

Bixby Technical Advisory Committee Meeting Agenda



**Bixby Municipal Building
Conference Room
111 North Cabaniss Ave, Bixby, Oklahoma**



Wednesday, March 5, 2025 | 10:00 A.M.

Technical Advisory Committee Members

David Segala - A.E.P.-P.S.O.
Jody Chester - A.E.P.-P.S.O.
Aaron Smith - A.E.P.-P.S.O.
Brett Ashlock - A.T.&T.
Kevin Bender - A.T.&T.
Kevin Wingard - SDT
Richard Gann - B.T.C. Broadband
Tony Gonzalez - B.T.C. Broadband
Susan Bevard - B.T.C. Broadband
Chad Jones - B.T.C. Broadband
Scott Lowry - B.T.C. Broadband
Woody Lowry - B.T.C. Broadband
Rob Miller - Bixby Public Schools
Lydia Wilson - Bixby Public Schools
Bea Aamodt - Bixby Public Works Director
Jim Harges, Construction Manager
Joey Wiedel - Interim City Manager
Gwen Plante - Project Manager
Heath Wright - Bixby Utilities & Water
Joe Sherrell - Bixby Fire Chief
Nicholas Flanary - Bixby Fire Marshal
Ryan King - Assistant Fire Marshal
Gladys Gill - City Planner I
Justin Rich - Cox
Loyda Mercado - Cox
Kadi Calfy - Cox

Matt Foreman - Cox
Christopher Long - Cox R.O.W. Agent
Marty Lademan - Creek County R.W.D. #2
Cynthia Hubbell - Creek County R.W.D. #2
Katherine Russell - East Central Electric
Ron Wolfe - East Central Electric (E.C.E.)
Caleb Brennecke - East Central Electric
Michael Beardsley - East Central Electric
Jeremy Hendrickson - ecoLINK
Rick McElhannon - ecoLINK
Steve Whitehouse - O.G. & E.
Dewayne Perry - O.G. & E.
Keith Melson - O.G. & E.
Quan Tran - O.G. & E.
Brandon Rainbolt - O.N.G.
Chandler Eidson - O.N.G.
Patrick Stone - O.N.G.
Bryant Cox - O.N.G.
Kris Mendoza - O.N.G.
Jeff Briggs - O.N.G.
Kym Cude - O.N.G.
Shannon Clemente - O.N.G.
Chance Marshall - O.N.G.
Chris Stobaugh - U.S.P.S. Bixby
Aaron Grodi - Windstream
Joel Ostrenga - Windstream

Call to Order

Introductions

Approval of Minutes

1. Review and approve minutes for the TAC meeting dated February 5th, 2025.

Project Discussions

1. Preliminary Drainage Plans for 131st Street from Memorial Drive to Mingo Road.
2. Preliminary Drainage Plans Gardenview Addition.

3. Utility Easement Closure (Bxec-25.01) within Lot 1 and 2, Block 1 of Crossing at Conrad Village.

New Business

Adjournment

This Notice and Agenda were posted on the bulletin board on or before 10:00 a.m., March 4, 2025, at the Bixby Municipal Building located at 111 N Cabaniss Ave, Bixby, Oklahoma.

Respectfully submitted,



Gladys Gill
Assistant Planner

Persons who require a special accommodation to participate in this meeting should contact Shannon Duran, City Clerk, 111 North Cabaniss Ave Bixby, Oklahoma, 918-366-4430, or email SDuran@bixbyok.gov as far in advance as possible and preferably at least 48-hours before the date of the meeting. Persons using a Telecommunications Device for the Deaf (T.D.D.) may contact Oklahoma Relay at 1-800-722-0353 and voice calls should be made to 1-800-522-8506 to communicate via telephone with hearing telephone users and vice versa.

Bixby Technical Advisory Committee Meeting

Meeting Minutes

**BPWA Conference Room
Dawes Building, 113 West Dawes, Bixby, Oklahoma**

Wednesday, February 5, 2025 | 10:00 A.M.

Technical Advisory Committee Members

Members Present

Justin Dowd, City of Bixby
Gwen Plante, City of Bixby
Nick Flanary, City of Bixby
Heath Wright, City of Bixby
Richard Gann, B.T.C.
Susan Bevard, BTC

Others Present

Erik Enyart, Tanner Consulting
Donna Crawford, City of Bixby Consultant

1. Call to Order, Introductions

- Gladys Gill, City of Bixby, called the meeting to order at 10:06 A.M.

2. Consider and approve minutes for the Technical Advisory Committee meeting dated 01/08/2025.

- Gladys Gill asked for a motion to approve the Technical Advisory Committee Meeting Minutes from the January 8, 2025 meeting. Richard Gann, BTC, made a motion to approve the minutes. Justin Dowd, City of Bixby, seconded.

Aye: All

Nay: None Motion Carried

3. Bixby Preliminary/Final Plat (B.X.P.T.) Number 20.05 Crossing at Conrad Village, Block 1 Partial. Applicant: Tanner Consulting. Discussion and review of Final Plat for Crossing at Conrad Village, Block 1 Partial, +/- .894 Acres, Four (4) Lots, One (1) Block, with One (1) Reserve Areas for residential development, in Section 23, Township 17 North, Range 13 East General Location: 15400 block of South 68th East Place.

- City of Bixby—The City requested clarification regarding the specific lot numbers in question. Additionally, the City asked for a copy of the letter from the Corporation Commission confirming that the oil well has been properly capped. No permits would be issued without confirmation of the well's status.
- The applicant mentioned that sewer crossings might need to be adjusted on the plat and would confirm with his team.

No further comments from the committee.

4. Adjourn

The meeting was adjourned at 10:13 AM.

SURVEY CONTROL DATA

1. HORIZONTAL DATUM IS TIED TO CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 WHICH IS ADJUSTED TO THE OKLAHOMA STATE PLANE NAD 83 (1993) COORDINATE SYSTEM, NORTH ZONE, PER MONUMENT #BA 11 DATA SHEET.
2. BEARINGS:
- THE BEARINGS SHOWN HEREIN OR HEREON ARE GRID BEARINGS DERIVED FROM THE USC & GS OKLAHOMA PLANE COORDINATE SYSTEM AND ARE NOT ASTRONOMICAL.
3. VERTICAL CONTROLS:
- A. LEVEL DATUM IS NGS, NAVD 88, PER CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 AND ADJUSTED FROM PRIMARY CONTROL UTILIZING DIFFERENTIAL LEVELING TECHNIQUES.
- B. ACCURACY - 3RD ORDER OR BETTER

TULSA BENCHMARK FROM CITY OF TULSA CONTROL DATA PREPARED BY AERIAL DATA SERVICE MONUMENTED JANUARY, 2002 STATION NO. BA 11 MON. TYPE 3" ALUMINUM CAP SET IN CONCRETE
N: 361550.5020
E: 2604311.8720
ELEV: 632.430
LAT: 35°58'26.01634"
LONG: 95°51'03.77782"

PRELIMINARY DRAINAGE PLANS FOR
131ST. STREET FROM MEMORIAL DR. TO MINGO RD.
PUBLIC WORKS DEPARTMENT
CITY OF BIXBY, OKLAHOMA

INDEX OF SHEETS

SHT. NO.	DESCRIPTION
1.	TITLE
2.	PAY ITEMS & NOTES (ROADWAY)
3.	PAY ITEMS & NOTES (WATERLINE)
4.	GENERAL CONSTRUCTION NOTES
5.-6.	SUMMARY OF DRAINAGE STRUCTURES
7.-8.	TYPICAL SECTIONS
9.-14.	SURVEY DATA
15.-20.	DEMO PLAN
21.	131ST ST DRAINAGE AREA MAP
22.	131ST ST FUTURE DRAINAGE AREA MAP
23.	STORMWATER MANAGEMENT PLAN
24.-29.	EROSION CONTROL
30.-41.	ROADWAY PLAN & PROFILES
42.-55.	131ST ST DITCH PLAN & PROFILES
56.-64.	WATERLINE PLAN & PROFILES
65.	SANITARY SEWER PLAN & PROFILE
66.-72.	SIGNING STRIPING AND SIDEWALK
73.	TRAFFIC SIGNAL PLAN
74.	SIGNAL PHASING DIAGRAM
75.	SIGNAL WIRING DIAGRAM
XS 1.-XS 41.	CROSS SECTIONS

ODOT STANDARDS

BRIDGE	ROADWAY	TRAFFIC
RCB-C1-8(2-14)	SSS-1-1	TCS1-1-01
RCB-C1-14(2-10)	TSC2-3-2	TCS2-1-00
RCB-E2-H15-30	TSO-2-0	TCS3-1-01
	CDIP-1-1	TCS4-1-01
	CI-1-2	TCS5-1-00
	MJB-3-2	TCS6-1-02
	SPI-4-1	TCS7-1-02
	SBI-4-2	TCS8-1-00
		TCS9-1-01
		TCS11-1-01
		TCS15-1-00
		PMAP1-2-01
		SA1-1-02
		SNS1-1-02
		TSSS1-1-00
		PWD1-2-00
		CFD1-2-01
		CC1-1-00
		PM1-1-03
		PM3-1-02
		SBS2-1-00
		GMS1-1-00
		GMS2-1-00
		SSP1-1-02
		SSA1-1-00
		FGS1-1-00

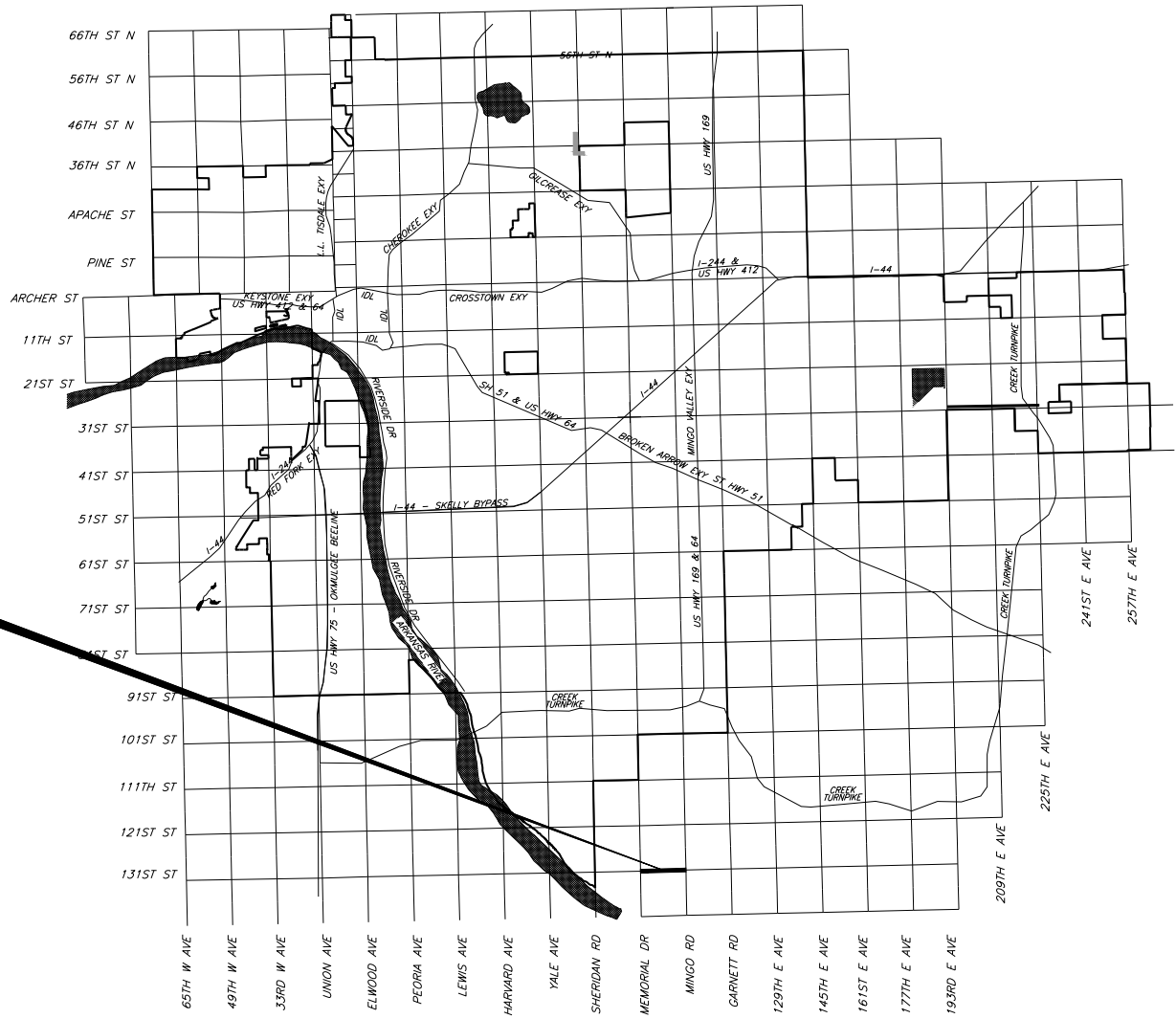
COT STANDARDS

603. SIGNAL POLE FOOTING DETAILS

LEGEND

	PROPOSED ROADS
	SECTION LINES
	QUARTER SECTION LINES
	FENCES (EXISTING)
	EXISTING GRADE
	EXISTING ROADS
	EXISTING INDEX CONTOURS
	EXISTING INTERMEDIATE CONTOURS
	BASE LINE
	PROPOSED GRADE
	COMMUNICATION LINES (EXISTING)
	POWER LINES (EXISTING)
	GAS LINE (EXISTING)
	SANITARY SEWER LINES (EXISTING)
	WATER LINES (EXISTING)
	COMMUNICATION LINES (PROPOSED)
	POWER LINES (PROPOSED)
	GAS LINE (PROPOSED)
	SANITARY SEWER LINES (PROPOSED)
	WATER LINES (PROPOSED)
	BUILDINGS (EXISTING)
	DRAINAGE STRUCTURES (EXISTING)
	DRAINAGE STRUCTURES (PROPOSED)
	RIGHT-OF-WAY LINES (EXISTING)
	RIGHT-OF-WAY LINES (PROPOSED)
	RIGHT-OF-WAY FENCE
	FLOWLINE (EXISTING)
	FLOWLINE (PROPOSED)
	TOE OF SLOPE (EXISTING)

ROADWAY
2019 OKLAHOMA STANDARD SPECIFICATIONS FOR HIGHWAY CONSTRUCTION-ENGLISH,
APPROVED BY THE U.S. DEPARTMENT OF TRANSPORTATION, FEDERAL HIGHWAY
ADMINISTRATION, DECEMBER 18, 2019, SHALL GOVERN.



CEC CORPORATION
1300 S. Main Street
Tulsa, Oklahoma 74119
T: (918) 663-9401
F: (918) 663-9404
WWW.CONNECTCEC.COM

C.A. #32 EXPIRES 06/30/26



THIS DOCUMENT
IS PRELIMINARY
IN NATURE AND IS
NOT A FINAL
AND SEALED
DOCUMENT

CITY ENGINEER _____ DATE _____

ADVERTISEMENT DATE: _____

ENGINEER'S CERTIFICATION: _____

SHANNON N. HANKS, P.E. NO. 21141

DATE

DATE

DATE

PLOT DATE: August 2, 2024, DRAWING NAME: 1 TITLE.DWG

BASE BID-ROADWAY					
ITEM NO.	SPEC. NO.	DESCRIPTION	PAY ITEM NOTES	UNIT	QUANTITY
1	201(A)	CLEARING AND GRUBBING	-	AC	10
2	202(A)	UNCLASSIFIED EXCAVATION	13, 15	CY	18,537
3	220	SWPPP DOCUMENTATION AND MANAGEMENT	-	LS	1
4	221	TEMPORARY EROSION CONTROL	-	LS	1
5	227	(SP)TURF REINFORCEMENT MAT	-	SY	114
6	230(A)	SOLID SLAB SODDING	1, 2	SY	30,579
7	303(A)	AGGREGATE BASE TYPE A	21	SY	24,378
8	310(B)	SUBGRADE, METHOD B	-	SY	25,823
9	325	SEPARATOR FABRIC	-	SY	30,291
10	409(A)	FABRIC REINFORCEMENT	-	SY	1,305
11	411(B)	SUPERPAVE, TYPE S3 (PG 70-28 OK)	11, 12	TON	4,669
12	411(B)	SUPERPAVE, TYPE S3 (PG 64-22 OK)	11, 12	TON	5,452
13	411(C)	SUPERPAVE, TYPE S4 (PG 70-28 OK)	11, 12	TON	2,474
14	411(E)	SUPERPAVE, TYPE S6 (PG 70-28 OK)	11, 12, 23	TON	18
15	412	COLD MILLING	-	SY	1,187
16	509(A)	CLASS AA CONCRETE	-	CY	1,870
17	509(D)	CLASS C CONCRETE	-	CY	121
18	511(A)	REINFORCING STEEL	-	LB	239,659
19	609(B)	2'-2" COMB. CURB & GUTTER (6" BARRIER)	9	LF	8,801
20	610(A)	4" CONCRETE SIDEWALK	9	SY	2,185
21	610(A)	4" DECORATIVE CONCRETE SIDEWALK	20	SY	784
22	610(B)	6" CONCRETE DRIVEWAY	7, 9, 14	SY	1,287
23	610(I)	TACTILE WARNING DEVICE-NEW	-	SF	38
24	611(A)	MANHOLE (4' DIA), COMPLETE IN PLACE	-	EA	2
25	611(A)	MANHOLE (6' DIA), COMPLETE IN PLACE	-	EA	2
26	611(B)	ADD'L DEPTH IN MANHOLE (4' DIA), COMPLETE IN PLACE	-	VF	2
27	611(G)	INLET (SMD TYPE 1), COMPLETE IN PLACE	5	EA	11
28	611(G)	INLET (SMD TYPE 2A), COMPLETE IN PLACE	5	EA	4
29	611(G)	INLET CI DES 2, COMPLETE IN PLACE	5	EA	16
30	611(G)	INLET CI DES 2B, COMPLETE IN PLACE	5	EA	2
31	611(G)	INLET CI DES 3, COMPLETE IN PLACE	5	EA	4
32	611(G)	INLET CI DES 3 W/ AMH, COMPLETE IN PLACE	5	EA	1
33	611(H)	ADD'L DEPTH IN INLET SMD TYPE 1, COMPLETE IN PLACE	22	VF	9
34	611(H)	ADD'L DEPTH IN INLET SMD TYPE 2A, COMPLETE IN PLACE	22	VF	1
35	611(H)	ADD'L DEPTH IN INLET CI DES. 2, COMPLETE IN PLACE	22	VF	48
36	611(H)	ADD'L DEPTH IN INLET CI DES. 3, COMPLETE IN PLACE	22	VF	7
37	611(H)	ADD'L DEPTH IN INLET CI DES. 3 W/ AMH, COMPLETE IN PLACE	22	VF	2
38	611(L)	7' X 6' JUNCTION BOXES, COMPLETE IN PLACE	24	EA	2
39	611(L)	10' X 5' JUNCTION BOXES, COMPLETE IN PLACE	24	EA	6
40	611(L)	10' X 6' JUNCTION BOXES, COMPLETE IN PLACE	24	EA	1
41	611(L)	10' X 10' JUNCTION BOXES, COMPLETE IN PLACE	24	EA	1
42	611(L)	12' X 5' JUNCTION BOXES, COMPLETE IN PLACE	24	EA	1
43	612(E)	VALVE BOXES ADJUST TO GRADE	-	EA	2
44	613(A)	18" R.C. PIPE CLASS III, COMPLETE IN PLACE	3, 10	LF	1,211
45	613(A)	24" R.C. PIPE CLASS III, COMPLETE IN PLACE	3, 10	LF	312
46	613(A)	30" R.C. PIPE CLASS III, COMPLETE IN PLACE	3, 10	LF	313
47	613(A)	36" R.C. PIPE CLASS III, COMPLETE IN PLACE	3, 10	LF	114
48	613(A)	42" R.C. PIPE CLASS III, COMPLETE IN PLACE	3, 10	LF	704
49	613(A)	54" R.C. PIPE CLASS III, COMPLETE IN PLACE	3, 10	LF	223
50	613(A)	72" R.C. PIPE CLASS III, COMPLETE IN PLACE	3, 10	LF	1,334
51	613(A)	38" X 60" R.C. PIPE, ELLIPTICAL, CLASS HE-III, COMPLETE IN PLACE	-	LF	279
52	613(M)	TYPE A4 CULVERT END TREATMENT, COMPLETE IN PLACE	-	EA	1
53	619(A)	REMOVAL OF STRUCTURES AND OBSTRUCTIONS	6, 8, 16, 17	EA	1
54	619(B)	REMOVAL OF CURB AND GUTTER	6, 17, 18	LF	898
55	619(B)	REMOVAL OF CONCRETE PAVEMENT	6, 17, 18	SY	7
56	619(B)	REMOVAL OF ASPHALT PAVEMENT	6, 17, 18	SY	13,940
57	619(B)	REMOVAL OF DRIVEWAY	6, 17, 18	SY	1,623
58	619(B)	REMOVAL OF SIDEWALK	6, 17, 18	SY	308
59	619(B)	REMOVAL OF FENCE	6, 17, 18	LF	255
60	624(E)	FENCE-STYLE CLF (4' HIGH, CLASS A)	26	LF	183
61	629(D)	REMOVE AND RESET MAILBOX	19	EA	11
62	641	MOBILIZATION	-	LS	1
63	642	CONSTRUCTION STAKING	4	LS	1
64	880(J)	CONSTRUCTION TRAFFIC CONTROL	-	LS	1
65	SPECIAL	ADD'L DEPTH IN 7' X 6' JUNCTION BOX	25	VF	1
66	SPECIAL	ADD'L DEPTH IN 10' X 5' JUNCTION BOX	25	VF	21
67	SPECIAL	ADD'L DEPTH IN 10' X 6' JUNCTION BOX	25	VF	4
68	SPECIAL	ADD'L DEPTH IN 10' X 10' JUNCTION BOX	25	VF	3
69	SPECIAL	ADD'L DEPTH IN 12' X 5' JUNCTION BOX	25	VF	3
70	SPECIAL	4' DIA. SANITARY SEWER MANHOLE, COMPLETE IN PLACE	-	EA	1
71	SPECIAL	ADD'L DEPTH IN SANITARY SEWER MANHOLE (4' DIA), COMPLETE IN PLACE	-	VF	5
72	SPECIAL	POLYVINYL CHLORIDE PIPE (PVC)(18 INCH)	-	LF	153
73	SPECIAL	ADD'L DEPTH EXCAVATION	-	SY	50
74	SPECIAL	SMD TYPE 1 GRATE	-	EA	5

