	
23	8"x8"x6" TEE	
24	8"x12" REDUCER	
25	8" 90° BEND	
26	12" 45° BEND	
27	STREET LIGHT PER WEBER COUNTY STDS.	
28	1.5" POLY IRRIGATION SERVICE LINE & METER PER HOOPER IRRIGATION STDS.	5/CDT.02
29	IRRIGATION DRAIN	4/CDT.04

NOTE:
PRIOR TO FABRICATION OR CONSTRUCTION, BEGIN AT THE LOW END OF ALL GRAVITY UTILITY LINES AND VERIFY THE INVERT ELEVATION OF THE POINT OF CONNECTION. NOTIFY ENGINEER FOR REDESIGN IF CONNECTION POINT IS HIGHER THAN SHOWN OR IF ANY UTILITY CONFLICTS OCCUR. GRAVITY CONNECTIONS MUST BE DONE PRIOR TO BUILDING FOOTINGS AND ROUGH PLUMBING ARE CONSTRUCTED.

NOTE:
POTHOLE TO IDENTIFY ANY CONFLICTS BEFORE ANY PIPE INSTALLATION. CONTACT ENGINEER IF ANY CONFLICTS ARE IDENTIFIED.

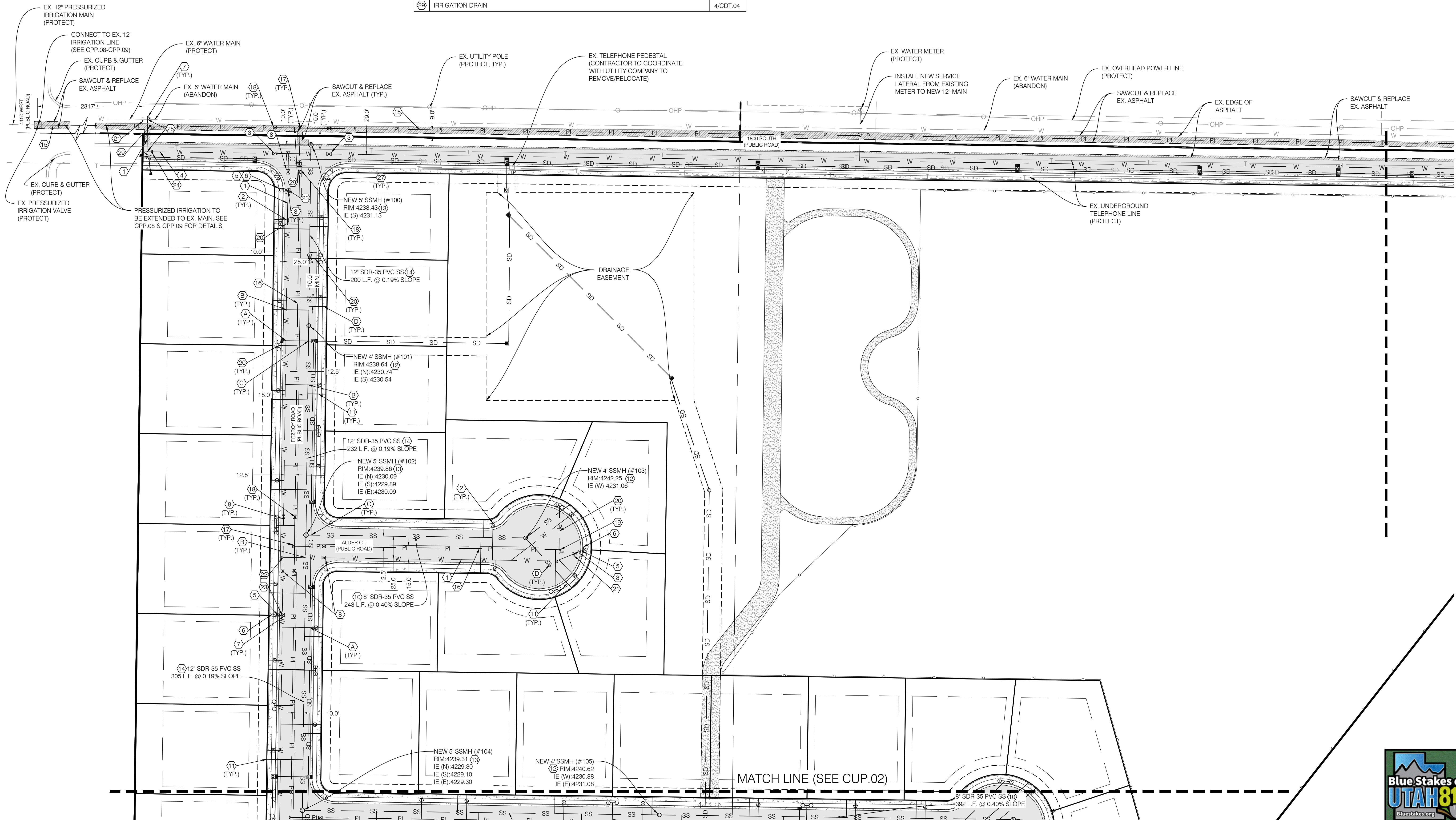
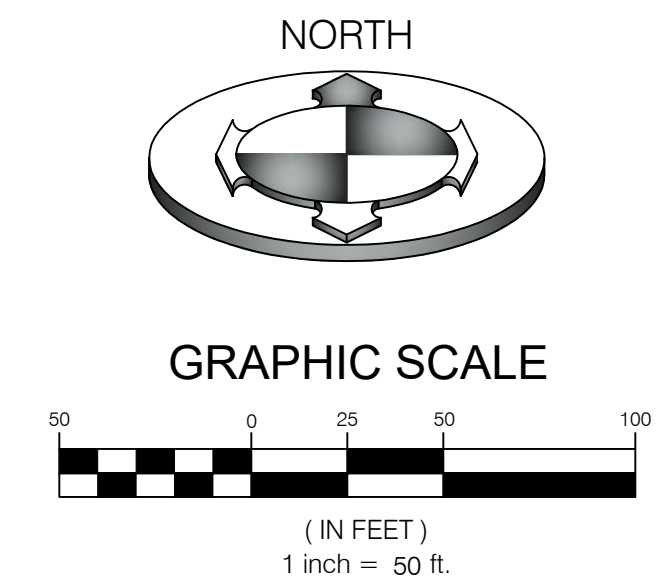
NOTE:
CONSTRUCTION OF THE PRESSURIZED IRRIGATION SHALL BE IN ACCORDANCE WITH HOOPER IRRIGATION STANDARDS.

NOTE A:
12" OF VERTICAL SEPERATION REQUIRED BETWEEN STORM AND WATER LINES. LOOP WATER MAIN IF IN CONFLICT.

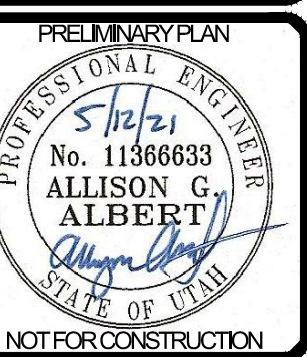
NOTE B:
18" OF VERTICAL SEPERATION REQUIRED BETWEEN SEWER AND WATER LINES. CONTACT ENGINEER FOR REDESIGN IF NECESSARY

NOTE C:
12" OF VERTICAL SEPERATION REQUIRED BETWEEN SEWER AND STORM. CONTACT ENGINEER FOR REDESIGN IF NECESSARY

NOTE D:
SEWER CLEANOUTS MUST BE PROVIDED EVERY 50' ON 4" SEWER LATERALS



NO.	DATE	DESCRIPTION
1	03/2021	REVISED PER COUNTY WATER & IRRIGATION COMMENTS
2	05/2021	REVISED PER COUNTY WATER & IRRIGATION COMMENTS
3	03/12/2021	DATE
4	200425 CUP OPTIMZ	SCALE MEASURES 1" ON FULL SIZE SHEETS ADJUST ACCORDINGLY FOR REDUCED SIZE SHEETS

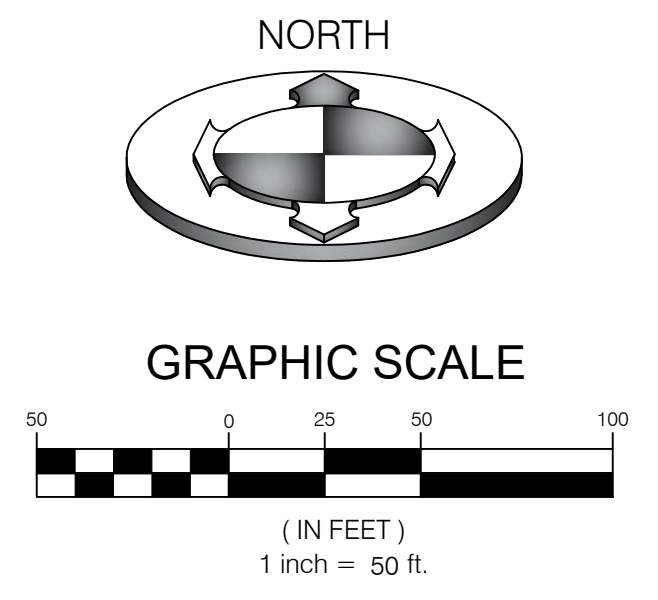
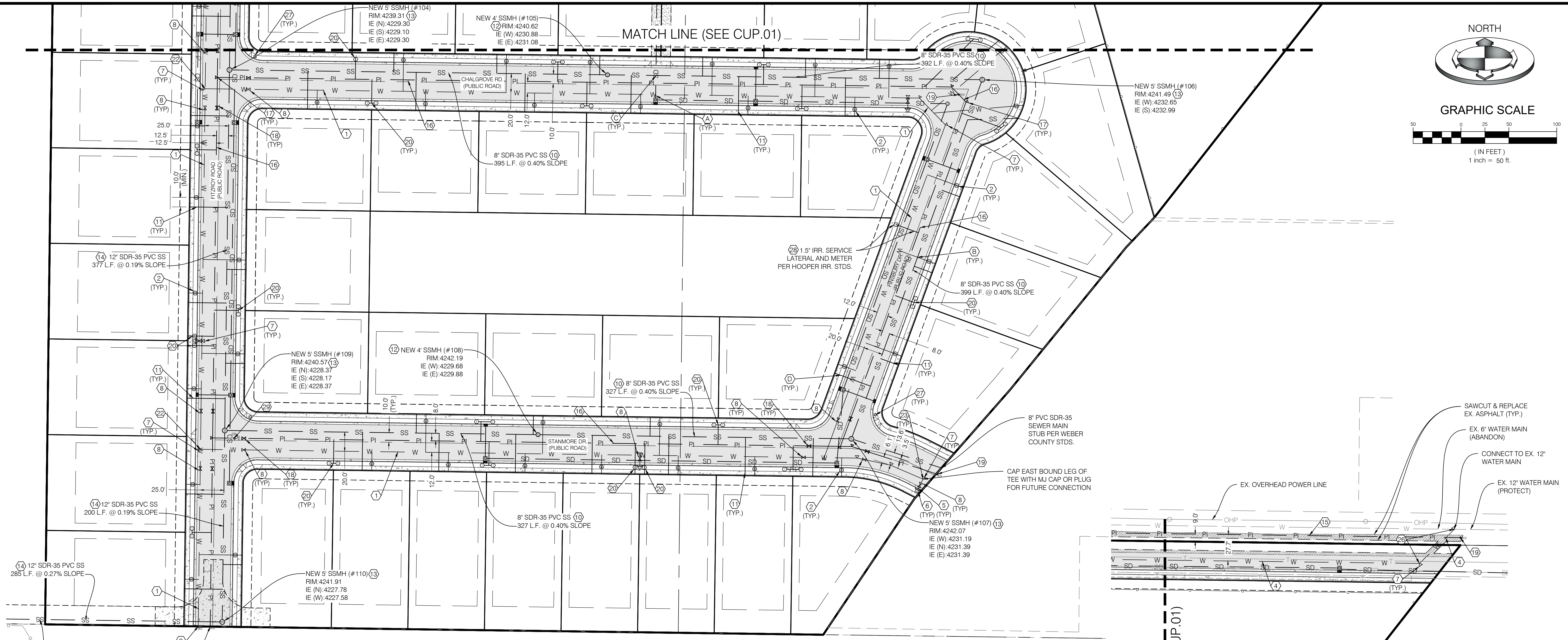


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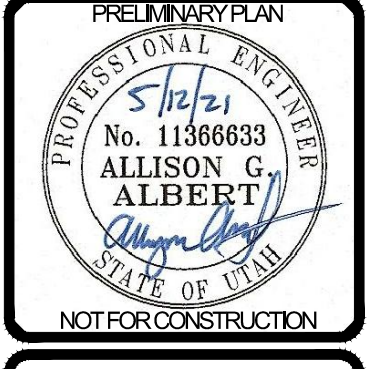
WINSTON PARK
 3701 W 1800 S
 WEBER COUNTY, UTAH

PROJECT NO. 2006142
UTILITY PLAN
 CUP.01
 5 OF 24





NO.	DATE	DESCRIPTION
1	03/20/21	REVISED PER COUNTY WATER & IRRIGATION COMMENTS
2	05/20/21	REVISED PER COUNTY WATER & IRRIGATION COMMENTS



BENCHMARK ENGINEERING & LAND SURVEYING
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WINSTON PARK
 3701 W 1800 S
 WEBER COUNTY, UTAH

PROJECT NO. 2006142
 UTILITY PLAN
 CUP.02
 6 OF 24

NO.	DESCRIPTION	DETAIL
1	8" PVC C-900 CULINARY WATER MAIN PER TAYLOR WEST WEBER WATER DISTRICT STDS.	
2	1" POLY WATER SERVICE LINE & METER PER TAYLOR WEST WEBER WATER DISTRICT STDS.	3/CDT.05
3	12" BUTTERFLY VALVE PER TAYLOR WEST WEBER WATER DISTRICT STDS.	1/CDT.05
4	12" PVC C-900 DR18 CULINARY WATER MAIN PER TAYLOR WEST WEBER WATER DISTRICT STDS.	
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6	FIRE HYDRANT PER TAYLOR WEST WEBER WATER DISTRICT STDS.	3/CDT.05
7	THRUST BLOCK PER TAYLOR WEST WEBER WATER DISTRICT STDS.	1/CDT.05
8	GATE VALVE PER TAYLOR WEST WEBER WATER DISTRICT STDS.	1/CDT.05
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12	4" SSMH PER WEBER COUNTY ENGINEERING STDS.	
13	5" SSMH PER WEBER COUNTY ENGINEERING STDS.	
14	12" PVC SDR-35 SEWER MAIN PER WEBER COUNTY ENGINEERING STDS.	
15	12" PVC C-900 PRESSURIZED IRRIGATION PIPE PER HOOPER IRRIGATION STDS.	3/CDT.02
16	8" PVC C-900 PRESSURIZED IRRIGATION PIPE PER HOOPER IRRIGATION STDS.	3/CDT.02
17	THRUST BLOCK PER HOOPER IRRIGATION STDS.	2/CDT.02
18	GATE VALVE PER HOOPER IRRIGATION STDS.	6/CDT.02
19	COMBO AIR VAC PER HOOPER IRRIGATION STDS.	1/CDT.02
20	1" POLY IRRIGATION SERVICE LINE & METER PER HOOPER IRRIGATION STDS.	5/CDT.02
21	8"X6" REDUCER	
22	8"X8"X8" TEE	
23	8"X8"X6" TEE	
24	8"X12" REDUCER	
25	8" 90° BEND	
26	12" 45° BEND	
27	STREET LIGHT PER WEBER COUNTY STDS.	
28	1.5" POLY IRRIGATION SERVICE LINE & METER PER HOOPER IRRIGATION STDS.	
29	IRRIGATION DRAIN	4/CDT.04

NOTE:
 PRIOR TO FABRICATION OR CONSTRUCTION, BEGIN AT THE LOW END OF ALL GRAVITY UTILITY LINES AND VERIFY THE INVERT ELEVATION OF THE POINT OF CONNECTION. NOTIFY ENGINEER FOR REDESIGN IF CONNECTION POINT IS HIGHER THAN SHOWN OR IF ANY UTILITY CONFLICTS OCCUR. GRAVITY CONNECTIONS MUST BE DONE PRIOR TO BUILDING FOOTINGS AND ROUGH PLUMBING ARE CONSTRUCTED.

NOTE A:
 12" OF VERTICAL SEPERATION REQUIRED BETWEEN STORM AND WATER LINES. LOOP WATER MAIN IF IN CONFLICT.

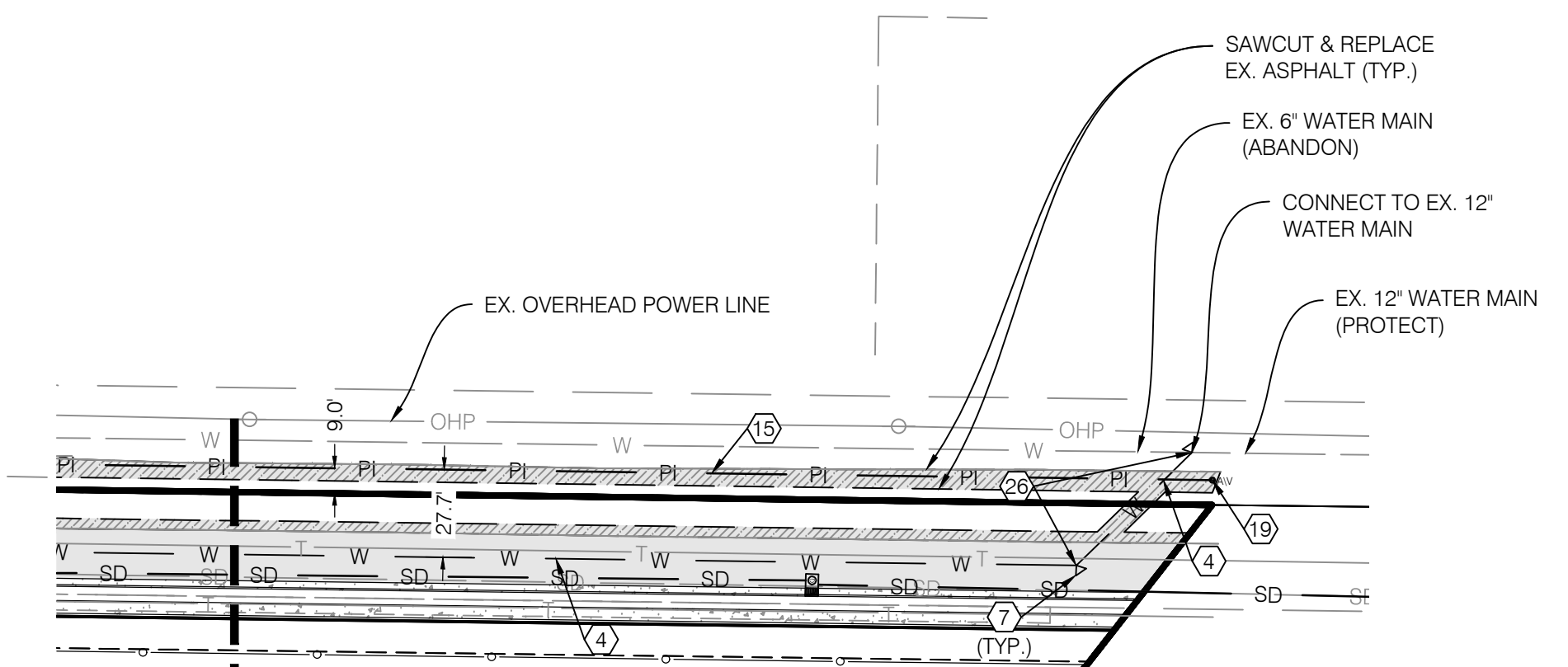
NOTE B:
 18" OF VERTICAL SEPERATION REQUIRED BETWEEN SEWER AND WATER LINES. CONTACT ENGINEER FOR REDESIGN IF NECESSARY

NOTE C:
 12" OF VERTICAL SEPERATION REQUIRED BETWEEN SEWER AND STORM. CONTACT ENGINEER FOR REDESIGN IF NECESSARY

NOTE D:
 SEWER CLEANOUTS MUST BE PROVIDED EVERY 50' ON 4" SEWER LATERALS

NOTE:
 POTHOLE TO IDENTIFY ANY CONFLICTS BEFORE ANY PIPE INSTALLATION. CONTACT ENGINEER IF ANY CONFLICTS ARE IDENTIFIED.

NOTE:
 CONSTRUCTION OF THE PRESSURIZED IRRIGATION SHALL BE IN ACCORDANCE WITH HOOPER IRRIGATION STANDARDS.



GRADING AND DRAINAGE KEY NOTE REFERENCE		
NO.	DESCRIPTION	DETAIL
1	GRADE SITE TO ELEVATIONS SHOWN ON PLAN	
2	8.5" ORIFICE PLATE	2/CDT.03
3	STORM DRAIN INLET BOX PER APWA #315.1	
4	STORM DRAIN CLEAN OUT	1/CDT.04
5	STORM DRAIN COMBO BOX PER APWA #316	
6	FLARED END SECTION	2/CDT.04
7	18" SNOUT	4/CDT.03
8	STORM DRAIN MAN-HOLE	

GRADING AND DRAINAGE KEY NOTE REFERENCE		
NO.	DESCRIPTION	DETAIL
9	15" Ø RCP CLASS III SD PIPE	
10	18" Ø RCP CLASS III SD PIPE	
11	21" Ø RCP CLASS III SD PIPE	
12	24" Ø RCP CLASS III SD PIPE	
13	12" Ø PERFORATED HDPE SD PIPE	3/CDT.04
14	3'X3' CATCH BASIN	1/CDT.03
15	SERIES 37 IN-LINE CHECK VALVE OR APPROVED EQUAL	3/CDT.03
16	15" Ø RCP CLASS III SD PIPE; 2-5 LF @ 0.50% (SEE NOTE A)	

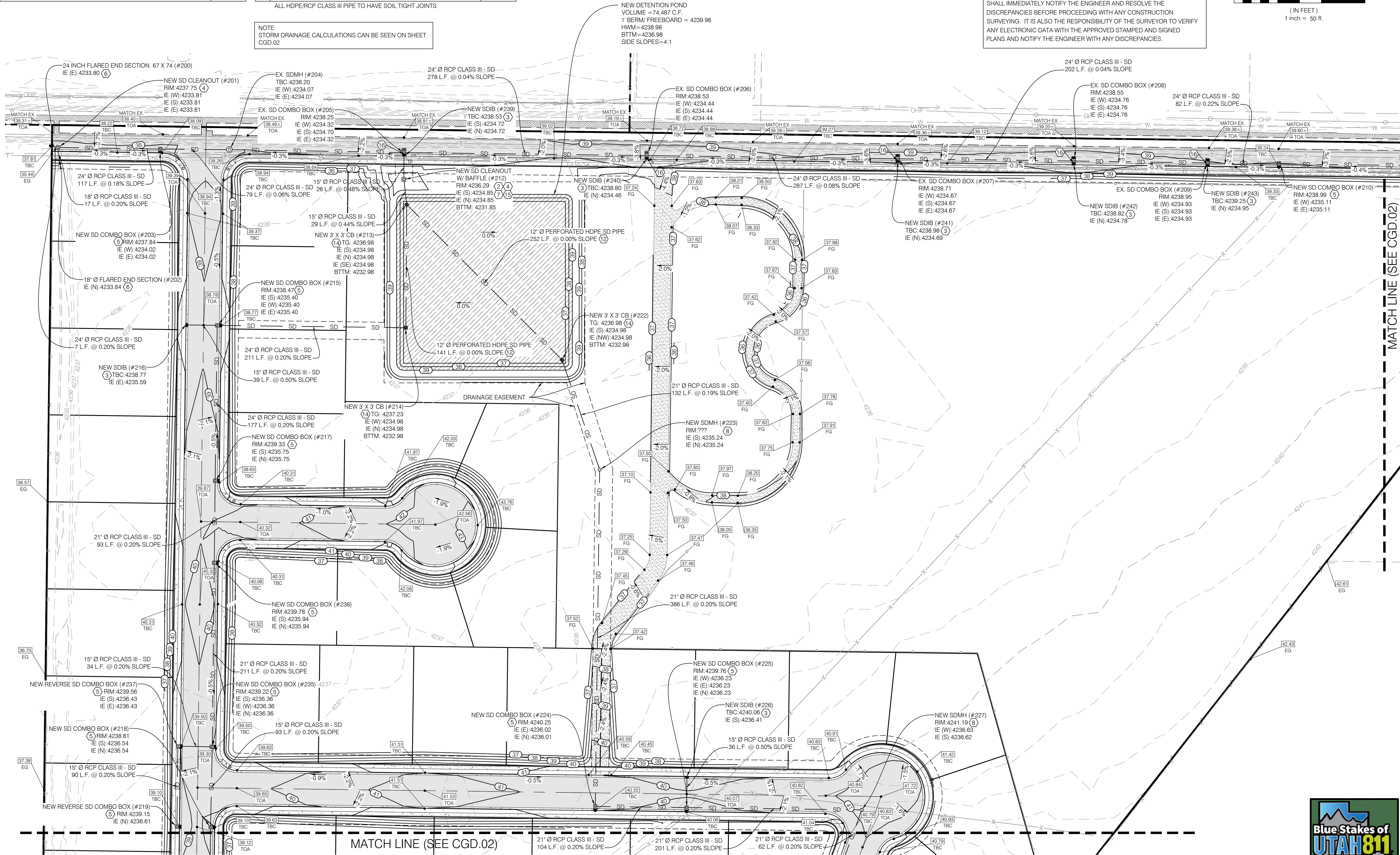
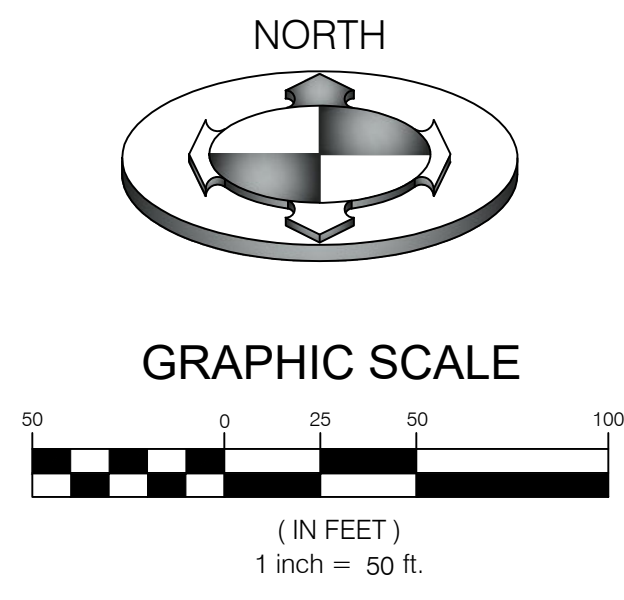
NOTE: STORM DRAINAGE CALCULATIONS CAN BE SEEN ON SHEET CGD.02

NOTE: PRIOR TO FABRICATION OR CONSTRUCTION, BEGIN AT THE LOW END OF ALL GRAVITY UTILITY LINES AND VERIFY THE INVERT ELEVATION OF THE POINT OF CONNECTION. NOTIFY ENGINEER FOR REDESIGN IF CONNECTION POINT IS HIGHER THAN SHOWN OR IF ANY UTILITY CONFLICTS OCCUR. GRAVITY CONNECTIONS MUST BE DONE PRIOR TO BUILDING FOOTINGS AND ROUGH PLUMBING ARE CONSTRUCTED.

NOTE: POT HOLE TO IDENTIFY ANY CONFLICTS BEFORE ANY PIPE INSTALLATION. CONTACT ENGINEER IF ANY CONFLICTS ARE IDENTIFIED.

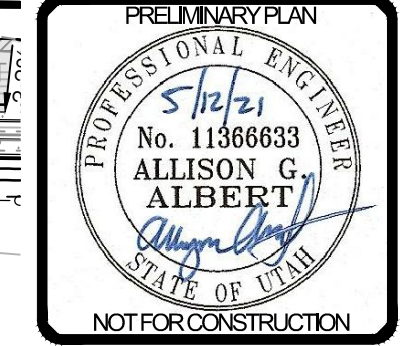
NOTE A: CONTRACTOR TO FIELD VERIFY DISTANCE BETWEEN EXISTING SD COMBO BOX AND NEW SDIB PRIOR TO INSTALLATION OF 15" Ø CLASS III RCP. ADJUST EX. COMBO BOX LID TO GRADE AS NEEDED.

SURVEY CONTROL NOTE:
THE CONTRACTOR OR SURVEYOR PERFORMING THE CONSTRUCTION SURVEYING SHALL BE RESPONSIBLE TO PROVIDE CONSTRUCTION LAYOUT PER THE APPROVED PLANS ONLY. THE SURVEYOR SHALL ALSO BE RESPONSIBLE FOR VERIFYING HORIZONTAL CONTROL FROM THE SURVEY MONUMENTS AND FOR VERIFYING ANY ADDITIONAL CONTROL POINTS SHOWN ON THE SURVEY OR IMPROVEMENTS PLANS OR ON ELECTRONIC DATA PROVIDED BY BENCHMARK ENGINEERING AND LAND SURVEYING. THE SURVEYOR SHALL ALSO USE THE BENCHMARKS AS SHOWN ON THE PLAN, AND VERIFY THEM AGAINST NO LESS THAN THREE EXISTING HARD IMPROVEMENT ELEVATIONS INCLUDED ON THESE PLANS OR ON ELECTRONIC DATA PROVIDED BY BENCHMARK ENGINEERING AND LAND SURVEYING. IF ANY DISCREPANCIES ARE ENCOUNTERED, THE SURVEYOR SHALL IMMEDIATELY NOTIFY THE ENGINEER AND RESOLVE THE DISCREPANCIES BEFORE PROCEEDING WITH ANY CONSTRUCTION SURVEYING. IT IS ALSO THE RESPONSIBILITY OF THE SURVEYOR TO VERIFY ANY ELECTRONIC DATA WITH THE APPROVED STAMPED AND SIGNED PLANS AND NOTIFY THE ENGINEER WITH ANY DISCREPANCIES.



NO.	DATE	DESCRIPTION
1	03/21	REVISED PER COUNTY WATER & IRRIGATION COMMENTS
2	05/21	REVISED PER COUNTY WATER & IRRIGATION COMMENTS

DRAWN BY: JHO
 CHECKED BY: AGA
 SURVEY DATE: 03/12/2021
 DATE: 03/12/2021
 DWG FILE: 2006142.DWG

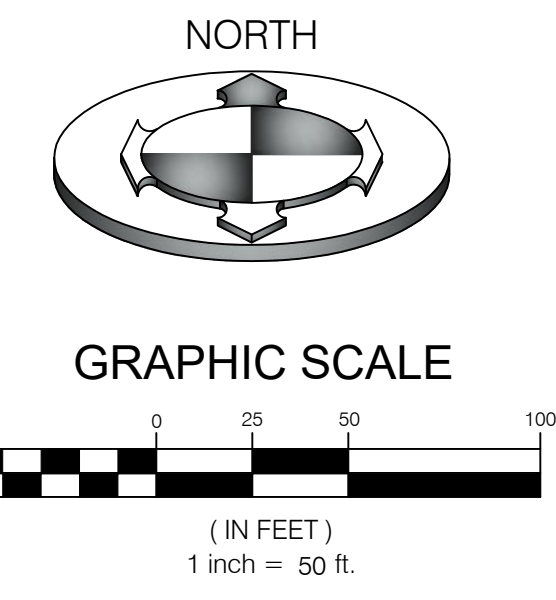
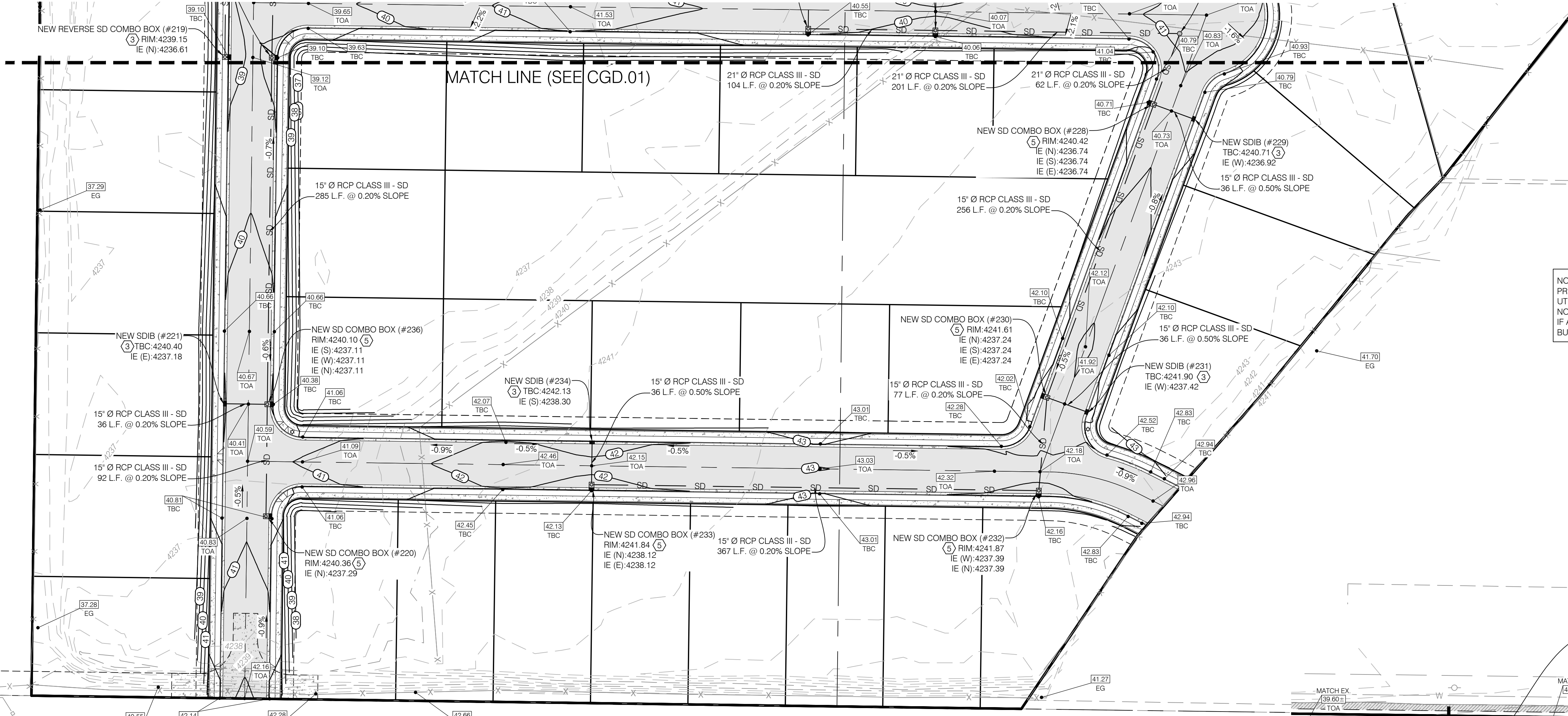


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 WEBER COUNTY, UTAH

PROJECT NO. 2006142
GRADING & DRAINAGE PLAN
 CGD.01
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NOTE:
PRIOR TO FABRICATION OR CONSTRUCTION, BEGIN AT THE LOW END OF ALL GRAVITY UTILITY LINES AND VERIFY THE INVERT ELEVATION OF THE POINT OF CONNECTION. NOTIFY ENGINEER FOR REDESIGN IF CONNECTION POINT IS HIGHER THAN SHOWN OR IF ANY UTILITY CONFLICTS OCCUR. GRAVITY CONNECTIONS MUST BE DONE PRIOR TO BUILDING FOOTINGS AND ROUGH PLUMBING ARE CONSTRUCTED.