BASE BID - TRAFFIC					
ITEM NO.	SPEC. NO.	DESCRIPTION	PAY ITEM NOTES	UNIT	QUANTITY
75	802(B)	2" PVC SCH.40 PLASTIC CONDUIT TRENCHED		LF	38
76	804(A)	STRUCTURAL CONCRETE		CY	0.5
77	804(B)	REINFORCING STEEL		LB	44
78	805(A)	(PL) REMOVAL OF TRAFFIC SIGNAL EQUIPMENT	T-9	LSUM	1
79	805(D)	(PL) REMOVE & RESET EXISTING SIGNS		EA	5
80	806(B)	10' MTG.HT.TS PED. POLE (G.STL.)		EA	1
81	830	PEDESTRIAN PUSH BUTTON		EA	2
82	831	1 WAY 3 SEC. ADJ. SIG. HD. S-6	T-2,T-10	EA	2
83	831	1 WAY 3 SEC. ADJ. SIG. HD. S-9	T-2,T-10	EA	2
84	831	1 WAY 2 SEC. ADJ. PED. SIG. HD. S-20	T-2,T-10	EA	2
85	833	BACKPLATE		EA	6
86	834(A)	5/C TRAF. SIG. EL. CABLE		LF	423
87	834(A)	15/C TRAF. SIG. EL. CABLE		LF	58
88	834(B)	2/C SHIELDED LOOP DETECTOR LEAD-IN CABLE		LF	12
89	850(A)	SHEET ALUMINUM SIGNS	T-1	SF	22
90	855(A)	TRAFFIC STRIPE (PLASTIC) (4" WIDE)	T-6	LF	16,215
91	855(A)	TRAFFIC STRIPE (PLASTIC) (8" WIDE)	T-7	LF	1,039
92	855(A)	TRAFFIC STRIPE (PLASTIC) (24" WIDE)	T-8	LF	704
93	855(B)	TRAFFIC STRIPE (PLASTIC) (ARROWS)	T-5	EA	20
94	857	PAVEMENT MARKING REMOVAL (TRAFFIC STRIPE)		LF	2,378
95	857	PAVEMENT MARKING REMOVAL (ARROWS)		EA	6
96	857	PAVEMENT MARKING REMOVAL (WORDS)		EA	3
97	890	(PL) TRAFFIC ITEMS (OPTI-COM SYSTEM MODIFICATIONS)	T-3,T-12	LSUM	1
98	890	(PL) TRAFFIC ITEMS (VIDEO DETECTION REINSTALLATION)	T-11	LSUM	1
99	890	(PL) TRAFFIC ITEMS (POLE AND 62' TS MST.ARM (G.STL.)		EA	1
100	SPECIAL	48" SIGNAL FOOTING S-62/70		EA	1

PAY ITEM NOTES (ROADWAY)

- THE PAY ITEM SOLID SLAB SODDING SHALL INCLUDE THE REPLACEMENT OF BACK FILL AND SOD AT EXISTING GRASS AREAS THAT MAY BE DAMAGED DURING CONSTRUCTION. CONTRACTOR SHALL REPLACE WITH LIKE SOD AT NO ADDITIONAL EXPENSE TO THE CITY OF BIXBY. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE REPAIR OR REPLACEMENT OF DAMAGE TO EXISTING THAT EXCEEDS THESE LIMITS.
- THE COST FOR SOLID SLAB SODDING INCLUDE THE COST OF FERTILIZING AND WATERING. FERTILIZER SHALL BE 10–20–10 APPLIED AT A RATE OF 1.5 POUNDS PER 10 SQUARE YARDS OF SOD. FERTILIZER SHALL BE APPLIED PER SECTION 230.04(H). WATERING SHALL BE APPLIED AS NECESSARY UNTIL VEGETATION IS ESTABLISHED OR UNTIL THE WORK IS ACCEPTED AS COMPLETE.
- PAY ITEM INCLUDES JOINT SEALANT, TRENCH EXCAVATION, BEDDING, BACK FILL, AND INCIDENTALS TO COMPLETELY CONSTRUCT PIPE.
- ALL STAKING AND SURVEYING NECESSARY TO COMPLETELY CONSTRUCT ALL ITEMS OF PROJECT SHALL BE PERFORMED BY A REGISTERED LICENSED SURVEYOR IN THE STATE OF OKLAHOMA. FINISHED GRADES TO BE APPROVED BY THE INSPECTOR. ALL RESPONSIBILITIES DESCRIBED IN PARAGRAPH "A" OF SECTION 642 OF THE 2009 ODOT STANDARD SPECIFICATIONS SHALL BE PERFORMED BY THE CONTRACTOR.
- PAY ITEM INCLUDES INLET STRUCTURE, FLOWABLE FILL AGG BASE, JOINT SEALANT, EXCAVATION, BEDDING AND BACKFILL, REINFORCING STEEL, CONCRETE, LABOR, AND INCIDENTALS TO COMPLETELY CONSTRUCT INLET.
- THE PAYMENT, INCLUDES BUT NOT LIMITED TO SAWING PAVEMENT, DEMOLITION, REMOVAL HAULING, DISPOSAL, MATERIALS AND LABOR TO REMOVE OR CONSTRUCT, BACK FILL AND COMPACTION, AND INCIDENTALS TO BE INCLUDED IN THESE ITEMS.
- THIS ITEM SHALL INCLUDE THE COST OF ALL CURB AND GUTTER ASSOCIATED WITH THE DRIVEWAY RADII AND THROUGH THE DRIVEWAY OPENING.
- SALVAGED GRATES AND FRAMES TO BECOME PROPERTY OF THE CITY OF BIXBY. PIPE REMOVED BECOME PROPERTY OF THE CONTRACTOR.
- ALL SAW CUTTING, DOWELS, AND SEALING SHALL BE INCLUDED IN THE COST OF THE ITEM.
- OMNI-FLEX GASKETS, OR APPROVED EQUAL, SHALL BE USED IN ALL REINFORCED CONCRETE PIPE JOINTS. COST TO BE INCLUDED IN THIS ITEM OF WORK.
- PAY FACTOR FOR AVERAGE LOT DENSITY OF ASPHALT PAVING UNDER SPECIFICATION NO. 411 SHALL BE USED FOR THIS PROJECT. ASPHALT ESTIMATED AT 112 LBS. PER SQUARE YARD PER 1" THICK.
- THE COST OF TACK COAT, EDGE JOINT MATERIAL, SCREENINGS FOR BLOTING AND ALL LABOR ASSOCIATED WITH THE PLACEMENT OF THIS ITEM SHALL BE INCLUDED IN THE UNIT BID FOR THIS ITEM. TACK COAT SHALL BE APPLIED AT A RATE OF 0.5 GALLONS PER SQUARE YARD PRIOR TO DILUTION.
- THIS PAY ITEM INCLUDES THE COST OF PLACING SUITABLE BACK FILL FOR ALL ITEMS OF WORK.
- QUANTITY INCLUDES 6" AGGREGATE BASE UNDER NEW DRIVEWAYS.
- PAYMENT SHALL BE MADE PER PLAN QUANTITIES FOR ALL EXCAVATION REQUIRED. NO ADDITIONAL PAYMENT SHALL BE MADE UNLESS QUANTITIES ARE EXTENDED TO ACCOUNT FOR ADDITIONAL WORK ADDED TO THE SCOPE OF THE PROJECT.
- INCLUDES REMOVAL OF ALL EXISTING ROADWAY DRAINAGE STRUCTURE, HEADWALLS (UNLESS OTHERWISE SPECIFIED), INLETS, FENCE, AND OTHER STRUCTURES WITHIN THE RIGHT-OF-WAY.
- TO BECOME THE PROPERTY OF AND BE DISPOSED OF BY THE CONTRACTOR IN A MANNER APPROVED BY THE ENGINEER.
- MATERIALS REMOVED SHALL NOT BE MEASURED FOR PAYMENT UNDER SECTION 202.06 UNCLASSIFIED EXCAVATION.

- THE CONTRACTOR SHALL REMOVE AND RESET MAILBOXES AS NECESSARY. MAILBOXES ARE TO BE MAINTAINED IN AN UPRIGHT POSITION AND ACCESSIBLE TO MAIL CARRIER'S CAR DURING CONSTRUCTION. ANY DAMAGE TO BOXES OR SUPPORTS SHALL BE REPAIRED BY THE CONTRACTOR ALL COST TO BE INCLUDED IN OTHER ITEMS OF WORK.
- STAMPED CONCRETE SIDEWALK SHALL BE INSTALLED WITH RUNNING BOND BRICK PATTERN. COLOR SHALL BE INTEGRAL AND MATCH HUE WITH FEDERAL STANDARD AMS-595 # 21105 (RED), OR APPROVED EQUAL, PAINTING OF STAMPED CONCRETE IS PROHIBITED AND WILL RESULT IN REJECTION OF WORK PRODUCT.
- AGGREGATE BASE UNDER ROADWAY AND NEW STREET RETURNS SHALL BE 12" THICK.
- ADDITIONAL DEPTH QUANTITIES SHALL BE MEASURED AND PAID FOR ALL INLETS EXCEEDING STANDARD DEPTH. STANDARD DEPTHS ARE AS FOLLOWS:
 - CAST IRON CURB INLET: 2.67 VF, MEASURED FROM LOWEST GRATE ELEVATION TO FLOWLINE OF OUTLET PIPE.
 - STANDARD MEDIAN DRAINS TYPE 1: 2.56 VF FOR 18" PIPE AND 3.10 VF FOR 24" PIPE, MEASURED FROM LOWEST ELEVATION OF INFLOW APRON TO FLOWLINE OF OUTLET PIPE.
 - STANDARD MEDIAN DRAINS TYPE 2A: 3.65 VF MEASURED FROM LOWEST ELEVATION OF INFLOW APRON TO FLOWLINE OF OUTLET PIPE.
- LOCATIONS TO BE DETERMINED IN THE FIELD AND WORK TO BE PERFORMED AT THE DIRECTION OF THE FIELD ENGINEER. QUANTITY IS ESTIMATED AND MAY BE OMITTED IN ITS ENTIRETY.
- PAY ITEM INCLUDES JUNCTION STRUCTURE, FLOWABLE FILL AGG BASE, JOINT SEALANT, EXCAVATION, BEDDING AND BACKFILL, REINFORCING STEEL, CONCRETE, LABOR, AND INCIDENTALS TO COMPLETELY CONSTRUCT JUNCTION BOX.
- ADDITIONAL DEPTH QUANTITIES SHALL BE MEASURED AND PAID FOR ALL JUNCTION BOXES EXCEEDING STANDARD DEPTH. STANDARD DEPTH IS 5.00 VF MEASURED FROM THE TOP OF THE STRUCTURE TO THE FLOWLINE OF THE OUTLET PIPE.
- PRICE BID FOR FENCE TO INCLUDE THE COST OF ALL GATES AND APPURTENANCES.

PAY ITEM NOTES (TRAFFIC)

- INCLUDED IN THIS PAY ITEM IS ALL THE HARDWARE AND POSTS ASSOCIATED WITH COMPLETELY INSTALLING SIGNS IN ACCORDANCE WITH ODOT STANDARD DRAWINGS SSPI-1 AND SSA1-1.
- ALL LED TRAFFIC SIGNAL LENSES SHALL BE FURNISHED AND INSTALLED IN THIS PROJECT. THE LED TRAFFIC MODULES, LENSES, AND ALL ASSOCIATED MATERIAL AND EQUIPMENT SHALL CONFORM TO I.T.E. VEHICLE TRAFFIC CONTROL SIGNAL HEAD (VTCSH) STANDARDS IN EFFECT AT THE TIME THE ORDER IS PLACED. LED HEADS SHALL BE CAPABLE OF OPERATION WITHOUT REFLECTOR.
- THE PRIORITY CONTROL SYSTEM SHALL INTERFACE WITH THE TRAFFIC CONTROLLER TO GIVE EMERGENCY VEHICLES APPROACHING THE INTERSECTION A GREEN WITH ALL OTHER INDICATIONS RED. THE PRIORITY CONTROL SYSTEM PROVIDED ON THIS PROJECT SHALL BE COMPLETELY COMPATIBLE WITH THE EXISTING 3M SYSTEM CURRENTLY BEING USED BY THE CITY. THIS ITEM ALSO INCLUDES MODEL 752 PHASE SELECTION AND 722 OPTICAL DETECTORS ALONG WITH ANY BRACKETS, EMITTER, CABLE AND WIRING NEEDED TO INSTALL SYSTEM. COMPATIBILITY SHALL BE VERIFIED WITH CITY EMERGENCY PERSONNEL. AN APPROVED EQUAL MY BE SUPPLIED FOR THE PROJECT ONLY UPON APPROVAL BY THE CITY OF BIXBY EMERGENCY PERSONNEL. ANY VARIANCES IN THE EQUIPMENT SUPPLIED MUST BE APPROVED BY THE CITY OF BIXBY EMERGENCY PERSONNEL PRIOR TO INSTALLATION.
- NOT USED.
- SYMBOLS AND LEGENDS ARE DIAGRAMMATIC ONLY AND LOCATIONS SHALL BE ADJUSTED FOR EXISTING FIELD CONDITIONS. BUT NO MAJOR ALTERATIONS OR RELOCATIONS WILL BE MADE WITHOUT FIRST CONSULTING WITH THE ENGINEER.
- QUANTITY SHOWN INCLUDES 13,563 L.F. TRAFFIC STRIPE (THERMOPLASTIC). TRAFFIC STRIPE (THERMOPLASTIC) WILL BE MEASURED BY THE LINEAR FOOT OF 4" WIDE TRAFFIC STRIPE.
- QUANTITY SHOWN INCLUDES 846 L.F. TRAFFIC STRIPE (THERMOPLASTIC)(WHITE). TRAFFIC STRIPE (THERMOPLASTIC) WILL BE MEASURED BY THE LINEAR FOOT OF 8" WIDE TRAFFIC STRIPE.
- QUANTITY SHOWN INCLUDES 690 L.F. TRAFFIC STRIPE (THERMOPLASTIC)(WHITE). TRAFFIC STRIPE (THERMOPLASTIC) WILL BE MEASURED BY THE LINEAR FOOT OF 24" WIDE TRAFFIC STRIPE.
- ALL TRAFFIC SIGNAL EQUIPMENT REMOVED (INCLUDING FOOTING) SHALL BECOME THE PROPERTY OF THE CONTRACTOR. THE PRICE BID SHALL INCLUDE THE REMOVAL OF ALL FOOTINGS BELOW COMPACTED GRADE OR AS DIRECTED BY THE ENGINEER.
- TRAFFIC SIGNAL HEAD FACES ARE TO BE COMPLETELY COVERED FROM THE TIME THEY ARE INSTALLED UNTIL PLACED IN FLASHING OR FULL OPERATION. COVERING ONLY THE LENSES IS NOT ACCEPTABLE.
- PAY ITEM SHALL INCLUDE MOVING EXISTING VIDEO DETECTION CAMERA TO PROPOSED POLE B. PAY ITEM SHALL ALSO INCLUDE INSTALLING NEW WIRING FROM CONTROLLER CABINET TO POLE B. PAY ITEM SHALL ALSO INCLUDE ALL LOOP DETECTOR RELOCATIONS.
- PAY ITEM TO INCLUDE WORK TO INSTALL OPTICOM FOR NEW SIGNALS AND CORRECT EXISTING OPTICOM FOR PHASES 2(NB) AND 6(SB) THAT ARE NOT WORKING CORRECTLY. CONTRACTOR TO ENSURE OPTICOM SYSTEM IS FULLY FUNCTIONING FOR ALL PHASES AFTER SIGNAL INSTALLATION.

CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNETTCEC.COM
STATE OF OK CERTIFICATE OF AUTHORIZATION
CAB 12 EXPIRES: 2004-06-30
COPYRIGHT ©2017 CEC. ALL RIGHTS RESERVED.
THIS DOCUMENT IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR USE OF THIS DOCUMENT
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

PROFESSIONAL
ENGINEER
TULSA, OKLAHOMA
131ST ST. - MEMORIAL TO MINGO
PRELIMINARY
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

REVISION HISTORY

DATE	DESCRIPTION

SUBMITTAL:

PRELIMINARY

DATE:	PROJECT NO:	DESIGNED BY:	DRAWN BY:	APPROVED BY:	SCALE:
11/30/2023	170231.0102	J.L.C.	J.L.C.	S.N.H.	AS SHOWN

131ST ST. - MEMORIAL TO MINGO

PAY ITEMS & NOTES
(ROADWAY)

SHEET
2

BIXBY, OKLAHOMA

Page 5 of 215

SUMMARY OF WATERLINE QUANTITIES					
ITEM NO.	SPEC NO.	DESCRIPTION	PAY ITEM NOTES	UNIT	TOTAL
W-1	309	12-INCH PVC PIPE, C900, DR14	W-1.2.3.7	LF	523
W-2	309	6-INCH PVC PIPE, C900, DR14	W-1.2.3.7	LF	300
W-3	312	12-INCH X 12-INCH TEE, RJ, AWWA C110/153	W-2.6	EA	1
W-4	312	12-INCH X 6-INCH TEE, RJ, AWWA C110/153	W-2.6	EA	1
W-5	312	6-INCH X 6-INCH TEE, RJ, AWWA C110/153	W-2.6	EA	1
W-6	312	12-INCH 45 DEGREE BEND, RJ, AWWA C110/153	W-2.6	EA	36
W-7	312	6-INCH 45 DEGREE BEND, RJ, AWWA C110/153	W-2.6	EA	44
W-8	312	12-INCH 22.5 DEGREE BEND, RJ, AWWA C110/153	W-2.6	EA	1
W-9	312	12-INCH SOLID SLEEVE	W-2.6	EA	18
W-10	312	6-INCH SOLID SLEEVE	W-2.6	EA	22
W-11	317	12-INCH GATE VALVE, RJ	W-5.6	EA	1
W-12	317	6-INCH GATE VALVE, RJ	W-5.6	EA	1
W-13	318	VALVE BOX	-	EA	2
W-14	-	3-WAY FIRE HYDRANT, COMPLETE IN PLACE	W-5.6	EA	2

WATERLINE GENERAL CONSTRUCTION NOTES:

- ALL WATER LINE CONSTRUCTION AND MATERIALS SHALL BE IN ACCORDANCE WITH THE CURRENT SPECIFICATIONS FOR WATER AND WASTEWATER. CITY OF BIXBY DEPARTMENT OF PUBLIC WORKS AND OKLAHOMA DEQ CHAPTER 626.
2. CONTRACTOR SHALL CONNECT METERS TO NEW WATER MAIN ONLY AFTER NEW WATER MAIN IS PUT IN TO SERVICE.
3. MINIMUM COVER OVER WATER LINES SHALL BE 3 FEET.
4. CONTRACTOR SHALL REPLACE EXISTING GRASS WITH SEED/SOD OF THE SAME TYPE AND VARIETY.
5. CONTRACTOR IS REQUIRED TO GIVE THE CITY OF BIXBY FORTY-EIGHT (48) HOURS NOTICE IF WATER IS TO BE TURNED OFF. THE CITY OF BIXBY PUBLIC WORKS DEPARTMENT IS TO OPERATE ALL WATER VALVES.
6. CONTRACTOR SHALL GIVE THE NOTIFICATION CENTER OF THE OKLAHOMA ONE-CALL SYSTEM, INC. NOTICE OF ANY EXCAVATING NO EARLIER THAN TEN (10) DAYS. NOR LATER THAN 48 HOURS. EXCLUDING SATURDAYS, SUNDAYS, AND LEGAL HOLIDAYS. PRIOR TO COMMENCEMENT OF WORK. PHONE 1-800-522-6543.
7. UTILITIES SHOWN HEREIN ARE INTENDED FOR INFORMATION PURPOSES ONLY AND ARE NOT TO BE CONSTRUED AS THE EXTENT OR EXACT LOCATION AND DEPTH OF UTILITIES THAT MAY BE ENCOUNTERED DURING THE COURSE OF CONSTRUCTION. THE CONTRACTOR SHALL FIELD VERIFY THE PRESENCE, TYPE, SIZE, LOCATION AND DEPTH OF ALL EXISTING UTILITIES IN THE PROJECT AREA PRIOR TO CONSTRUCTION.
8. EXISTING SERVICE CONNECTIONS ARE TO BE KEPT OPERABLE UNTIL NEW CONNECTIONS ARE MADE. ALL RECONNECTIONS OF SERVICE LINES SHALL BE MADE BY THE CONTRACTOR. SERVICE CONNECTIONS SHALL BE INSTALLED AS PER CITY OF BIXBY WATER STANDARDS. METERS ON THE SAME SIDE OF THE STREET AS THE NEW WATER LINE SHALL HAVE THE SERVICE CONNECTION REPLACED ALL THE WAY TO THE METER. FORE METERS ON THE OPPOSITE SIDE OF THE STREET AS THE NEW WATER LINE. THE CONTRACTOR SHALL STUB ONTO THE EXISTING SERVICE LINE WITH A COMPRESSION COUPLING AND LAY NEW LINE TO THE PIPE CONNECTION. ALL CONNECTIONS MAD ON P.V.C PIPE SHALL HAVE A SERVICE CLAMP.
9. ABANDONED LINES MAY BE LEFT IN PLACE IF THEY DO NOT INTERFERE WITH ANY SALVAGEABLE MATERIAL. ALL ABANDONED LINE MUST BE CUT AND PLUGGED.
10. PROPERTY DIMENSIONS SHOWN ARE FROM RECORDED PLATS AND FIELD SURVEYS. ALL WATER SERVICE CONNECTIONS HAVE BEEN SHOWN BASED UPON FIELD SURVEYS AND PUBLIC WORKS DEPARTMENT RECORDS.
11. CONTRACTOR SHALL VERIFY DEPTH OF EXISTING WATERLINES AT CONNECTIONS IN ORDER TO ADJUST DEPTH OF FITTINGS.
12. ALL EXCAVATED MATERIALS NOT REQUIRED IN OTHER AREAS OF THE PROJECT SHALL BECOME THE PROPERTY OF THE CONTRACTOR AND SHALL BE DISPOSED OF BY THE CONTRACTOR IN A MANNER ACCEPTABLE TO THE ENGINEER WITHOUT COST TO THE CITY OF BIXBY.
13. ALL STAKING AND SURVEYING NECESSARY TO COMPLETELY CONSTRUCT ALL OF THIS WATERLINE PROJECT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR AND SHALL BE PERFORMED BY A REGISTERED LICENSED SURVEYOR IN THE STATE OF OKLAHOMA WITH FINISH GRADES TO BE APPROVED BY THE INSPECTOR.
14. WATER USED DURING CONSTRUCTION SHALL BY METERED AND PAID FOR BY THE CONTRACTOR AT THE CURRENT RATE.

PAY ITEM NOTES - WATERLINE:

- W-2 TESTING AND CHLORINATION OF WATER MAINS SHALL BE PERFORMED BY THE CONTRACTOR. TESTING, CHLORINATION, AND FLUSHING SHALL BE DONE IN ACCORDANCE WITH SECTION 109.3 OF THE GENERAL SPECIFICATIONS. CONTRACTOR SHALL FURNISH AND INSTALL TEMPORARY PLUGS WITH ADEQUATE BLOCKING OR RESTRAINTS, PLUS CORPORATION COCKS, AS DIRECTED BY CITY TESTING PERSONNEL. THEN, ONCE TESTING, CHLORINATION AND FLUSHING IS COMPLETED REMOVE TEMPORARY BLOCKING AND CORPORATION CLOCKS AND TIE IN TO EXISTING SYSTEM. USING FITTINGS SWABBED INTERNALLY WITH 2% BLEACH SOLUTION. TESTING, CHLORINATION, AND FLUSHING OF NEW WATER MAIN SHALL BE PERFORMED BY THE CITY PERSONNEL ON MAINS WHICH ARE PHYSICALLY DISCONNECTED FROM THE EXISTING WATER SYSTEM. TESTING, CHLORINATION, AND FLUSHING OF NEW WATER MAINS SHALL NOT BE PERFORMED AGAINST VALVES WHICH ARE PHYSICALLY CONNECTED TO THE EXISTING SYSTEM. SEE SPECIAL PROVISIONS FOR TESTING AND CHLORINATION NOTES. ALL COSTS FOR TEMPORARY PLUGS, BLOCK, RESTRAINING, CORPORATION COCKS, TUBING, THREADED CONNECTIONS, BLEACH AND OTHER INCIDENTALS SHALL BE INCLUDED IN THE UNIT PRICE BID FOR PIPE.
- W-2 POLYWRAP COVERING IS APPROVED FOR FITTINGS. POLYWRAP SHOULD NOT BE USED ON PVC PIPE. COST TO BE INCLUDED IN UNIT PRICE BID FOR PIPE.
- W-3 CONTRACTOR TO EXCAVATE ALL UTILITY CROSSINGS AHEAD OF PIPE LAYING SO THAT THE GRADES CAN BE ADJUSTED ON THE PROPOSED WATER MAIN TO AVOID UTILITY CONFLICTS. FAILURE TO DO SO SHALL NOT ENTITLE THE CONTRACTOR TO CLAIM EXTRA COMPENSATION FOR ADJUSTMENTS TO THE PROPOSED WATER MAIN. COST FOR EXCAVATING UTILITY CROSSINGS AND BORING OF LOCATIONS AS SHOWN ON PLANS SHALL BE INCLUDED IN PIPE.
- W-4 CONTRACTOR SHALL INSURE ALL POLES WHICH ARE EFFECTED BY TRENCHING CONDITIONS ARE BRACED BY OWNERS. PAYMENT SHALL BE INCLUDED IN "RIGHT-OF-WAY CLEARING AND RESTORING". NO ADDITIONAL PAYMENT SHALL BE MADE.
- W-5 SALVAGED HYDRANTS, VALVES AND OTHER FITTINGS SHALL BE DELIVERED TO THE CITY OF BIXBY. PAYMENT TO BE MADE UNDER "RIGHT-OF-WAY CLEARING AND RESTORING". NO ADDITIONAL PAYMENT SHALL BE MADE.
- W-6 ALL COSTS FOR COMPONENTS NECESSARY TO RESTRAIN JOINTS FOR PIPE FITTINGS DESIGNATED "RESTRAINED JOINT" OR "RJ" SHALL BE INCLUDED IN UNIT PRICE BID FOR PIPE OR FITTINGS. NO ADDITIONAL PAYMENT SHALL BE MADE.
- W-7 ALL ABANDONED WATERLINE SHALL BE CUT AND PLUGGED. COST TO BE INCLUDED IN UNIT PRICE BID FOR PIPE.

STANDARD WATERLINE CONSTRUCTION NOTES, CITY OF BIXBY

- ALL WATER DISTRIBUTION SYSTEMS SHALL BE CONSTRUCTED IN ACCORDANCE WITH THE CURRENT CITY OF BIXBY PUBLIC WORKS DEPARTMENT STANDARDS AND SPECIFICATIONS.
2. ALL WATER DISTRIBUTION SYSTEM CONSTRUCTION SHALL BE INSPECTED BY THE PUBLIC WORKS DEPARTMENT UTILITY INSPECTOR IN ACCORDANCE WITH CITY POLICY.
3. THE CITY PUBLIC WORKS DEPARTMENT SHALL OPERATE ALL VALVES, ALL VALVES SHALL BE LOCATED OUTSIDE OF STREET PAVING AND SHALL HAVE A 2' DIAMETER X 4" FORMED CONCRETE COLLAR INSTALLED AROUND VALVE BOXES.
4. THE CONTRACTOR SHALL VERIFY UTILITY LOCATIONS BEFORE EXCAVATING.
5. DUCTILE IRON PIPE SHALL BE C150 FOR LINES 6-INCH THROUGH 18-INCH DIAMETER AND C151 FOR LINES UNDER 6-INCH DIAMETER.
6. ALL UTILITY LINES LOCATED UNDER STREETS SHALL BE LAID IN TYPE A AGGREGATE BASE. THE TRENCH SHALL BE ENTIRELY BACKFILLED WITH LIMESTONE SCREENINGS, TYPE A AGGREGATE BASE, OR FLOWABLE FILL TO THE TOP OF PAVING SUBGRADE AND COMPACTED TO 95% STANDARD PROCTOR DENSITY.
7. PVC PIPE SHALL CONFORM TO AWWA C900 PRESSURE CLASS 200, EQUIVALENT TO DR-14 UNLESS OTHERWISE SHOWN.
8. WHEN C900 PVC IS USED, A NO. 8 BARE COPPER WIRE SHALL BE BURIED ON THE TOP SURFACE OF THE PIPE CONNECTED TO EACH FIRE HYDRANT BY COLD WELD BRAISING OR ATTACHING TO A BOLT, JUST ABOVE GROUND LEVEL.
9. ALL IRON PIPE SHALL BE POLYWRAPPED. ALL FITTINGS AND VALVES SHALL BE POLYWRAPPED DUCTILE OR CAST IRON.
10. ALL FITTINGS, VALVES, AND JOINTS SHALL BE RESTRAINED USING MEGA LUGS OR OTHER APPROVED MECHANICAL RESTRAINT SYSTEM OR PRODUCT.
11. ALL DISTRIBUTION LINES IN CONDUIT AND AT DRAINAGE FEATURE CROSSING SHALL BE CONSTRUCTED WITH RESTRAINED JOINTS.
12. ALL MAIN LINES SHALL HAVE A MINIMUM OF THREE (3) FEET AND MAXIMUM OF EIGHT (8) FEET OF COVER.
13. ALL WATER DISTRIBUTION SYSTEM LINES, EXCEPT DEAD END FOR FIRE HYDRANTS ONLY, SHALL BE LOOPED TO PROVIDE CIRCULATION.
14. DISTRIBUTION LINES SMALLER THAN SIX (6) INCHES SHALL NOT BE INSTALLED.
15. BEDDING, BACKFILL, AND COMPACTION OVER WATER LINES SHALL BE IN ACCORDANCE WITH CITY STANDARD DRAWINGS, BACKFILL AND COMPACTION REQUIREMENT FOR STREETS SHALL EXTEND TWO (2) FEET BACK OF CURB.
16. WATER MAIN CONSTRUCTION SHALL INCLUDE THE COORDINATION OF FIRE HYDRANT BASES, VALVE BOXES WITH FINAL GRADES, PAVING AND LANDSCAPE.
17. FIRE HYDRANTS:
 - 17.1 FIRE HYDRANTS SHALL BE MUELLER CENTURION OR AVK AND MUST BE OIL-FILLED
 - 17.2 FIRE HYDRANTS SHOULD HAVE A 4-1/2 INCH PUMPER OUTLET. NOT LESS THAN 2-1/2 INCH HOSE OUTLETS AND BE CONNECTED TO THE MAIN WITH PIPE NOT SMALLER THAN SIX INCHES. THE PUMPER SHOULD BE ABLE TO CONNECT TO THE HYDRANT WITH A SINGLE 10 FEET LENGTH OF SUCTION HOSE. SET TO THE CENTER OF THE LOWEST OUTLET IS NOT LESS THAN 18-INCHES ABOVE THE SURROUNDING GRADE. THE HYDRANT OPERATING NUT SHOULD NOT BE OVER FOUR FEET ABOVE GRADE, AND SHALL HAVE A FOUR-FOOT-SIX-INCH LENGTH.
18. TAPS ON EXISTING WATER LINE SHALL BE CONSTRUCTED AS FOLLOWS: (1) STAINLESS STEEL SADDLES ARE REQUIRED: (2) THE TAPPING VALVE SHALL BE SUPPORTED BENEATH TO PRECLUDE THE WEIGHT OF THE TAPPING VALVE FROM BEARING ON THE PIPE AND SADDLE: (3) AFTER INSTALLATION OF SADDLE AND VALVE AND PRIOR TO THE TAP, THE SADDLE AND VALVE SHALL BE PRESSURE TESTED FOR A MINIMUM OF 1 MINUTE AT 100 PSI IN THE PRESENCE OF A CITY INSPECTOR : (4) THE PIPE COUPON FROM THE TAP SHALL BE RETAINED BY THE CONTRACTOR AND SUBMITTED TO THE CITY.
19. THE CITY SHALL BE NOTIFIED 48 HOURS PRIOR TO TESTING AND DISINFECTION. ESCROW PAYMENTS TO THE CITY FOR METER SETTINGS ARE THE RESPONSIBILITY OF THE CONTRACTOR.
20. FLUSHING, TESTING AND DISINFECTION SHALL BE PERFORMED BY THE CONTRACTOR AT HIS EXPENSE UNDER THE SUPERVISION OF THE CITY.
21. WHEN WORKING IN OR ADJACENT TO EXISTING SUBDIVISIONS ONLY ONE (1) DAYS WORTH OF TRENCH MAY BE OPEN AT A GIVEN TIME. THIS REQUIREMENT MAY BE MODIFIED, IN WRITING, BY THE PUBLIC WORKS DIRECTOR FOR A SPECIFIC PROJECT.
22. ROAD CLOSURE REQUESTS MUST BE SUBMITTED TO THE CITY OF BIXBY AND APPROVED BY THE CITY COUNCIL PRIOR TO CLOSURE.
23. SERVICE LINES SHALL BE TAPPED TO MAIN LINES USING MANUFACTURER APPROVED SADDLES FOR SPECIFIC MATERIAL UTILIZED.
24. SERVICE LINES SHALL BE DR 9 3408 PE OR SEAMLESS COPPER WATER TUBE MEETING THE REQUIREMENTS OF ASTM-888.
25. ALL SERVICE LINE FITTINGS SHALL BE BRASS WITH PACKED JOINT COMPRESSION, SOLDERED, OR THREADED CONNECTIONS.
26. LONG SERVICE LINES SHALL BE PLUGGED AND MAGNETIC TAPE IDENTIFYING WATERLINE SHALL BE PLANTED AT EACH END OF CONDUIT.
27. WHEN CONDUIT IS PROVIDED FOR SERVICE LINES IT SHALL BE SCHEDULE 40 PVC OR STRONGER.

[illegible]

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\3 GENERAL CONSTRUCTION NOTES.DWG

GENERAL CONSTRUCTION NOTES

1. ALL WORK SHALL BE DONE FOLLOWING THE LINES AND GRADES SHOWN ON THE DRAWINGS. ALL ADDITIONAL SURVEY, LAYOUT, AND MEASUREMENT SHALL BE PERFORMED BY THE CONTRACTOR AS PART OF THE WORK UNDER THIS CONTRACT.
2. ALL INCIDENTALS OR ITEMS NOT SPECIFICALLY IDENTIFIED SHALL BE INCLUDED IN OTHER ITEMS OF THE WORK.
3. THE CONTRACTOR SHALL BE RESPONSIBLE FOR ANY DAMAGE TO EXISTING PUBLIC AND PRIVATE PROPERTY AFFECTED BY HIS CONSTRUCTION OPERATIONS. RESTORATION OF ALL DAMAGES PROPERTY, BOTH PUBLIC AND PRIVATE, TO ITS ORIGINAL CONDITION SHALL BE PERFORMED BY AND AT THE EXPENSE OF THE CONTRACTOR. CONTRACTOR SHALL NOTIFY THE "OKIE ONE CALL SYSTEM" WELL IN ADVANCE OF CONSTRUCTION AS TO HIS INTENT AND SHALL HAVE THE UTILITIES LOCATED IN THE FIELD.
4. WHERE MATERIALS ARE TRANSPORTED IN THE PROSECUTION OF THE WORK, VEHICLES SHALL NOT BE LOADED BEYOND THE LOADING CAPACITY RECOMMENDED BY THE MANUFACTURER OF THE VEHICLE OR PRESCRIBED BY ANY FEDERAL, STATE, OR LOCAL LAW OR REGULATION.
5. FENCING, PAVEMENTS, OR OTHER IMPROVEMENTS DAMAGED OR REMOVED DURING CONSTRUCTION SHALL BE REPLACED TO AN EQUAL OR BETTER CONDITION BY THE CONTRACTOR. ALL COSTS TO BE INCIDENTAL TO THE PROJECT.
6. THE CONTRACTOR SHALL BE RESPONSIBLE FOR TEMPORARY FENCING AROUND THE CONSTRUCTION AREA. TEMPORARY FENCING SHALL BE INCIDENTAL TO THE CONSTRUCTION OF THE PROJECT AND WILL NOT BE PAID FOR SEPARATELY.
7. IT SHALL BE THE CONTRACTOR'S RESPONSIBILITY TO DEVELOP, FURNISH, AND MAINTAIN A TRAFFIC CONTROL PLAN INCLUDING ALL SIGNS, EQUIPMENT, AND INCIDENTALS TO PROVIDE CONVENIENCE, SAFETY, AND MAINTENANCE OF VEHICULAR AND PEDESTRIAN TRAFFIC FOR PUBLIC AND PRIVATE PROPERTIES WITHIN THE LIMITS OF THE PROJECT AND FOR THE DURATION OF CONSTRUCTION OPERATIONS. THE PLAN AND SIGNING SHALL BE IN ACCORDANCE WITH STANDARDS SET FORTH IN THE LATEST EDITION OF THE "MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES" AND IN ACCORDANCE WITH THE CITY OF BIXBY STANDARDS AND SHALL INCLUDE ALL FLAGS, FLAGMEN, BARRICADES, SIGNS, JACKETS, POSTS, TRAFFIC CONES, TRAFFIC BARRELS, LIGHTS, FENCING, AND ANY AND ALL OTHER APPURTENANCES REQUIRED. ALLEYS AND SINGLE LANES MAY BE CLOSED UPON APPROVAL OF THE CITY ENGINEER. ACCESS MUST BE MAINTAINED TO ALL HOMES.
8. COMPACTION UNDER PAVEMENTS AND SIDEWALKS SHALL BE 95% STANDARD PROCTOR DENSITY.
9. ALL OVERLAND DRAINAGE PATTERNS SHALL BE RE-ESTABLISHED AFTER CONSTRUCTION OF THE PROPOSED IMPROVEMENTS.
10. ALL DISTURBED AREAS SHALL BE VEGETATED AS PER PLANS AND SPECIFICATIONS.
11. ALL EXCAVATED MATERIALS NOT REQUIRED IN OTHER AREAS OF THE PROJECT, INCLUDING SOILS, CONCRETE PAVEMENT, AND CURB REMOVALS, SHALL BECOME THE PROPERTY OF THE CONTRACTOR AND SHALL BE DISPOSED OF BY THE CONTRACTOR IN A MANNER ACCEPTABLE TO THE ENGINEER WITHOUT COST TO THE CITY OF BIXBY.
12. TREES AND SHRUBS THAT MUST BE REMOVED FOR CONSTRUCTION OF THE PROPOSED IMPROVEMENTS AND CLEARING OF THE RIGHT-OF-WAY SHALL BE COMPLETELY REMOVED BY THE CONTRACTOR. STUMPS SHALL BE CUT OUT AND REMOVED FROM THE SITE OR MILLED TO 1' BELOW FINISH GROUND LEVEL. COST TO BE INCIDENTAL TO THE PROJECT.
13. RUBBLE FROM THE REMOVAL OF MISCELLANEOUS STRUCTURES AND DEBRIS FROM TREE AND STUMP REMOVAL SHALL BECOME THE PROPERTY OF THE CONTRACTOR AND SHALL BE DISPOSED OF OFF-SITE AT THE CONTRACTOR'S EXPENSE.
14. ALL OPEN TRENCHES AND OTHER EXCAVATIONS SHALL BE PROTECTED WITH SUITABLE BARRIERS, SIGNS, AND LIGHTS. OBSTRUCTIONS, SUCH AS MATERIAL PILES AND EQUIPMENT, SHALL BE PROTECTED WITH SIMILAR WARNING SIGNS AND LIGHTS. ALL BARRICADES, SIGNS, LIGHTS, AND OTHER PROTECTIVE DEVICES SHALL BE INSTALLED AND MAINTAINED IN A MANNER ACCEPTABLE TO THE OWNER.
15. THE CONTRACTOR SHALL EXERCISE CAUTION IN THE PROGRESS OF THE WORK IN ORDER TO PREVENT INTERRUPTION OF EXISTING UTILITIES AND SHALL COORDINATE CONSTRUCTION OPERATIONS WITH ALL UTILITY COMPANIES FOR THE RELOCATION OF THEIR LINES PRIOR OR CONCURRENT WITH CONSTRUCTION OPERATIONS AS REQUIRED.
16. CONTRACTOR SHALL DETERMINE THE LOCATION AND ELEVATION OF EXISTING LINES TO BE CROSSED, TAPPED, OR CONNECTED WELL IN ADVANCE OF CONSTRUCTION TO ALLOW FOR ALIGNMENT OF LINES, STRUCTURES, AND FITTINGS AS INDICTED ON THE PLANS. PAYMENT FOR ADDITIONAL FITTINGS, IN ADDITION TO WHAT IS INDICATED ON THE PLANS, WILL NOT BE PAID FOR AND WILL BE CONSIDERED INCIDENTAL TO THE CONSTRUCTION OF THE PROJECT.
17. COSTS ASSOCIATED WITH EXCAVATION AND BACKFILL SHALL BE INCLUDED IN THE UNIT PRICE FOR PIPE.
18. ALL SUBMITTALS AND SHOP DRAWINGS FOR PROPOSED STRUCTURES SHALL BE SUBMITTED TO AND APPROVED BY THE OWNER PRIOR TO ORDERING MATERIALS.
19. CONTRACTOR TO INSTALL NON-DETECTABLE WARNING TAPE WITH 4 MIL THICKNESS AND MINIMUM 3" WIDTH AT APPROXIMATELY 12" ABOVE TOP OF WATER AND SEWER LINES, INCLUDING TRENCHED SERVICE LINES.
20. THE CONTRACTOR IS RESPONSIBLE FOR MAINTAINING AN AS-BUILT SET OF PLANS TO BE TURNED IN TO THE ENGINEER AT THE END OF THE PROJECT.
21. SEDIMENTATION AND EROSION CONTROL SHALL BE CONSTRUCTED AND MAINTAINED IN ACCORDANCE WITH THE CITY OF BIXBY STORM WATER POLLUTION PREVENTION PLAN.
22. THE 100-YEAR FLOODPLAIN ELEVATION VARIES FROM APPROX. 601.00 TO 602.00.
23. ALL FENCES REQUIRED TO BE REMOVED FOR THE CONSTRUCTION OF THE PROJECT SHALL BE RESTORED TO EQUAL OR BETTER CONDITION. ALL COSTS SHALL BE INCIDENTAL TO OTHER ITEMS OF THE WORK.