NOTE:
SAWCUT WIDTH, LOCATIONS AND TIE-IN ELEVATIONS IN EXISTING HARDSCAPE ARE APPROXIMATE, CONTRACTOR TO FIELD VERIFY LOCATION AND EXTENT OF SAWCUTTING PRIOR TO CONSTRUCTION. NOTIFY CIVIL ENGINEER IF REVISIONS ARE REQUIRED. SEE NOTE 58 ON CGN.01 FOR FURTHER DETAIL.

NOTE:
POTHOLE TO IDENTIFY ANY CONFLICTS BEFORE ANY PIPE INSTALLATION. CONTACT ENGINEER IF ANY CONFLICTS ARE IDENTIFIED.

NO.	DESCRIPTION	DETAIL
①	GRADE SITE TO ELEVATIONS SHOWN ON PLAN	
②	8.5" ORIFICE PLATE	2/CDT.03
③	STORM DRAIN INLET BOX PER APWA #315.1	
④	STORM DRAIN CLEAN OUT	1/CDT.04
⑤	STORM DRAIN COMBO BOX PER APWA #316	
⑥	FLARED END SECTION	2/CDT.04
⑦	18" SNOUT	4/CDT.03
⑧	STORM DRAIN MANHOLE	
⑨	15" Ø RCP CLASS III SD PIPE	
⑩	18" Ø RCP CLASS III SD PIPE	
⑪	21" Ø RCP CLASS III SD PIPE	
⑫	24" Ø RCP CLASS III SD PIPE	
⑬	12" Ø PERFORATED HDPE SD PIPE	3/CDT.04
⑭	3'x3' CATCH BASIN	1/CDT.03
⑮	SERIES 37 IN-LINE CHECK VALVE OR APPROVED EQUAL	3/CDT.03
⑯	15" Ø RCP CLASS III SD PIPE, 1-5 LF @ 0.50% (SEE NOTE A)	

ALL HDPE/RCP CLASS III PIPE TO HAVE SOIL TIGHT JOINTS

SURVEY CONTROL NOTE:
THE CONTRACTOR OR SURVEYOR PERFORMING THE CONSTRUCTION SURVEYING SHALL BE RESPONSIBLE TO PROVIDE CONSTRUCTION LAYOUT PER THE APPROVED PLANS ONLY. THE SURVEYOR SHALL ALSO BE RESPONSIBLE FOR VERIFYING HORIZONTAL CONTROL FROM THE SURVEY MONUMENTS AND FOR VERIFYING ANY ADDITIONAL CONTROL POINTS SHOWN ON THE SURVEY OR IMPROVEMENTS PLANS OR ON ELECTRONIC DATA PROVIDED BY BENCHMARK ENGINEERING AND LAND SURVEYING. THE SURVEYOR SHALL ALSO USE THE BENCHMARKS AS SHOWN ON THE PLAN, AND VERIFY THEM AGAINST NO LESS THAN THREE EXISTING HARD IMPROVEMENT ELEVATIONS INCLUDED ON THESE PLANS OR ON ELECTRONIC DATA PROVIDED BY BENCHMARK ENGINEERING AND LAND SURVEYING. IF ANY DISCREPANCIES ARE ENCOUNTERED, THE SURVEYOR SHALL IMMEDIATELY NOTIFY THE ENGINEER AND RESOLVE THE DISCREPANCIES BEFORE PROCEEDING WITH ANY CONSTRUCTION SURVEYING. IT IS ALSO THE RESPONSIBILITY OF THE SURVEYOR TO VERIFY ANY ELECTRONIC DATA WITH THE APPROVED STAMPED AND SIGNED PLANS AND NOTIFY THE ENGINEER WITH ANY DISCREPANCIES.

NOTE A:
CONTRACTOR TO FIELD VERIFY DISTANCE BETWEEN EXISTING SD COMBO BOX AND NEW SDIB PRIOR TO INSTALLATION OF 15" Ø CLASS III RCP. ADJUST EX. COMBO BOX LID TO GRADE AS NEEDED.

STORM DRAINAGE CALCULATIONS Rational Method (Q=CIA)

Area Identification (A)	Rational Coefficient (C)	C*A
Roof = 162,000	0.9	145,800 S.F.
Pavement = 237,126	0.9	213,413 S.F.
Landscaping = 1,313,176	0.2	262,635 S.F.
Sum = 1,712,302 S.F.		Sum = 621,848 S.F.

NOAA ATLAS 14 (100 YEAR STORM)			Allowable Discharge = 10cfs/acre	
Time (min)	Intensity (in/hr)	Rainfall Excess (cu.ft.)	Allowed Discharge (cu.ft.)	Volume to Detain (cu.ft.)
15	4.10	1,025	53116	49578
30	2.76	1,380	71513	64437
60	1.71	1,710	88613	74462
120	0.93	1,860	96387	68084
180	0.64	1,905	98718	56265
360	0.35	2,124	110067	25160
720	0.22	2,604	134941	0
1440	0.12	2,904	150487	0

Detention Calculations

Pond Volume
Detention Pond Civil 3D = **74,487 cf**

Pipe Volume

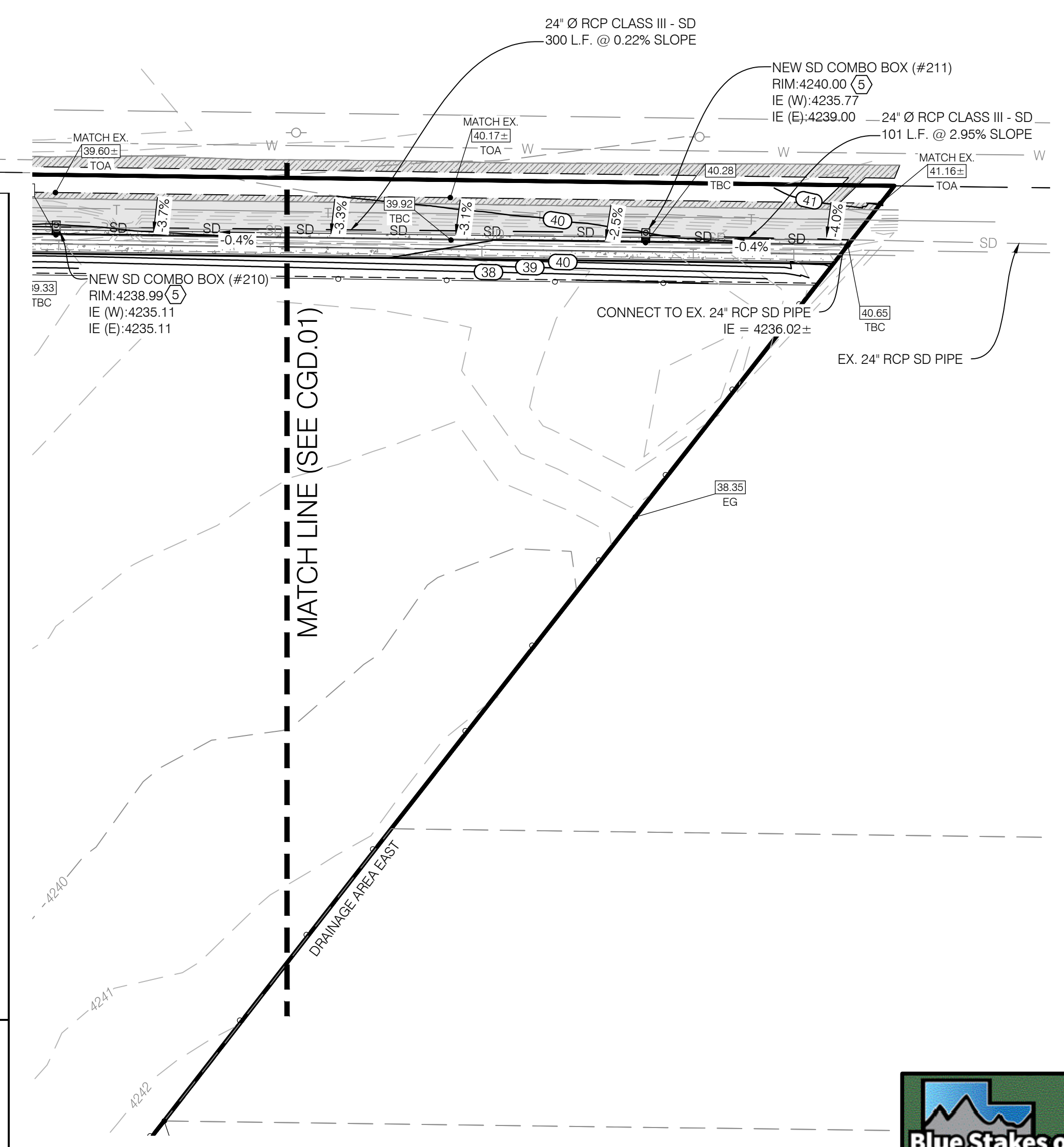
12 in. Pipe	Length = 393 lf	Volume = 309 cf
15 in. Pipe	Length = 1,513 lf	Volume = 1,857 cf
21 in. Pipe	Length = 1,189 lf	Volume = 2,860 cf
24 in. Pipe	Length = 388 lf	Volume = 1,219 cf

Is there adequate storage? Storage Provided = **80,731 cf**
Req. Storage = **74,462 cf** **YES**

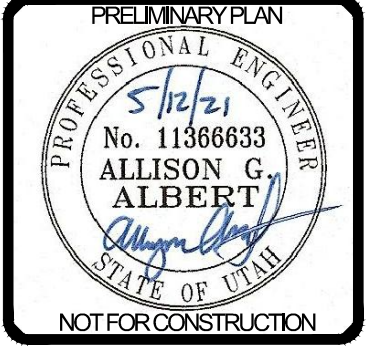
Orifice Design:
The storm runoff will be detained at 0.1 cfs/acre

$$Q = C_d A_0 \sqrt{2gh}$$

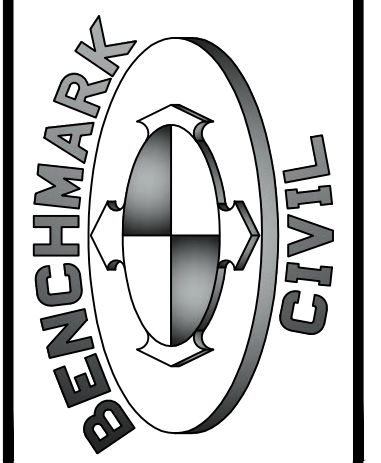
Total acreage of development:	39.31 acres
Allowable discharge:	0.1 cfs/acre
Max head:	4.13 ft
Design diameter for new orifice:	8.5 inch



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	03/12/2021	DATE
	03/12/2021	DATE



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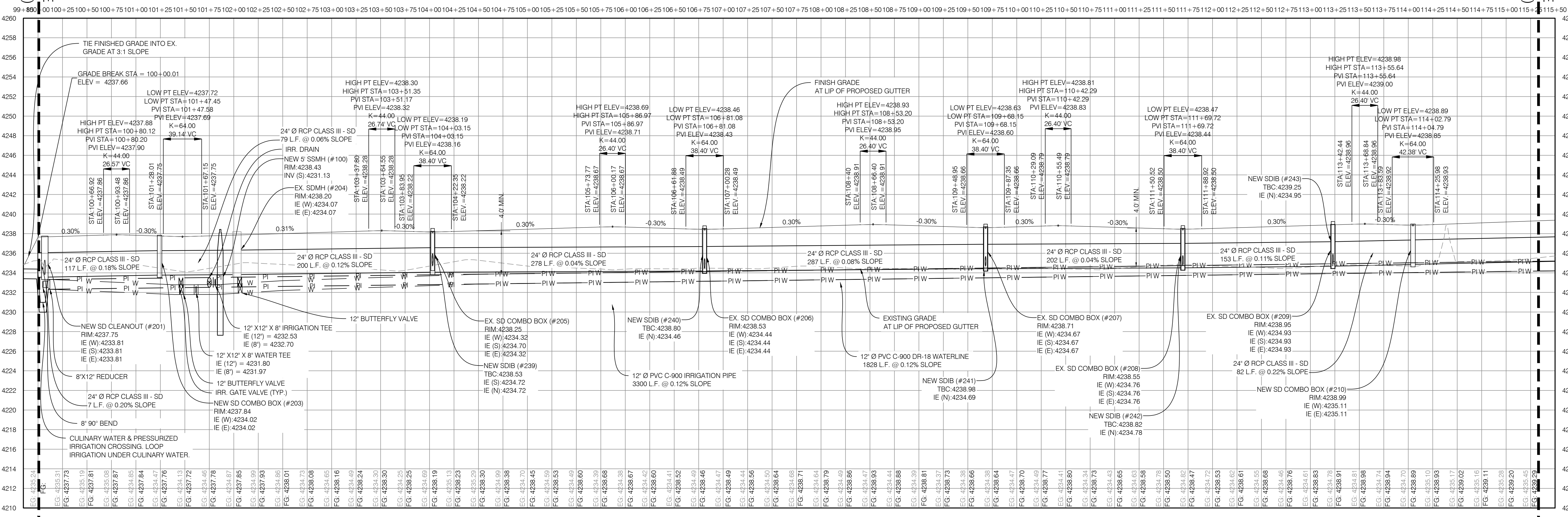
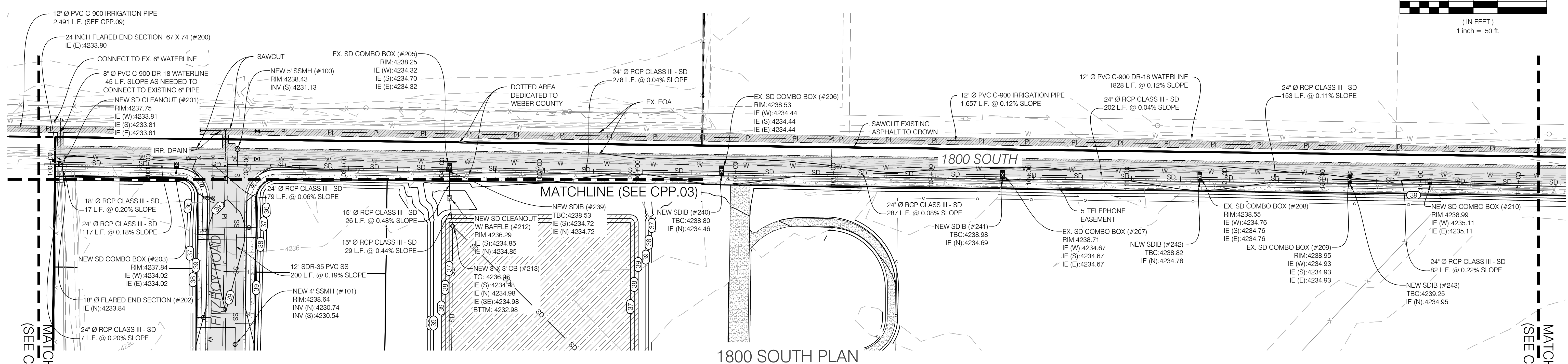
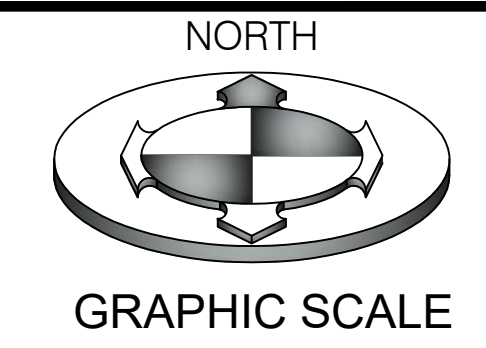
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3701 W 1800 S
WEBER COUNTY, UTAH

PROJECT NO. 2006142

GRADING & DRAINAGE PLAN

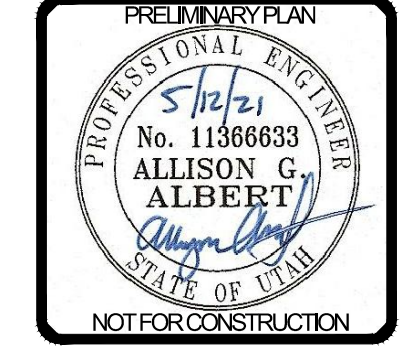
CGD.02
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1800 SOUTH PROFILE

NO.	DATE	DESCRIPTION
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2	05/21	REVISED PER COUNTY WATER & IRRIGATION COMMENTS
3	03/12/2021	DATE
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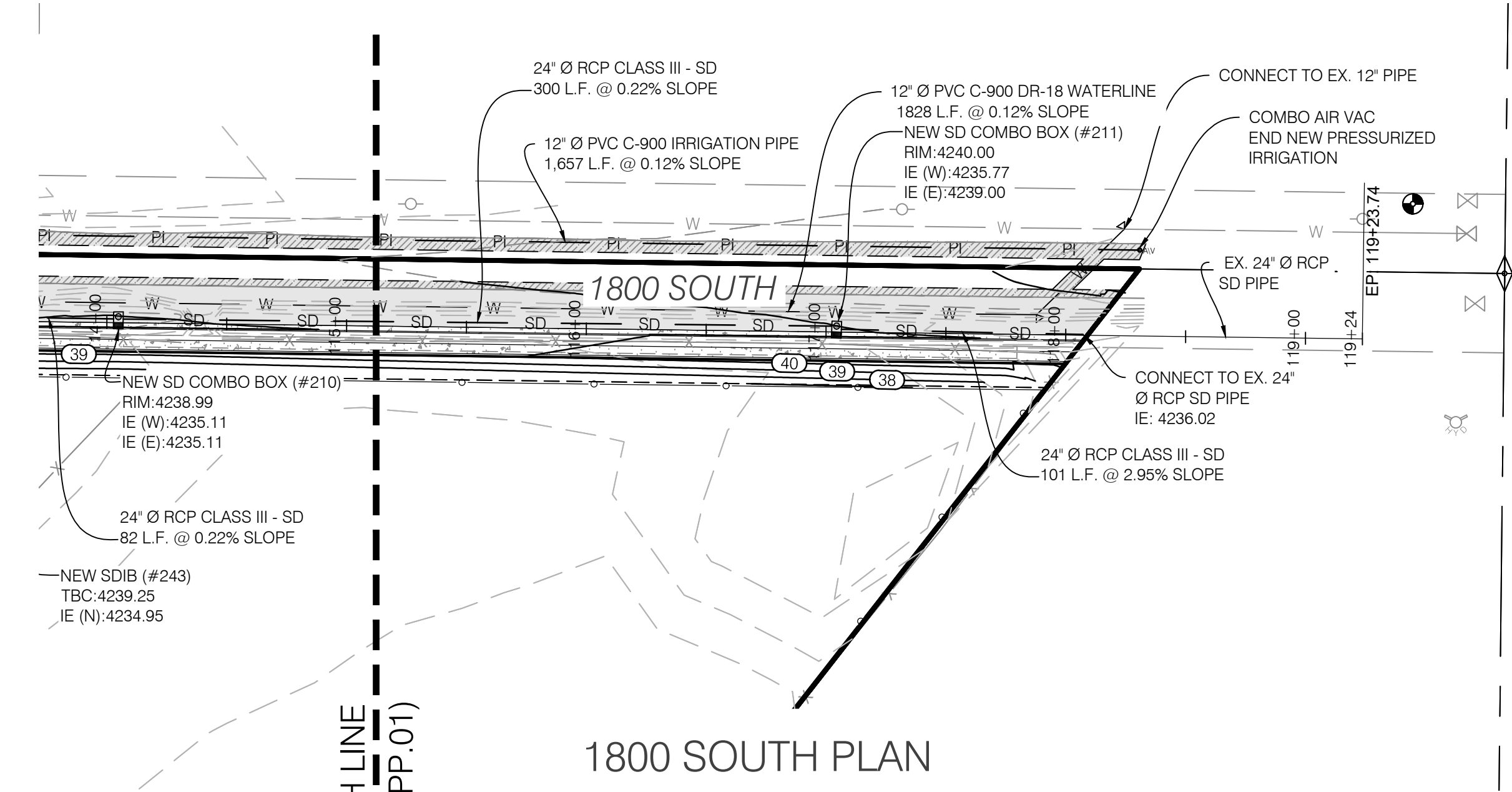
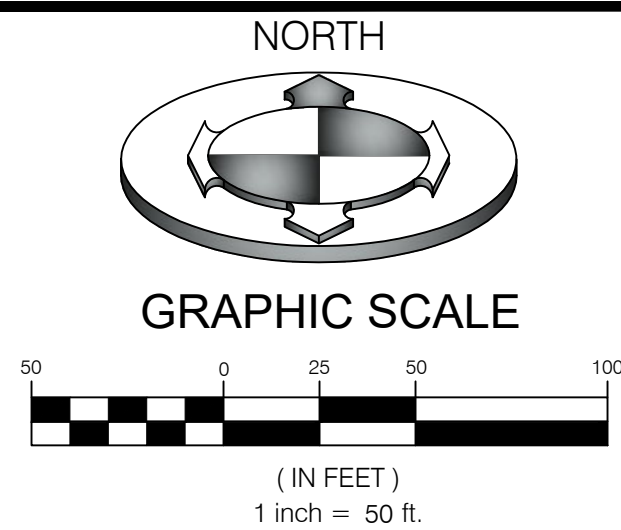


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PROJECT NO. 2006142
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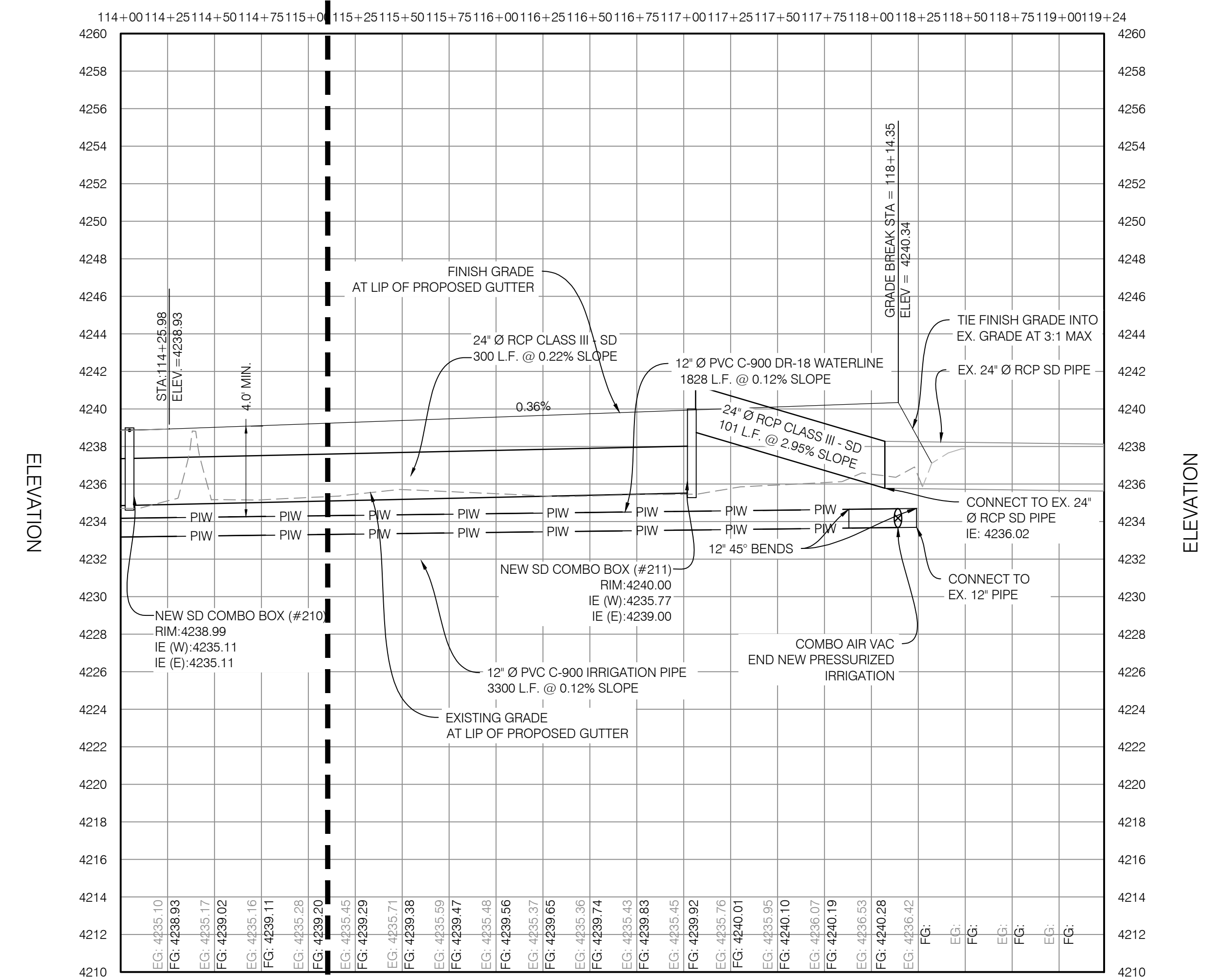




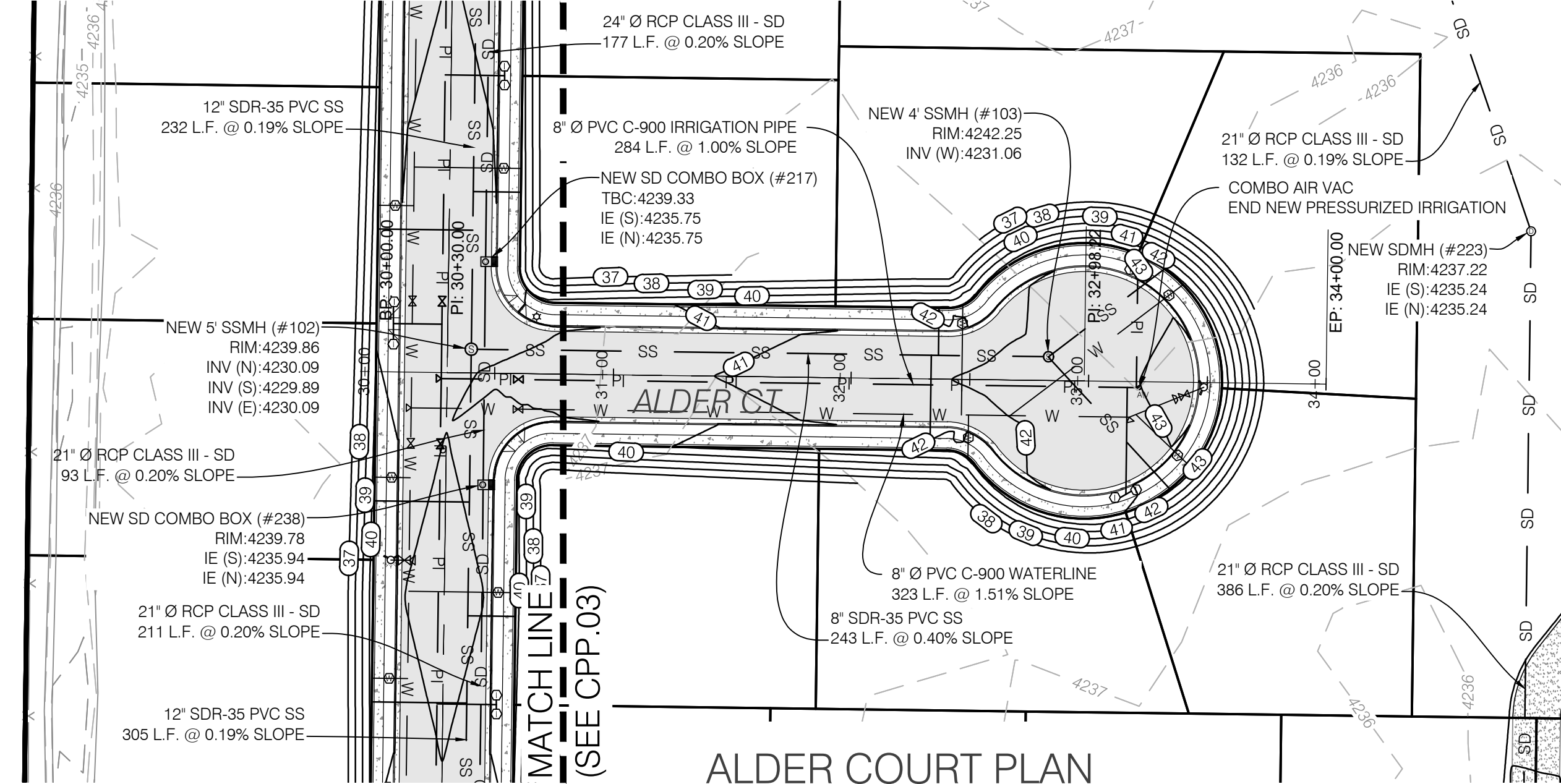
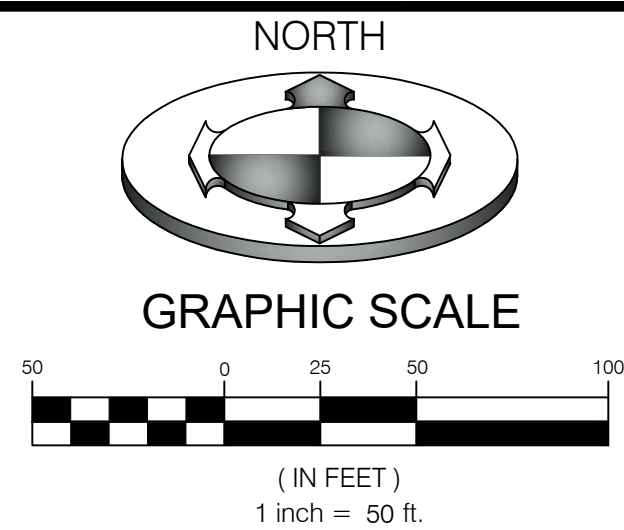
1800 SOUTH PLAN

MATCH LINE
(SEE CPP.01)

STATION



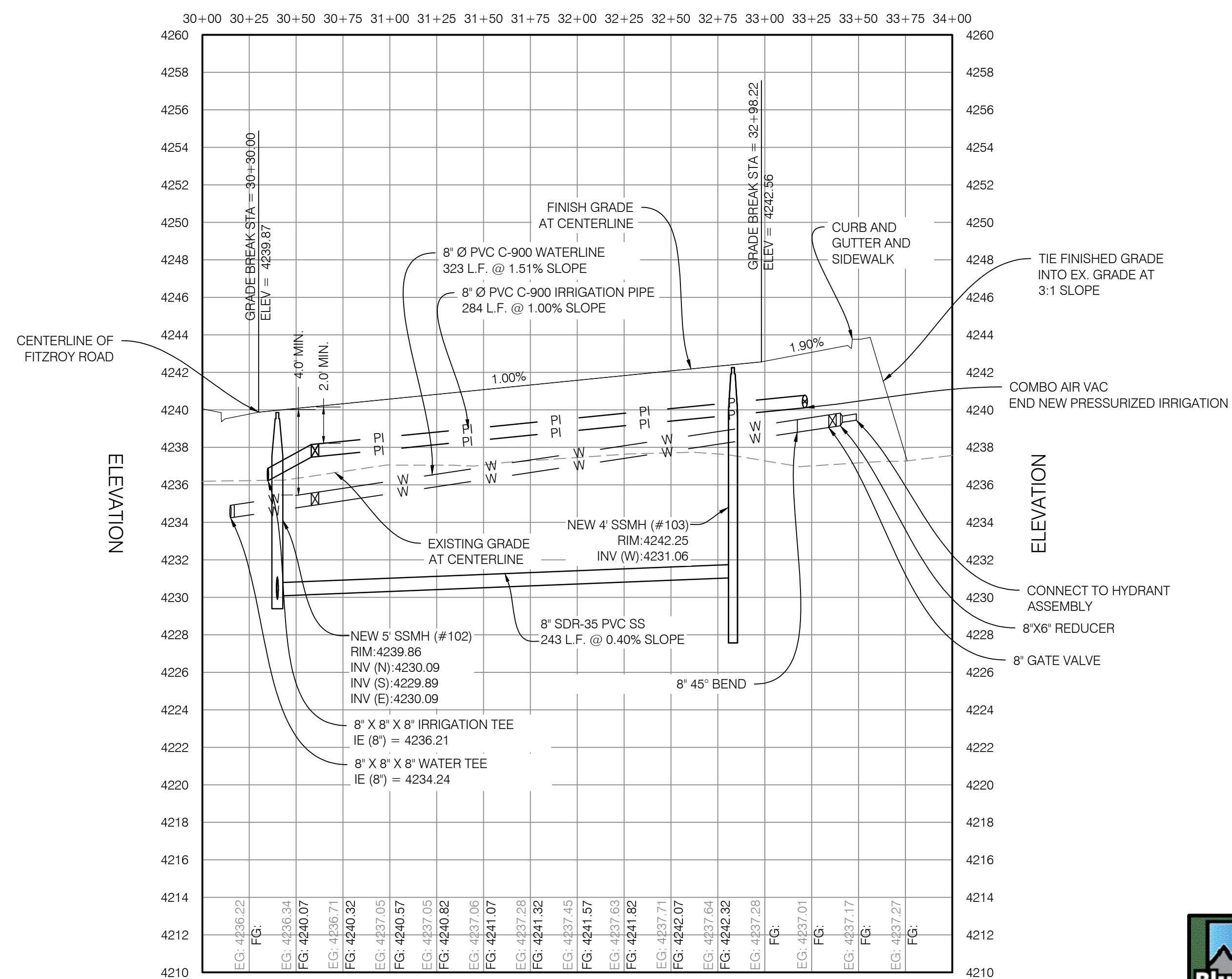
1800 SOUTH PROFILE



ALDER COURT PLAN

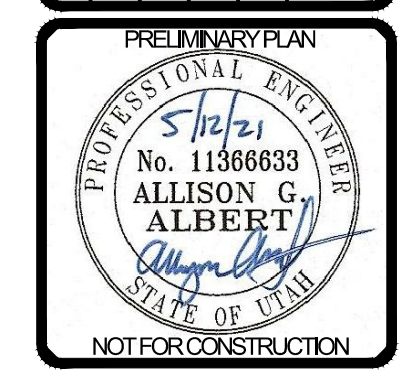
MATCH LINE
(SEE CPP.03)