24. CLOSURE OF PRIVATE DRIVES SHALL BE COORDINATED WITH THE AFFECTED PROPERTY OWNER. TIME OF CLOSURE SHALL BE KEPT TO THE MINIMUM TIME REQUIRED FOR THE EXCAVATION, PIPE PLACEMENT, AND BACKFILL OF THE SEWER LINE.
25. DEWATERING OF STORM OR GROUNDWATER FROM THE TRENCH SHALL BE INCLUDED IN THE PER LINEAR FOOT COST OF PIPE. NO ADDITIONAL PAYMENT SHALL BE MADE.

CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
STATE OF OK CERTIFICATE OF AUTHORIZATION
CEN 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR TRANSMISSION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

PROFESSIONAL ENGINEER
J. L. C. J.L.C.
THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT
OKLAHOMA

SUBMITTAL:PRELIMINARY

DATE:11/30/2023
PROJECT NO:170231.0102
DESIGNED BY:J.L.C.
DRAWN BY:J.L.C.
APPROVED BY:S.N.H.
SCALE:AS SHOWN

REVISION HISTORY

NO.	DESCRIPTION	DATE

131ST ST. - MEMORIAL TO MINGO

BIXBY, OKLAHOMA

SHEET NAME
GENERAL
CONSTRUCTION
NOTES

SHEET
4

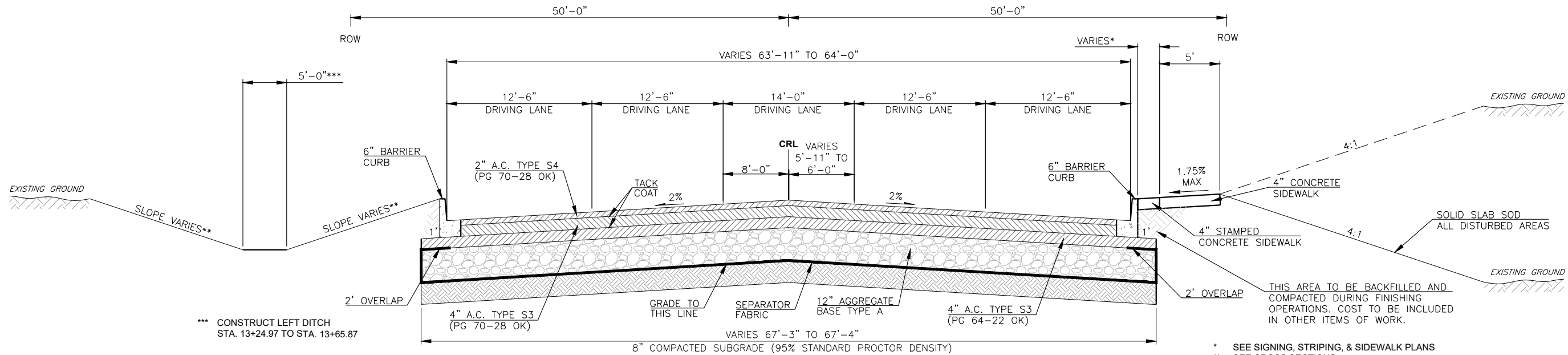
Page 7 of 215

[illegible]

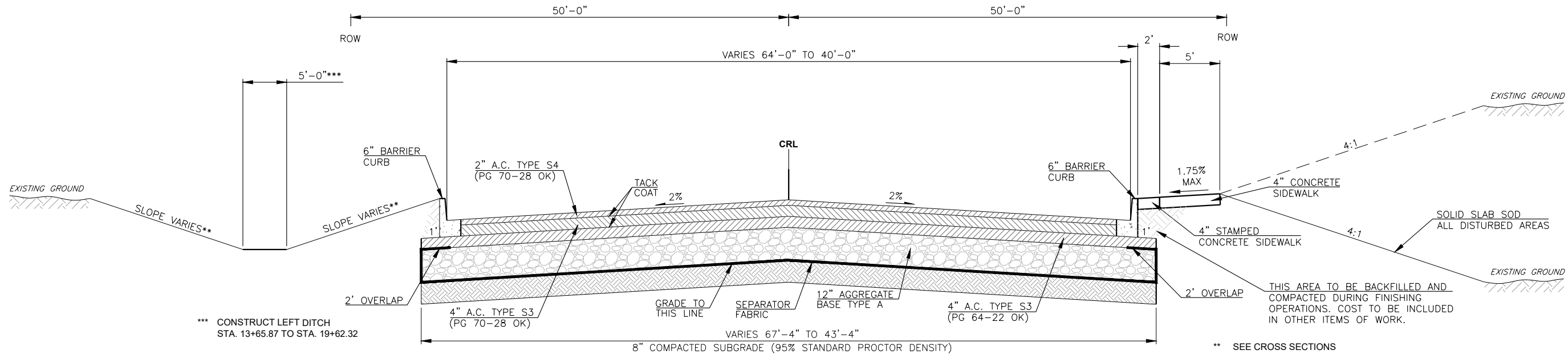
[illegible]

SHEET NAME SUMMARY OF DRAINAGE STRUCTURES (2 OF 2)	131ST ST. - MEMORIAL TO MINGO		BIXBY, OKLAHOMA	
PRELIMINARY NO. DESCRIPTION DATE DATE: 11/30/2023 PROJECT NO: 170231 0102 DESIGNED BY: J.L.C. DRAWN BY: J.L.C. APPROVED BY: S.N.H. SCALE: AS SHOWN	REVISION HISTORY			
 THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL SIGNED AND SEALED DOCUMENT				
 CEC CORPORATION TULSA, OKLAHOMA 74119 WWW.CONNECTCEC.COM STATE OF OK. CERTIFICATE OF AUTHORIZATION LICENSE NO. 170231 C.E.C. 32 EXPIRES: 2026-06-30 COPYRIGHT © 2007 CEC. ALL RIGHTS RESERVED. NO PART OF THIS DOCUMENT MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS WITHOUT EXPRESS WRITTEN PERMISSION OF CEC. 8 PROHIBITED				

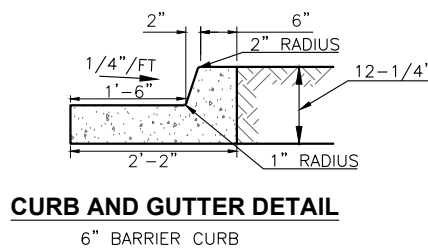
PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\131ST ST TYPICAL SECTIONS.DWG



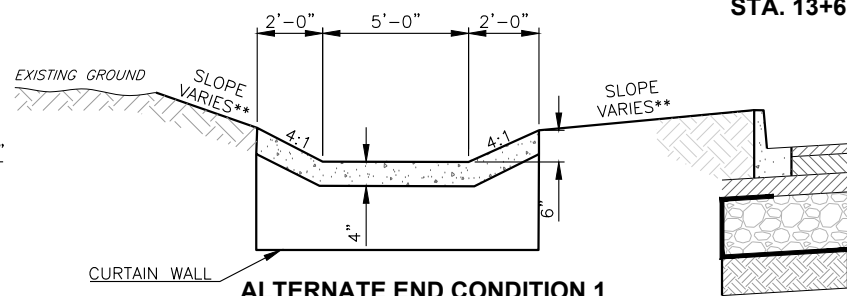
TYPICAL SECTION 1
5-LANE A.C. RECONSTRUCTION
STA. 11+85.94 TO STA. 13+65.87



TYPICAL SECTION 2
TRANSITION A.C. RECONSTRUCTION
STA. 13+65.87 TO STA. 19+62.32

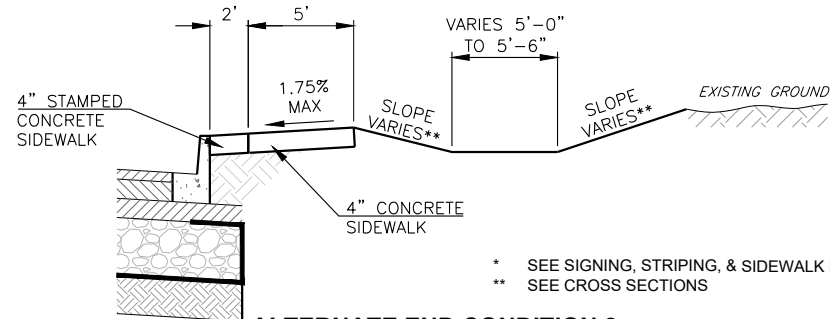


CURB AND GUTTER DETAIL
6" BARRIER CURB



ALTERNATE END CONDITION 1
CONSTRUCT NORTH DITCH
STA. 16+19.59 TO STA. 21+60.29
STA. 23+68.53 TO STA. 26+65.00
STA. 29+28.67 TO STA. 31+04.49
STA. 39+44.42 TO STA. 39+87.48

* SEE SIGNING, STRIPING, & SIDEWALK PLANS
** SEE CROSS SECTIONS



ALTERNATE END CONDITION 2
CONSTRUCT SOUTH DITCH
STA. 14+25.05 TO STA. 15+30.63
STA. 19+54.30 TO STA. 22+67.25
STA. 23+41.37 TO STA. 26+63.62
STA. 28+23.71 TO STA. 28+96.37
STA. 29+16.76 TO STA. 30+71.79
STA. 32+00.70 TO STA. 30+71.79
STA. 33+32.14 TO STA. 34+20.53

* SEE SIGNING, STRIPING, & SIDEWALK PLANS
** SEE CROSS SECTIONS

CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAB 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR TRANSMISSION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

PROFESSIONAL
SEAL
THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

REVISION HISTORY	
NO.	DESCRIPTION

SUBMITTAL:	PRELIMINARY	DATE:	PROJECT NO.	DESIGNED BY:	DRAWN BY:	APPROVED BY:	SCALE:
		11/30/2023	170231.0102	J.L.C.	J.L.C.	S.N.H.	AS SHOWN

131ST ST. - MEMORIAL TO MINGO

BIXBY, OKLAHOMA

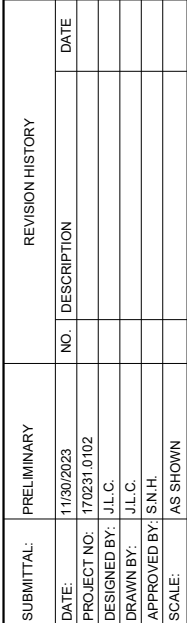
SHEET NAME

TYPICAL SECTIONS
(1 OF 2)

SHEET

7

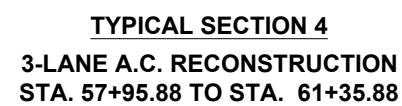
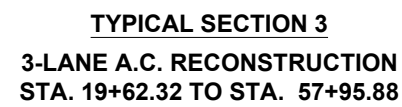
Page 10 of 215



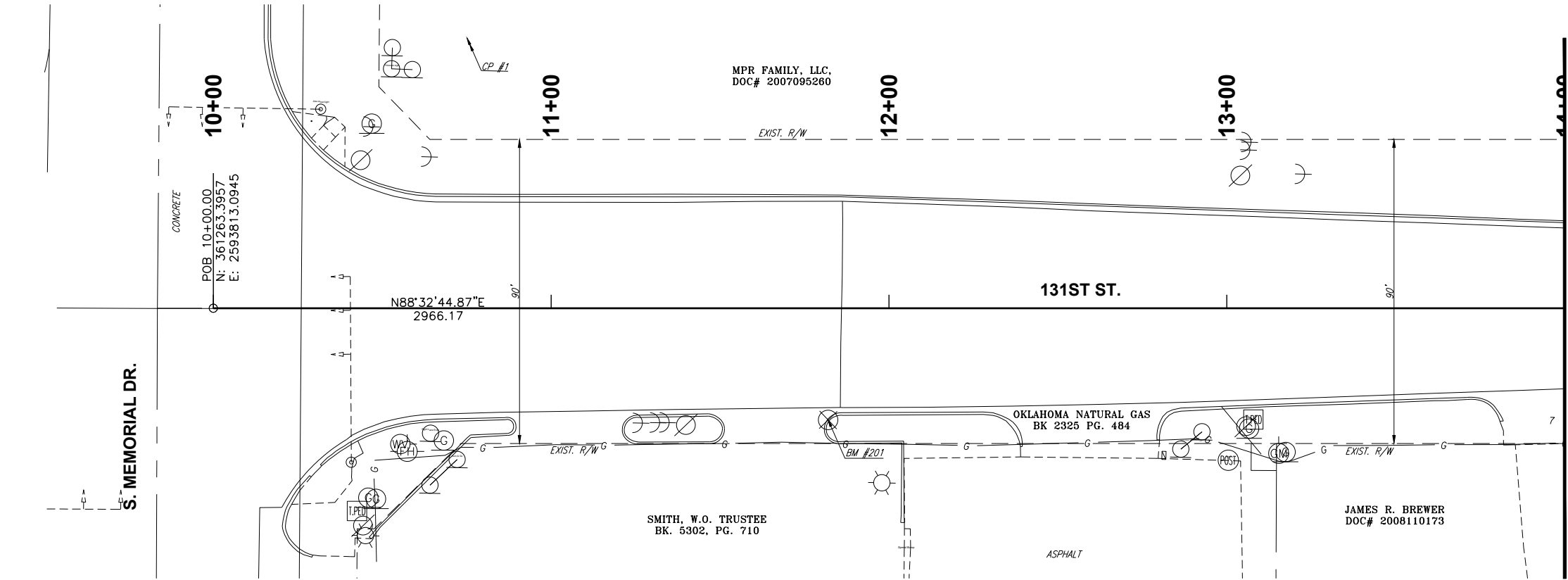
131ST ST. - MEMORIAL TO MINGO

BIXBY, OKLAHOMA

SHEET
8

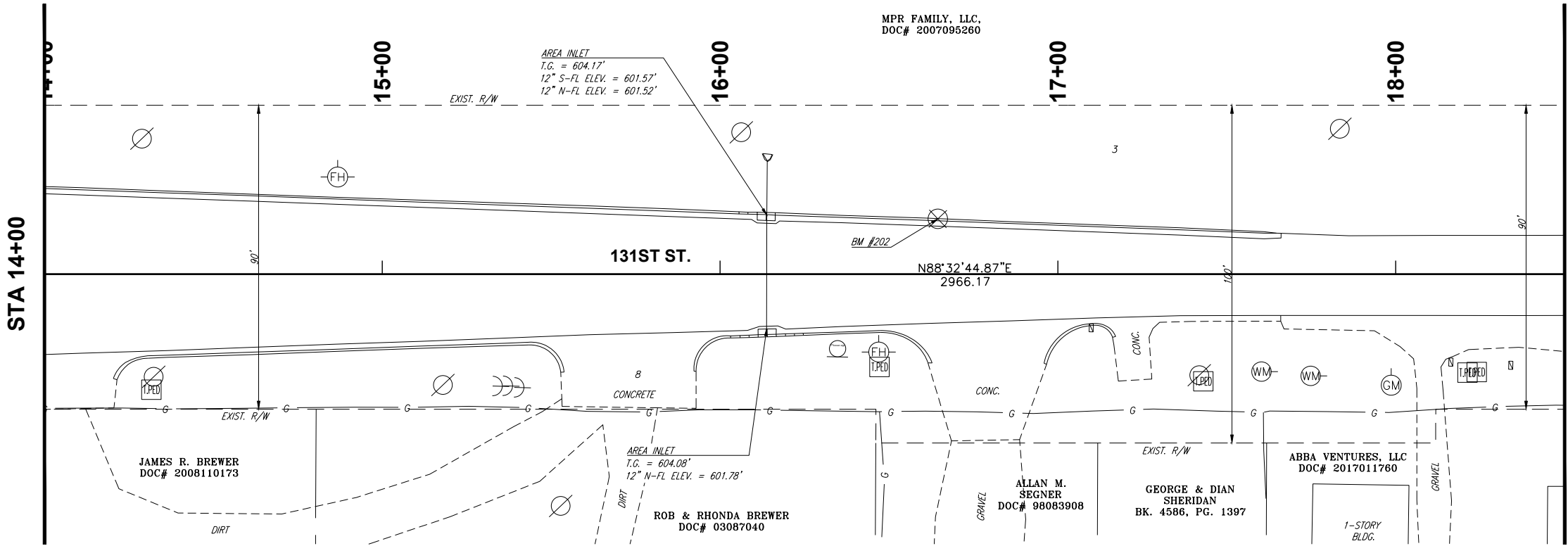


PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\131ST ST SURVEY DATA.DWG

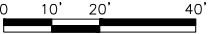


CONTROL POINT TABLE				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
1	361441.9509	2593841.1644	606.65	SET 5/8" IRON PIN W/ CEC CP CAP

BENCHMARK TABLE				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
201	361235.0	2593995.9	605.71	SET CUT "X" ON TOP OF CURB
202	361296.6	2594476.9	604.81	SET CUT "X" ON TOP OF CURB



STA 18+50
SEE SHEET 10



SURVEY CONTROL DATA

- HORIZONTAL DATUM IS TIED TO CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 WHICH IS ADJUSTED TO THE OKLAHOMA STATE PLANE NAD 83 (1993) COORDINATE SYSTEM, NORTH ZONE, PER MONUMENT #BA 11 DATA SHEET.
- BEARINGS:

THE BEARINGS SHOWN HEREIN OR HEREON ARE GRID BEARINGS DERIVED FROM THE USC & GS OKLAHOMA PLANE COORDINATE SYSTEM AND ARE NOT ASTRONOMICAL.
- VERTICAL CONTROLS:

A. LEVEL DATUM IS NGS, NAVD 88, PER CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 AND ADJUSTED FROM PRIMARY CONTROL UTILIZING DIFFERENTIAL LEVELING TECHNIQUES.