STATION

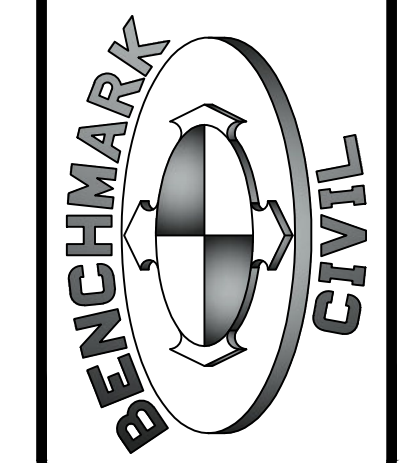


ALDER CT PROFILE

NO.	DATE	DESCRIPTION
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2	05/12/21	REVISED PER COUNTY, WATER & IRRIGATION COMMENTS



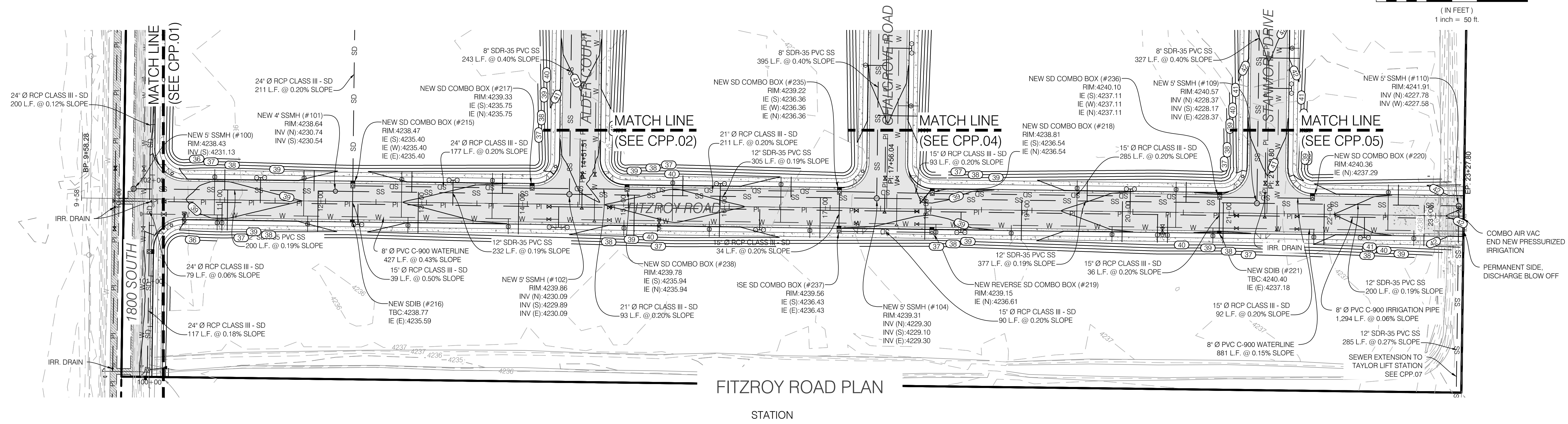
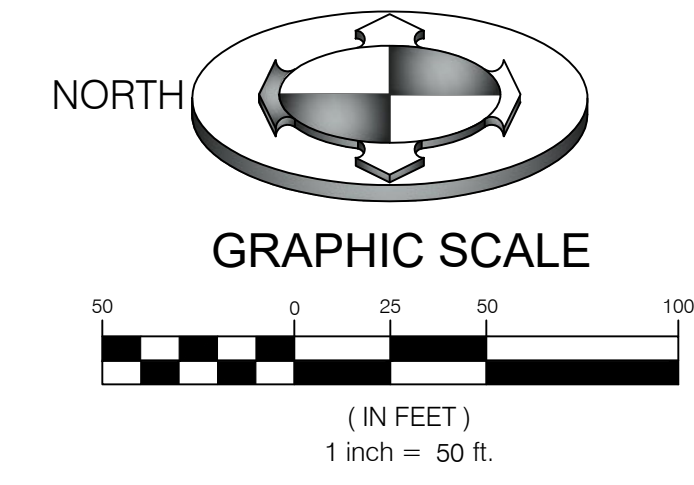
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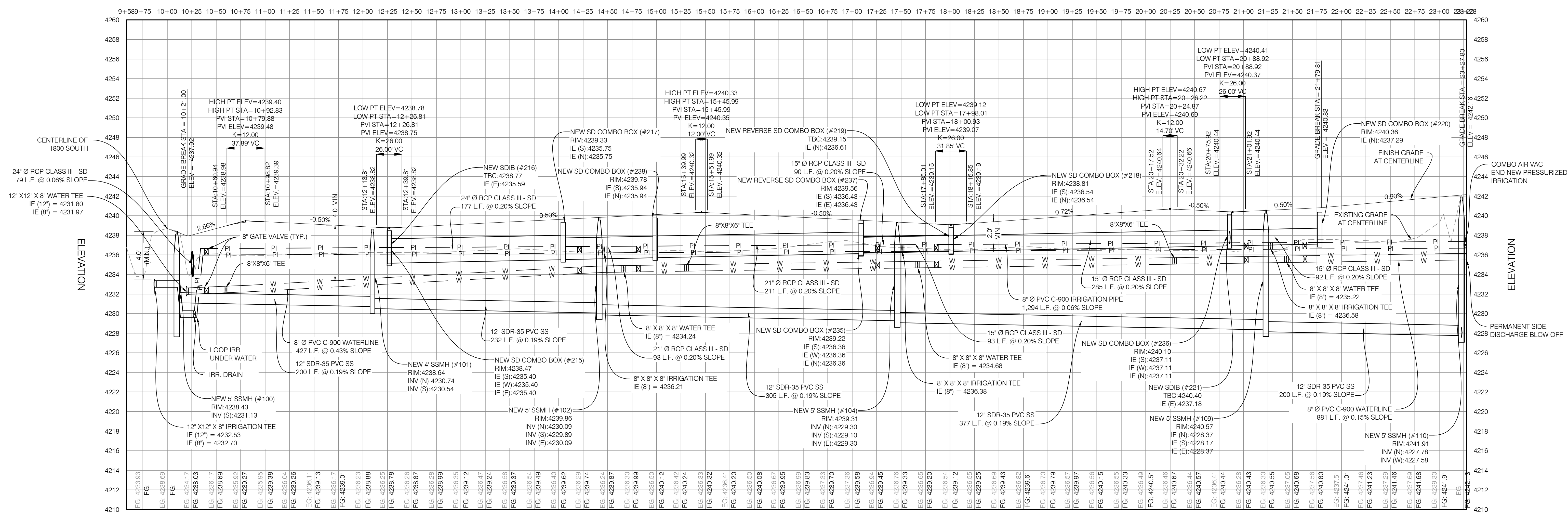
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FITZROY ROAD PLAN

STATION



FITZROY ROAD PROFILE

NO.	DATE	DESCRIPTION
1	03/21	REVISED PER COUNTY WATER & IRRIGATION COMMENTS
2	05/21	REVISED PER COUNTY WATER & IRRIGATION COMMENTS

DRAWN BY: JHO
 CHECKED BY: AGA
 FIELD OFFICER: SURVEY
 DATE: 03/12/2021
 DWG FILE: 2006142_CPP-03.DWG

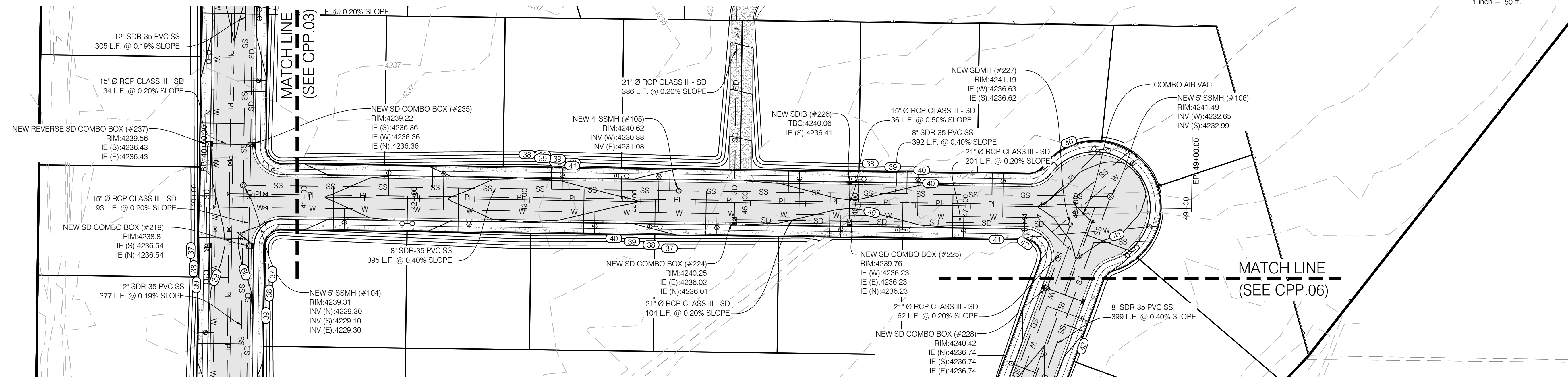
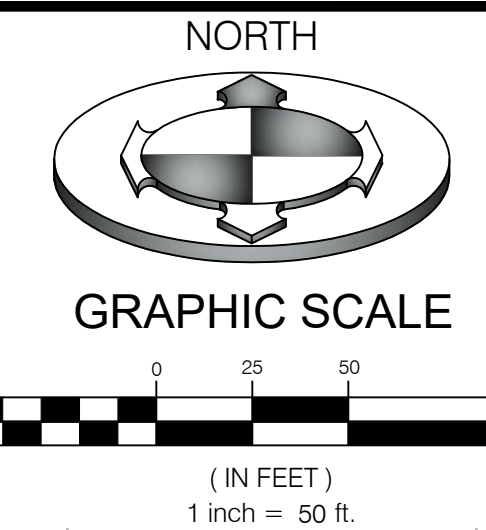
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 PROFESSIONAL ENGINEER
 No. 11566633
 ALLISON G. ALBERT
 STATE OF UTAH
 NOT FOR CONSTRUCTION

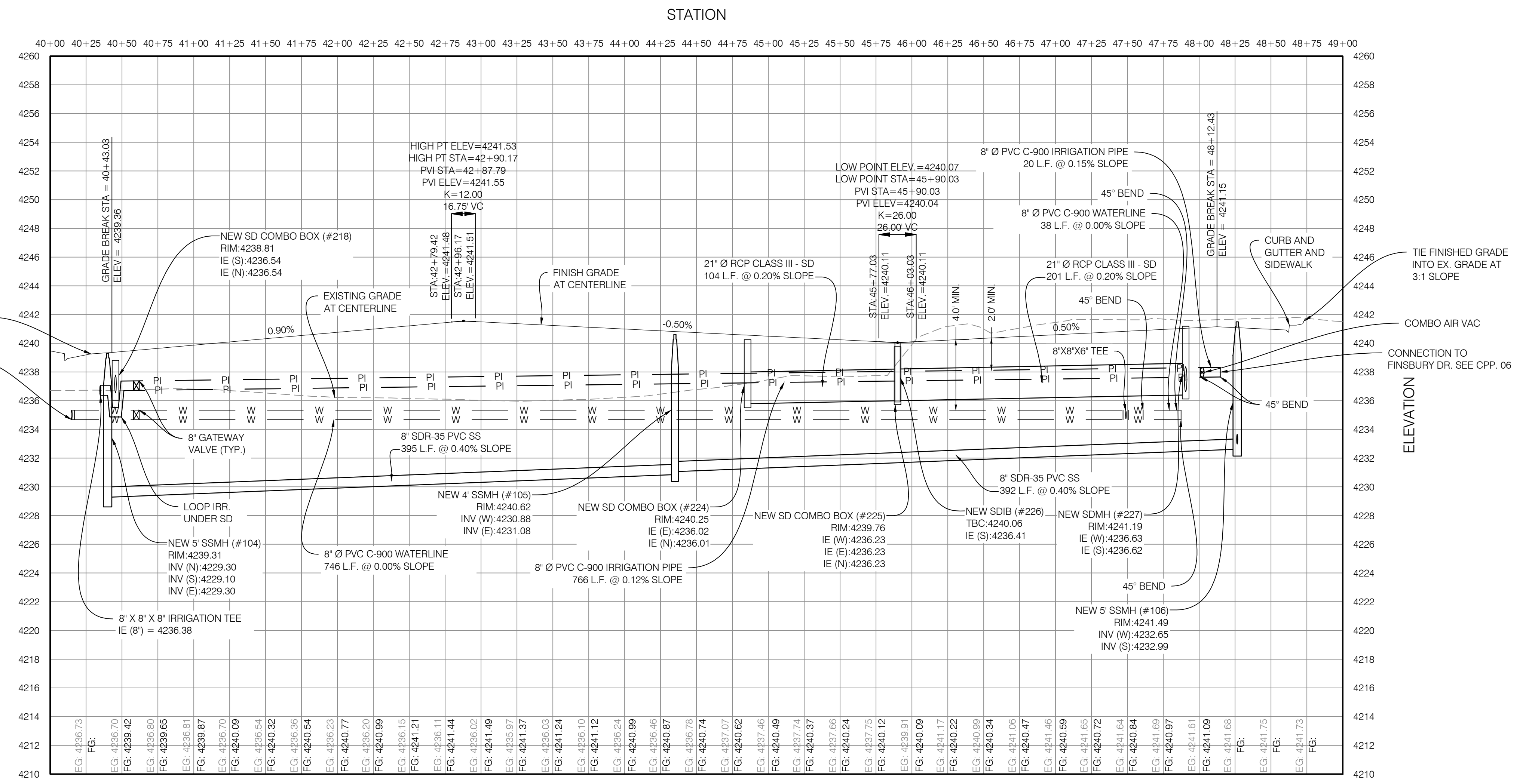
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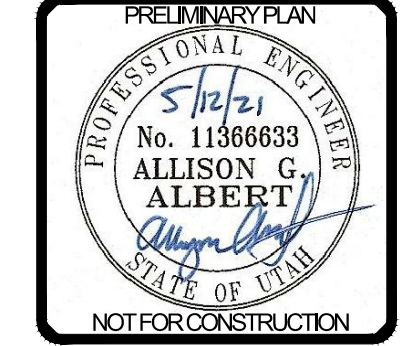


CHALGROVE DRIVE PLAN

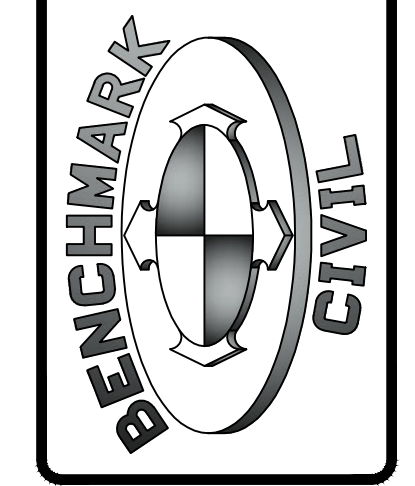


CHALGROVE RD PROFILE

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2	05/21	REVISED PER COUNTY WATER & IRRIGATION COMMENTS



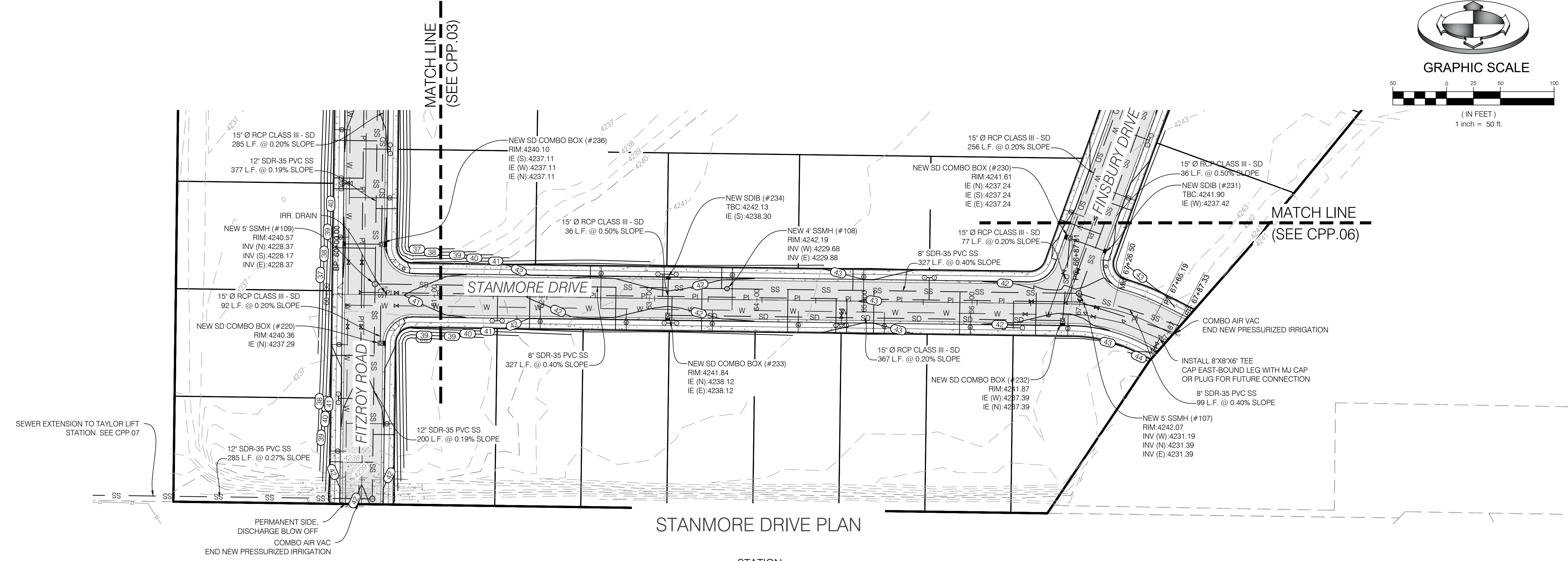
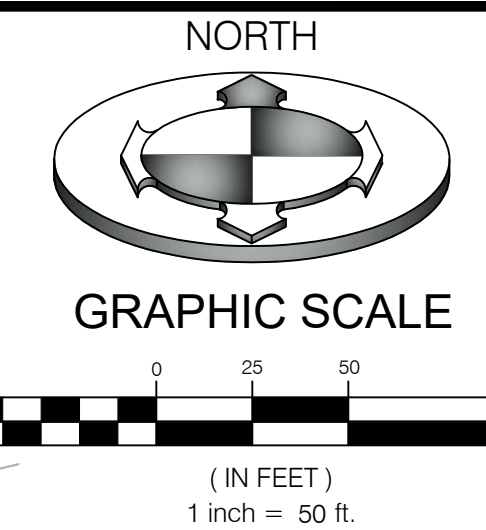
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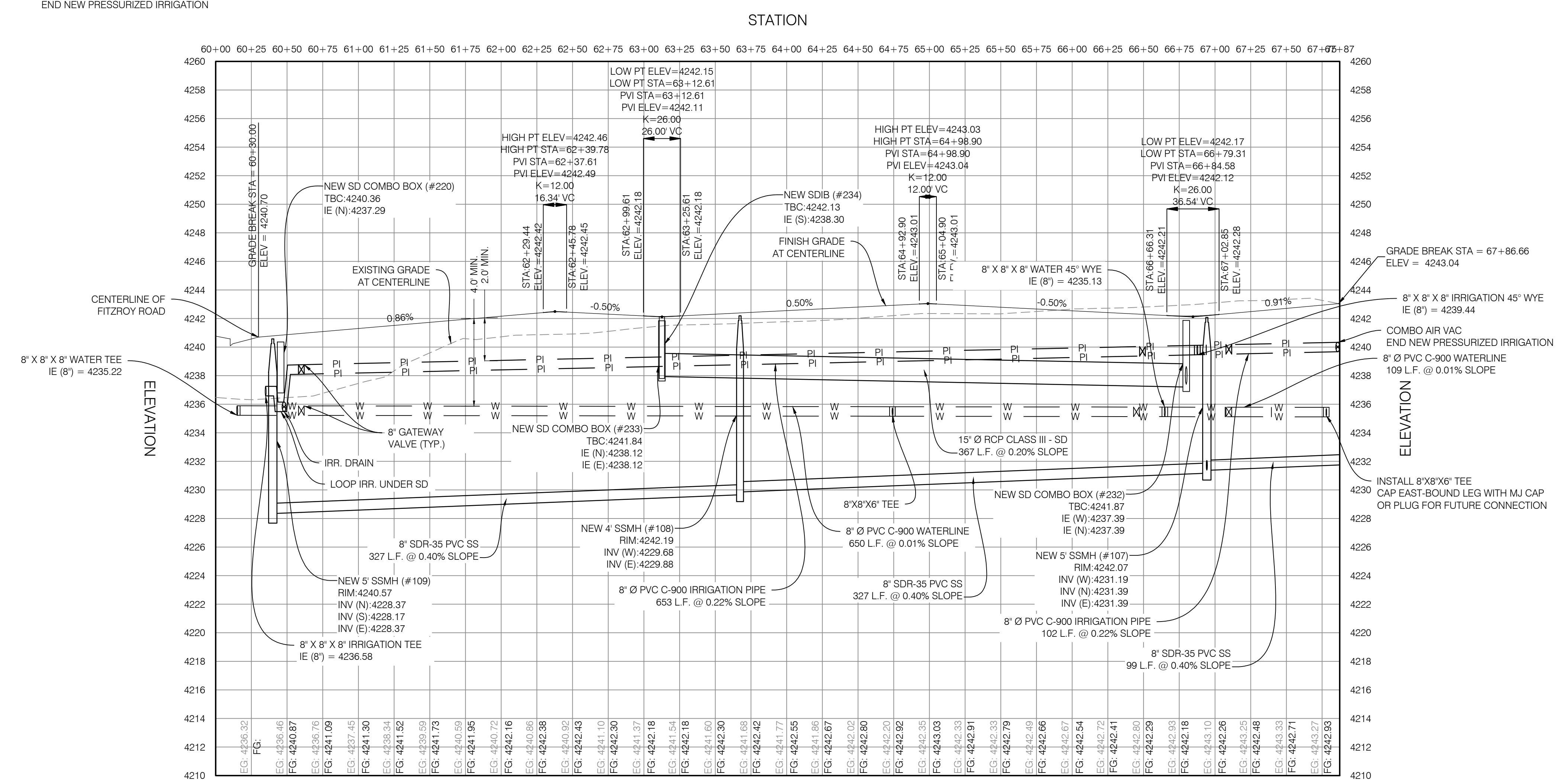
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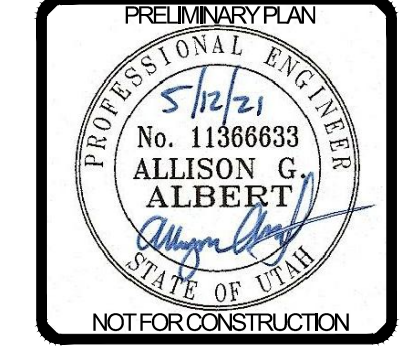
STANMORE DRIVE PLAN



STANMORE DR PROFILE

NO.	DATE	DESCRIPTION
1	03/20/21	REVISED PER COUNTY WATER & IRRIGATION COMMENTS
2	05/12/21	REVISED PER COUNTY WATER & IRRIGATION COMMENTS

PROJECT NO.	2006142
DATE	03/12/2021
SCALE	AS SHOWN ON FULL SIZE SHEETS
SCALE	AS SHOWN ON FULL SIZE SHEETS

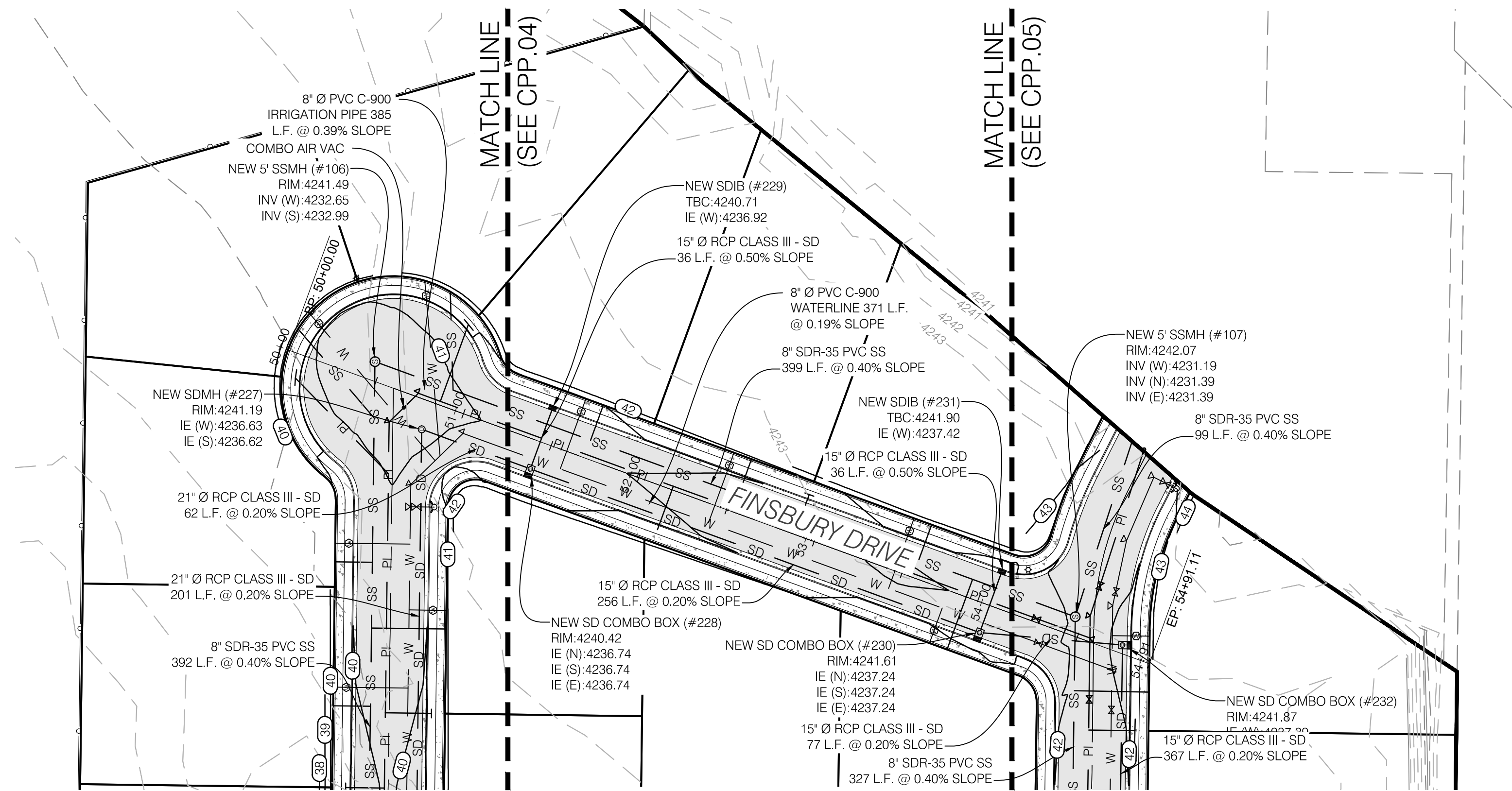
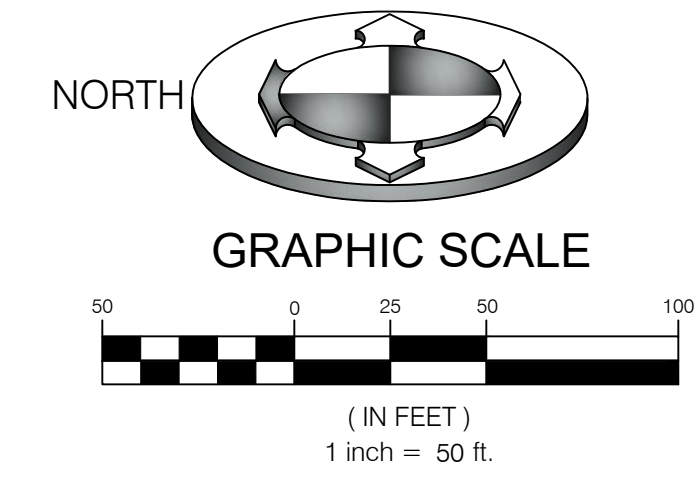


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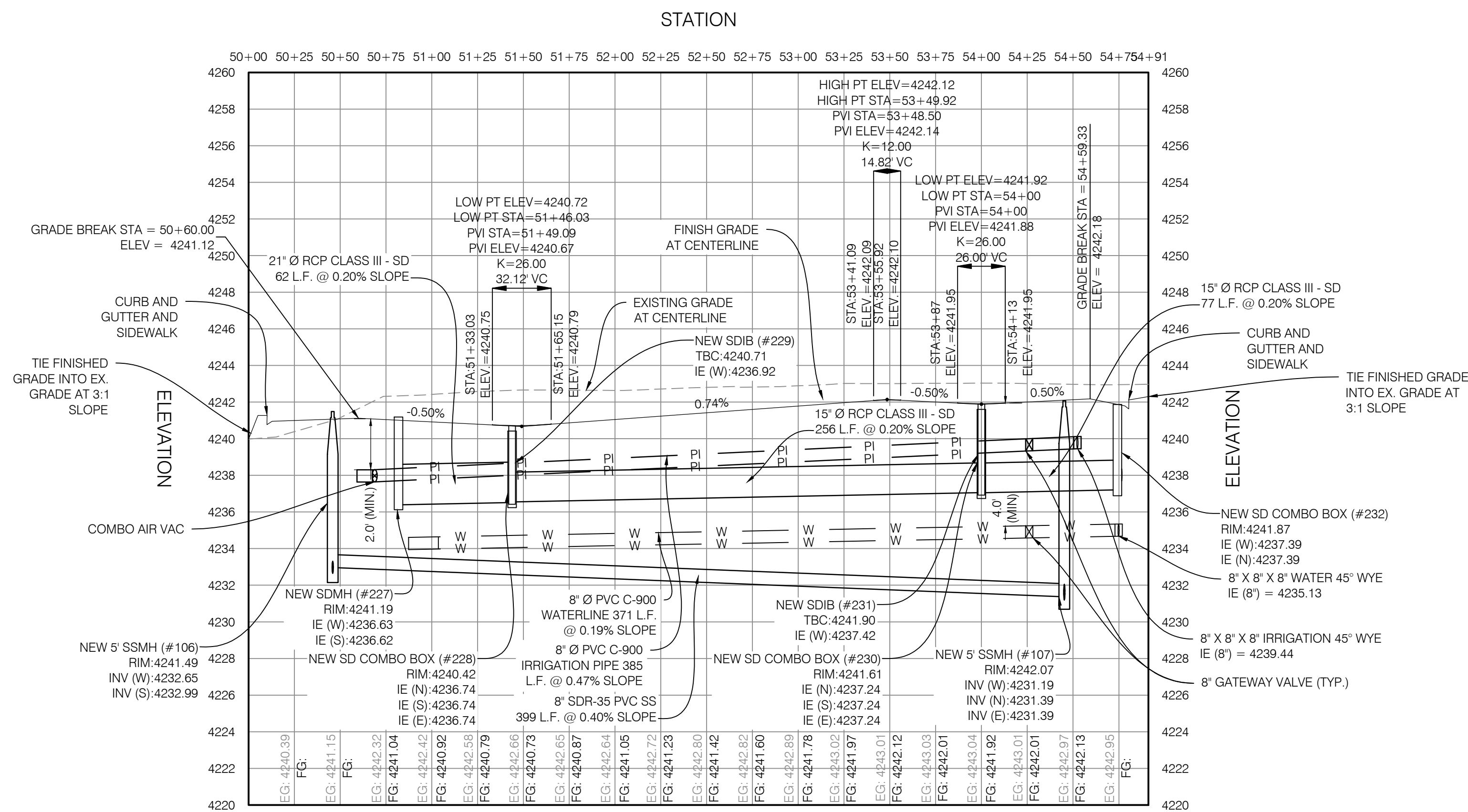
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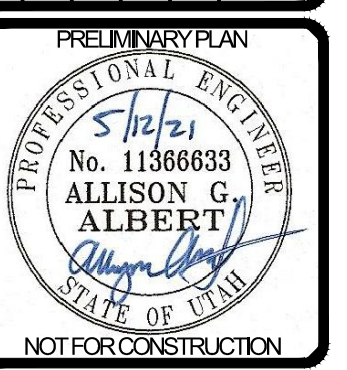


FINSBURY DRIVE PLAN

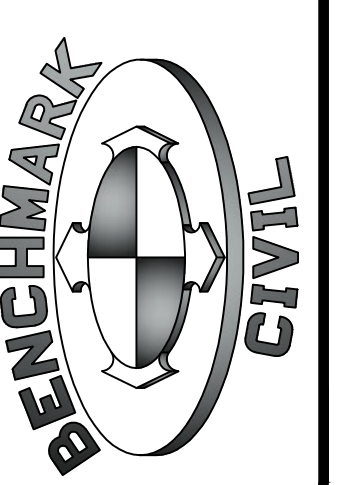


FINSBURY DR PROFILE

NO.	DATE	DESCRIPTION
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2	05/21/21	REVISED PER COUNTY WATER & IRRIGATION COMMENTS



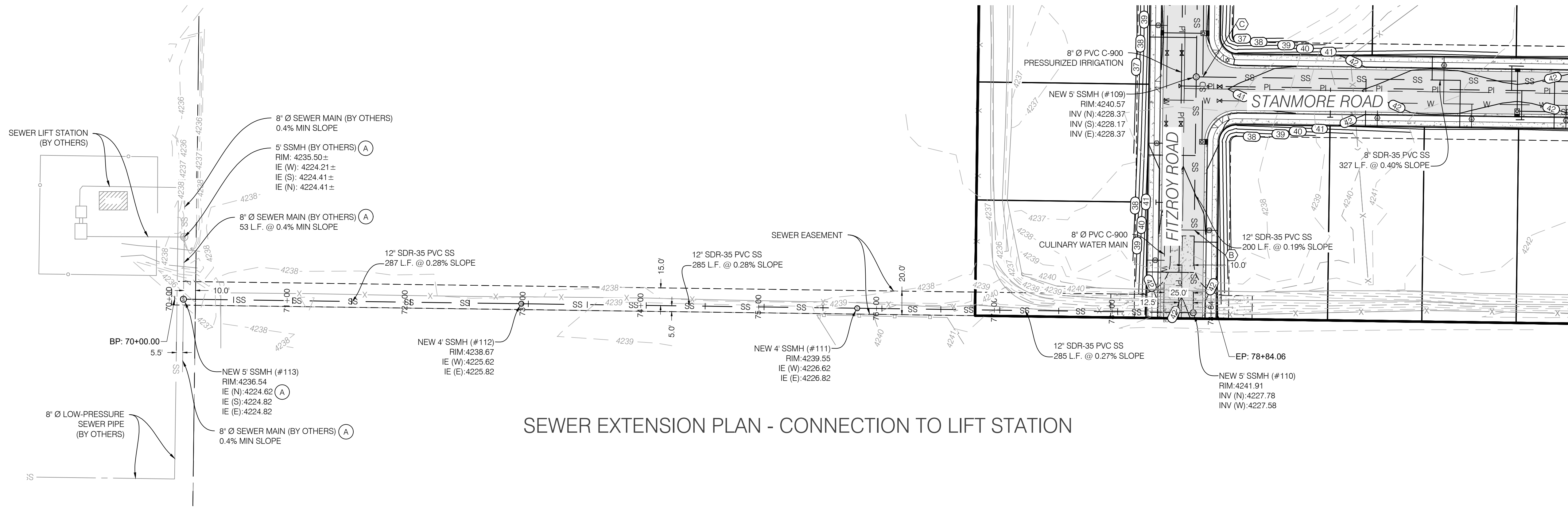
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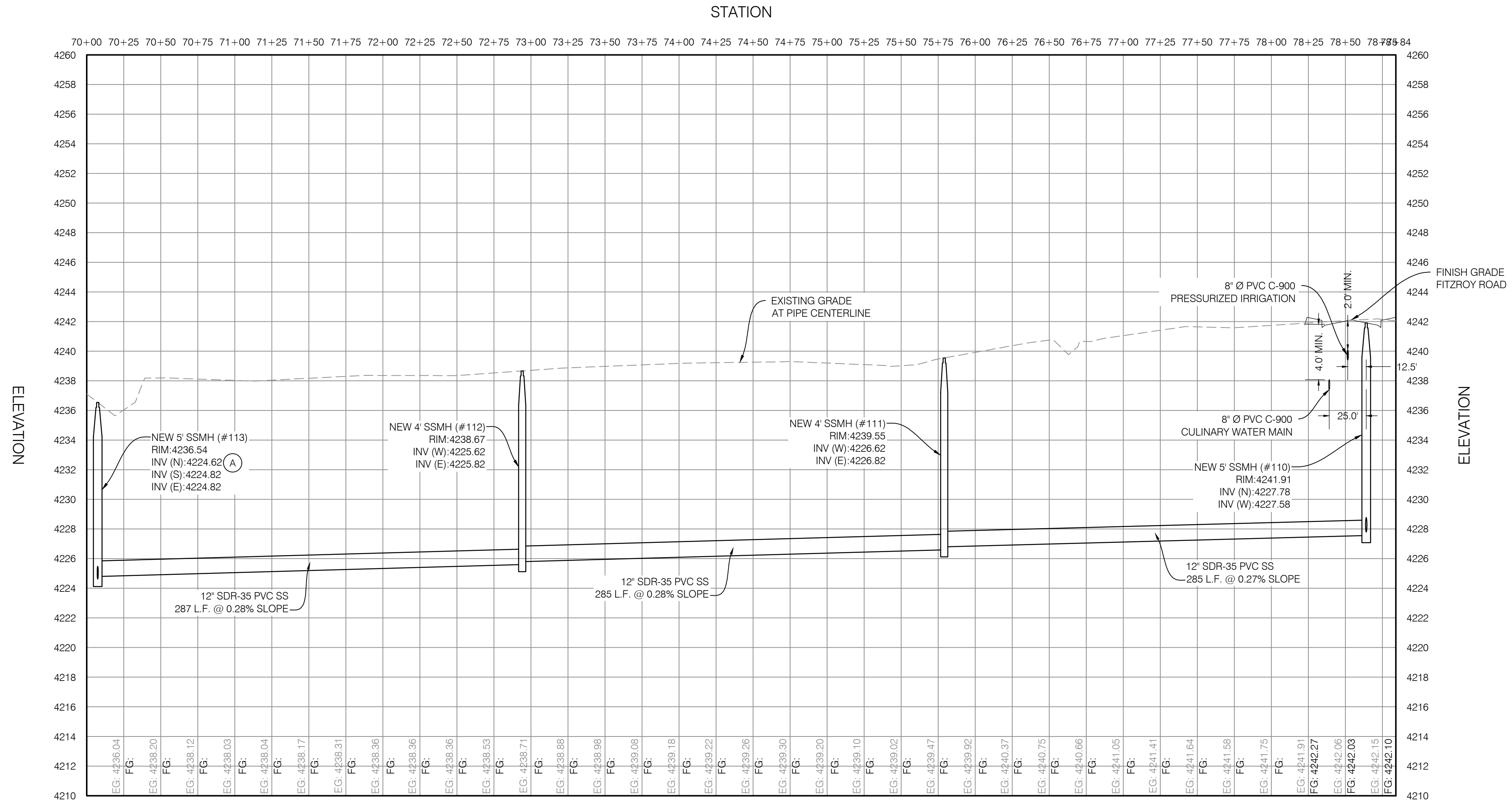
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ROADWAY PLAN & PROFILE
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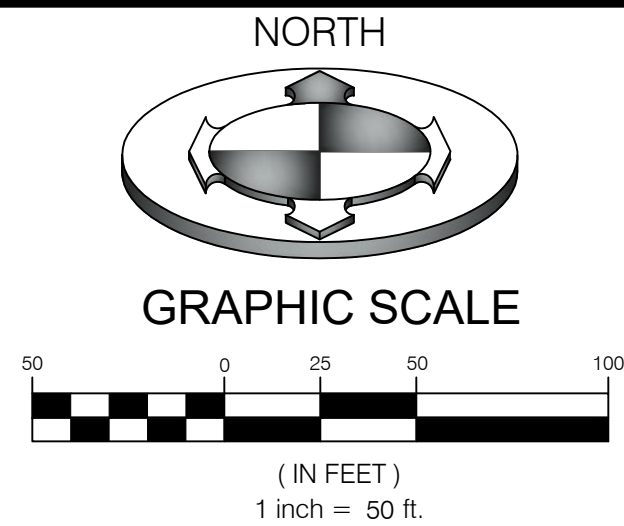




SEWER EXTENSION PLAN - CONNECTION TO LIFT STATION



SEWER EXTENSION PROFILE - CONNECTION TO LIFT STATION



NOTE:
PRIOR TO FABRICATION OR CONSTRUCTION, BEGIN AT THE LOW END OF ALL GRAVITY UTILITY LINES AND VERIFY THE INVERT ELEVATION OF THE POINT OF CONNECTION. NOTIFY ENGINEER FOR REDESIGN IF CONNECTION POINT IS HIGHER THAN SHOWN OR IF ANY UTILITY CONFLICTS OCCUR. GRAVITY CONNECTIONS MUST BE DONE PRIOR TO BUILDING FOOTINGS AND ROUGH PLUMBING ARE CONSTRUCTED.

NOTE A:
PRIOR TO FABRICATION OR CONSTRUCTION, FIELD VERIFY THE LOCATION AND DEPTH OF UTILITIES DESIGNED BY OTHERS (LIFT STATION, SEWER MANHOLES, SEWER PIPES, ETC.) CONTACT ENGINEER FOR REDESIGN IF THERE ARE CONFLICTS OR IF THE SEWER DEPTH IS HIGHER THAN 4224.21.

NOTE B:
18" OF VERTICAL SEPERATION REQUIRED BETWEEN SEWER AND WATER LINES. CONTACT ENGINEER FOR REDESIGN IF NECESSARY

NOTE C:
12" OF VERTICAL SEPERATION REQUIRED BETWEEN SEWER AND STORM. CONTACT ENGINEER FOR REDESIGN IF NECESSARY

NO.	DATE	DESCRIPTION
1	03/21/21	REVISED PER COUNTY WATER & IRRIGATION COMMENTS
2	05/12/21	REVISED PER COUNTY WATER & IRRIGATION COMMENTS

PROFESSIONAL ENGINEER
 No. 11566833
 ALLISON G. ALBERT
 STATE OF UTAH
 NOT FOR CONSTRUCTION

BENCHMARK CIVIL
 BENCHMARK ENGINEERING & LAND SURVEYING
 9188 SOUTH STATE STREET SUITE #100
 SANDY, UTAH 84070 (801) 542-7192
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WINSTON PARK
 3701 W 1800 S
 WEBER COUNTY, UTAH

PROJECT NO. 2006142
SEWER PLAN & PROFILE
 CPP.07
 15OF 24

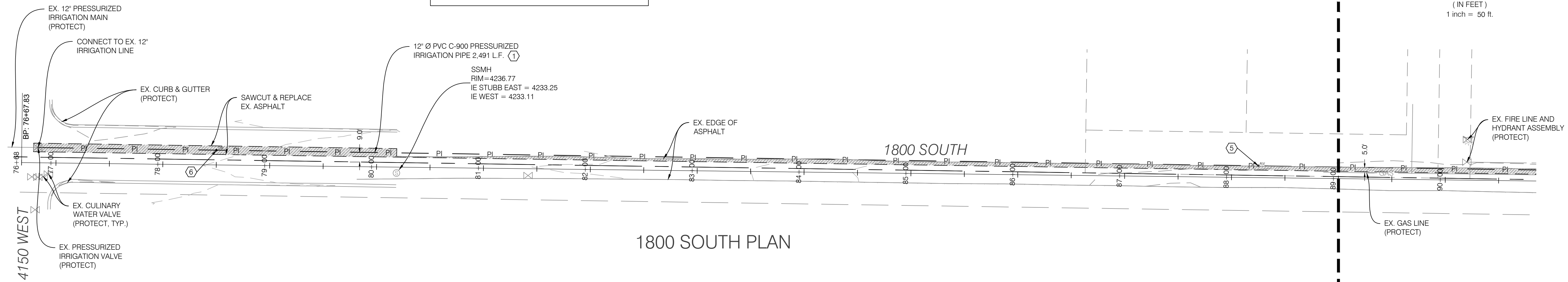
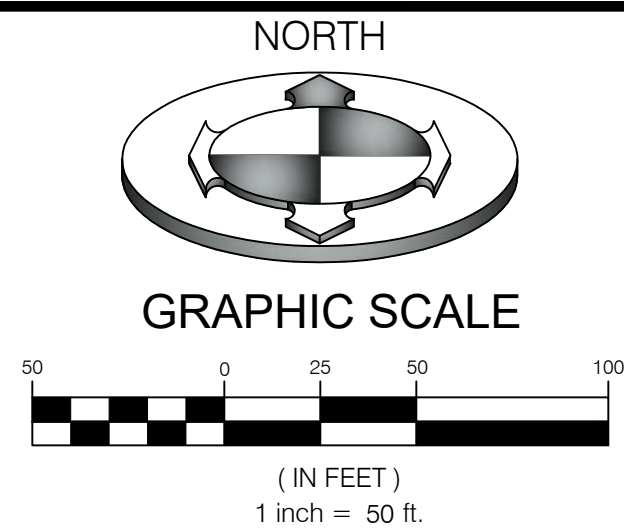


NOTE:
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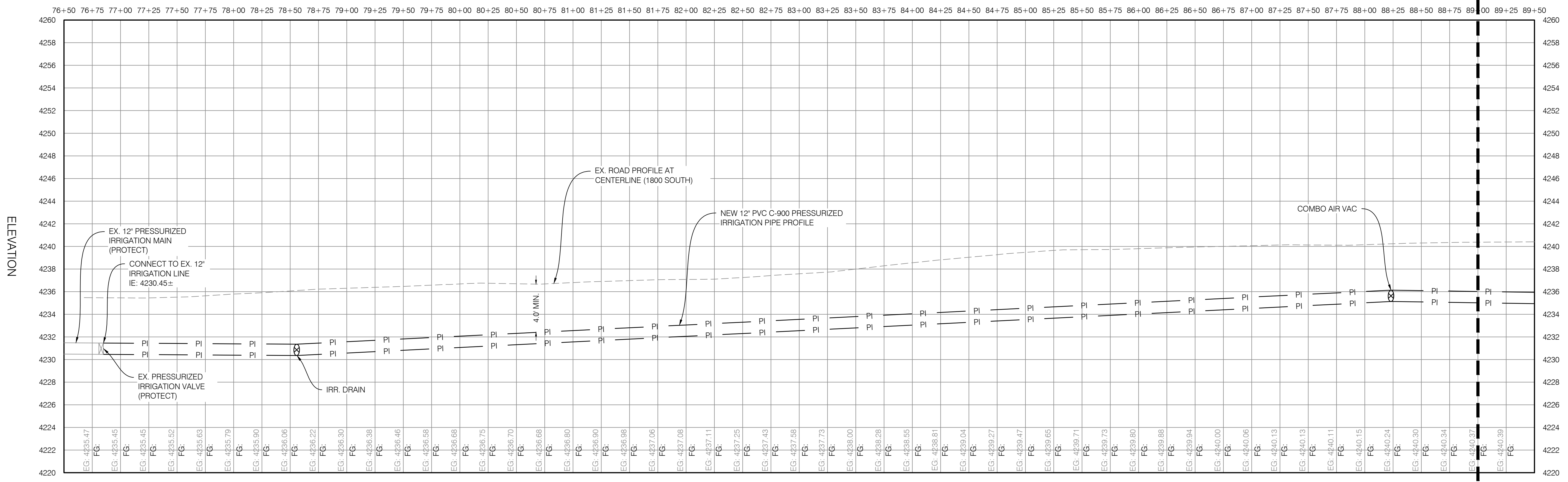
NOTE:
POTHOLE TO IDENTIFY ANY CONFLICTS BEFORE ANY PIPE INSTALLATION. CONTACT ENGINEER IF ANY CONFLICTS ARE IDENTIFIED.

NOTE:
CONSTRUCTION OF THE PRESSURIZED IRRIGATION SHALL BE IN ACCORDANCE WITH HOOPER IRRIGATION STANDARDS.

CONSTRUCTION KEY NOTE REFERENCE		
NO.	DESCRIPTION	DETAIL
①	12" PVC C-900 PRESSURIZED IRRIGATION PIPE PER HOOPER IRRIGATION STDS.	3/CDT.02
②	8" PVC C-900 PRESSURIZED IRRIGATION PIPE PER HOOPER IRRIGATION STDS.	3/CDT.02
③	THRUST BLOCK PER HOOPER IRRIGATION STDS.	2/CDT.02
④	GATE VALVE PER HOOPER IRRIGATION STDS.	6/CDT.02
⑤	COMBO AIR VAC PER HOOPER IRRIGATION STDS.	1/CDT.02
⑥	IRRIGATION DRAIN	4/CDT.04

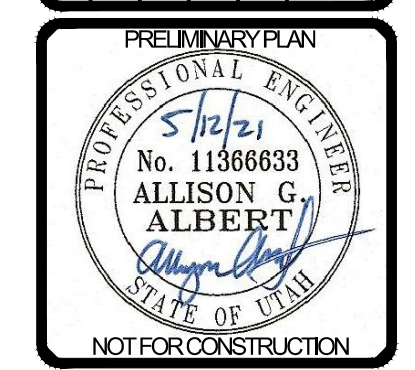


1800 SOUTH PLAN



1800 SOUTH PROFILE

NO.	DATE	DESCRIPTION
1	03/20/21	REVISED PER COUNTY, WATER & IRRIGATION COMMENTS
2	05/21/21	REVISED PER COUNTY, WATER & IRRIGATION COMMENTS
3	03/12/2021	



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PROJECT NO. 2006142
IRRIGATION PLAN & PROFILE
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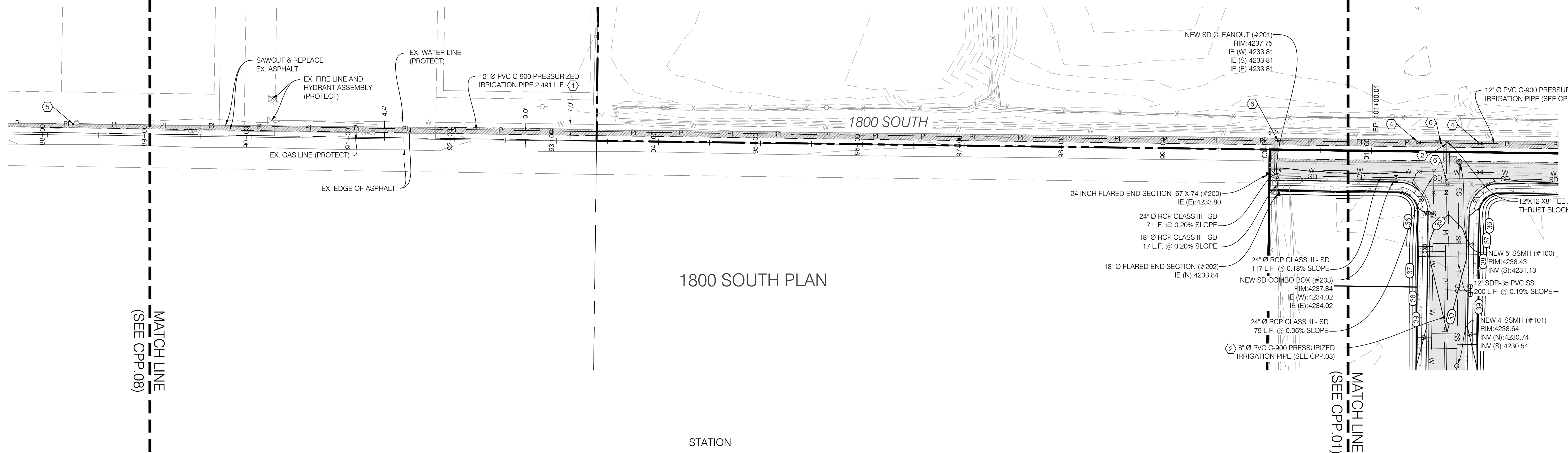
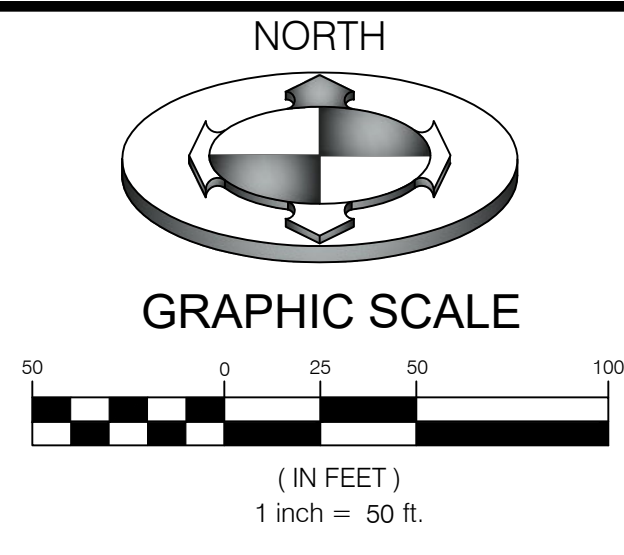


CONSTRUCTION KEY NOTE REFERENCE		
NO.	DESCRIPTION	DETAIL
①	12" PVC C-900 PRESSURIZED IRRIGATION PIPE PER HOOPER IRRIGATION STDS.	3/CDT.02
②	8" PVC C-900 PRESSURIZED IRRIGATION PIPE PER HOOPER IRRIGATION STDS.	3/CDT.02
③	THRUST BLOCK PER HOOPER IRRIGATION STDS.	2/CDT.02
④	GATE VALVE PER HOOPER IRRIGATION STDS.	6/CDT.02
⑤	COMBO AIR VAC PER HOOPER IRRIGATION STDS.	1/CDT.02
⑥	IRRIGATION DRAIN	4/CDT.04

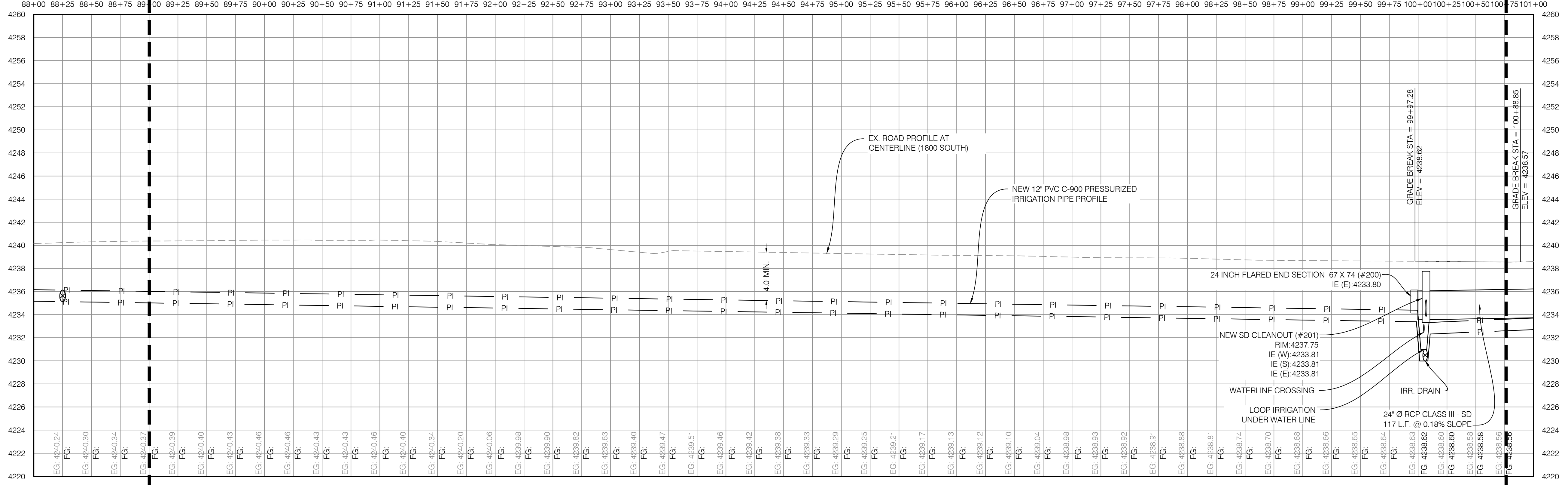
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NOTE:
POTHOLE TO IDENTIFY ANY CONFLICTS BEFORE ANY PIPE INSTALLATION. CONTACT ENGINEER IF ANY CONFLICTS ARE IDENTIFIED.

NOTE:
CONSTRUCTION OF THE PRESSURIZED IRRIGATION SHALL BE IN ACCORDANCE WITH HOOPER IRRIGATION STANDARDS.



1800 SOUTH PLAN



1800 SOUTH PROFILE

NO.	DATE	DESCRIPTION
1	03/20/21	REVISED PER COUNTY WATER & IRRIGATION COMMENTS
2	05/12/21	REVISED PER COUNTY WATER & IRRIGATION COMMENTS
3	03/12/2021	ISSUED FOR PERMIT

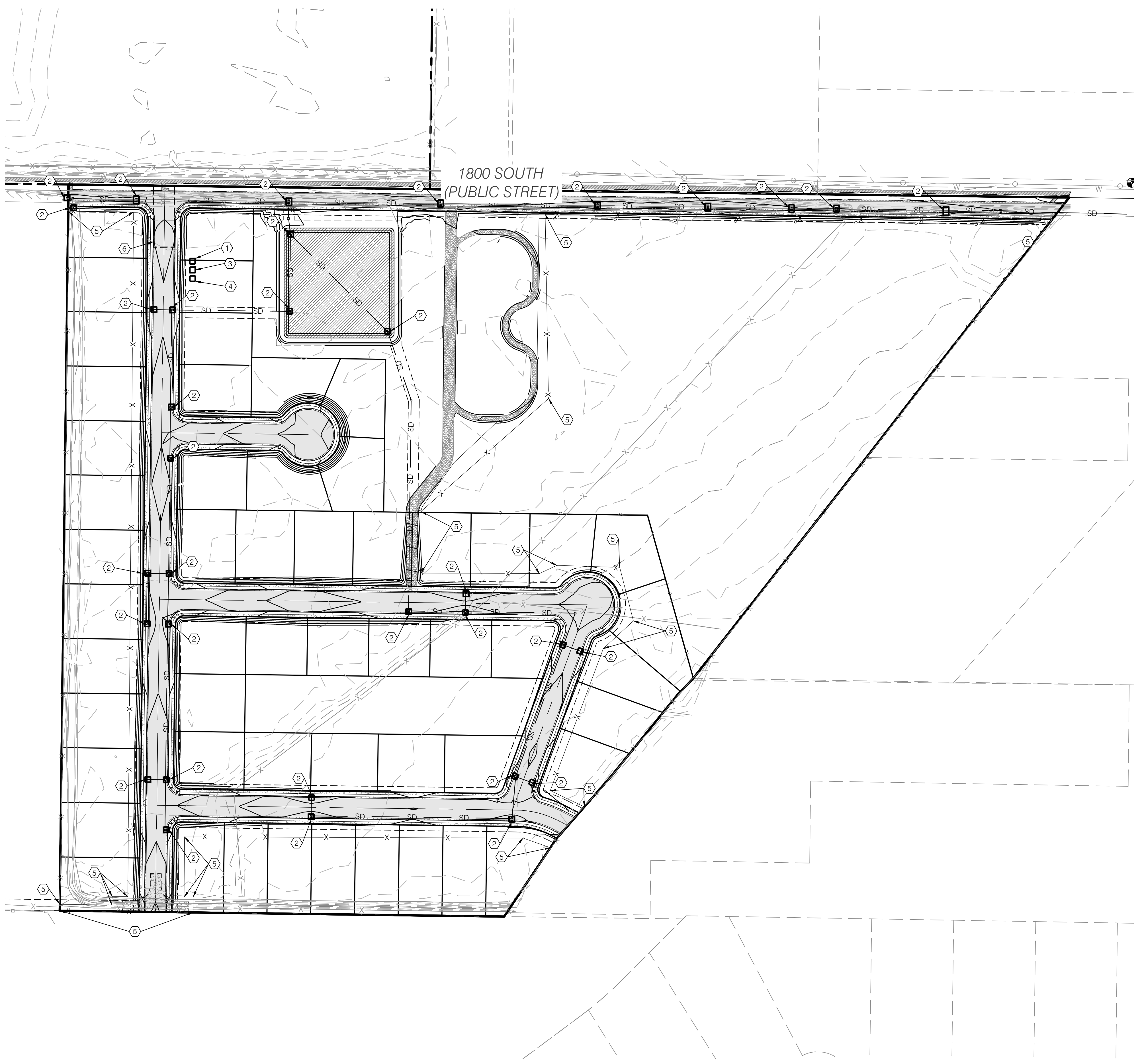
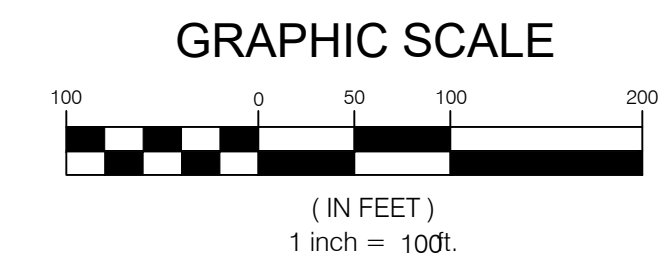
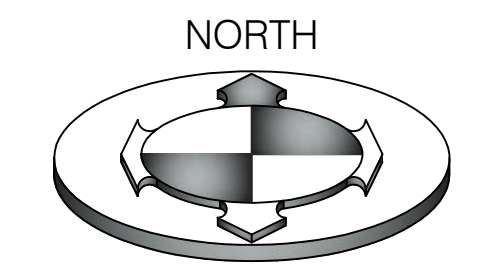
PROFESSIONAL ENGINEER
No. 11566833
ALLISON G. ALBERT
STATE OF UTAH
NOT FOR CONSTRUCTION

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WINSTON PARK
3701 W 1800 S
WEBER COUNTY, UTAH

PROJECT NO. 2006142
IRRIGATION PLAN & PROFILE
CPP.09
17 OF 24

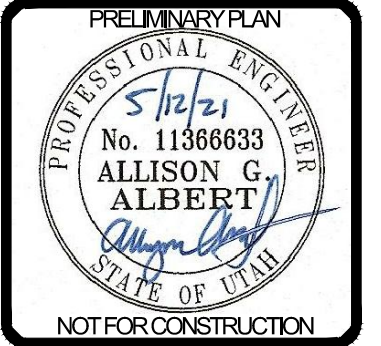




SWPPP KEY NOTES REFERENCE		
PROVIDE, INSTALL AND/OR CONSTRUCT THE FOLLOWING PER THE SPECIFICATIONS GIVEN OR REFERENCED AND THE DETAILS NOTED AND AS SHOWN ON THE CONSTRUCTION DRAWINGS.		
NO	DESCRIPTION	DETAIL
①	CONCRETE WASTE MANAGEMENT	1/CEP.02
②	INLET PROTECTION WATTLE	2/CEP.02
③	MATERIALS STORAGE	3/CEP.02
④	PORTABLE TOILETS	4/CEP.02
⑤	SILT FENCE	6/CEP.02
⑥	TEMPORARY CONSTRUCTION ENTRANCE	7/CEP.02

NOTE: CONTRACTOR SHALL INSTALL EROSION CONTROLS (SILT FENCES, STRAW BALES, ETC) AS REQUIRED BY REGULATORY AGENCIES. SAID CONTROLS SHALL BE INSTALLED IN ACCORDANCE WITH AGENCY STANDARDS AND FOLLOWING BEST MANAGEMENT PRACTICES FOR ACTUAL PLACEMENT ON SITE. STRAW BALES SHOWN ON THESE DRAWINGS ARE INTENDED AS A MINIMUM REQUIREMENT. ADDITIONAL CONTROLS REQUESTED BY AGENCY INSPECTORS SHALL BE REQUIRED. DUST CONTROL SHALL BE PROVIDED AT ALL TIMES, AT THE CONTRACTOR'S EXPENSE, TO MINIMIZE ANY DUST NUISANCE AND SHALL BE IN ACCORDANCE WITH THE REQUIREMENTS OF THE CITY.

NO	DATE	DESCRIPTION
1	02/20/21	REVISED PER COUNTY, WATER & IRRIGATION COMMENTS
2	05/10/21	REVISED PER COUNTY, WATER & IRRIGATION COMMENTS



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 WEBER COUNTY, UTAH

PROJECT NO. 2006142
EROSION CONTROL PLAN
 CEP.01
 18 OF 24



BMP: Concrete Waste Management

DESCRIPTION:
Prevent or reduce the discharge of pollutants to storm water from concrete waste by conducting washout off-site, performing on-site washout in a designated area, and training employees and subcontractors.

APPLICATIONS:
This technique is applicable to all types of sites.

INSTALLATION/APPLICATION CRITERIA:

- Store dry and wet materials under cover, away from drainage areas.
- Avoid mixing excess amounts of fresh concrete or cement on-site.
- Perform washout of concrete trucks off-site or in designated areas only.
- Do not wash out concrete trucks into storm drains, open ditches, streets, or streams.
- Do not allow excess concrete to be dumped on-site, except in designated areas.
- When washing concrete to remove fine particles and expose the aggregate, avoid creating runoff by draining the water within a bermed or level area. (See Earth Berm Barrier Information Sheet.)
- Train employees and subcontractors in proper concrete waste management.

LIMITATIONS:

- Off-site washout of concrete wastes may not always be possible.

MAINTENANCE:

- Inspect subcontractors to ensure that concrete wastes are being properly managed.
- If using a temporary pit, dispose hardened concrete on a regular basis.

BMP: Inlet Protection – Wattle

IP-W CONSTRUCTION

DESCRIPTION:
Sediment barrier erected around storm drain inlet.

APPLICATION:
Construct at storm drainage inlets located down-gradient of areas to be disturbed by construction.