B. ACCURACY - 3RD ORDER OR BETTER

TULSA BENCHMARK FROM CITY OF TULSA CONTROL DATA PREPARED BY AERIAL DATA SERVICE MONUMENTED JANUARY, 2002 STATION NO. BA 11 MON. TYPE 3" ALUMINUM CAP SET IN CONCRETE
N: 361550.5020
E: 2604311.8720
ELEV: 632.430
LAT: 35°58'26.01634"
LONG: 95°51'03.77782"



CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
STATE OF OK CERTIFICATE OF AUTHORIZATION
CEN 32 EXPIRES: 2006-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
NO PART OF THIS DOCUMENT MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.



SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO.	DATE:	PROJECT NO.	NO.	DESCRIPTION
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE:					

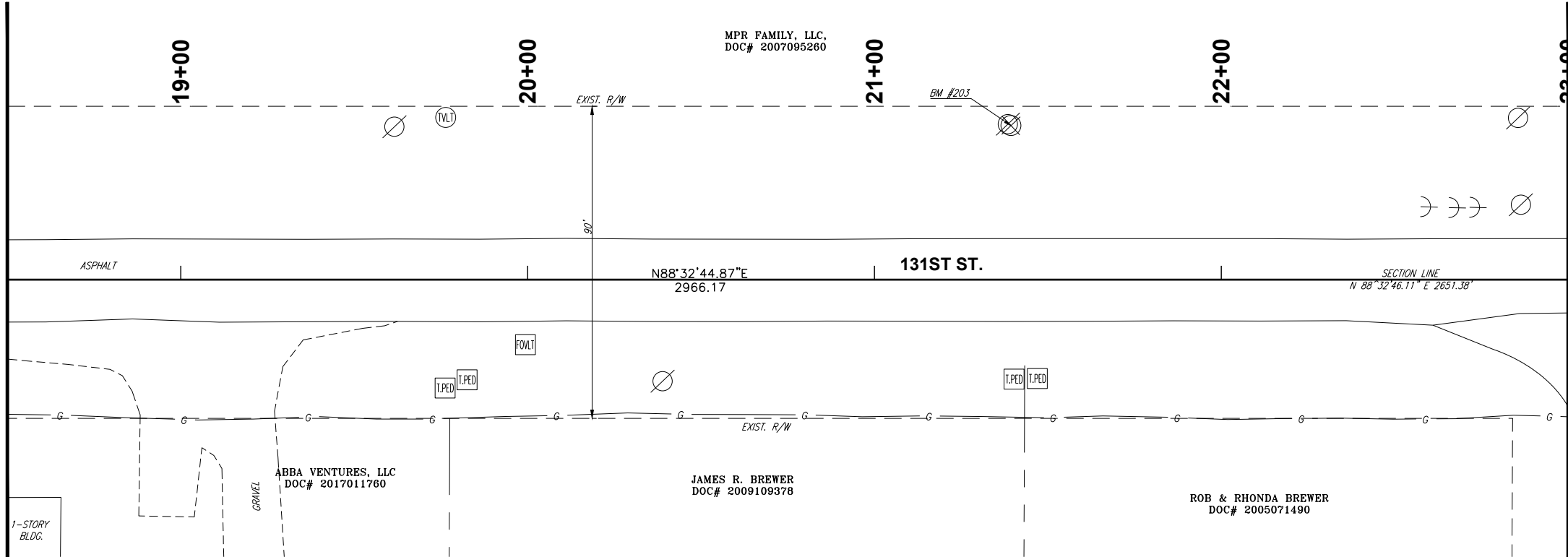
131ST ST. - MEMORIAL TO MINGO
BIXBY, OKLAHOMA

SHEET NAME
SURVEY DATA
(1 OF 6)

SHEET
9

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\131ST ST SURVEY DATA.DWG

STA 18+50
SEE SHEET 9



BENCHMARK TABLE				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
203	361336.7	2594951.0	603.62	SET RAILROAD SPIKE IN S FACE OF POWER POLE
204	361263.1	2595461.2	603.44	CUT "X" IN TOP OF CURB IN NW COR OF PKG LOT

STA 23+00

SURVEY CONTROL DATA

- HORIZONTAL DATUM IS TIED TO CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 WHICH IS ADJUSTED TO THE OKLAHOMA STATE PLANE NAD 83 (1993) COORDINATE SYSTEM, NORTH ZONE, PER MONUMENT #BA 11 DATA SHEET.
- BEARINGS:

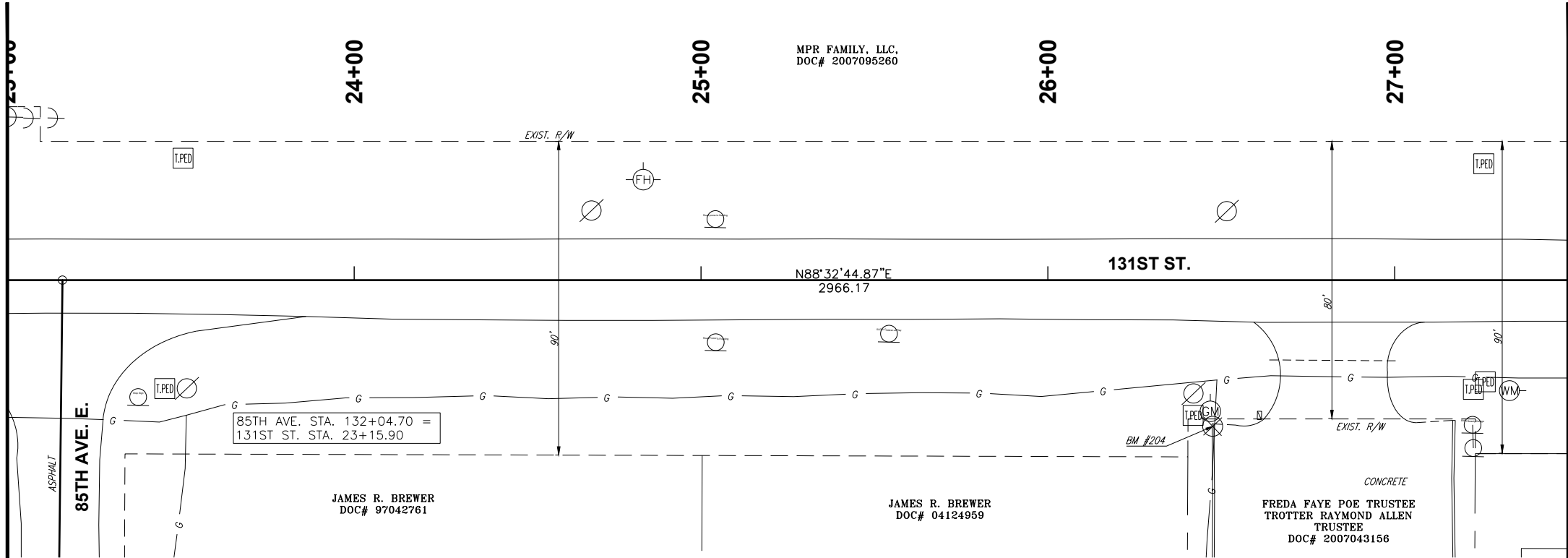
THE BEARINGS SHOWN HEREIN OR HEREON ARE GRID BEARINGS DERIVED FROM THE USC & GS OKLAHOMA PLANE COORDINATE SYSTEM AND ARE NOT ASTRONOMICAL.
- VERTICAL CONTROLS:

A. LEVEL DATUM IS NGS, NAVD 88, PER CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 AND ADJUSTED FROM PRIMARY CONTROL UTILIZING DIFFERENTIAL LEVELING TECHNIQUES.

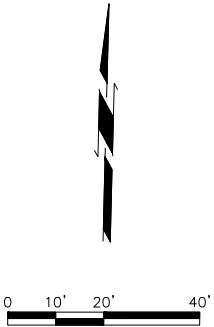
B. ACCURACY - 3RD ORDER OR BETTER

TULSA BENCHMARK FROM CITY OF TULSA CONTROL DATA PREPARED BY AERIAL DATA SERVICE MONUMENTED JANUARY, 2002 STATION NO. BA 11 MON. TYPE 3" ALUMINUM CAP SET IN CONCRETE
N: 361550.5020
E: 2604311.8720
ELEV: 632.430
LAT: 35°58'26.01634"
LONG: 95°51'03.77782"

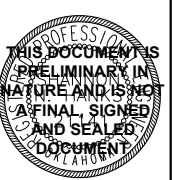
STA 23+00



STA 27+50
SEE SHEET 11



STATE OF OKLAHOMA
TULSA, OKLAHOMA 74119
WWW.CONNEXTECH.COM
CAN 32 EXPIRES: 2006-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
NO PART OF THIS DOCUMENT MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.



SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	11/30/2023	NO.	DESCRIPTION	NO.	DATE
PROJECT NO.:	1702310102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

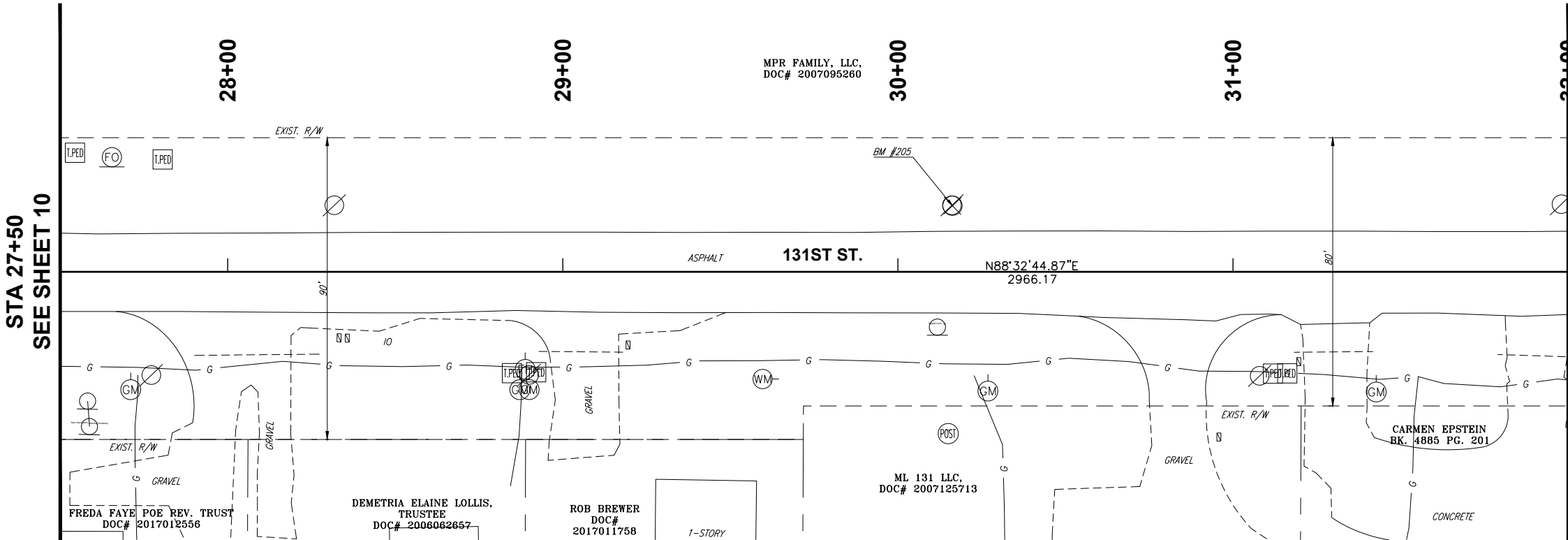
131ST ST. - MEMORIAL TO MINGO

BIXBY, OKLAHOMA

SHEET NAME
SURVEY DATA
(2 OF 6)

SHEET
10

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\131ST ST SURVEY DATA.DWG



BENCHMARK TABLE				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
205	361334.2	2595828.2	604.24	SET RAILROAD SPIKE IN S FACE OF POWER POLE
206	361249.2	2596293.1	606.29	SET CUT "X" ON TOP OF CURB

STA 32+00
SEE SHEET 12

STA 32+00

SURVEY CONTROL DATA

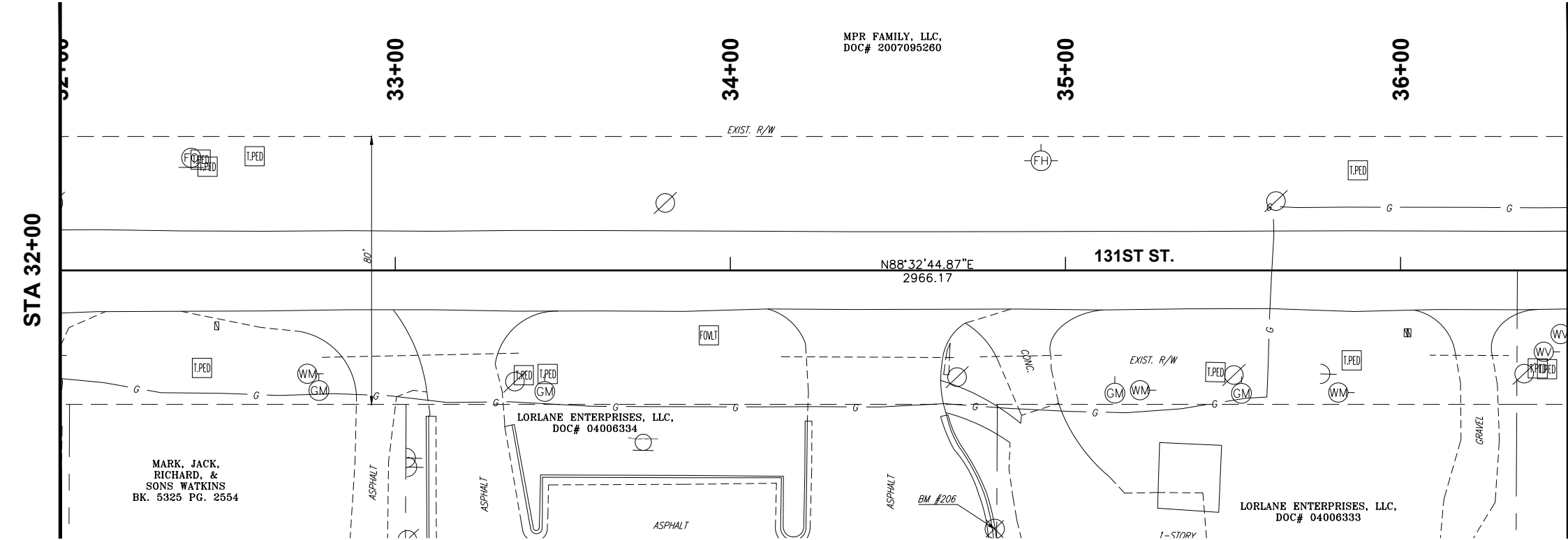
- HORIZONTAL DATUM IS TIED TO CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 WHICH IS ADJUSTED TO THE OKLAHOMA STATE PLANE NAD 83 (1993) COORDINATE SYSTEM, NORTH ZONE, PER MONUMENT #BA 11 DATA SHEET.
- BEARINGS:

THE BEARINGS SHOWN HEREIN OR HEREON ARE GRID BEARINGS DERIVED FROM THE USC & GS OKLAHOMA PLANE COORDINATE SYSTEM AND ARE NOT ASTRONOMICAL.
- VERTICAL CONTROLS:

A. LEVEL DATUM IS NGS, NAVD 88, PER CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 AND ADJUSTED FROM PRIMARY CONTROL UTILIZING DIFFERENTIAL LEVELING TECHNIQUES.

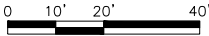
B. ACCURACY - 3RD ORDER OR BETTER

TULSA BENCHMARK FROM CITY OF TULSA CONTROL DATA PREPARED BY AERIAL DATA SERVICE MONUMENTED JANUARY, 2002 STATION NO. BA 11 MON. TYPE 3" ALUMINUM CAP SET IN CONCRETE
N: 361550.5020
E: 2604311.8720
ELEV: 632.430
LAT: 35°58'26.01634"
LONG: 95°51'03.77782"



STA 32+00

STA 36+50
SEE SHEET 12



CEC

STATE OF OKLAHOMA
TULSA, OKLAHOMA 74119
WWW.CONNEXTEC.COM
CAN 32 EXPIRES: 2006-06-30

STATE OF OKLAHOMA
TULSA, OKLAHOMA 74119
WWW.CONNEXTEC.COM
CAN 32 EXPIRES: 2006-06-30

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

PROFESSIONAL
ENGINEER
TULSA, OKLAHOMA
170231.0102
J.L.C.
J.L.C.
S.N.H.
AS SHOWN

131ST ST. - MEMORIAL TO MINGO

SHEET NAME
SURVEY DATA
(3 OF 6)

SHEET
11

REVISION HISTORY

NO.	DESCRIPTION	DATE

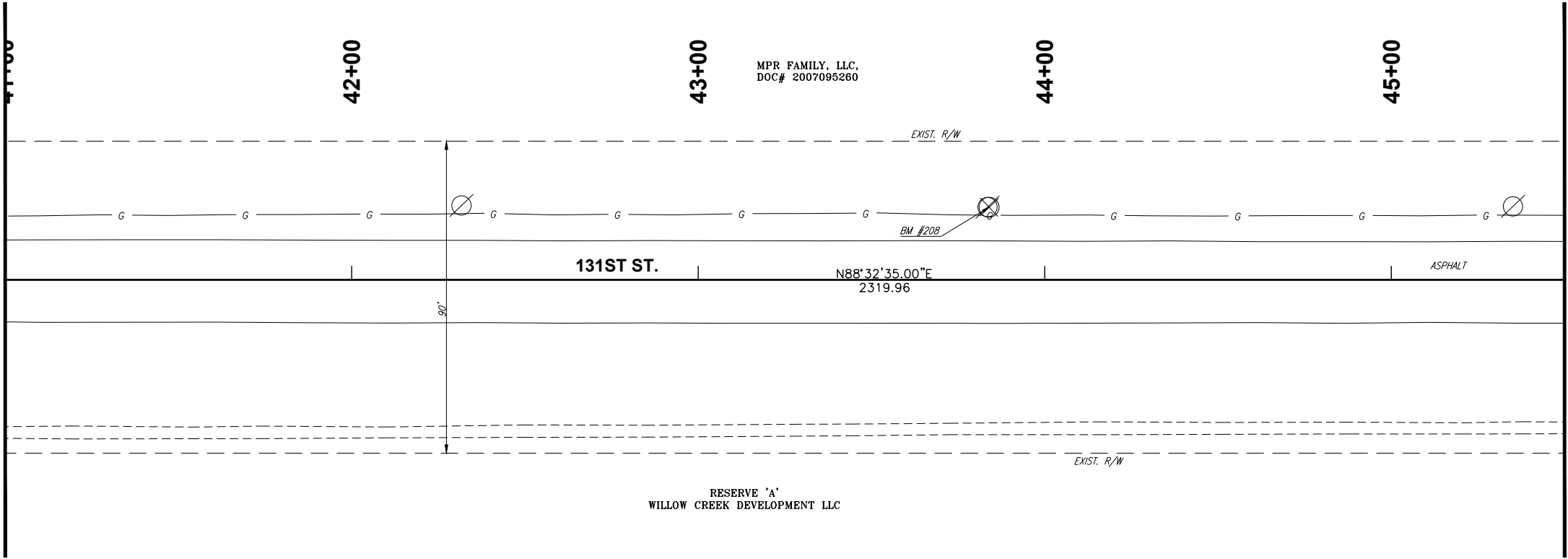
131ST ST. - MEMORIAL TO MINGO

SHEET NAME
SURVEY DATA
(3 OF 6)

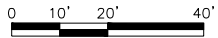
SHEET
11

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\131ST ST SURVEY DATA.DWG

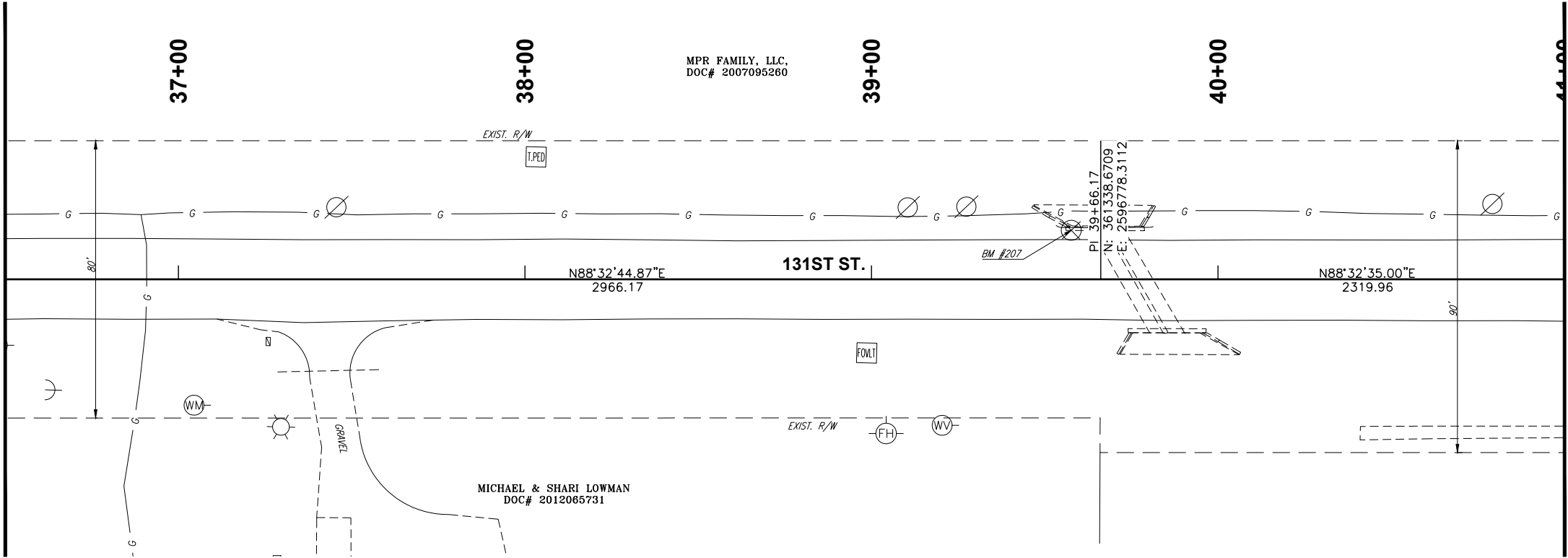
STA 41+00
SEE SHEET 13



STA 45+50
SEE SHEET 13



STA 36+50
SEE SHEET 11



STA 41+00

BENCHMARK TABLE				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
207	361352.6	2596769.5	605.285	SET CUT "X" IN TOP OF HEADWALL
208	361370.2	2597195.4	604.315	SET RAILROAD SPIKE IN S FACE OF POWER POLE

SURVEY CONTROL DATA

- HORIZONTAL DATUM IS TIED TO CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 WHICH IS ADJUSTED TO THE OKLAHOMA STATE PLANE NAD 83 (1993) COORDINATE SYSTEM, NORTH ZONE, PER MONUMENT #BA 11 DATA SHEET.
- BEARINGS:

THE BEARINGS SHOWN HEREIN OR HEREON ARE GRID BEARINGS DERIVED FROM THE USC & GS OKLAHOMA PLANE COORDINATE SYSTEM AND ARE NOT ASTRONOMICAL.
- VERTICAL CONTROLS:

A. LEVEL DATUM IS NGS, NAVD 88, PER CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 AND ADJUSTED FROM PRIMARY CONTROL UTILIZING DIFFERENTIAL LEVELING TECHNIQUES.

B. ACCURACY - 3RD ORDER OR BETTER

TULSA BENCHMARK FROM CITY OF TULSA CONTROL DATA
PREPARED BY AERIAL DATA SERVICE MONUMENTED JANUARY, 2002 STATION NO. BA 11 MON. TYPE 3" ALUMINUM CAP SET IN CONCRETE
N: 361550.5020
E: 2604311.8720
ELEV: 632.430
LAT: 35°58'26.01634"
LONG: 95°51'03.77782"

CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
STATE OF OK CERTIFICATE OF AUTHORIZATION
CEN 32 EXPIRES: 2006-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
NO PARTS OF THIS DOCUMENT OR ANY
INDICATIONS OR USE OF THE DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

PROFESSIONAL
ENGINEER
THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT
TULSA, OKLAHOMA

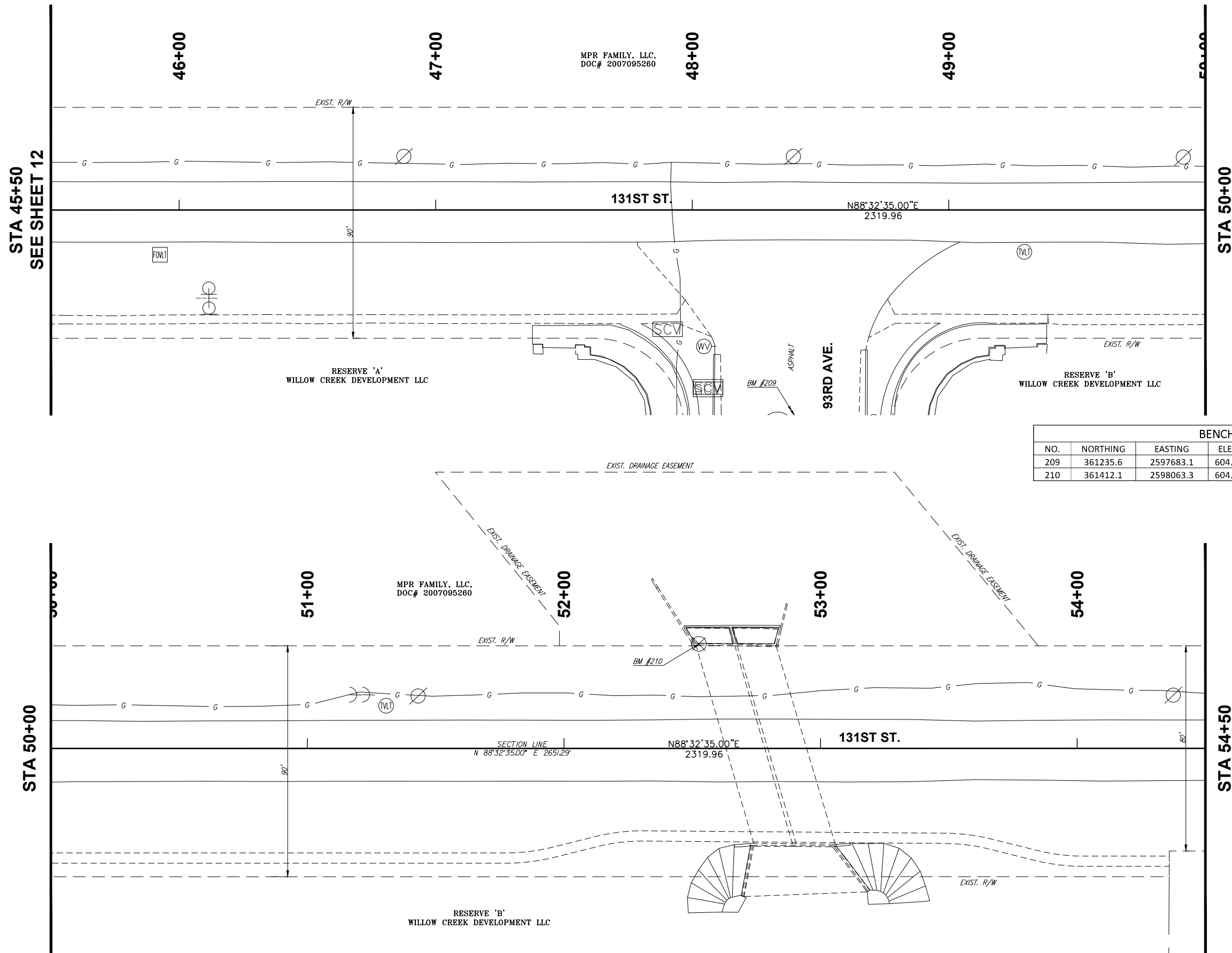
REVISION HISTORY		PRELIMINARY	
NO.	DESCRIPTION	DATE	SCALE
1	11/30/2023	170231.0102	AS SHOWN
2	DESIGNED BY: J.L.C.		
3	DRAWN BY: J.L.C.		
4	APPROVED BY: S.N.H.		

131ST ST. - MEMORIAL TO MINGO

SHEET NAME
SURVEY DATA
(4 OF 6)

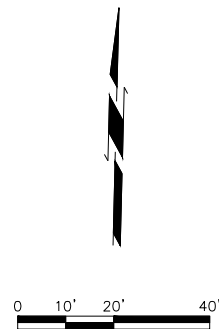
SHEET
12

Page 15 of 215



TULSA BENCHMARK FROM CITY OF TULSA CONTROL DATA
PREPARED BY AERIAL DATA SERVICE MONUMENTED JANUARY,
2002 STATION NO. BA 11 MON. TYPE 3" ALUMINUM CAP SET
IN CONCRETE
N: 361550.5020
E: 2604311.8720
ELEV: 632.430
LAT: 35°58'26.01634"
LONG: 95°51'03.77782"

BENCHMARK TABLE				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
209	361235.6	2597683.1	604.23	SET CUT "X" IN TOP OF CURB
210	361412.1	2598063.3	604.81	SET CUT "X" ON TOP OF HEADWALL



CEC CORPORATION
1300 S. MAIN STREET
TULSA, OKLAHOMA 74119
P: 918.663.9421
WWW.CONNECTTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAP. 32. EXPIRES: 2026-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



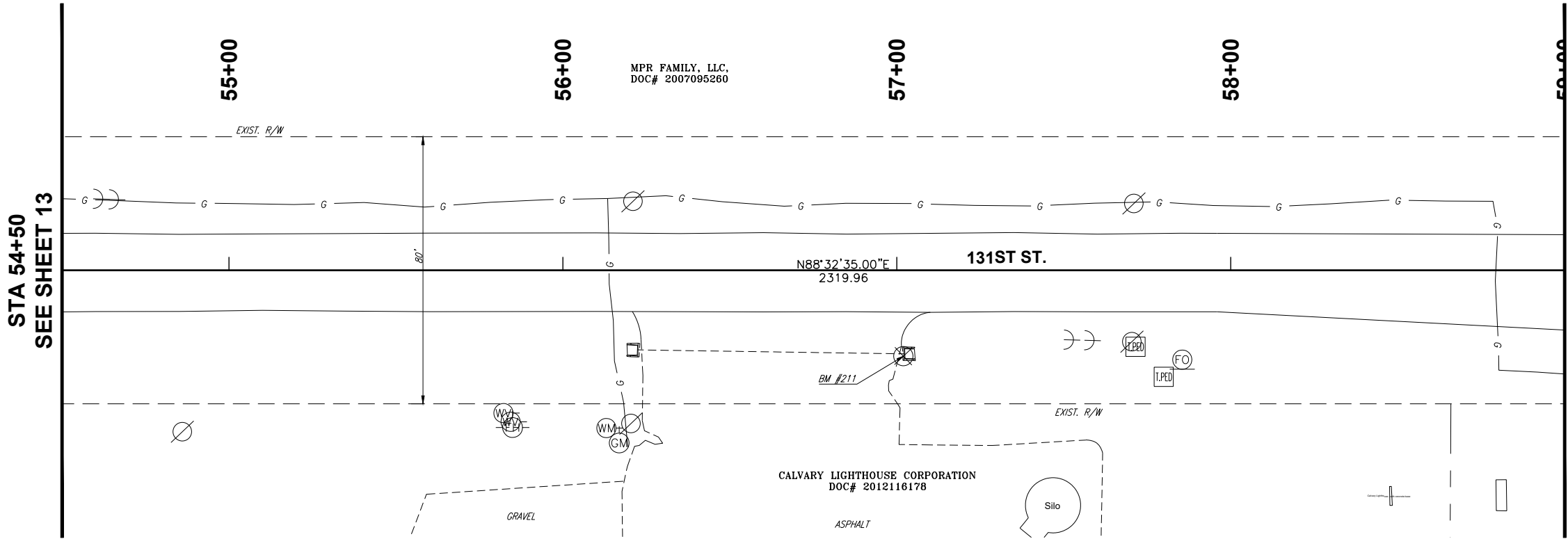
SUBMITTAL:		PRELIMINARY	REVISION HISTORY	
DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE
	1702310.102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:				
SCALE:	AS SHOWN			

131ST ST. - MEMORIAL TO MINGO

SHEET NAME
SURVEY DATA
(5 OF 6)

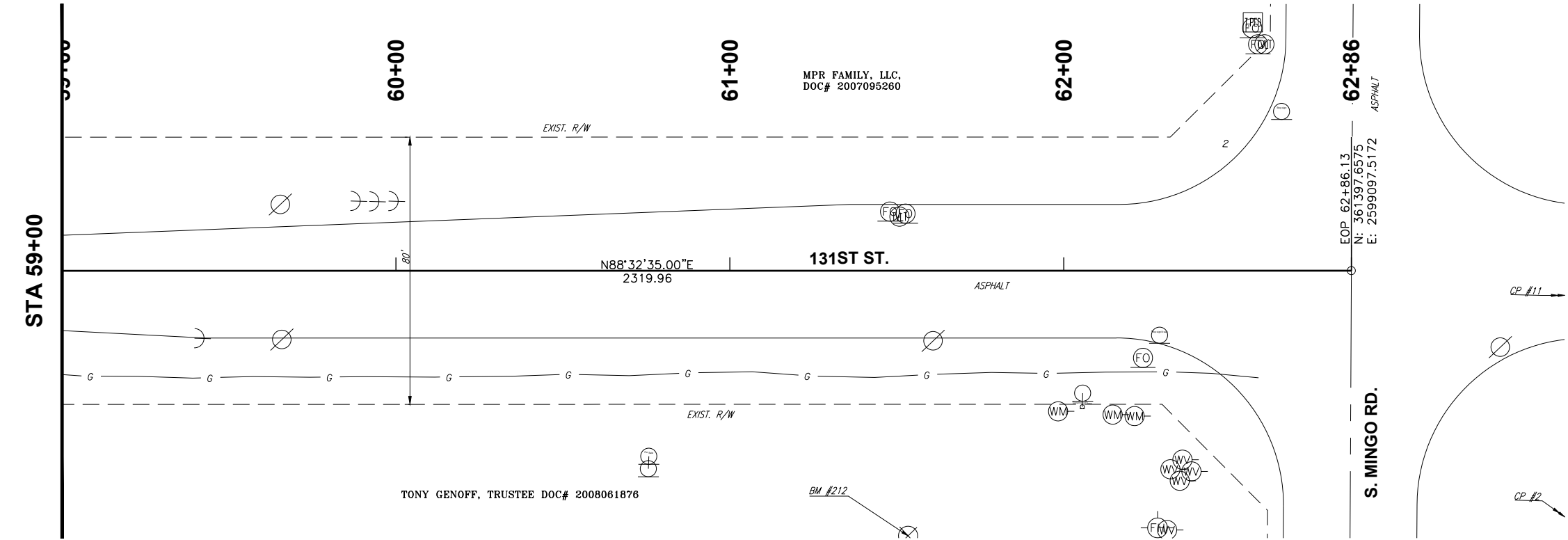
SHEET
13

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\131ST ST SURVEY DATA.DWG



CONTROL POINT TABLE				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
2	361296.6851	2599206.0991	605.165	SET 5/8" IRON PIN W/ CEC CP CAP
11	361550.5020	2604311.8720	632.43	FOUND CITY OF TULSA ALUM CAP STAMPED BA 11

BENCHMARK TABLE				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
211	361357.1	2598514.2	607.92	SET CUT "X" ON TOP OF HEADWALL
212	361314.9	2598966.8	607.655	SET 5/8" IRON PIN FLUSH IN GROUND



SURVEY CONTROL DATA

- HORIZONTAL DATUM IS TIED TO CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 WHICH IS ADJUSTED TO THE OKLAHOMA STATE PLANE NAD 83 (1993) COORDINATE SYSTEM, NORTH ZONE, PER MONUMENT #BA 11 DATA SHEET.
- BEARINGS:

THE BEARINGS SHOWN HEREIN OR HEREON ARE GRID BEARINGS DERIVED FROM THE USC & GS OKLAHOMA PLANE COORDINATE SYSTEM AND ARE NOT ASTRONOMICAL.
- VERTICAL CONTROLS:

A. LEVEL DATUM IS NGS, NAVD 88, PER CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 AND ADJUSTED FROM PRIMARY CONTROL UTILIZING DIFFERENTIAL LEVELING TECHNIQUES.

B. ACCURACY - 3RD ORDER OR BETTER

TULSA BENCHMARK FROM CITY OF TULSA CONTROL DATA PREPARED BY AERIAL DATA SERVICE MONUMENTED JANUARY, 2002 STATION NO. BA 11 MON. TYPE 3" ALUMINUM CAP SET IN CONCRETE
N: 361550.5020
E: 2604311.8720
ELEV: 632.430
LAT: 35°58'26.01634"
LONG: 95°51'03.77782"

CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXTEC.COM
CAN 32 EXPIRES: 2006-06-30

STATE OF OK CERTIFICATE OF AUTHORIZATION
COPRIGHT ©2017 CEC. ALL RIGHTS RESERVED.
NO ENDORSEMENT OF OR ASSOCIATION
WITH ANY PRODUCT OR SERVICE OF ANY
INDIVIDUAL OR ENTITY IS AUTHORIZED
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