INSTALLATION/APPLICATION CRITERIA:

- ◆ Provide up-gradient sediment controls, such as silt fence during construction of inlet
- ◆ When construction of curb and gutter and roadways is complete, install gravel filled wattles around perimeter of inlet

LIMITATIONS:

- ◆ Recommended maximum contributing drainage area of one acre
- ◆ Requires shallow slopes adjacent to inlet

MAINTENANCE:

- ◆ Inspect inlet protection following storm event and at a minimum of once every 14 days.
- ◆ Remove accumulated sediment when it reaches 4 inches in depth.
- ◆ Look for bypassing or undercutting and repair or realign as needed.

BMP: Materials Storage

DESCRIPTION:
Controlled storage of on-site materials.

APPLICATION:

- Storage of hazardous, toxic, and all chemical substances.
- Any construction site with outside storage of materials.

INSTALLATION/APPLICATION CRITERIA:

- Designate a secured area with limited access as the storage location. Ensure no waterways or drainage paths are nearby.
- Construct compacted earthen berm (See Earth Berm Barrier Information Sheet), or similar perimeter containment around storage location for impoundment in the case of spills.
- Ensure all on-site personnel utilize designated storage area. Do not store excessive amounts of material that will not be utilized on site.
- For active use of materials away from the storage area ensure materials are not set directly on the ground and are covered when not in use. Protect storm drainage during use.

LIMITATIONS:

- Does not prevent contamination due to mishandling of products.
- Spill Prevention and Response Plan still required.
- Only effective if materials are actively stored in controlled location.

MAINTENANCE:

- Inspect daily and repair any damage to perimeter impoundment or security fencing.
- Check materials are being correctly stored (i.e. standing upright, in labeled containers, lightly capped) and that no materials are being stored away from the designated location.

BMP: Portable Toilets

DESCRIPTION:
Temporary on-site sanitary facilities for construction personnel.

APPLICATION:
All sites with no permanent sanitary facilities or where permanent facility is too far from activities.

INSTALLATION/APPLICATION CRITERIA:

- Locate portable toilets in convenient locations throughout the site.
- Prepare level, gravel surface and provide clear access to the toilets for servicing and for on-site personnel.
- Construct earth berm perimeter (See Earth Berm Barrier Information Sheet) control for spill/protection leak.

LIMITATIONS:
No limitations.

MAINTENANCE:

- Portable toilets should be maintained in good working order by licensed service with daily observation for leak detection.
- Regular waste collection should be arranged with licensed service.
- All waste should be deposited in sanitary sewer system for treatment with appropriate agency approval.

BMP: Spill Clean-Up

DESCRIPTION:
Practices to clean-up leakage/spillage of on-site materials that may be harmful to receiving waters.

APPLICATION:
All sites

GENERAL:

- Store controlled materials within a storage area.
- Educate personnel on prevention and clean-up techniques.
- Designate an Emergency Coordinator responsible for employing preventative practices and for providing spill response.
- Maintain a supply of clean-up equipment on-site and post a list of local response agencies with phone numbers.

METHODS:

- Clean-up spills/leaks immediately and remediate cause.
- Use as little water as possible. NEVER HOSE DOWN OR BURY SPILL CONTAMINATED MATERIAL.
- Use rags or absorbent material for clean-up. Excavate contaminated soils.
- Dispose of clean-up material and soil as hazardous waste.
- Document all spills with date, location, substance, volume, actions taken and other pertinent data.
- Contact local Fire Department and State Division of Environmental Response and Remediation (Phone #536-4100) for any spill of reportable quantity.

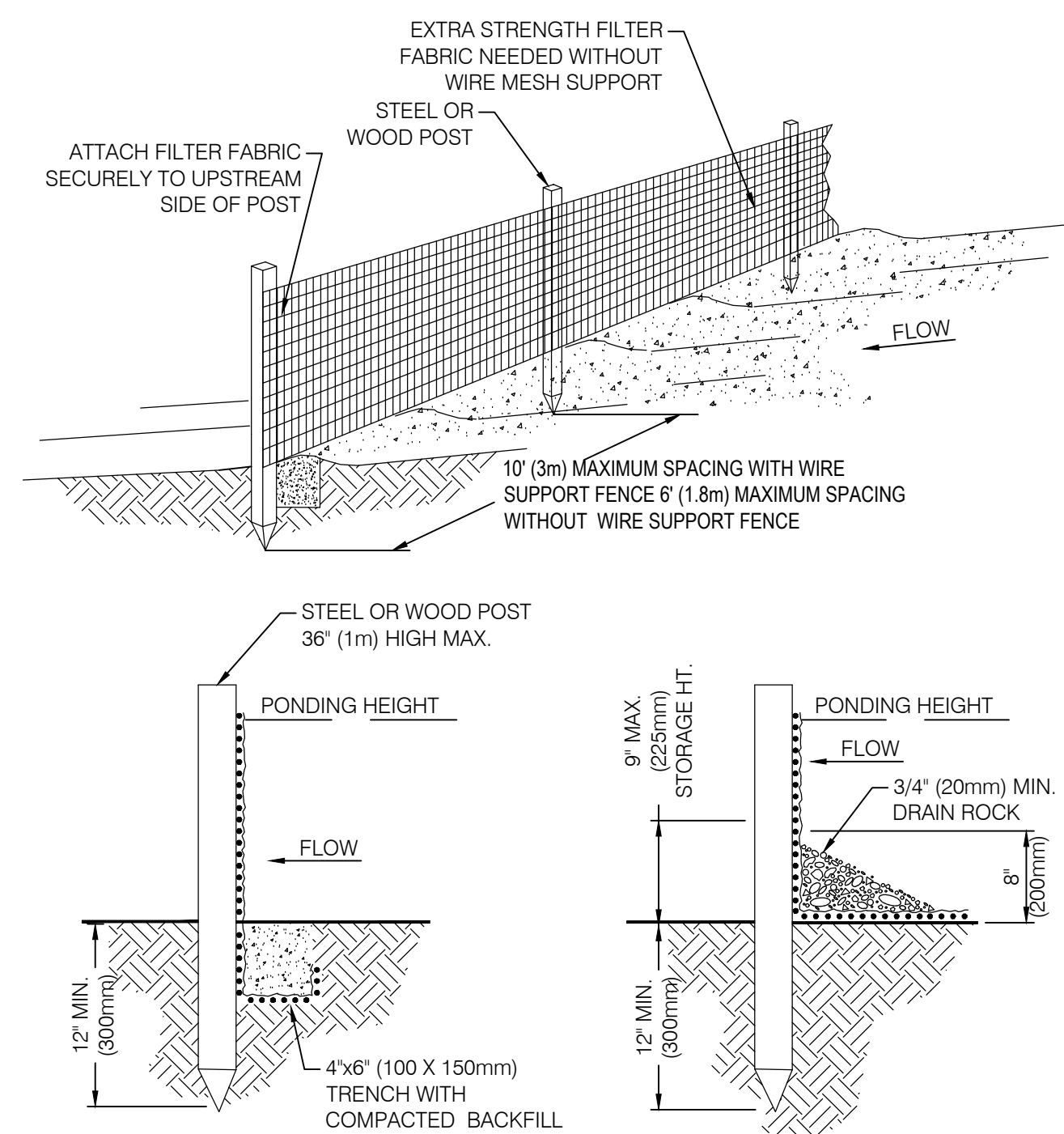
CONCRETE WASTE MANAGEMENT ①
SCALE: NTS

INLET PROTECTION WATTLE ②
SCALE: NTS

MATERIALS STORAGE ③
SCALE: NTS

PORTABLE TOILETS ④
SCALE: NTS

SPILL CLEAN UP ⑤
SCALE: NTS



TRENCH DETAIL

INSTALLATION WITHOUT TRENCHING

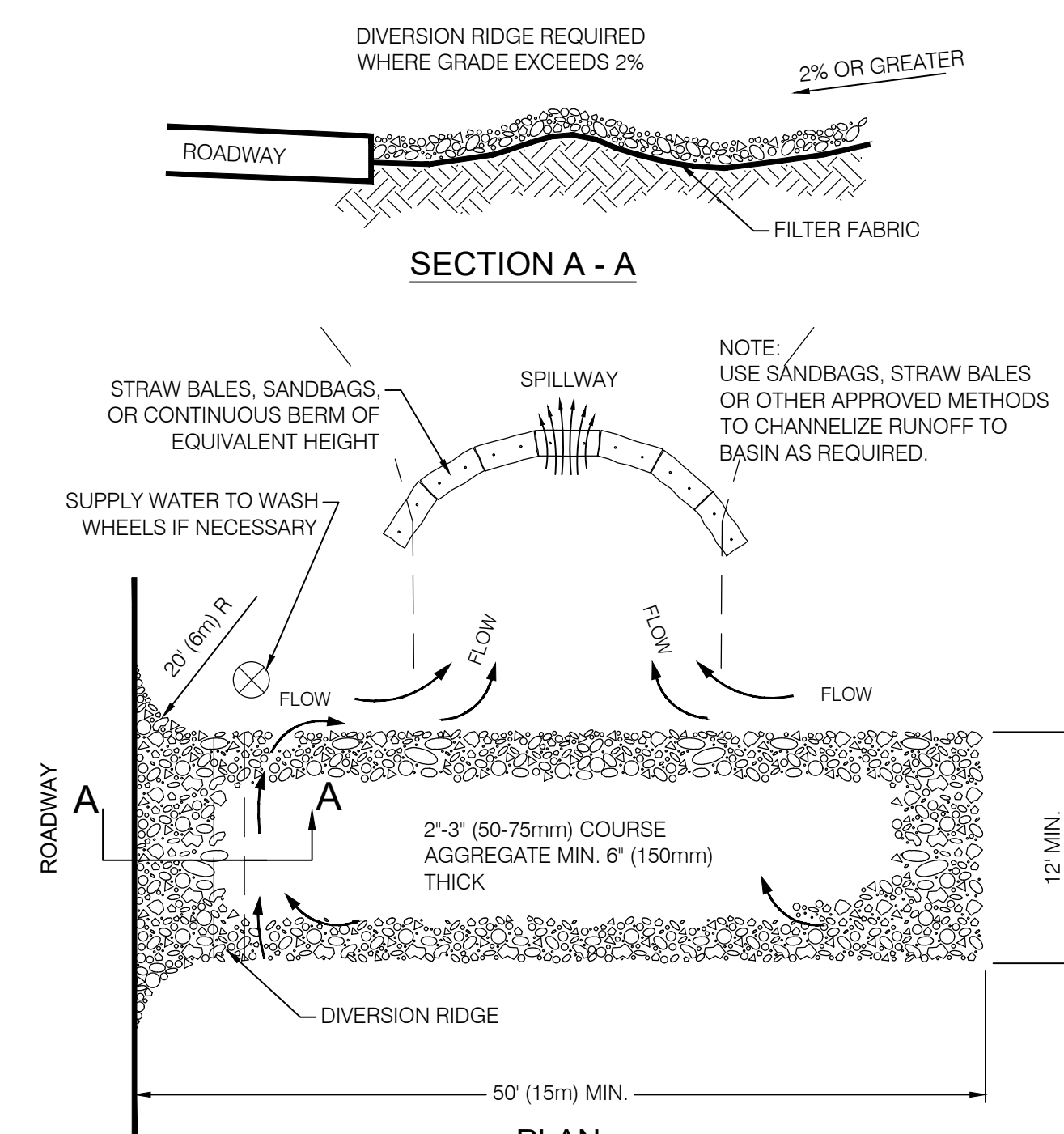
NOT TO SCALE

REF. FROM 1994 JOHN McCULLAH

NOTES:

1. SILT FENCE SHALL BE PLACED ON SLOPE CONTOURS TO MAXIMIZE PONDING EFFICIENCY.
2. INSPECT AND REPAIR FENCE AFTER EACH STORM EVENT AND REMOVE SEDIMENT WHEN NECESSARY. 9' (225mm) MAXIMUM RECOMMENDED STORAGE HEIGHT.
3. REMOVED SEDIMENT SHALL BE DEPOSITED TO AN AREA THAT WILL NOT CONTRIBUTE SEDIMENT OFF-SITE AND CAN BE PERMANENTLY STABILIZED.

SILT FENCE ⑥
SCALE: NTS



SECTION A - A

PLAN

REF. FROM 1994 JOHN McCULLAH

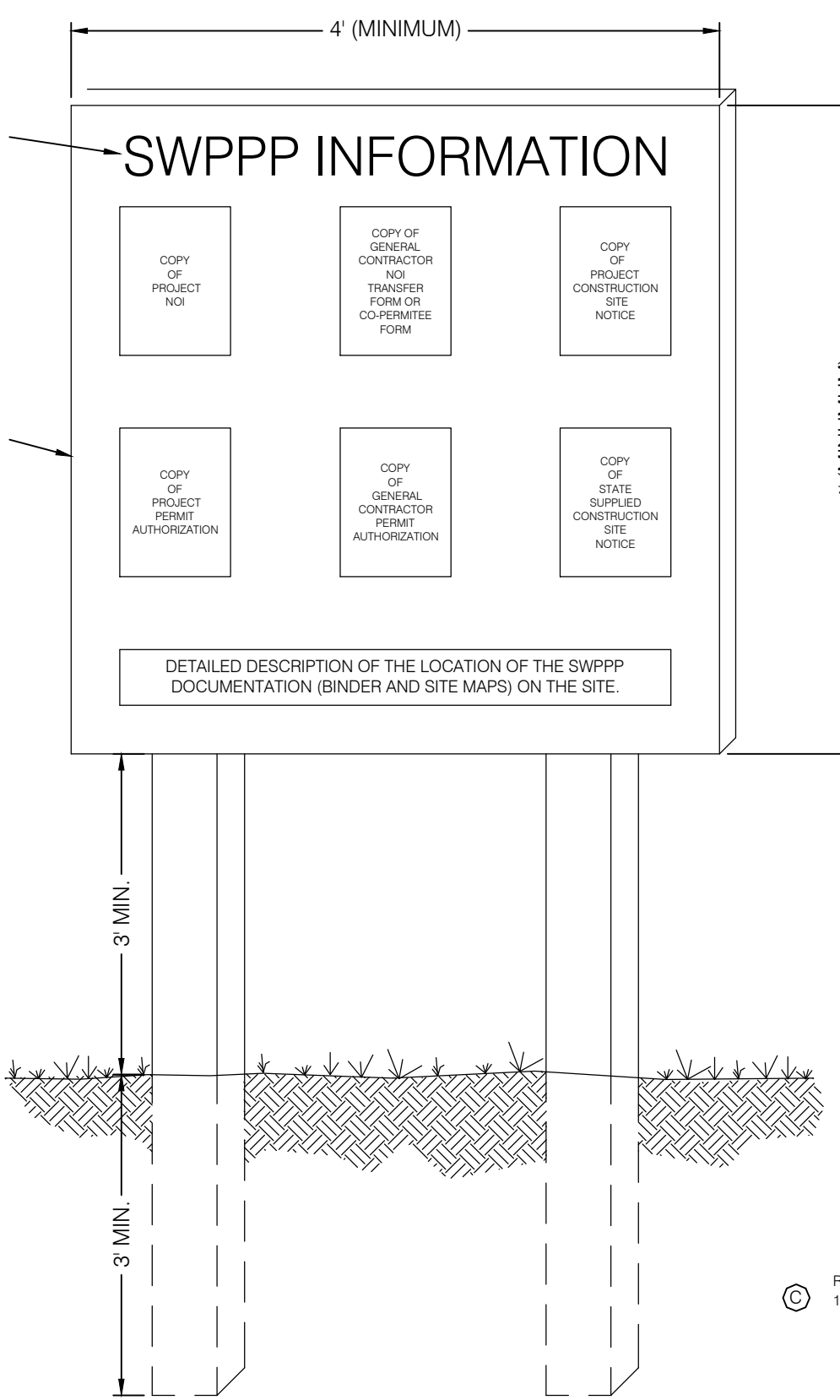
NOTES:

1. THE ENTRANCE SHALL BE MAINTAINED IN A CONDITION THAT WILL PREVENT TRACKING OR FLOWING OF SEDIMENT ONTO PUBLIC RIGHT-OF-WAYS. THIS MAY REQUIRE TOP DRESSING, REPAIR AND/OR CLEAN OUT OF ANY MEASURES USED TO TRAP SEDIMENT.
2. WHEN NECESSARY, WHEELS SHALL BE CLEANED PRIOR TO ENTRANCE ONTO PUBLIC RIGHT-OF-WAY.
3. WHEN WASHING IS REQUIRED, IT SHALL BE DONE ON AN AREA STABILIZED WITH CRUSHED STONE THAT DRAINS INTO AN APPROVED SEDIMENT TRAP OR SEDIMENT BASIN.

TEMPORARY GRAVEL CONSTRUCTION ENTRANCE/EXIT ⑦
SCALE: NTS

"SWPPP INFORMATION" MUST BE DISPLAYED PROMINENTLY ACROSS THE TOP OF THE SIGN, AS SHOWN IN THE DETAIL.

SIGN TO BE CONSTRUCTED OF A RIGID MATERIAL, SUCH AS PLYWOOD OR OUTDOOR SIGN BOARD. SIGN MUST BE CONSTRUCTED IN A MANNER TO PROTECT DOCUMENTS FROM DAMAGE DUE TO WEATHER (WIND, SUN, MOISTURE, ETC.)



NOTES:

- 1) THE SWPPP INFORMATION SIGN MUST BE LOCATED NEAR THE CONSTRUCTION EXIT OF THE SITE, SUCH THAT IT IS ACCESSIBLE AND VIEWABLE BY THE GENERAL PUBLIC, BUT NOT OBSTRUCTING VIEWS AS TO CAUSE A SAFETY HAZARD.
- 2) ALL POSTED DOCUMENTS MUST BE MAINTAINED IN A CLEARLY READABLE CONDITION AT ALL TIMES THROUGHOUT CONSTRUCTION AND UNTIL THE NOTICE-TERMINATION (NOT) IS FILED FOR THE PERMIT.
- 3) CONTRACTOR SHALL POST OTHER STORM WATER AND/OR EROSION AND SEDIMENT CONTROL RELATED PERMITS ON THE SIGN AS REQUIRED BY THE GOVERNING AGENCY.
- 4) SIGN SHALL BE LOCATED OUTSIDE OF PUBLIC RIGHT-OF-WAY AND EASEMENTS UNLESS APPROVED BY THE GOVERNING AGENCY.
- 5) CONTRACTOR IS RESPONSIBLE FOR ENSURING STABILITY IF THE SWPPP INFORMATION SIGN.

REF. FROM 1994 JOHN McCULLAH

SWPPP INFORMATION SIGN ⑧
SCALE: NTS

NO.	DATE	DESCRIPTION
1	10/20/21	REVISED PER COUNTY, WATER & IRRIGATION COMMENTS
2	05/02/21	REVISED PER COUNTY, WATER & IRRIGATION COMMENTS

SCALE: MEASURES SHOWN ON FULL SIZE SHEETS
ADJUST ACCORDINGLY FOR REDUCED SIZE SHEETS

PROFESSIONAL ENGINEER
No. 11366833
ALLISON G. ALBERT
STATE OF UTAH
NOT FOR CONSTRUCTION

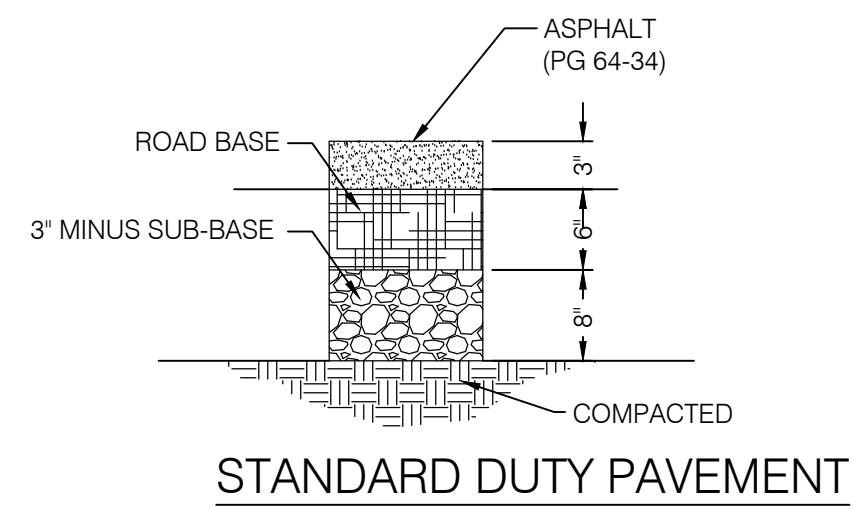
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WINSTON PARK
3701 W 1800 S
WEBER COUNTY, UTAH

PROJECT NO. 2006142
EROSION CONTROL DETAILS
CEP.02
19 OF 24



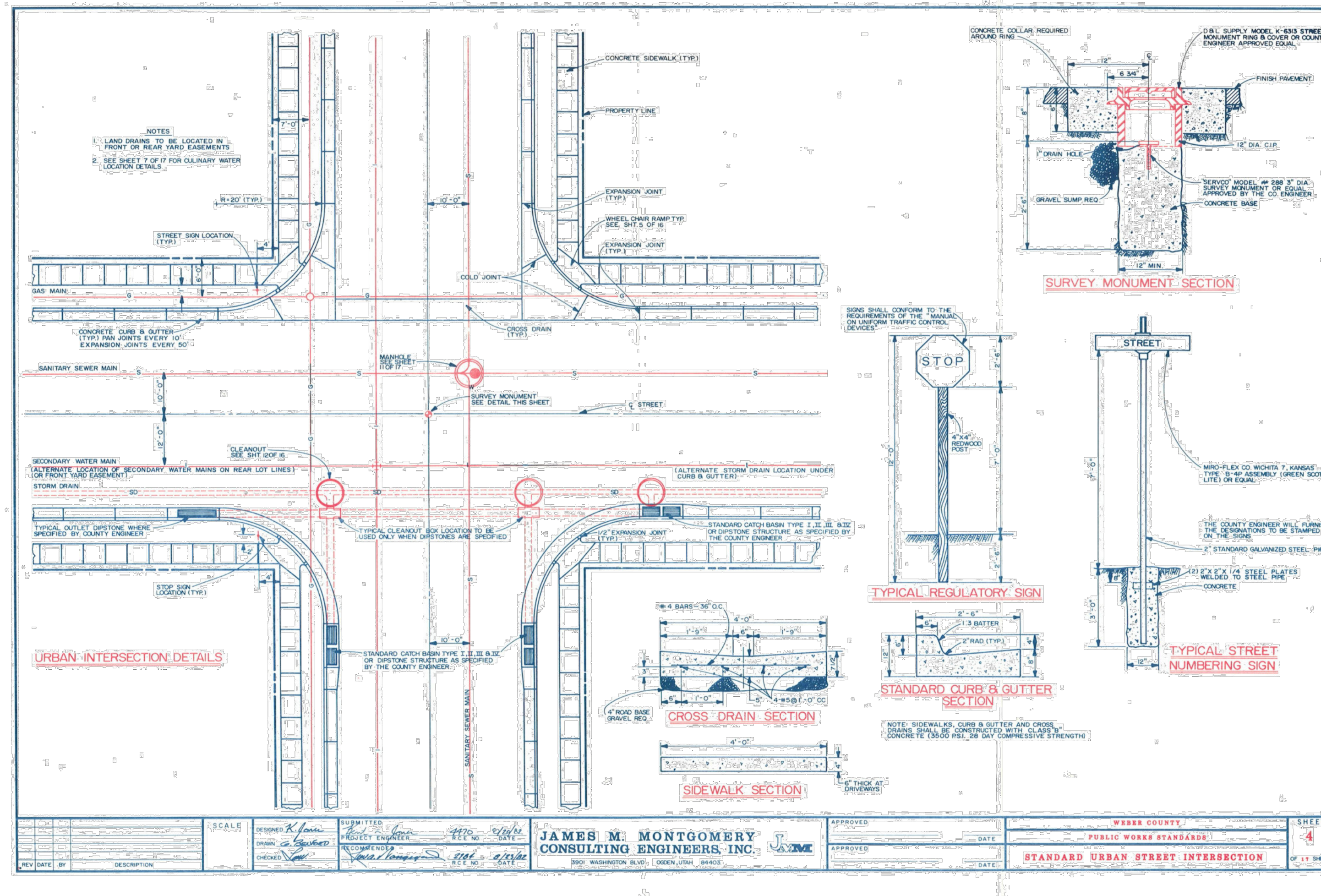
ALTERNATE: STANDARD
 CONCRETE 5"
 GRAVEL BASE 4"
 GRAVEL BASE 8"



NOTE:
 1. FOR REINFORCEMENT DESIGN OF PCC PAVEMENT SECTIONS SEE STRUCTURAL ENGINEER
 2. FOR DOWEL DESIGN OF PCC PAVEMENT SECTIONS SEE GEOTECHNICAL ENGINEER
 3. REFER TO GEOTECHNICAL REPORT #1160708 PREPARED BY AGEC ON OCTOBER 12, 2016 FOR PAVEMENT DESIGN. DEFER TO GEOTECHNICAL REPORT OR COUNTY STANDARDS, WHICHEVER IS MORE CONSERVATIVE.
 4. COMPACTION TESTING REQUIRED FOR BOTH ROAD BASE AND SUB BASE PER WEBER COUNTY STANDARDS.

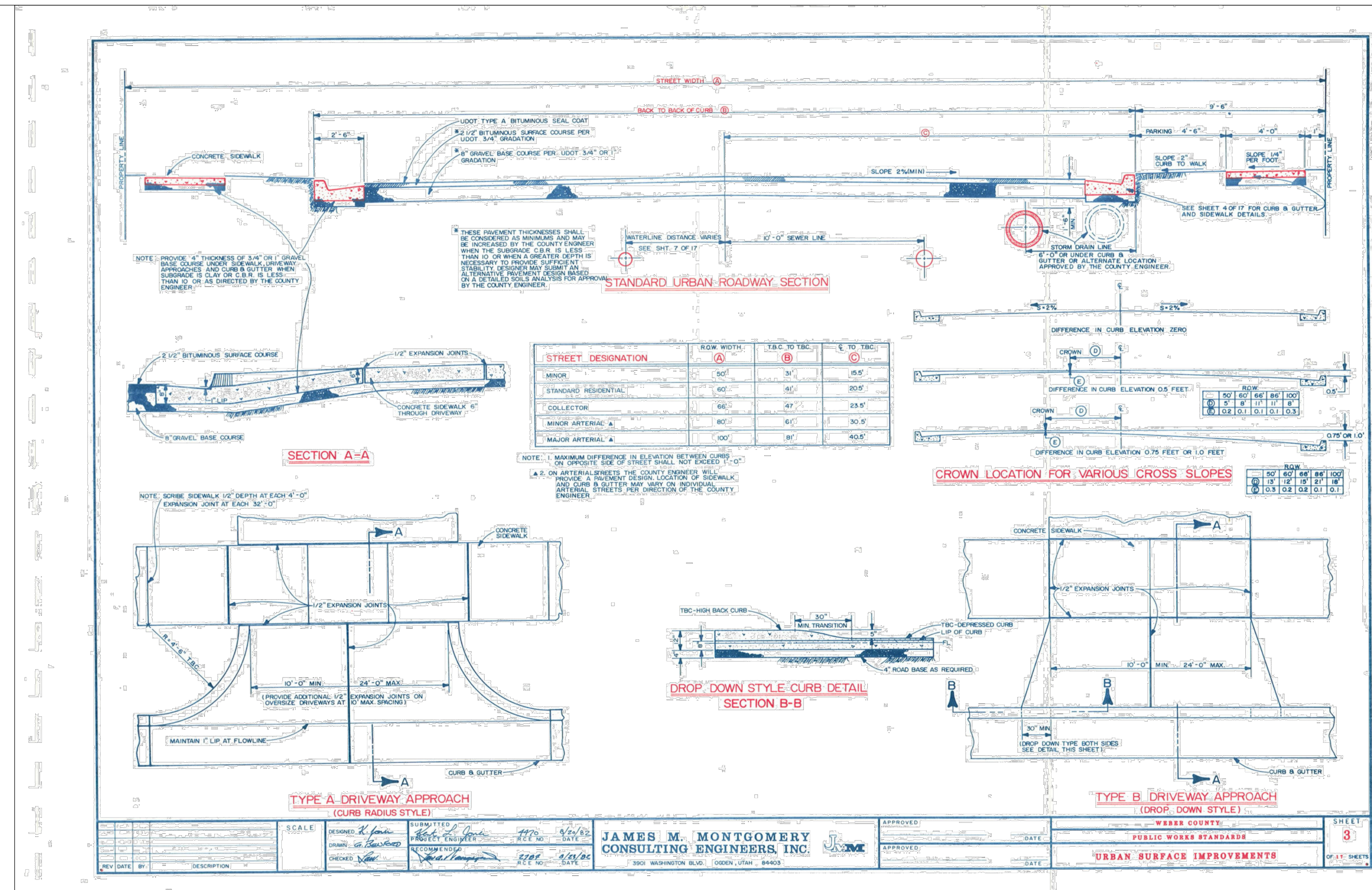
PAVEMENT SECTIONS 1

SCALE: N.T.S.



WEBER COUNTY INTERSECTION DETAILS 2

SCALE: N.T.S.



WEBER COUNTY SURFACE IMPROVEMENTS DETAILS 3

SCALE: N.T.S.

No.	DATE	DESCRIPTION
1	03/21/21	REVISED PER COUNTY, WATER & IRRIGATION COMMENTS
2	05/12/21	REVISED PER COUNTY, WATER & IRRIGATION COMMENTS

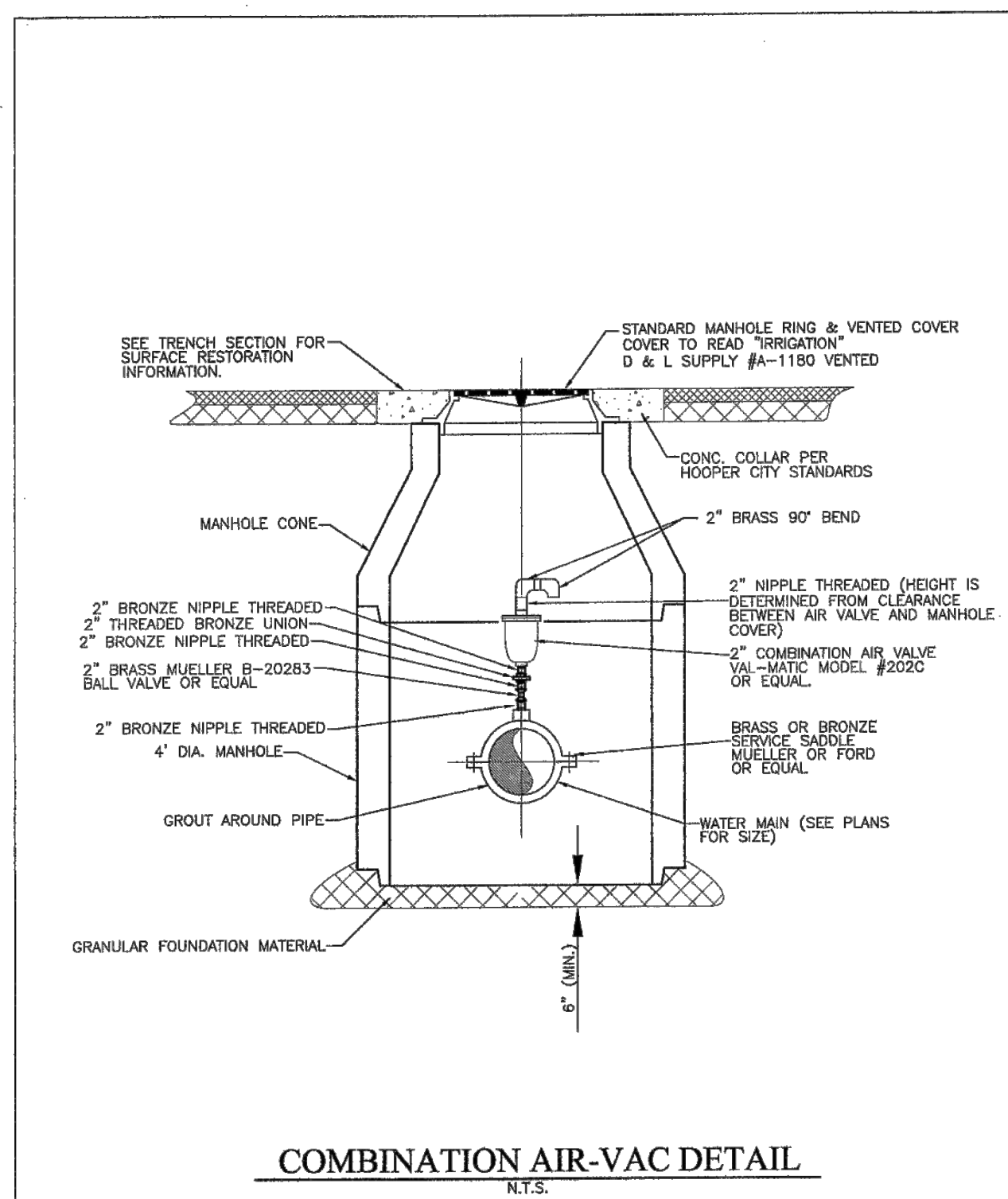
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BENCHMARK CIVIL

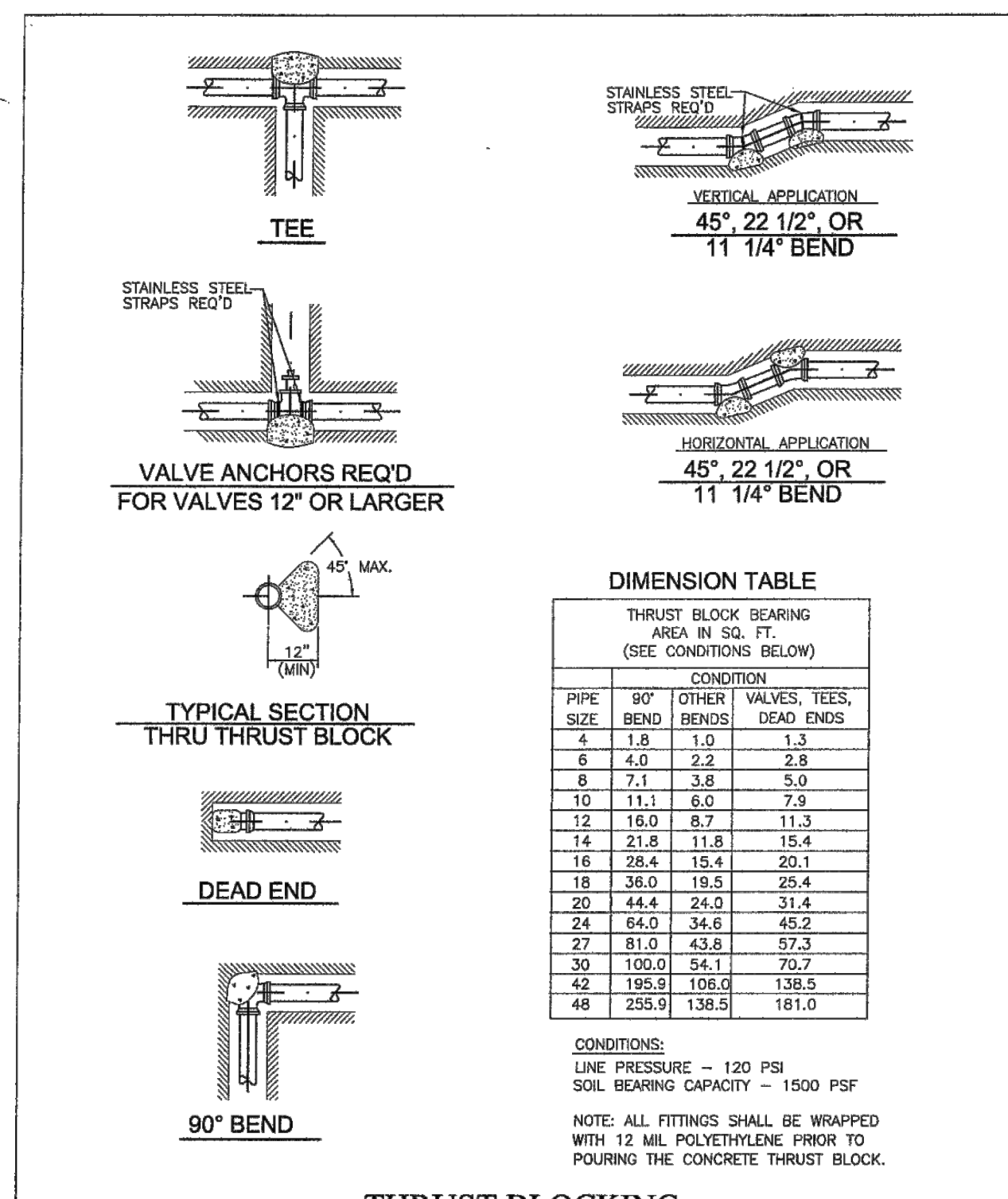
WINSTON PARK
 3701 W 1800 S
 WEBER COUNTY, UTAH

PROJECT NO. 2006142
 DETAILS & NOTES SHEET
 CDT.01 20 OF 24



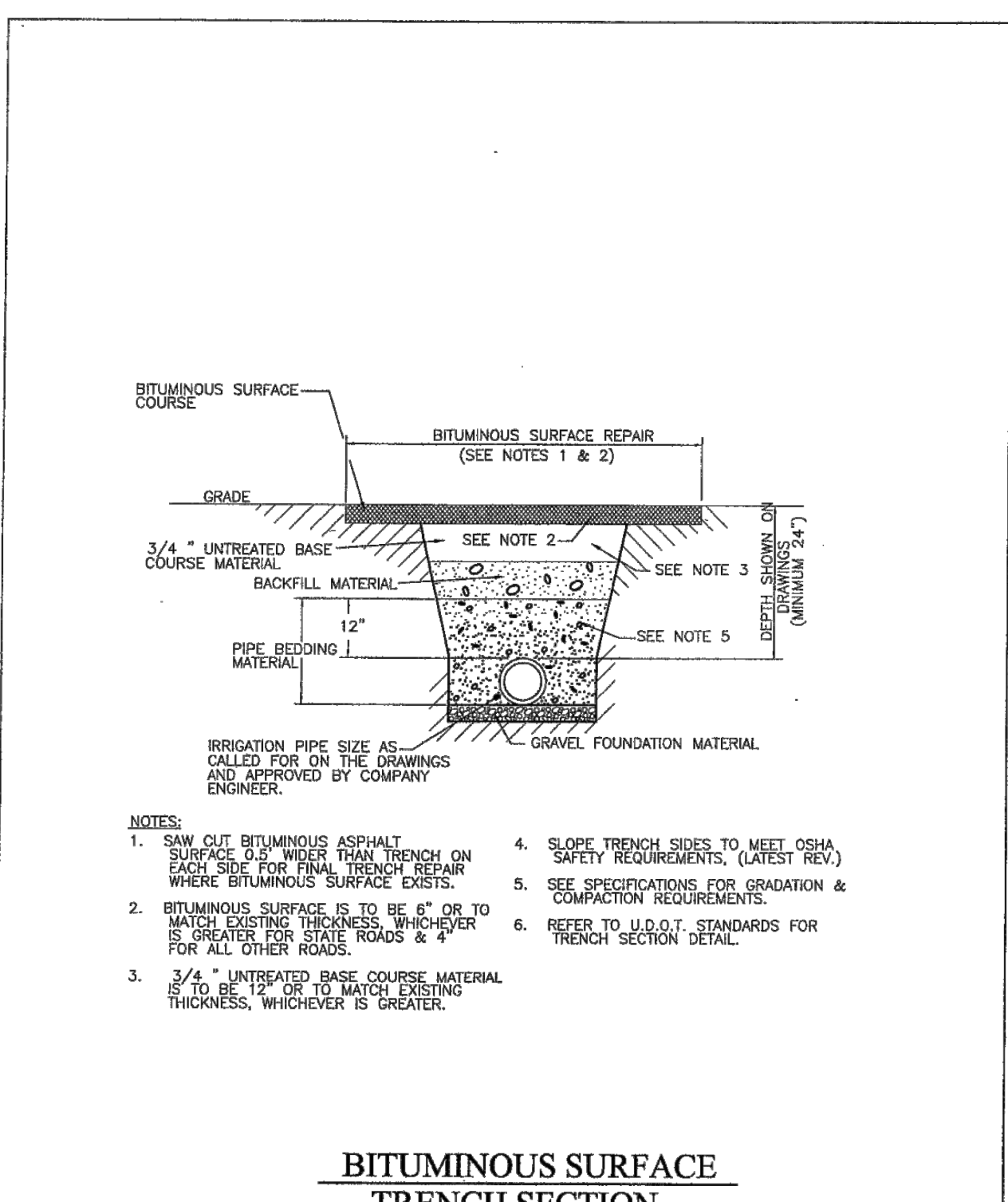
RELEASE OF LIABILITY THE DESIGNER, CONTRACTOR, AND/OR SUB CONTRACTOR SHALL BE RESPONSIBLE FOR THE ACCURACY OF THE INFORMATION PROVIDED TO THE USER OF THIS DRAWING. THE USER OF THIS DRAWING SHALL BE RESPONSIBLE FOR THE ACCURACY OF THE INFORMATION PROVIDED TO THE USER OF THIS DRAWING. THE USER OF THIS DRAWING SHALL BE RESPONSIBLE FOR THE ACCURACY OF THE INFORMATION PROVIDED TO THE USER OF THIS DRAWING.	JUB Hooper Irrigation Company Pressure Irrigation Standards COMBINATION AIR-VAC DETAIL	SHEET PI-1
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COMBINATION AIR-VAC DETAIL
HOOPER IRRIGATION STANDARDS ①
SCALE: N.T.S.



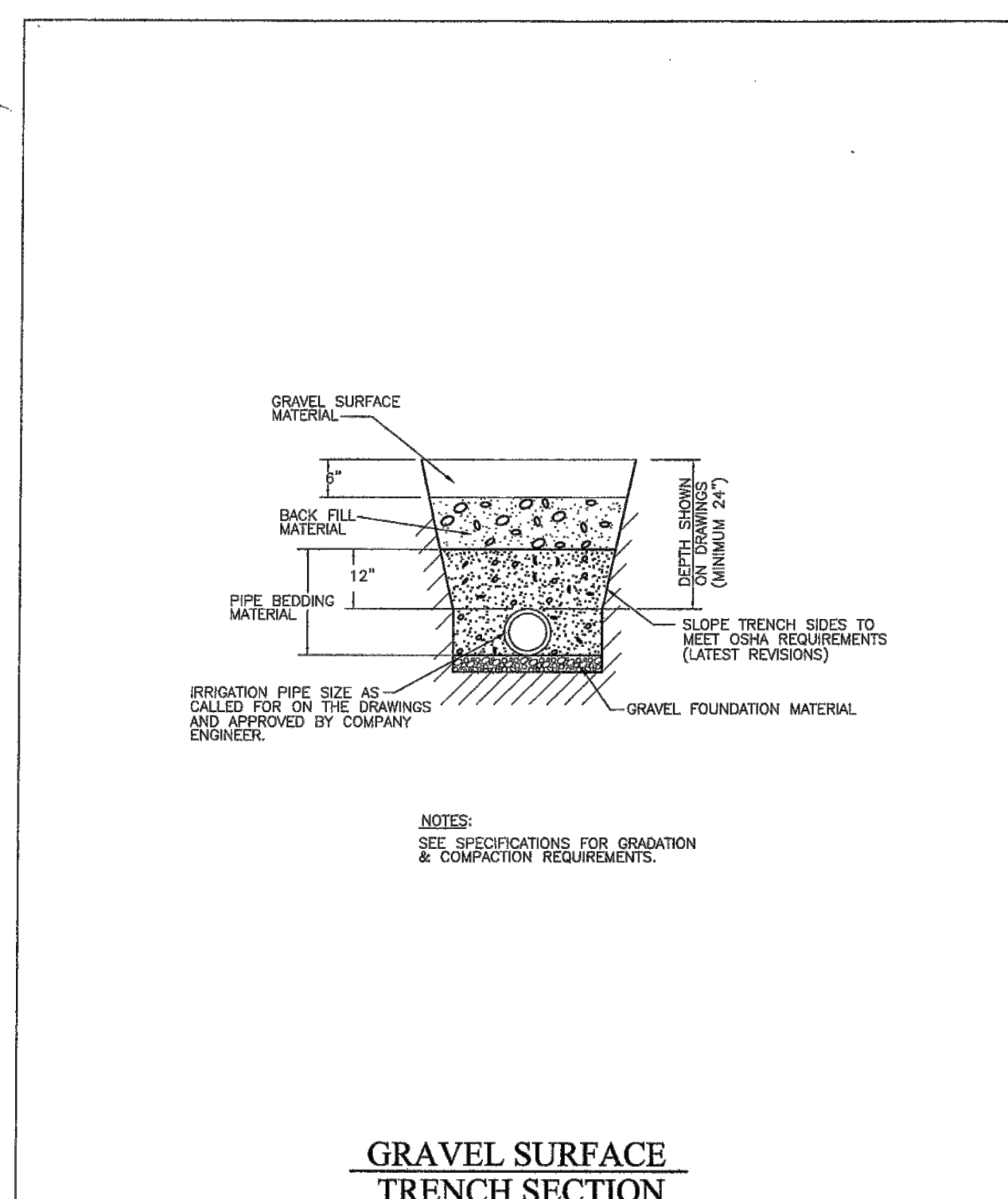
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THRUST BLOCKING DETAILS
HOOPER IRRIGATION STANDARDS ②
SCALE: N.T.S.



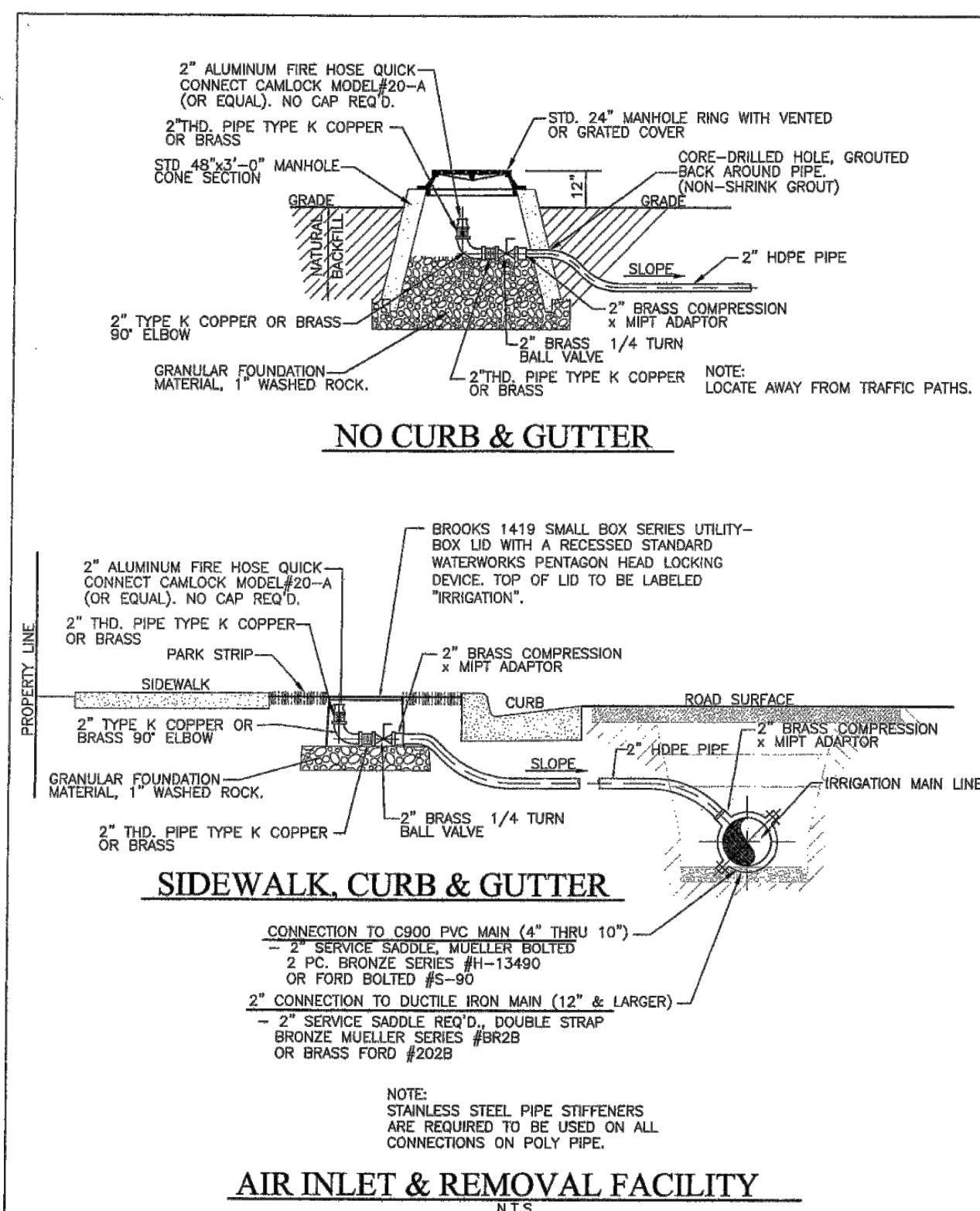
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TRENCH SECTIONS
HOOPER IRRIGATION STANDARDS ③
SCALE: N.T.S.



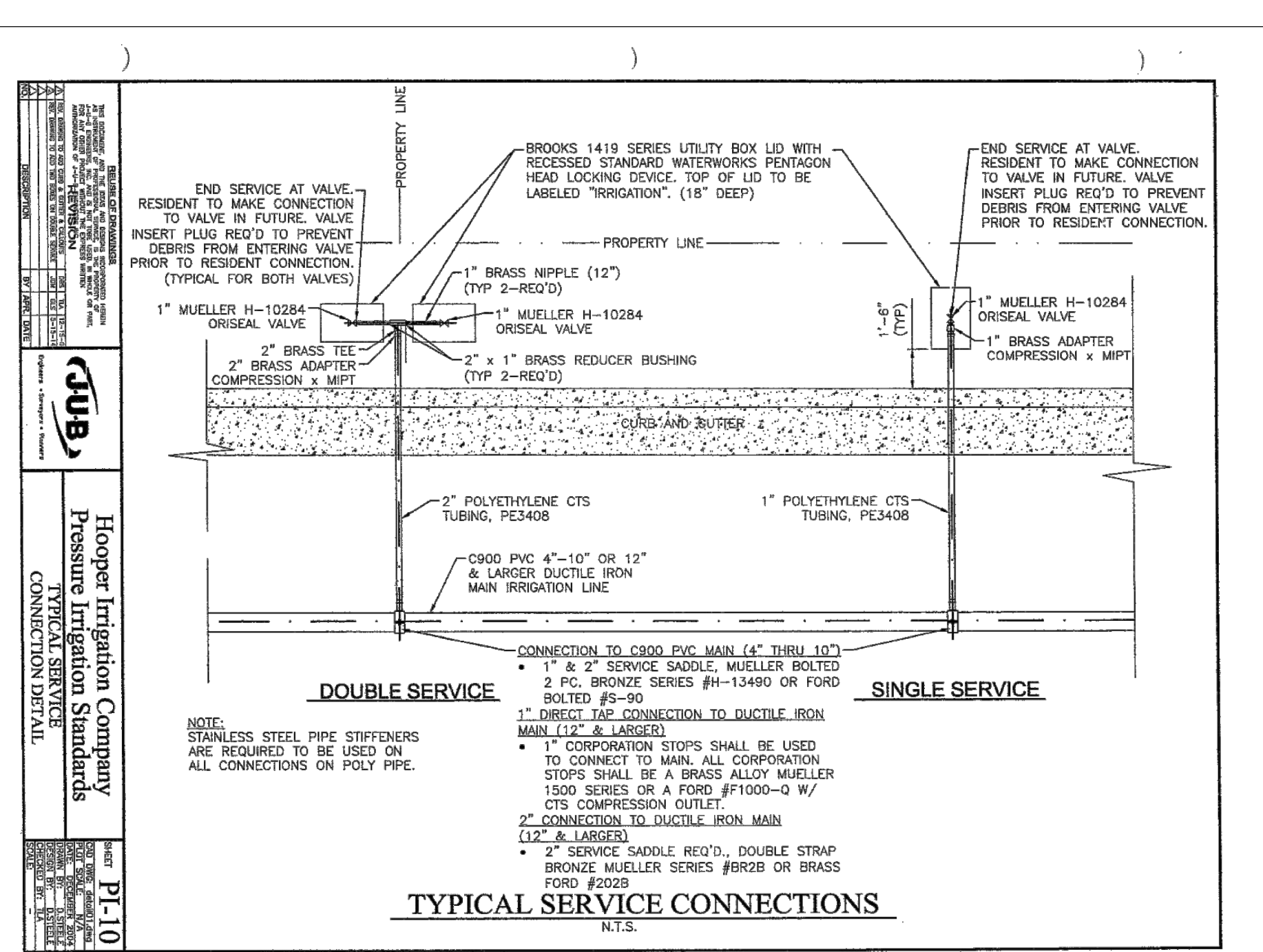
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GRAVEL SURFACE TRENCH SECTION
HOOPER IRRIGATION STANDARDS ④
SCALE: N.T.S.



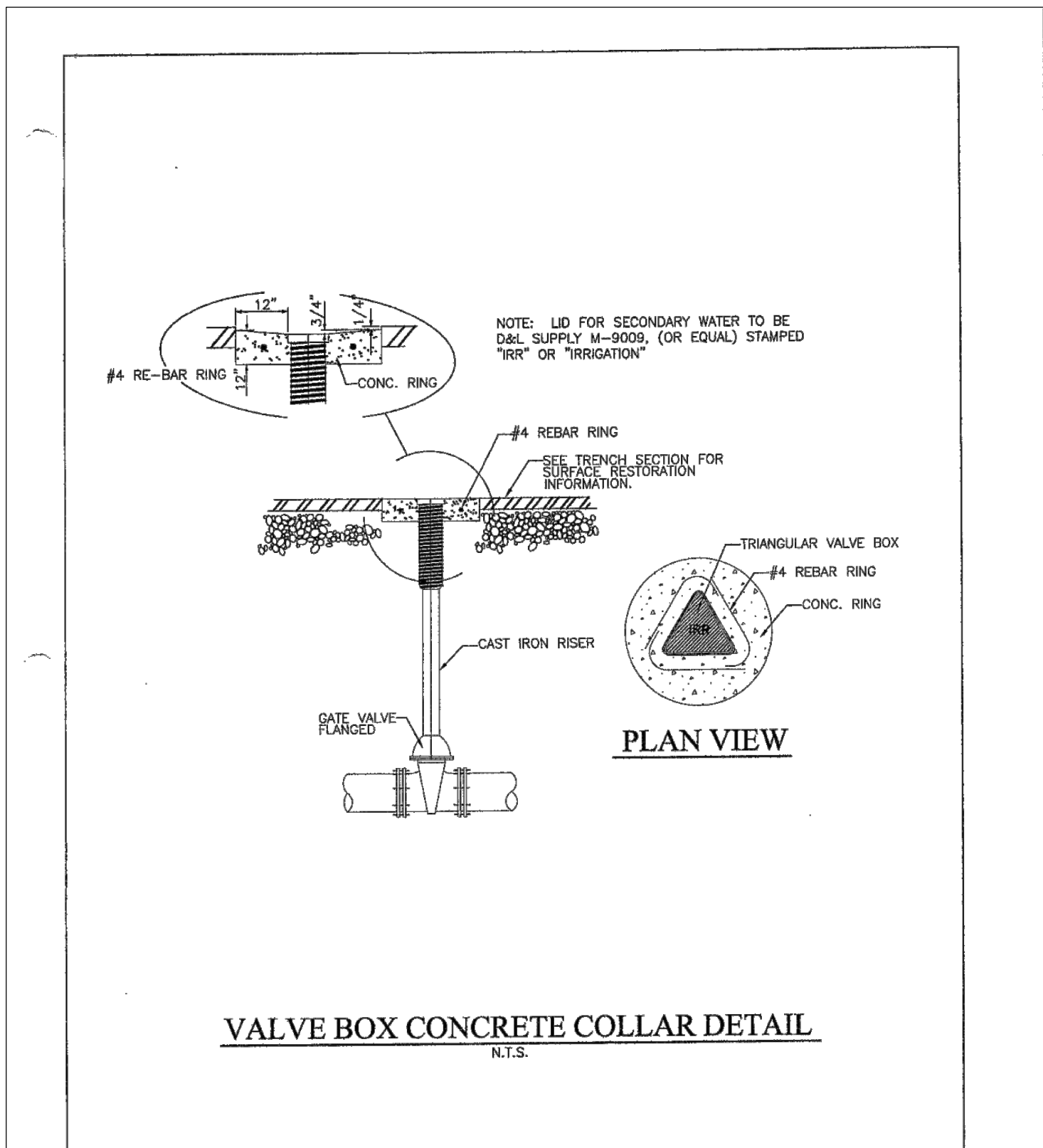
RELEASE OF LIABILITY THE DESIGNER, CONTRACTOR, AND/OR SUB CONTRACTOR SHALL BE RESPONSIBLE FOR THE ACCURACY OF THE INFORMATION PROVIDED TO THE USER OF THIS DRAWING. THE USER OF THIS DRAWING SHALL BE RESPONSIBLE FOR THE ACCURACY OF THE INFORMATION PROVIDED TO THE USER OF THIS DRAWING. THE USER OF THIS DRAWING SHALL BE RESPONSIBLE FOR THE ACCURACY OF THE INFORMATION PROVIDED TO THE USER OF THIS DRAWING.	JUB Hooper Irrigation Company Pressure Irrigation Standards AIR INLET & REMOVAL FACILITY	SHEET PI-5
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AIR INLET & REMOVAL FACILITY
HOOPER IRRIGATION STANDARD ④
SCALE: N.T.S.



RELEASE OF LIABILITY THE DESIGNER, CONTRACTOR, AND/OR SUB CONTRACTOR SHALL BE RESPONSIBLE FOR THE ACCURACY OF THE INFORMATION PROVIDED TO THE USER OF THIS DRAWING. THE USER OF THIS DRAWING SHALL BE RESPONSIBLE FOR THE ACCURACY OF THE INFORMATION PROVIDED TO THE USER OF THIS DRAWING. THE USER OF THIS DRAWING SHALL BE RESPONSIBLE FOR THE ACCURACY OF THE INFORMATION PROVIDED TO THE USER OF THIS DRAWING.	JUB Hooper Irrigation Company Pressure Irrigation Standards TYPICAL SERVICE CONNECTIONS	SHEET PI-10
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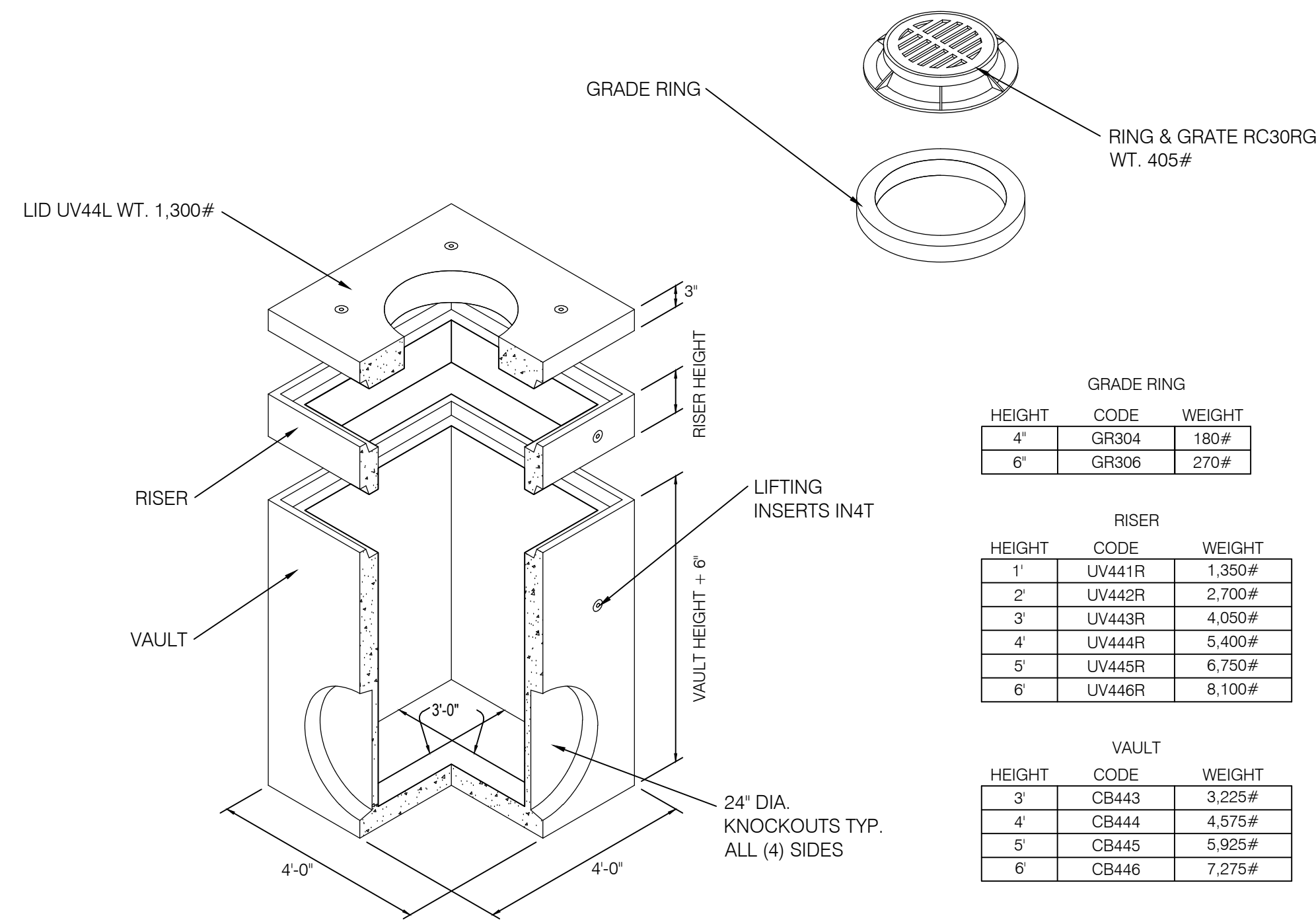
TYPICAL SERVICE CONNECTION DETAIL
HOOPER IRRIGATION STANDARDS ⑤
SCALE: N.T.S.



RELEASE OF LIABILITY THE DESIGNER, CONTRACTOR, AND/OR SUB CONTRACTOR SHALL BE RESPONSIBLE FOR THE ACCURACY OF THE INFORMATION PROVIDED TO THE USER OF THIS DRAWING. THE USER OF THIS DRAWING SHALL BE RESPONSIBLE FOR THE ACCURACY OF THE INFORMATION PROVIDED TO THE USER OF THIS DRAWING. THE USER OF THIS DRAWING SHALL BE RESPONSIBLE FOR THE ACCURACY OF THE INFORMATION PROVIDED TO THE USER OF THIS DRAWING.	JUB Hooper Irrigation Company Pressure Irrigation Standards VALVE BOX CONCRETE COLLAR	SHEET PI-2
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VALVE BOX CONCRETE COLLAR DETAIL
HOOPER IRRIGATION STANDARDS ⑥
SCALE: N.T.S.

PROJECT NO. 2006142	DATE 03/20/21	REVISIONS 1 03/20/21 REVISED PER COUNTY WATER & IRRIGATION COMMENTS 2 05/02/21 REVISED PER COUNTY WATER & IRRIGATION COMMENTS
DRAWN BY JHO	CHECKED BY AGA	FIELD/COORDINATOR SURVEY
DATE 03/12/2021	SCALE 20X/42 SITE OFFSETS	SCALE MEASURES 1/4" ON FULL SIZE SHEETS ADJUST ACCORDINGLY FOR REDUCED SIZE SHEETS
BENCHMARK CIVIL BENCHMARK ENGINEERING & LAND SURVEYING 9138 SOUTH STATE STREET SUITE #100 SANDY, UTAH 84070 (801) 542-7192 www.benchmarkcivil.com		
WINSTON PARK 3701 W 1800 S WEBER COUNTY, UTAH		
DETAILS & NOTES SHEET CDT.02 21 OF 24		



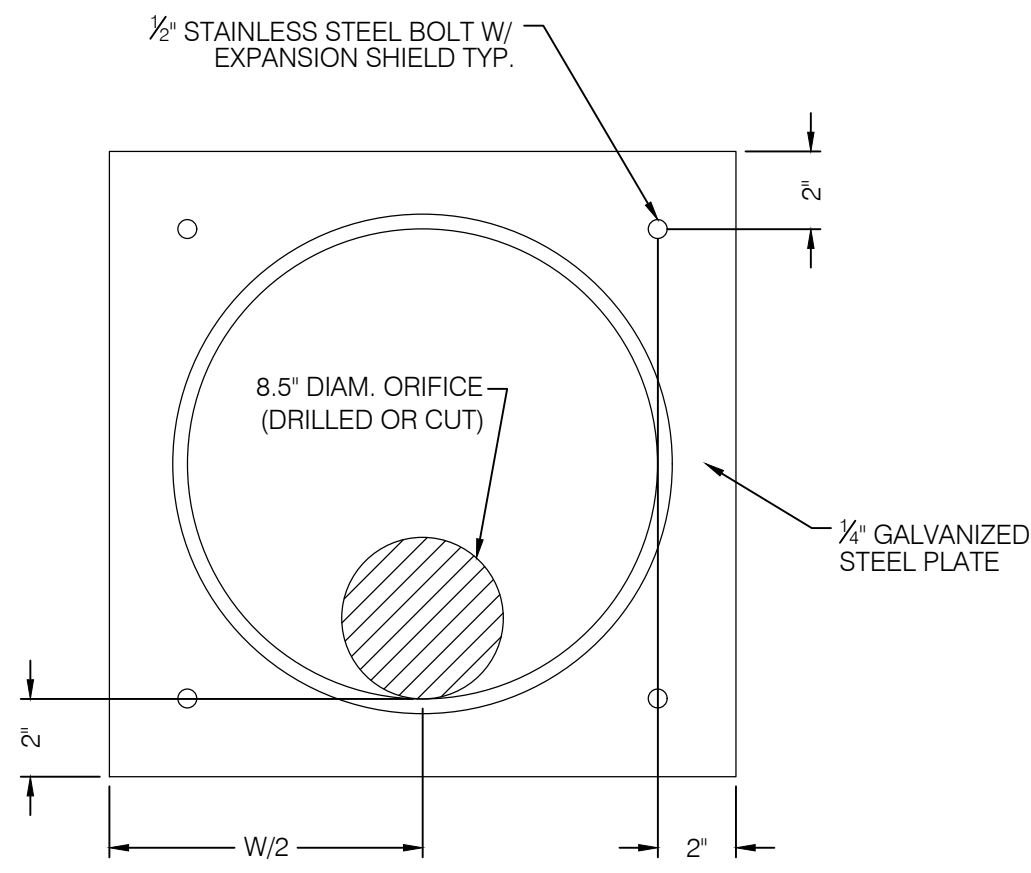
GRADE RING		
HEIGHT	CODE	WEIGHT
4"	GR304	180#
6"	GR306	270#

RISER		
HEIGHT	CODE	WEIGHT
1'	UV441R	1,350#
2'	UV442R	2,700#
3'	UV443R	4,050#
4'	UV444R	5,400#
5'	UV445R	6,750#
6'	UV446R	8,100#

VAULT		
HEIGHT	CODE	WEIGHT
3'	CB443	3,225#
4'	CB444	4,575#
5'	CB445	5,925#
6'	CB446	7,275#

3'x3' CATCH BASIN
SCALE: NTS

- NOTES:
 1. CATCH BASINS ARE DESIGNED TO MEET ASTM C858 WITH AASHTO HS-20 LOADING.
 2. OPENINGS MAY BE SIZED AND LOCATED AS REQUIRED.
 3. OPTIONAL GRATING OR COVER MATERIAL MAY BE CAST IN AS REQUIRED.
 4. CHECK HARDWARE SECTION FOR OPTIONAL ACCESSORIES.