PROFESSIONAL
ENGINEER
THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT
TULSA, OKLAHOMA

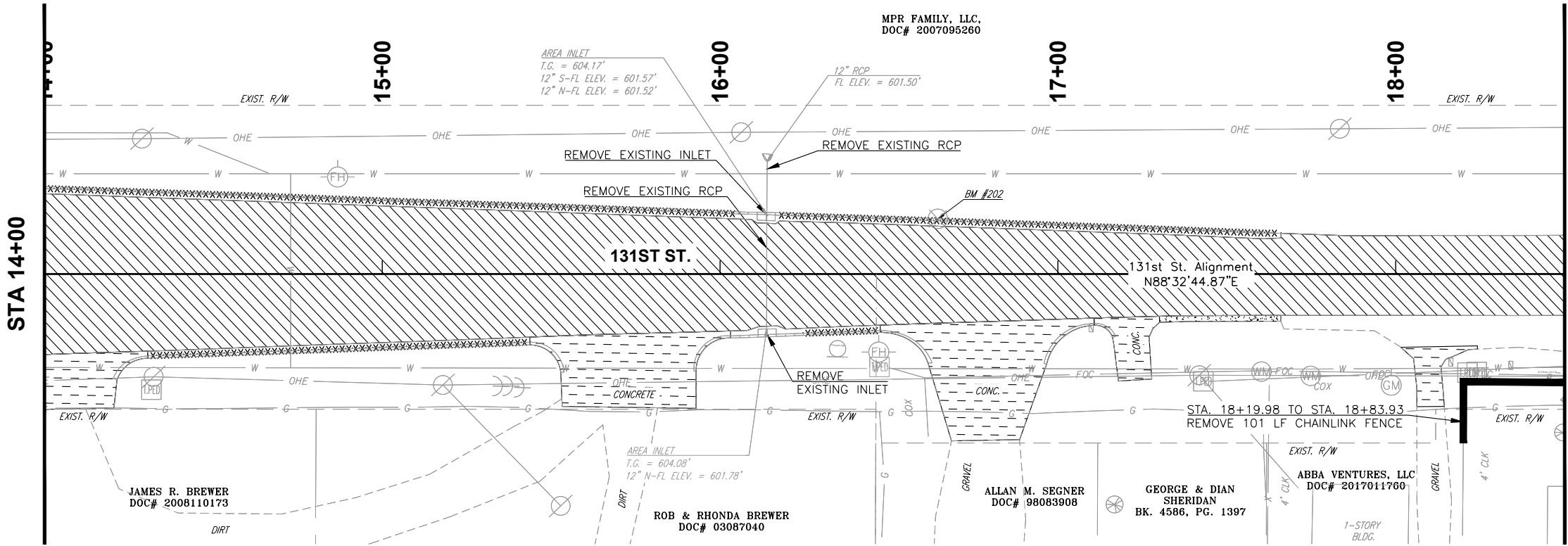
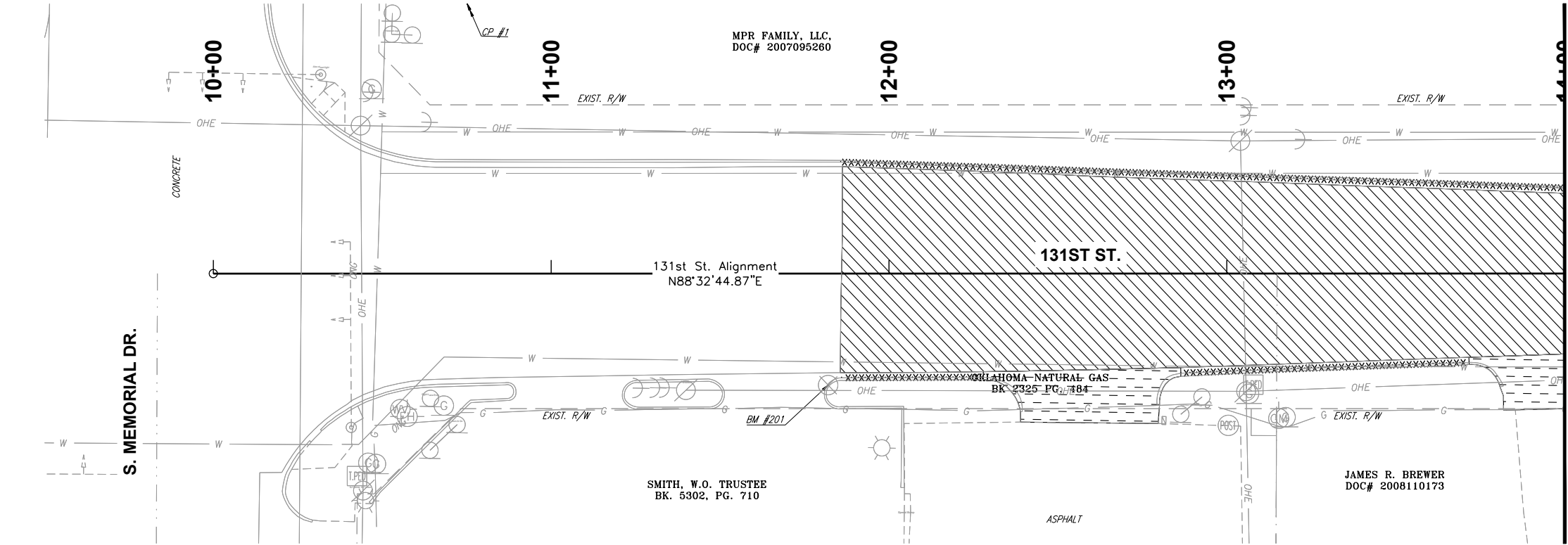
REVISION HISTORY		PRELIMINARY	
NO.	DESCRIPTION	DATE	DATE

SUBMITTAL:		131ST ST. - MEMORIAL TO MINGO	
DATE:	PROJECT NO.	BIXBY, OKLAHOMA	
11/30/2023	170231.0102		
DESIGNED BY: J.L.C.	DRAWN BY: J.L.C.		
APPROVED BY: S.N.H.	SCALE: AS SHOWN		

SHEET NAME	
SURVEY DATA	
(6 OF 6)	
SHEET	
14	

Page 17 of 215

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\131ST ST - DEMO PLANS.DWG



STA 18+50
SEE SHEET 16

CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
CAN 32 EXPIRES: 2004-06-30

STATE OF OK CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

PROFESSIONAL
THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT
TULSA, OKLAHOMA

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	11/30/2023	NO.	DESCRIPTION	NO.	DATE
PROJECT NO:	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

131ST ST. - MEMORIAL TO MINGO

SHEET NAME
DEMO PLAN
(1 OF 6)

SHEET
15

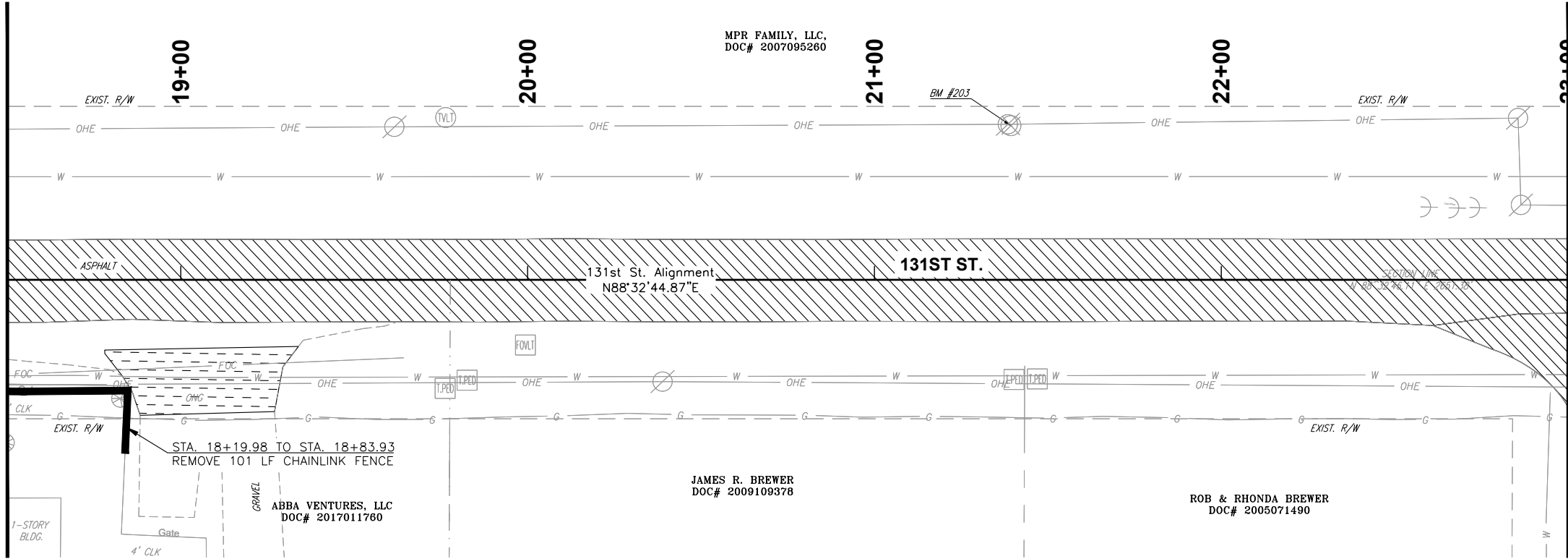
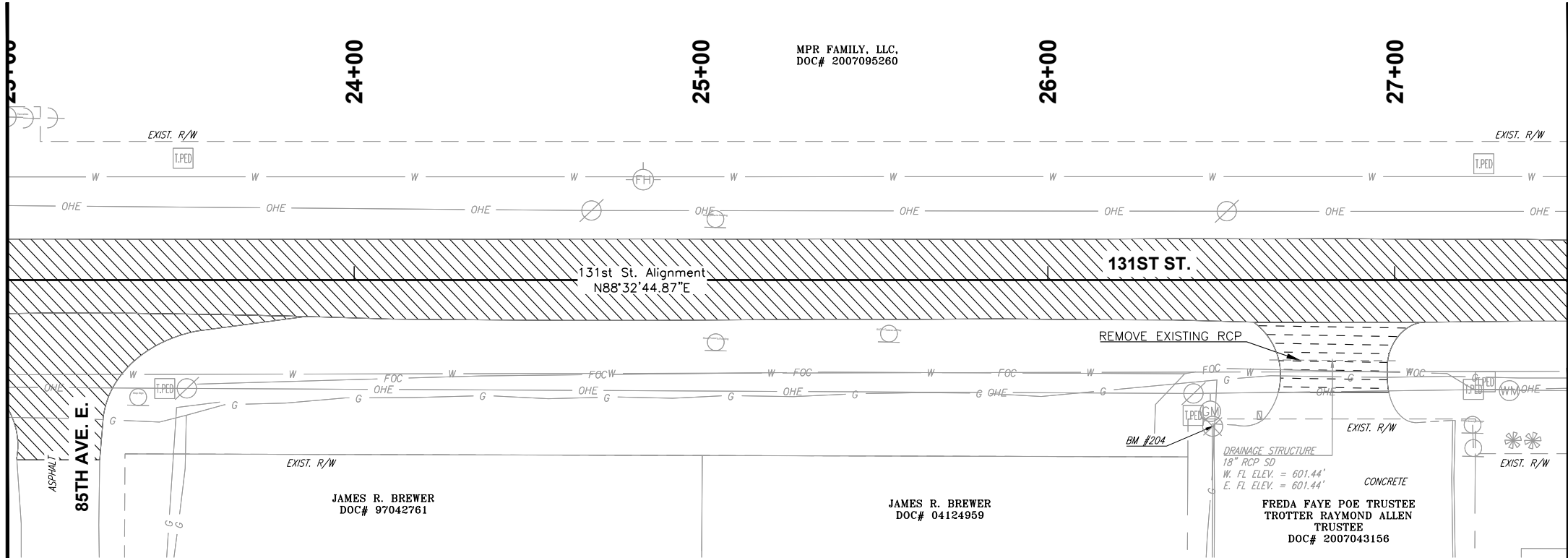
BIXBY, OKLAHOMA

Page 18 of 215

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\131ST ST - DEMO PLANS.DWG

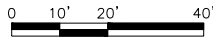
STA 23+00

STA 18+50
SEE SHEET 15



STA 27+50
SEE SHEET 17

STA 23+00



LEGEND	
	REMOVE CONCRETE PAVEMENT
	REMOVE ASPHALT PAVEMENT
	REMOVE SIDEWALK
	REMOVE DRIVEWAY
	COLD MILLING
	REMOVE FENCE
	REMOVE CURB & GUTTER
	REMOVE TREE/SHURB

131ST ST. - MEMORIAL TO MINGO

BIXBY, OKLAHOMA

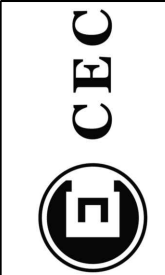
SHEET NAME
DEMO PLAN
(2 OF 6)

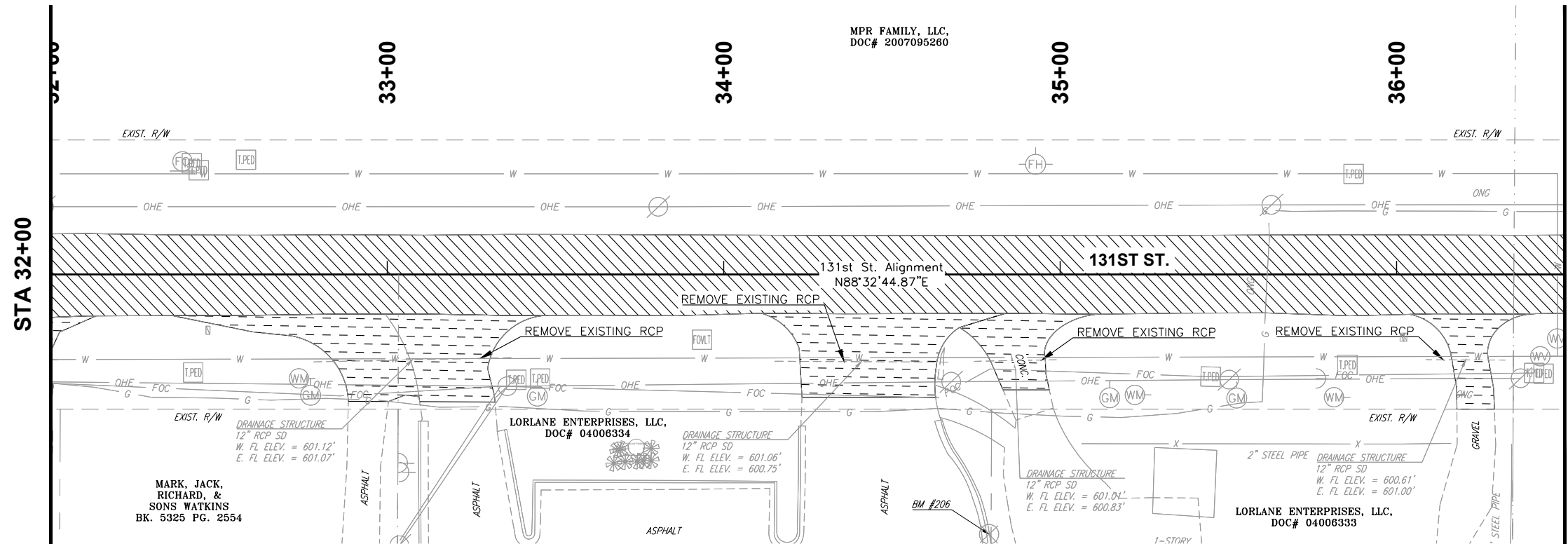
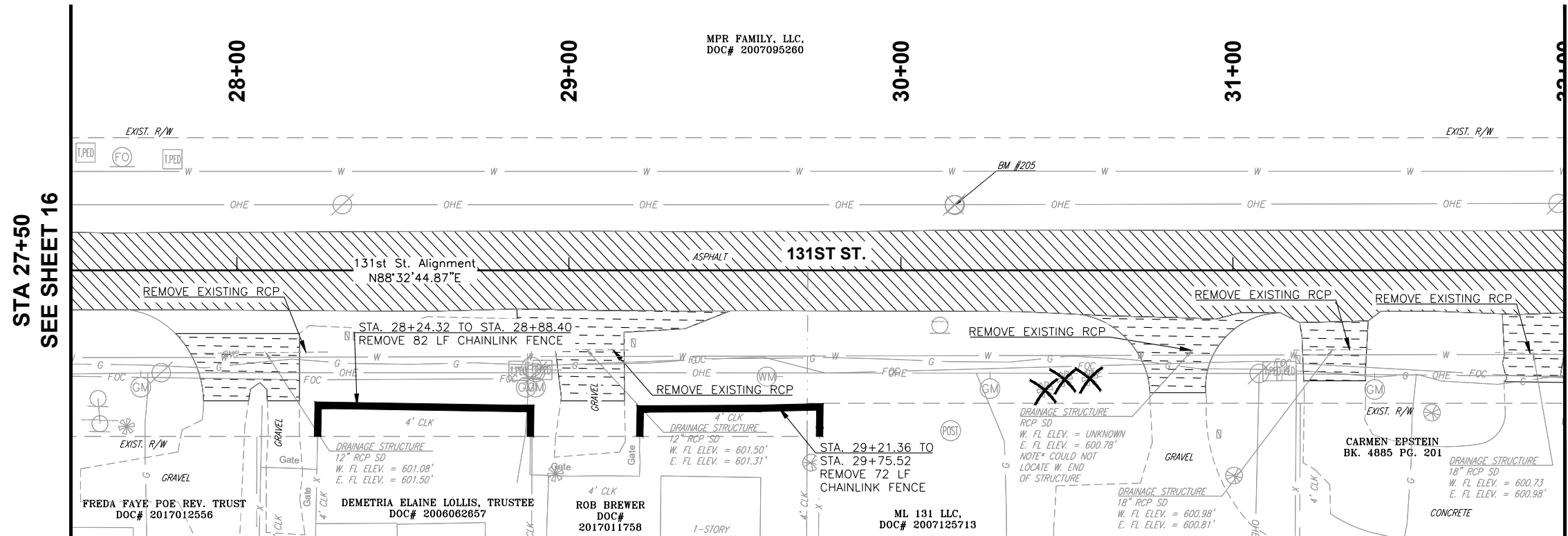
SHEET
16

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	11/30/2023	NO.	DESCRIPTION	DATE	
PROJECT NO:	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				



CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
STATE OF OK CERTIFICATE OF AUTHORIZATION
CEN 12 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
NO PART OF THIS DOCUMENT MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.

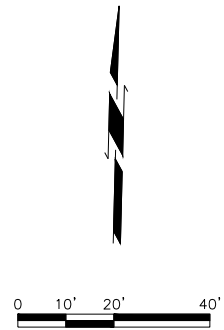




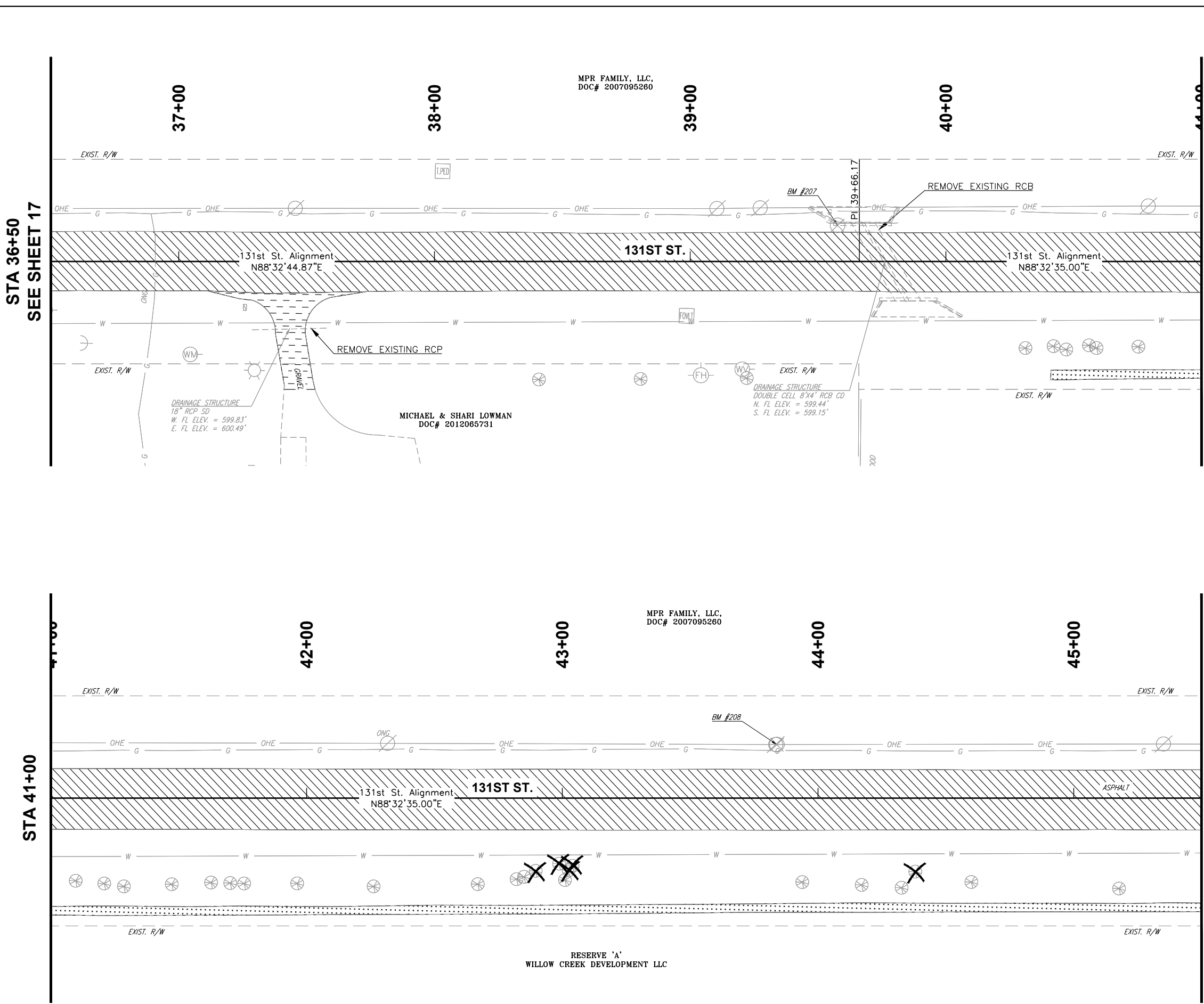
STA 32+00

**STA 36+50
SEE SHEET 18**

LEGEND	
	REMOVE CONCRETE PAVEMENT
	REMOVE ASPHALT PAVEMENT
	REMOVE SIDEWALK
	REMOVE DRIVEWAY
	COLD MILLING
	REMOVE FENCE
	REMOVE CURB & GUTTER
	REMOVE TREE/SHURB