FLOW RESTRICTOR PLATE

8.5" ORIFICE RESTRICTOR

- SCALE: N.T.S.
- STEEL: ASTM A 36 STEEL
 - BOLTS: USE 1/2" STAINLESS STEEL BOLTS AND 1/2" STAINLESS WASHERS.
 - COATING: COAT ALL METAL PARTS WITH ASPHALTUM PAINT.

Series 37

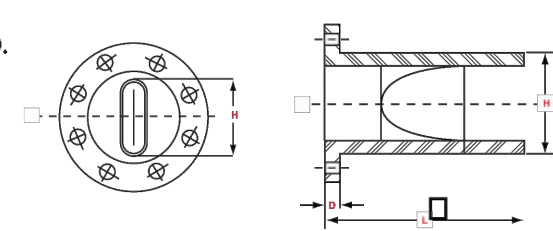
- Installs between pipe flanges, eliminating valve body.
- Offers minimal face-to-face dimension—only the thickness of the flange.
- Features unique, maintenance-free, one-piece elastomer check sleeve design.
- Eliminates chatter—silent, non-slamming.
- Closes on entrapped solids.



- Materials of Construction**
- Valves are available in pure gum rubber, neoprene, Hypalon®, Buna-N, Viton® and EPDM.
 - ANSI Class 125 Flanges, DIN PN6, PN10, PN16.
 - Special coating available.

Tideflex® Technologies' Series 37 Flanged InLine Check Valve is a simple, reliable, cost-effective solution to backflow problems. Designed to be installed between twomating flanges, the Series 37 eliminates the need for a valve body.

The pressure drop of the Series 37 is increased because of the smaller I.D. required to fit the check valve in the line.



With only one moving part, the maintenance-free rubber check sleeve, the Series 37 InLine Check Valve is simple in design. Sliding, rotating, swinging and spring parts are eliminated. There are no seats to corrode or packing to maintain. In addition, the Series 37 is a passive design, requiring no external source of air or electricity to operate. The result is reduced operating costs.

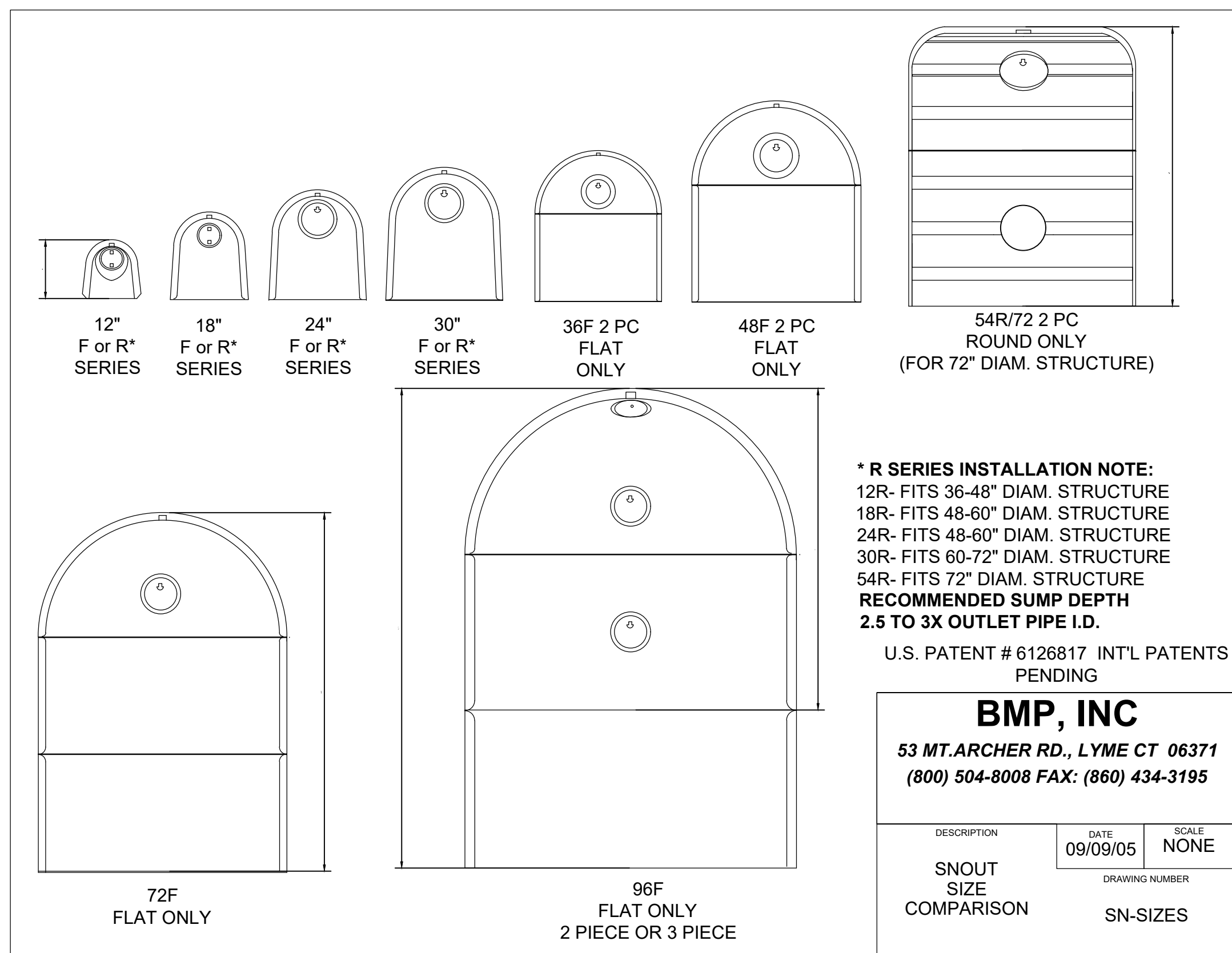
The Series 37 InLine Check Valve can be ordered in a variety of elastomers. Flanges conform to ANSI B16.1 Class 125 specifications. Special custom designs or metric flanged models are also available. When ordering, specify line pressure, backpressure and whether an SST is required.

Dimensions Series 37 Flanged InLine Check Valve						
Nominal Size* (Pipe I.D.)	Length	Height of Bolt	Flange Thickness	Max. Backpressure (psi)	Standard Support	With Saddle Support
2	5	1 7/8	3/8	150	N/A	N/A
3	5 1/2	2 7/8	3/8	100	N/A	N/A
4	7	3 7/8	3/8	75	N/A	N/A
6	11	5 7/8	3/8	75	150	150
8	12 1/2	7 7/8	1/2	60	125	125
10	15 1/2	9 7/8	1/2	45	75	75
12	18 1/2	11 7/8	1/2	35	75	75
14	22	13 3/4	5/8	25	70	70
16	23	15 3/4	3/4	20	60	60
18	24	17 3/4	1	15	45	45
20	32	19 3/4	1	10	40	40
24	37	23 3/4	1	10	40	40
30	41	29 3/4	1 1/2	8	40	40
36	47	35 3/4	1 1/2	8	35	35
42	49	41 1/2	1 3/4	5	25	25
48	52	47 1/2	1 3/4	5	25	25
54	57	53 1/2	2	5	25	25
60	64	59 1/2	2	5	25	25
72	73	71 1/2	2	5	25	25

Numbers indicate maximum dimensions in inches.
 * Larger sizes available upon request.

CHECK VALVE DETAIL

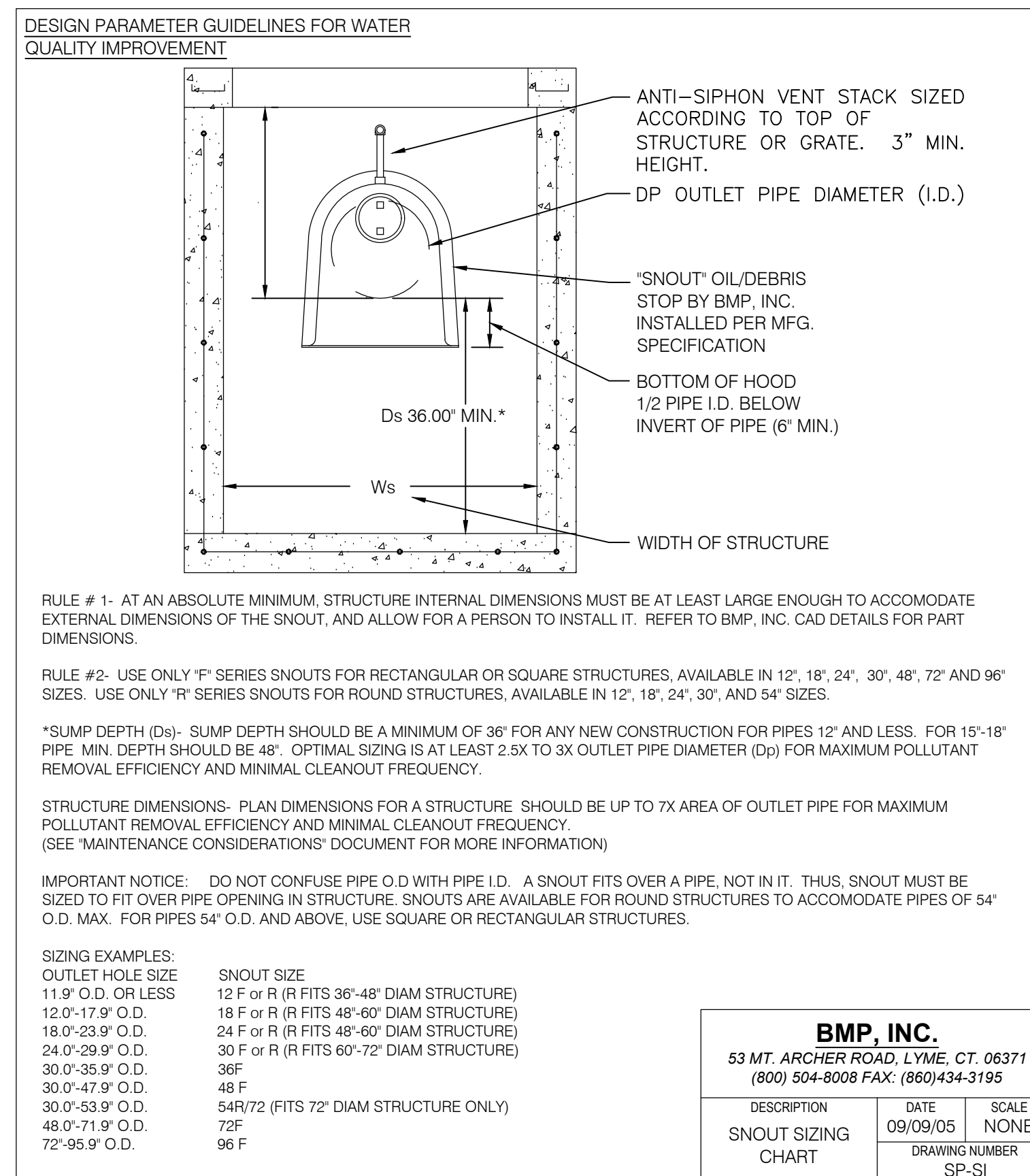
SCALE: N.T.S.



*** R SERIES INSTALLATION NOTE:**
 12R- FITS 36-48" DIAM. STRUCTURE
 18R- FITS 48-60" DIAM. STRUCTURE
 24R- FITS 48-60" DIAM. STRUCTURE
 30R- FITS 60-72" DIAM. STRUCTURE
 54R- FITS 72" DIAM. STRUCTURE
RECOMMENDED SUMP DEPTH 2.5 TO 3X OUTLET PIPE I.D.
 U.S. PATENT # 6126817 INT'L PATENTS PENDING

BMP, INC
 53 MT. ARCHER RD., LYME CT 06371
 (800) 504-8008 FAX: (860) 434-3195

DESCRIPTION	DATE	SCALE
SNOUT SIZE COMPARISON	09/09/05	NONE
DRAWING NUMBER		SN-SIZES



DESIGN PARAMETER GUIDELINES FOR WATER QUALITY IMPROVEMENT

RULE # 1- AT AN ABSOLUTE MINIMUM, STRUCTURE INTERNAL DIMENSIONS MUST BE AT LEAST LARGE ENOUGH TO ACCOMMODATE EXTERNAL DIMENSIONS OF THE SNOUT, AND ALLOW FOR A PERSON TO INSTALL IT. REFER TO BMP, INC. CAD DETAILS FOR PART DIMENSIONS.

RULE #2- USE ONLY 'F' SERIES SNOUTS FOR RECTANGULAR OR SQUARE STRUCTURES, AVAILABLE IN 12", 18", 24", 30", 48", 72" AND 96" SIZES. USE ONLY 'R' SERIES SNOUTS FOR ROUND STRUCTURES, AVAILABLE IN 12", 18", 24", 30", AND 54" SIZES.

*SUMP DEPTH (Ds) - SUMP DEPTH SHOULD BE A MINIMUM OF 36" FOR ANY NEW CONSTRUCTION FOR PIPES 12" AND LESS. FOR 15"-18" PIPE MIN. DEPTH SHOULD BE 48". OPTIMAL SIZING IS AT LEAST 2.5X TO 3X OUTLET PIPE DIAMETER (Dp) FOR MAXIMUM POLLUTANT REMOVAL EFFICIENCY AND MINIMAL CLEANOUT FREQUENCY.

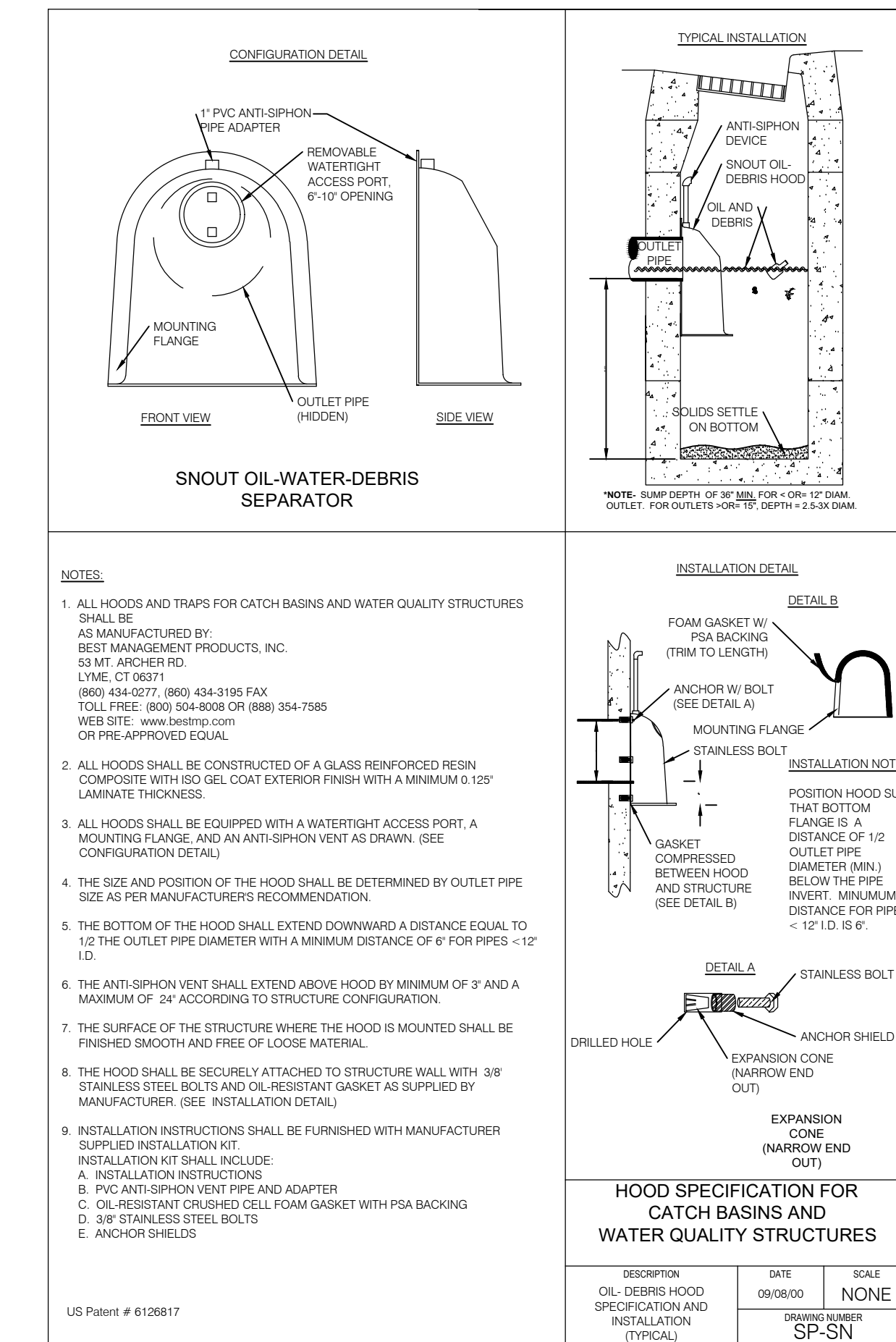
STRUCTURE DIMENSIONS - PLAN DIMENSIONS FOR A STRUCTURE SHOULD BE UP TO 7X AREA OF OUTLET PIPE FOR MAXIMUM POLLUTANT REMOVAL EFFICIENCY AND MINIMAL CLEANOUT FREQUENCY. (SEE 'MAINTENANCE CONSIDERATIONS' DOCUMENT FOR MORE INFORMATION)

IMPORTANT NOTICE - DO NOT CONFUSE PIPE O.D. WITH PIPE I.D. A SNOUT FITS OVER A PIPE, NOT IN IT. THUS, SNOUT MUST BE SIZED TO FIT OVER PIPE OPENING IN STRUCTURE. SNOUTS ARE AVAILABLE FOR ROUND STRUCTURES TO ACCOMMODATE PIPES OF 54" O.D. MAX. FOR PIPES 54" O.D. AND ABOVE, USE SQUARE OR RECTANGULAR STRUCTURES.

SIZING EXAMPLES:
 OUTLET HOLE SIZE
 11 9" O.D. OR LESS 12 F or R (R FITS 36"-48" DIAM STRUCTURE)
 12 0"-17 9" O.D. 18 F or R (R FITS 48"-60" DIAM STRUCTURE)
 18 0"-23 9" O.D. 24 F or R (R FITS 48"-60" DIAM STRUCTURE)
 24 0"-29 9" O.D. 30 F or R (R FITS 60"-72" DIAM STRUCTURE)
 30 0"-35 9" O.D. 36F
 30 0"-47 9" O.D. 48F
 30 0"-53 9" O.D. 54R/72 (FITS 72" DIAM STRUCTURE ONLY)
 48 0"-71 9" O.D. 72F
 72"-95 9" O.D. 96F

BMP, INC.
 53 MT. ARCHER ROAD, LYME, CT. 06371
 (800) 504-8008 FAX: (860) 434-3195

DESCRIPTION	DATE	SCALE
SNOUT SIZING CHART	09/09/05	NONE
DRAWING NUMBER		SP-SI



NOTES:

- ALL HOODS AND TRAPS FOR CATCH BASINS AND WATER QUALITY STRUCTURES SHALL BE MANUFACTURED BY BEST MANAGEMENT PRODUCTS, INC. ES MT. ARCHER RD. LYME, CT 06371 (860) 434-0277, (860) 434-3195 FAX TOLL FREE: (800) 504-8008 OR (888) 354-7565 WEB SITE: WWW.BMP.COM OR PRE-APPROVED EQUAL.
- ALL HOODS SHALL BE CONSTRUCTED OF A GLASS REINFORCED RESIN COMPOSITE WITH ISO GEL COAT EXTERIOR FINISH WITH A MINIMUM 0.125" LAMINATE THICKNESS.
- ALL HOODS SHALL BE EQUIPPED WITH A WATERTIGHT ACCESS PORT, A MOUNTING FLANGE, AND AN ANTI-SIPHON VENT AS DRAWN. (SEE CONSTRUCTION DETAIL)
- THE SIZE AND POSITION OF THE HOOD SHALL BE DETERMINED BY OUTLET PIPE SIZE AS PER MANUFACTURER'S RECOMMENDATION.
- THE BOTTOM OF THE HOOD SHALL EXTEND DOWNWARD A DISTANCE EQUAL TO 1/2 THE OUTLET PIPE DIAMETER WITH A MINIMUM DISTANCE OF 6" FOR PIPES < 12" I.D.
- THE ANTI-SIPHON VENT SHALL EXTEND ABOVE HOOD BY MINIMUM OF 3" AND A MAXIMUM OF 24" ACCORDING TO STRUCTURE CONFIGURATION.
- THE SURFACE OF THE STRUCTURE WHERE THE HOOD IS MOUNTED SHALL BE FINISHED SMOOTH AND FREE OF LOOSE MATERIAL.
- THE HOOD SHALL BE SECURELY ATTACHED TO STRUCTURE WALL WITH 3/8" STAINLESS STEEL BOLTS AND OIL-RESISTANT GASKET AS SUPPLIED BY MANUFACTURER. (SEE INSTALLATION DETAIL)
- INSTALLATION INSTRUCTIONS SHALL BE FURNISHED WITH MANUFACTURER SUPPLIED INSTALLATION KIT. SUPPLIED INSTALLATION KIT SHALL INCLUDE:
 A. INSTALLATION INSTRUCTIONS
 B. PVC ANTI-SIPHON VENT PIPE AND ADAPTER
 C. OIL-RESISTANT CRUSHED CELL FOAM GASKET WITH PSA BACKING
 D. 3/8" STAINLESS STEEL BOLTS
 E. ANCHOR SHIELDS

HOOD SPECIFICATION FOR CATCH BASINS AND WATER QUALITY STRUCTURES

DESCRIPTION	DATE	SCALE
OIL-DEBRIS HOOD SPECIFICATION AND INSTALLATION (TYPICAL)	09/09/05	NONE
DRAWING NUMBER		SP-SN

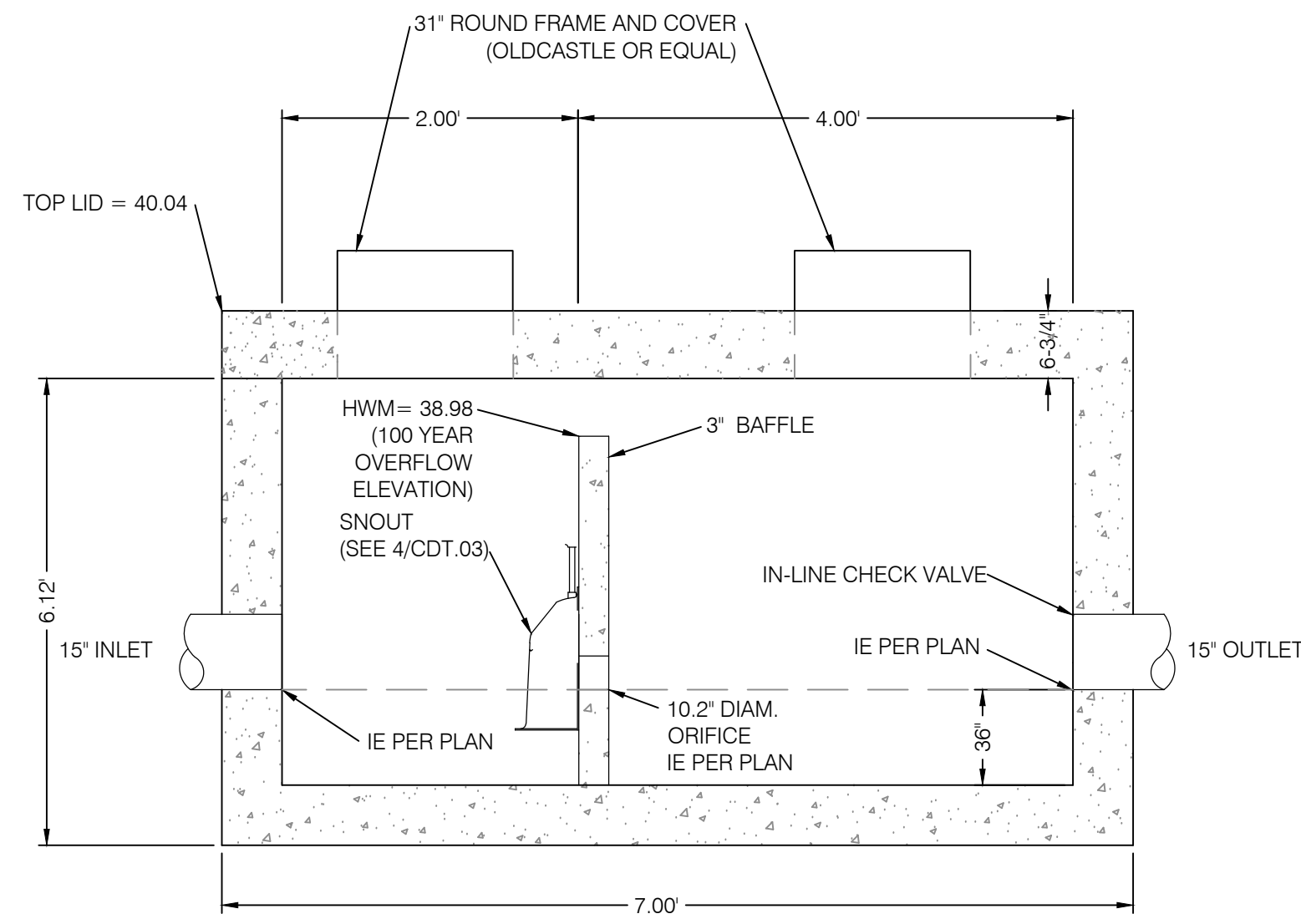
18F SNOUT DETAILS
SCALE: NTS

PROJECT NO. 2006142

WINSTON PARK
3701 W 1800 S
WEBER COUNTY, UTAH

BENCHMARK CIVIL
 ENGINEERING & SURVEYING
 LAND SURVEYING & ENGINEERING
 9138 SOUTH STATE STREET SUITE #100
 SANDY, UTAH 84070 (801) 542-7192
 www.benchmarkcivil.com

DETAILS & NOTES SHEET
 CDT.03
 22 OF 24



4'X6' CLEANOUT BOX WITH BAFFLE

SCALE: N.T.S.

1

DETAIL A
Sealant Detail
Check CP110 and CP120
for Specific Joint Details

Diameter	Code	Weight
12"	FES12B	3,550#
15"	FES15B	740#
18"	FES18B	990#
24"	FES24B	1,540#
30"	FES30B	2,190#
36"	FES36B	3,100#
42"	FES42B	5,350#
48"	FES48B	6,550#

Slope	A	B	C	E	F	G
12" 2.4 : 1	4"	24"	48"	72"	24"	2"
15" 2.4 : 1	6"	37"	66"	73"	30"	2 1/2"
18" 2.3 : 1	9"	57"	96"	73"	36"	2 1/2"
24" 2.5 : 1	12"	78"	132"	73"	48"	3"
30" 2.5 : 1	15"	99"	168"	73"	60"	3 1/2"
36" 2.5 : 1	18"	120"	204"	73"	72"	4"
42" 2.5 : 1	21"	141"	240"	73"	84"	4 1/2"
48" 2.5 : 1	24"	162"	276"	73"	96"	5"

Oldcastle Precast

Flared End

FILE NAME: 2102OPENFLARE

ISSUE DATE: 5/2008

www.oldcastleprecast.com

Oldcastle Precast

Flared End Section for Round Pipe

FILE NAME: 2102OPENFLARE

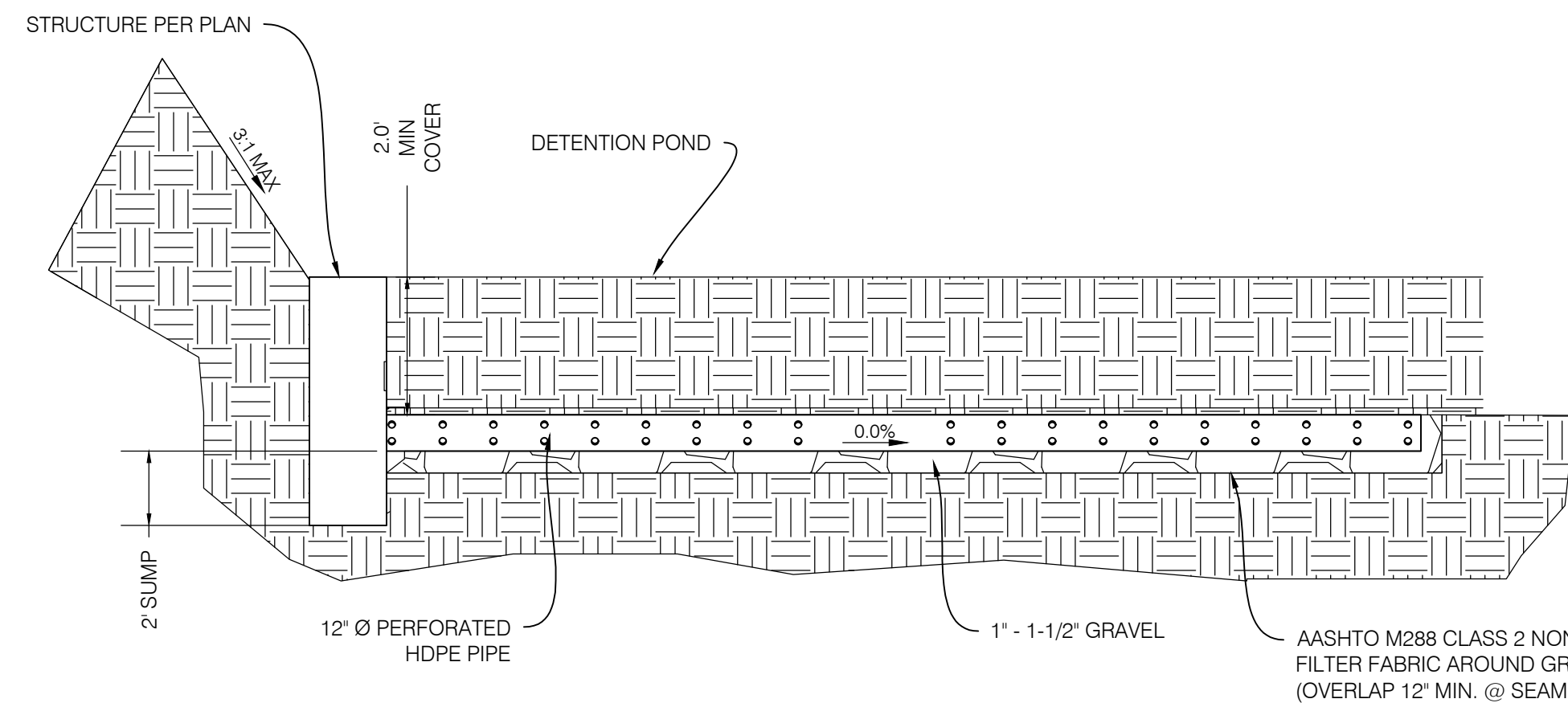
ISSUE DATE: 5/2008

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FLARED END SECTION WITH TRASH GATE

SCALE: N.T.S.

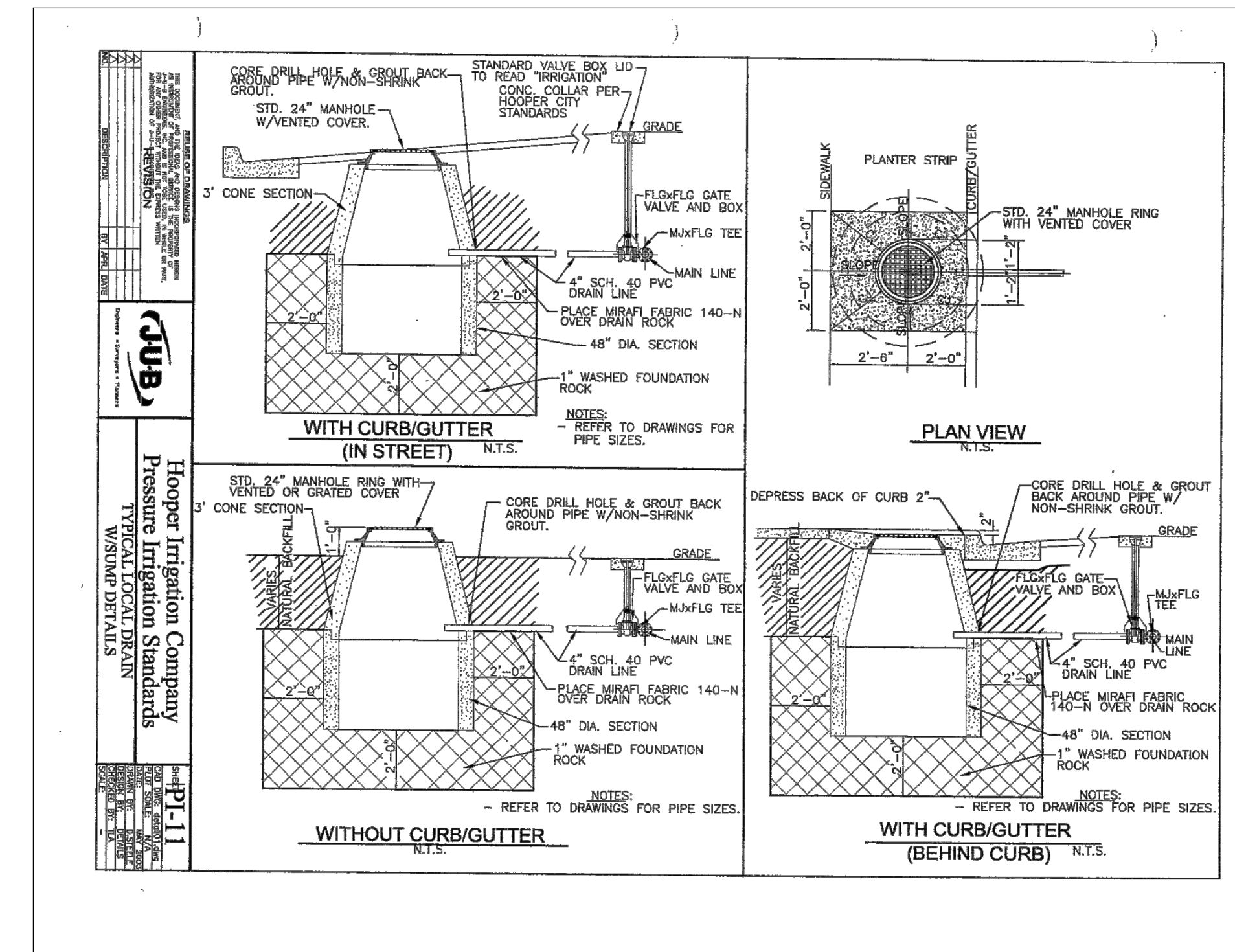
2



PERFORATED PIPE DETAIL

SCALE: N.T.S.

3



TYPICAL LOCAL DRAIN W/SUMP DETAILS HOOPER IRRIGATION STANDARDS

SCALE: N.T.S.

4

No.	DATE	DESCRIPTION
1	03/21/21	REVISED PER COUNTY WATER & IRRIGATION COMMENTS
2	05/02/21	REVISED PER COUNTY WATER & IRRIGATION COMMENTS

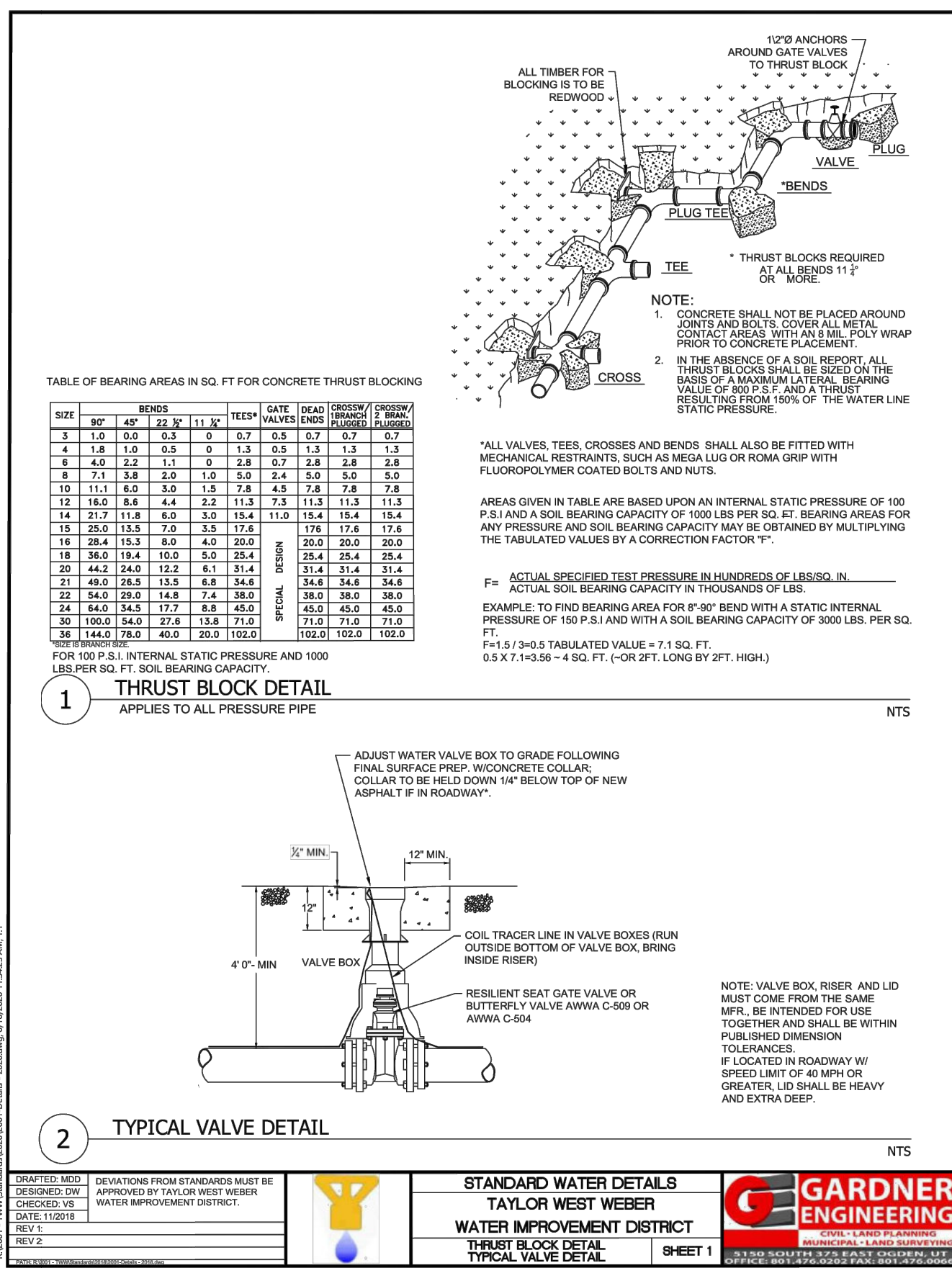
PROFESSIONAL ENGINEER
No. 11566833
ALLISON G. ALBERT
STATE OF UTAH

BENCHMARK ENGINEERING & LAND SURVEYING
9138 SOUTH STATE STREET SUITE #100
SANDY, UTAH 84070 (801) 542-7192
www.benchmarkcivil.com

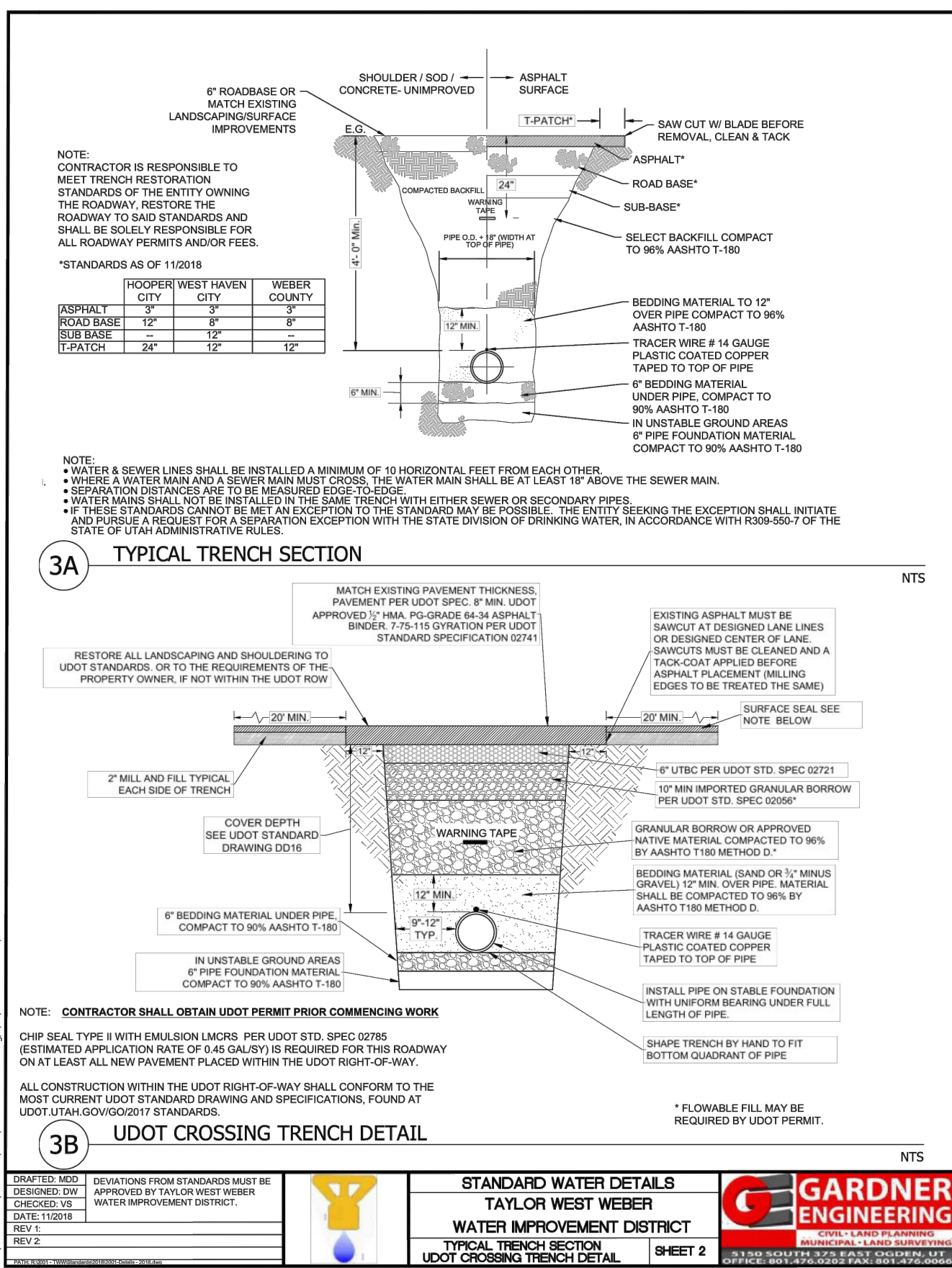
BENCHMARK CIVIL

WINSTON PARK
3701 W 1800 S
WEBER COUNTY, UTAH

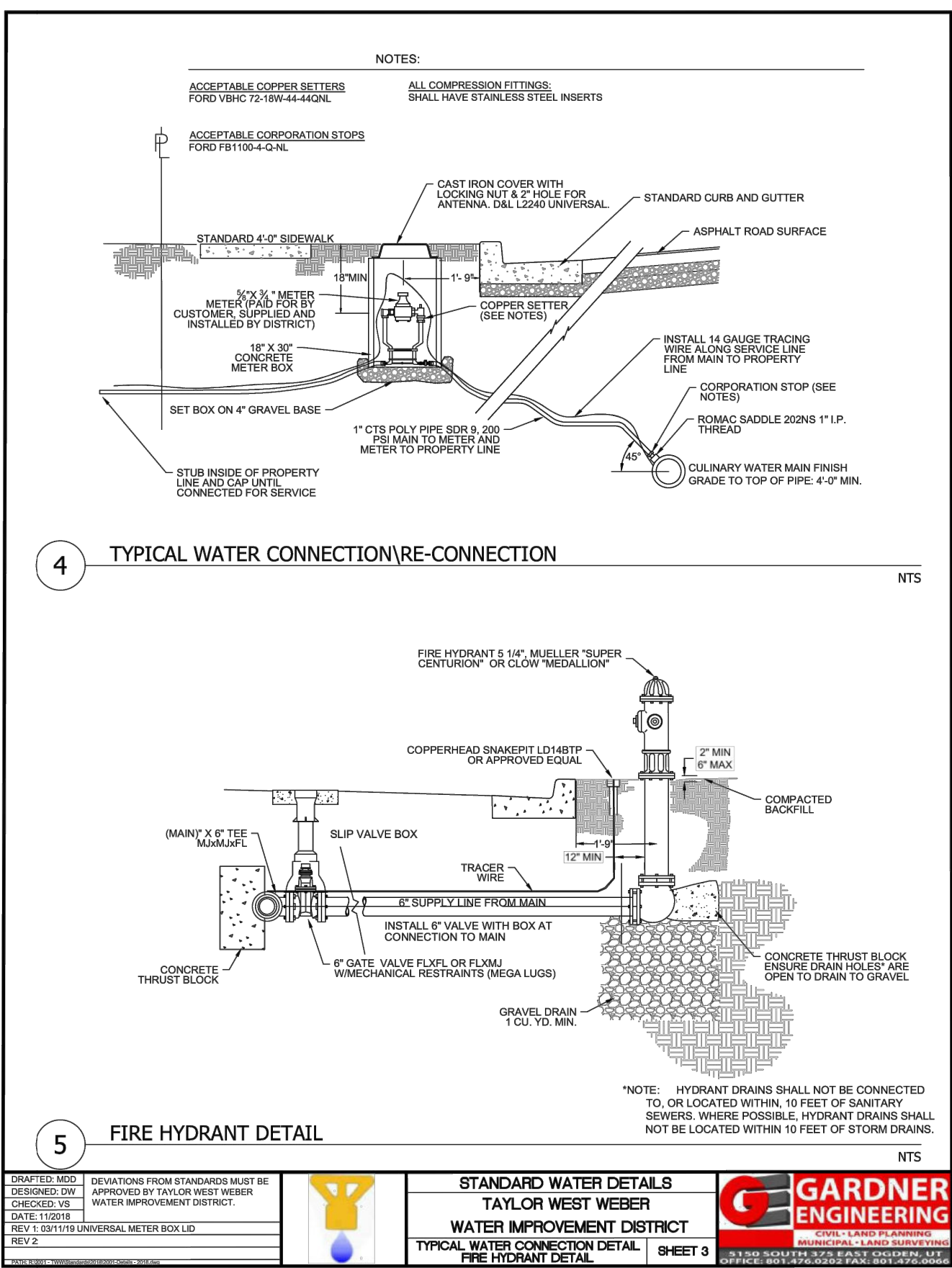
PROJECT NO. 2006142
DETAILS & NOTES SHEET
CDT.04
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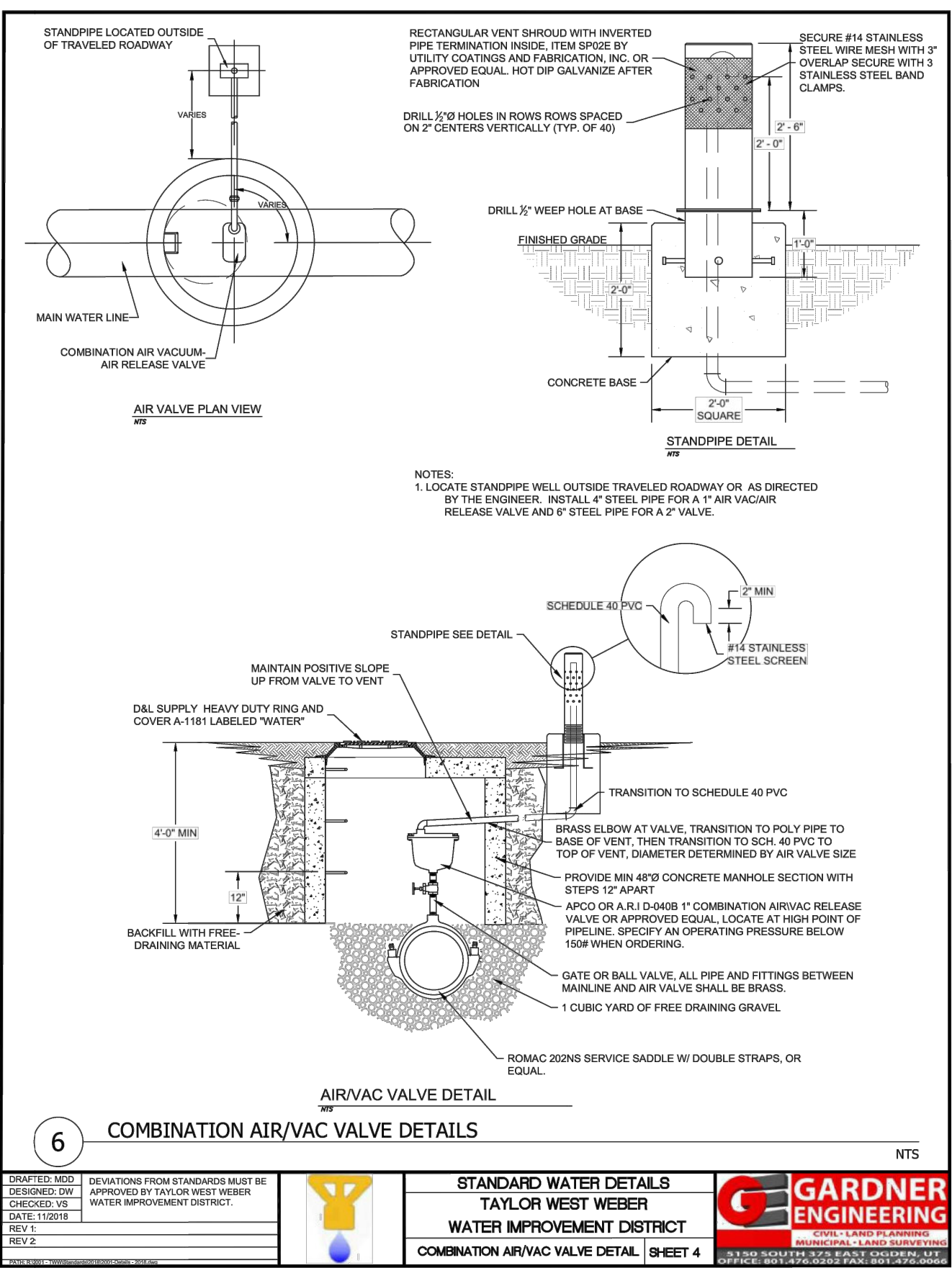
THRUST BLOCK AND VALVE DETAILS
TAYLOR-WEST WEBER WATER DISTRICT STDs.
SCALE: N.T.S.



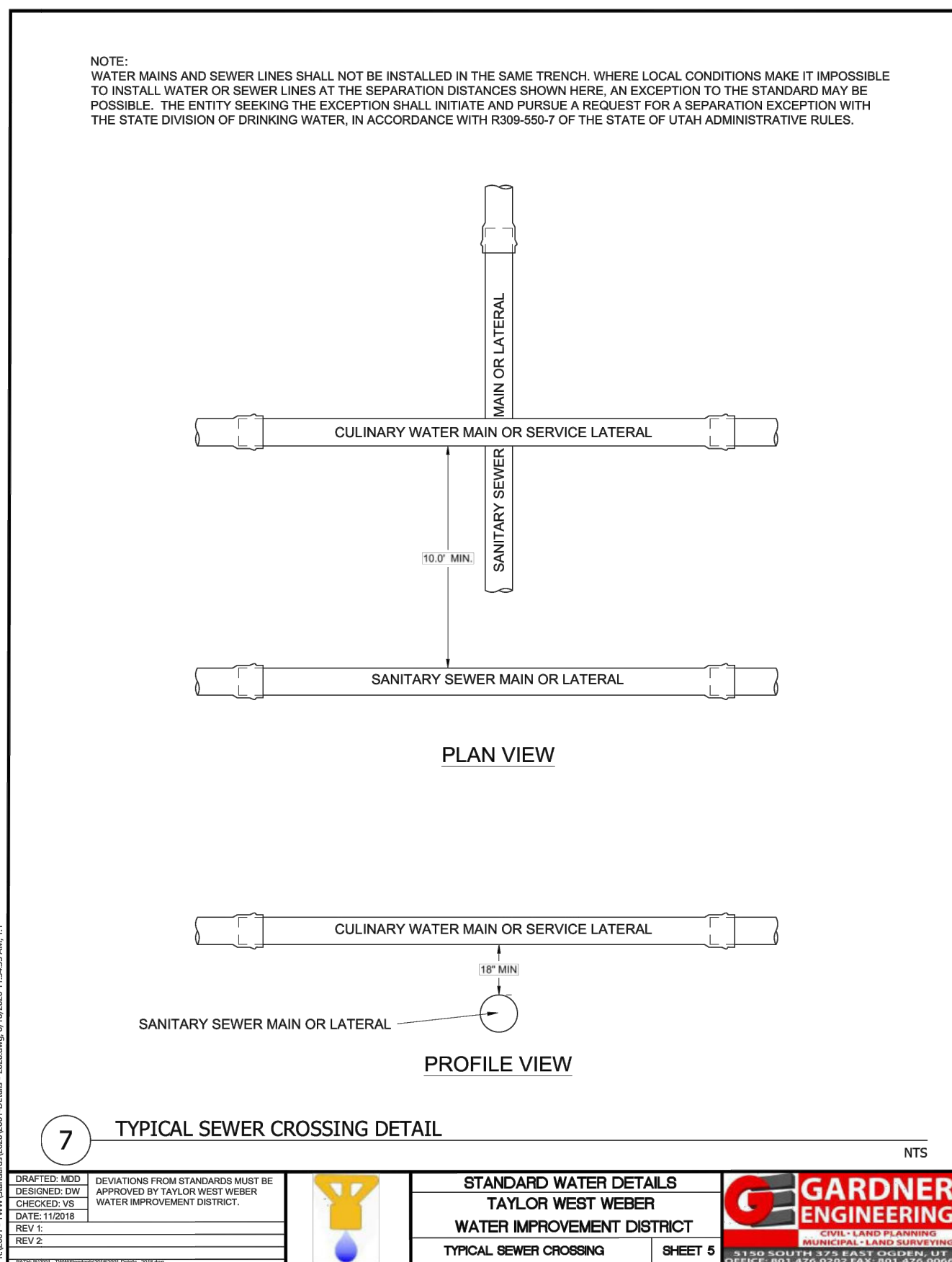
TRENCH DETAILS
TAYLOR-WEST WEBER WATER DISTRICT STDs.
SCALE: N.T.S.



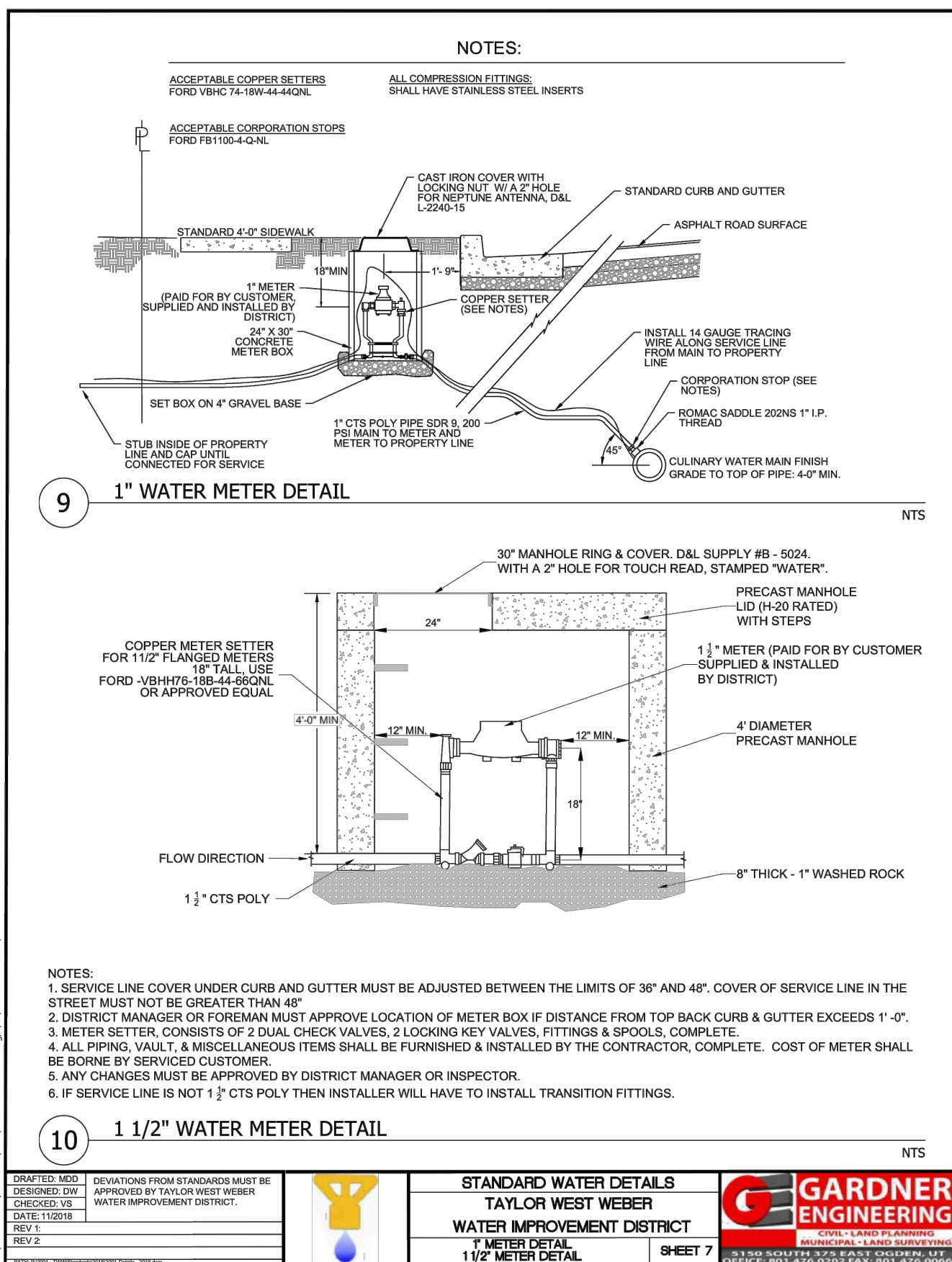
TYP. CONNECTION AND FIRE HYDRANT DETAILS
TAYLOR-WEST WEBER WATER DISTRICT STDs.
SCALE: N.T.S.



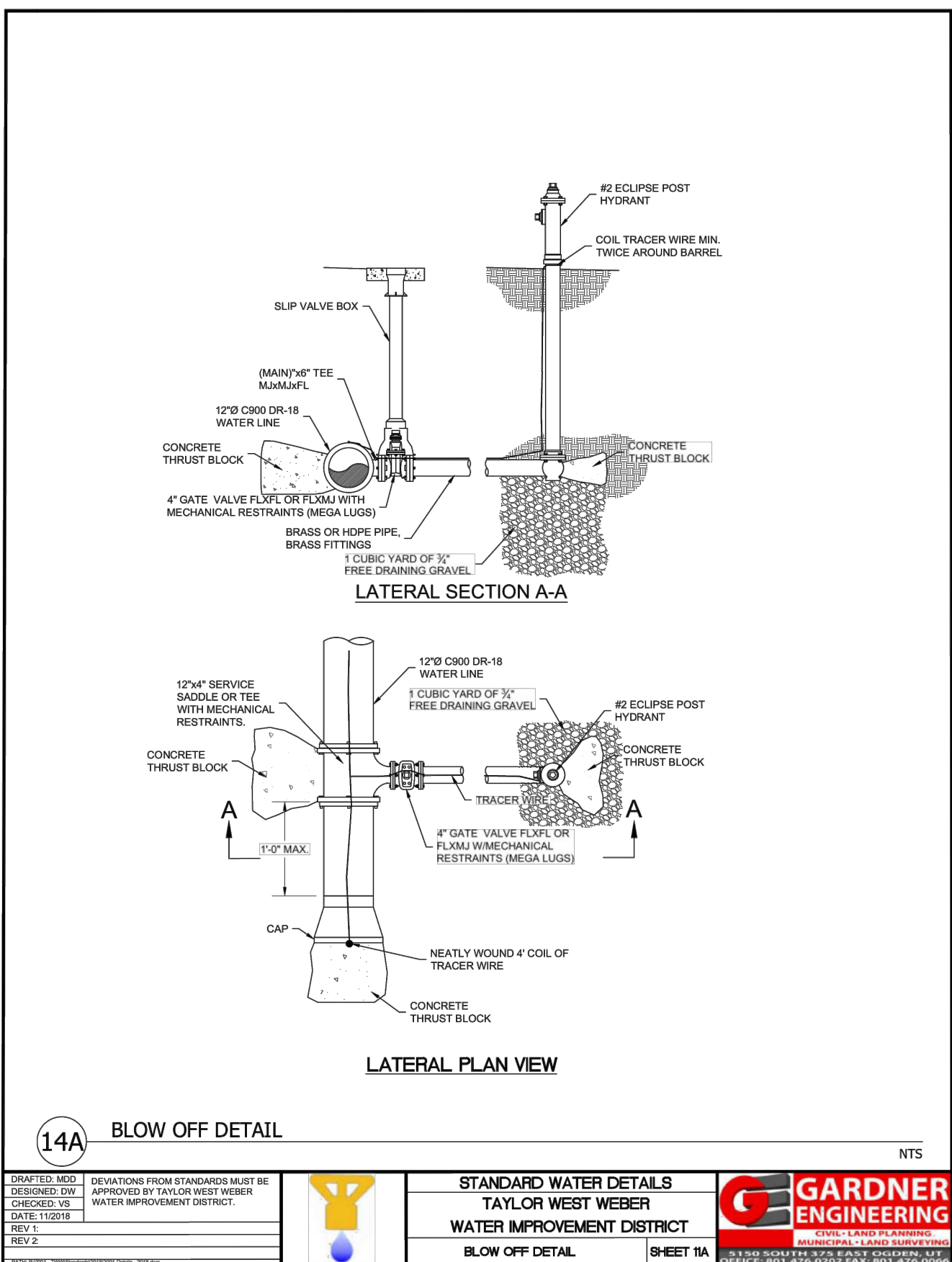
COMBO AIR-VAC DETAIL
TAYLOR-WEST WEBER WATER DISTRICT STDs.
SCALE: N.T.S.



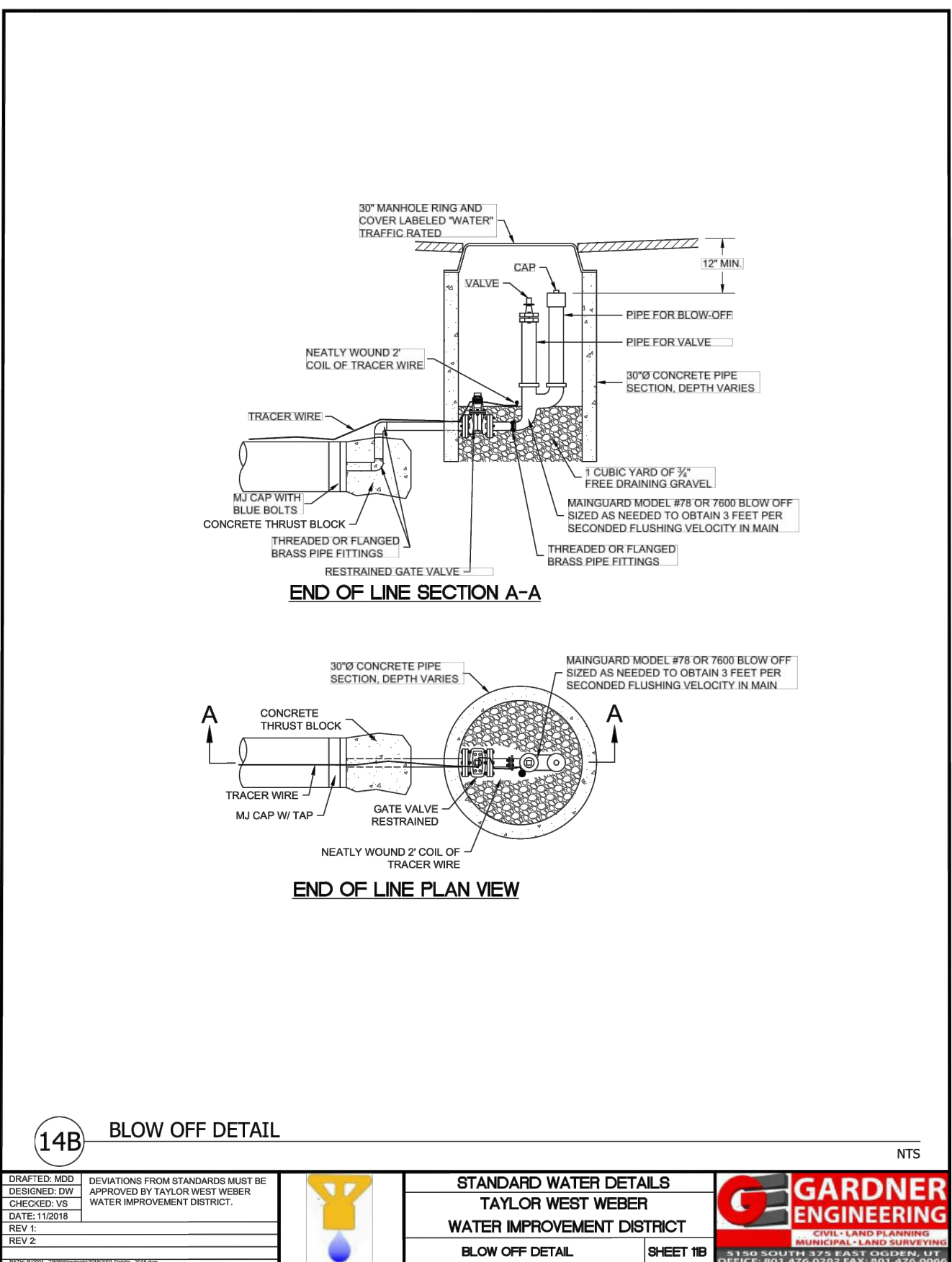
TYPICAL SEWER CROSSING DETAIL
TAYLOR-WEST WEBER WATER DISTRICT STDs.
SCALE: N.T.S.



METER DETAIL
TAYLOR-WEST WEBER WATER DISTRICT STDs.
SCALE: N.T.S.



LATERAL BLOW OFF DETAIL
TAYLOR-WEST WEBER WATER DISTRICT STDs.
SCALE: N.T.S.



END LINE BLOW OFF DETAIL
TAYLOR-WEST WEBER WATER DISTRICT STDs.
SCALE: N.T.S.

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PROJECT NO. 2006142

DETAILS & NOTES SHEET
 CDT.05
 24 OF 24

REVISIONS:
 1. 03/2021 REVISED PER COUNTY WATER & IRRIGATION COMMENTS
 2. 05/2021 REVISED PER COUNTY WATER & IRRIGATION COMMENTS

DATE: 03/2021
 DRAWN BY: JHO
 CHECKED BY: AGA
 FIELD/ORD: SURVEY
 DATE: 03/2021
 DATE: 03/2021
 DATE: 03/2021
 DATE: 03/2021

SCALE: MEASURES IN CH ON FULL SIZE SHEET'S
 ADJUST ACCORDING FOR REDUCED SIZE SHEETS

NOT FOR CONSTRUCTION

PROFESSIONAL ENGINEER
 No. 11866893
 ALLISON G. ALBERT
 STATE OF UTAH