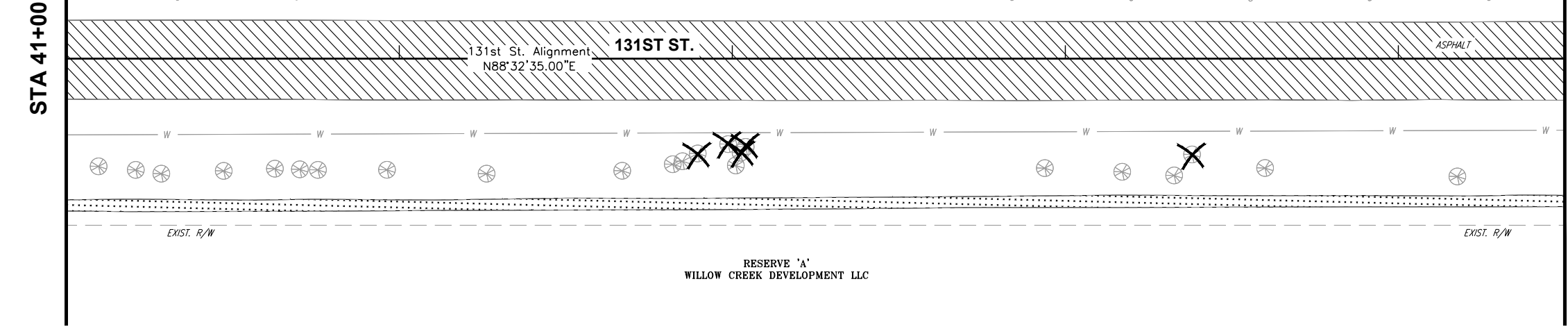
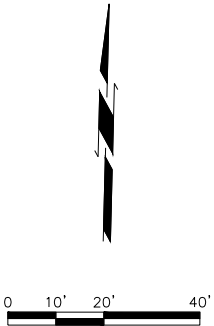
[illegible]

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\131ST ST - DEMO PLANS.DWG



LEGEND

- REMOVE CONCRETE PAVEMENT
- REMOVE ASPHALT PAVEMENT
- REMOVE SIDEWALK
- REMOVE DRIVEWAY
- COLD MILLING
- REMOVE FENCE
- XXXX· REMOVE CURB & GUTTER
- REMOVE TREE/SHURB



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
CAN 32 EXPIRES: 2006-06-30

STATE OF OK CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

PROFESSIONAL SEAL

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO.	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE:	AS SHOWN				

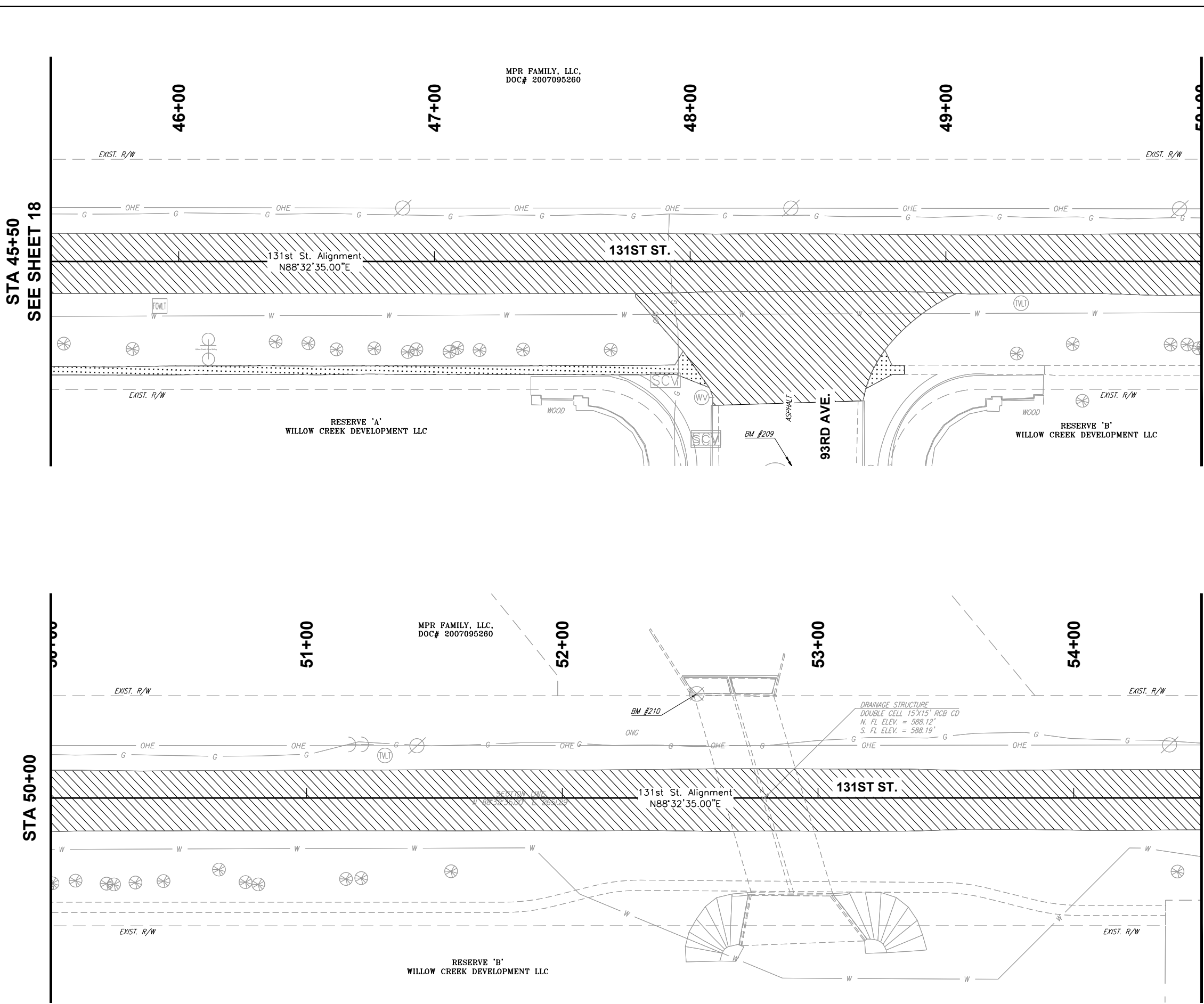
131ST ST. - MEMORIAL TO MINGO

SHEET NAME
DEMO PLAN
(4 OF 6)

SHEET
18

BIXBY, OKLAHOMA

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\131ST ST - DEMO PLANS.DWG



LEGEND

REMOVE CONCRETE PAVEMENT

REMOVE ASPHALT PAVEMENT

REMOVE SIDEWALK

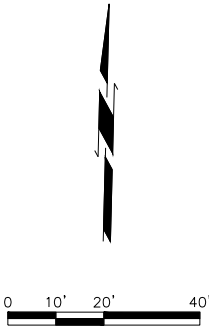
REMOVE DRIVEWAY

COLD MILLING

REMOVE FENCE

REMOVE CURB & GUTTER

REMOVE TREE/SHURB



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXTEC.COM
CAN 32 EXPIRES: 2006-06-30

STATE OF OK CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR DISTRIBUTION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

PROFESSIONAL SEAL

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE: AS SHOWN					

131ST ST. - MEMORIAL TO MINGO

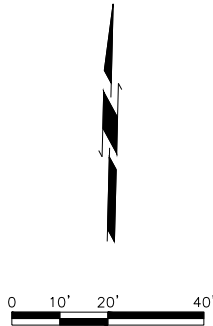
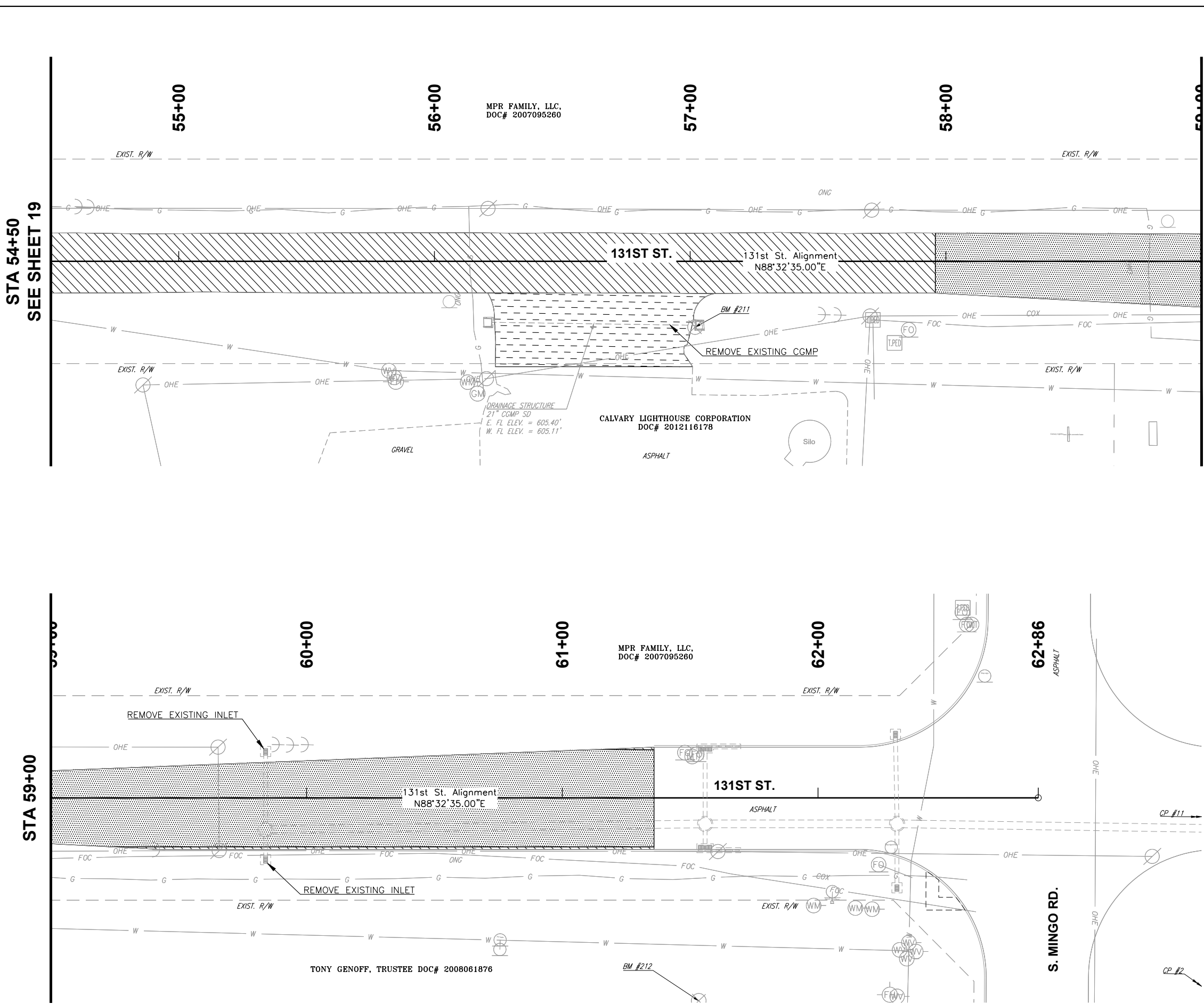
SHEET NAME
DEMO PLAN
(5 OF 6)

SHEET
19

BIXBY, OKLAHOMA

Page 22 of 215

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\131ST ST - DEMO PLANS.DWG



LEGEND	
	REMOVE CONCRETE PAVEMENT
	REMOVE ASPHALT PAVEMENT
	REMOVE SIDEWALK
	REMOVE DRIVEWAY
	COLD MILLING
	REMOVE FENCE
	REMOVE CURB & GUTTER
	REMOVE TREE/SHURB

CEC

CEC CORPORATION

TULSA, OKLAHOMA 74119

WWW.CONNEXTEC.COM

CAN 32 EXPIRES: 2008-06-30

STATE OF OK CERTIFICATE OF AUTHORIZATION

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.

THIS DRAWING IS THE PROPERTY OF CEC. ANY

REPRODUCTION OR DISTRIBUTION OF THIS DRAWING

WITHOUT EXPRESS WRITTEN AUTHORIZATION OF

CEC IS PROHIBITED.

PROFESSIONAL SEAL

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	11/30/2023	NO.	DESCRIPTION	NO.	DATE
PROJECT NO.:	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

131ST ST. - MEMORIAL TO MINGO

SHEET NAME

DEMO PLAN

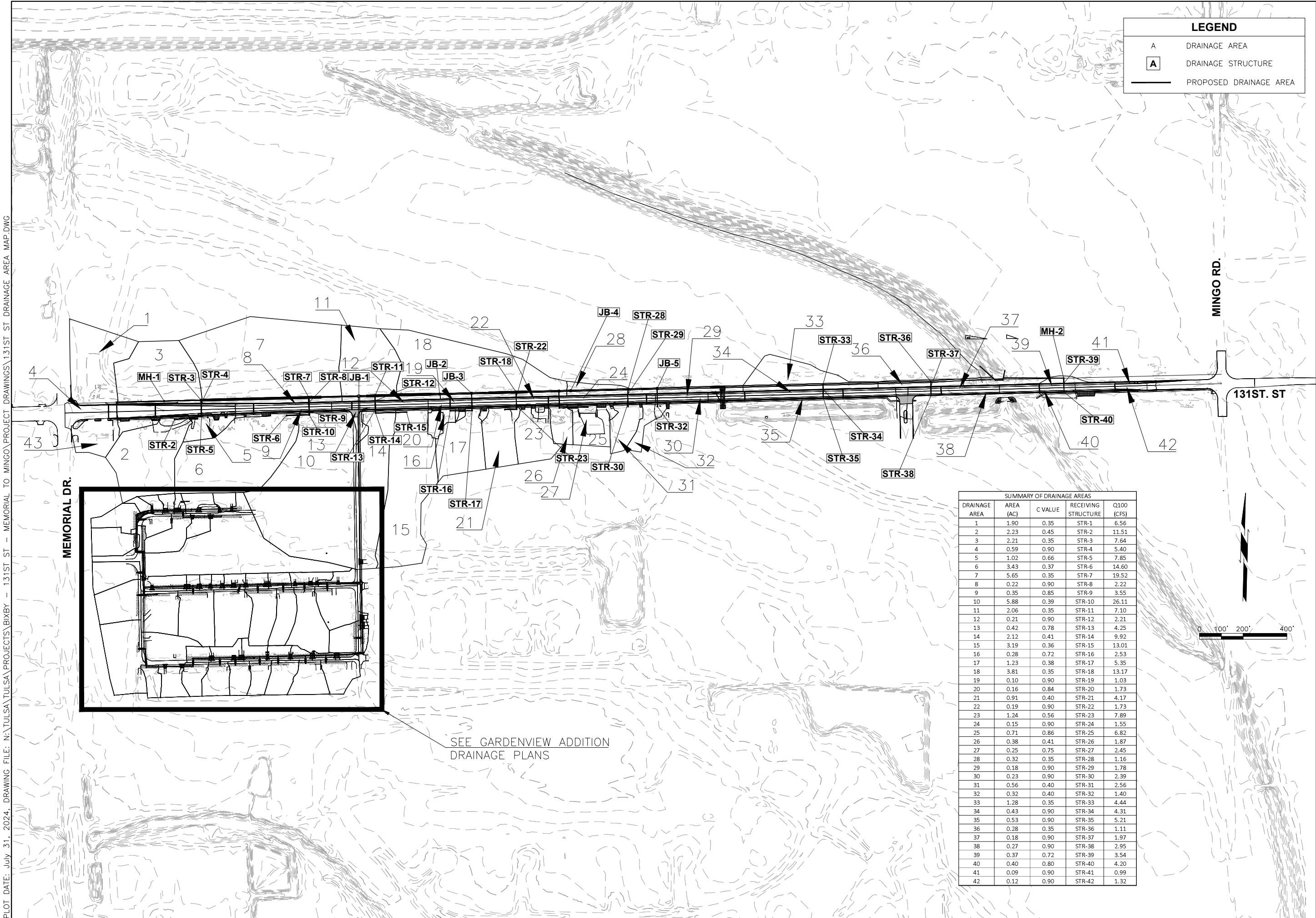
(6 OF 6)

SHEET

20

BIXBY, OKLAHOMA

Page 23 of 215



PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\131ST ST DRAINAGE AREA MAP.DWG

CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAB 32 EXPIRES: 08/06/30
COPYRIGHT ©2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR DISTRIBUTION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

PROFESSIONAL SEAL

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

REVISION HISTORY		SUBMITTAL:		PRELIMINARY	
NO.	DESCRIPTION	DATE:	PROJECT NO.	DESIGNED BY:	DRAWN BY:
		11/30/2023	170231.0102	J.L.C.	J.L.C.
				APPROVED BY:	SCALE:
				S.N.H.	AS SHOWN

131ST ST. - MEMORIAL TO MINGO

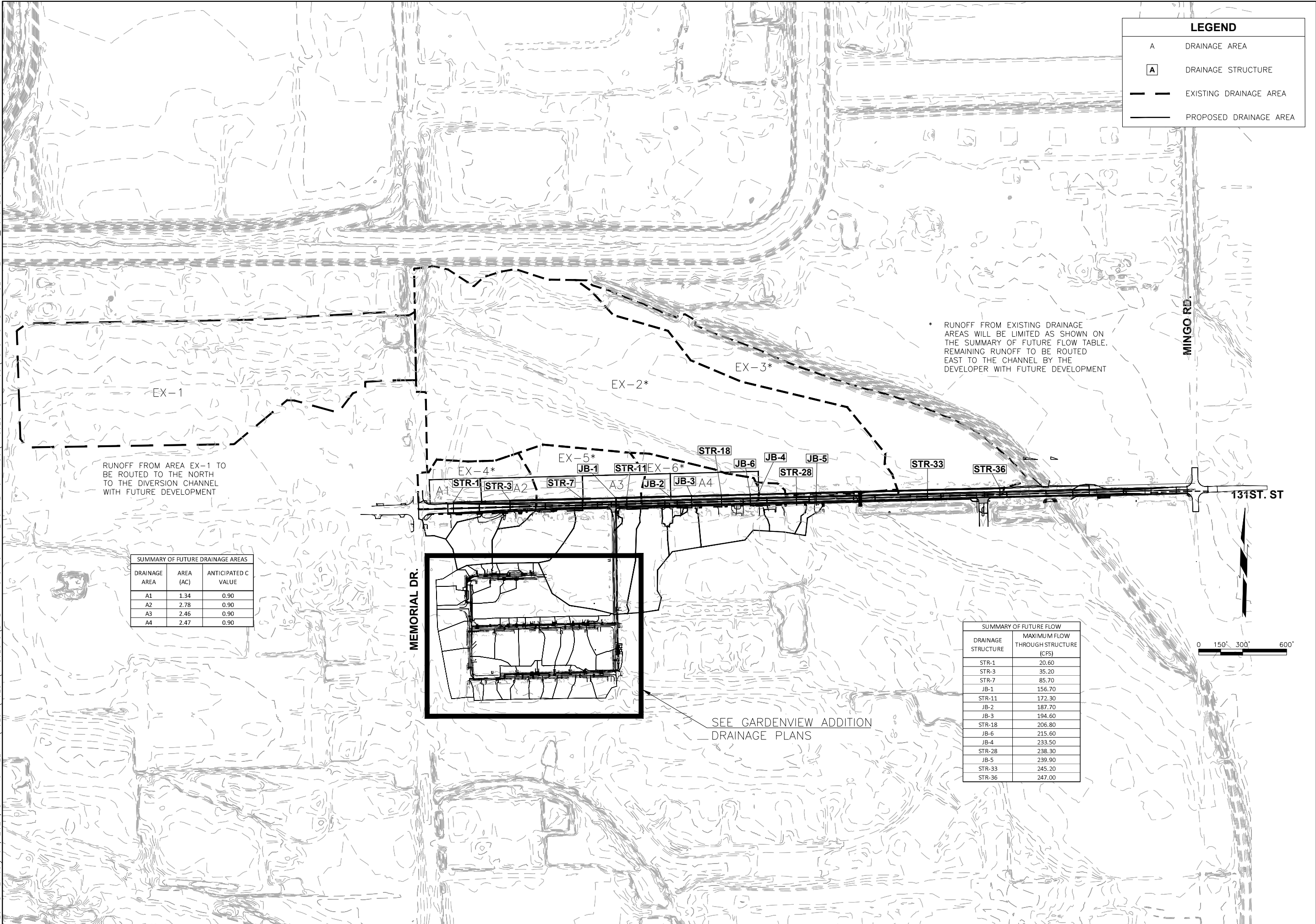
SHEET NAME
131ST ST
DRAINAGE AREA
MAP

SHEET
21

BIXBY, OKLAHOMA

Page 24 of 215

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\131ST ST DRAINAGE AREA MAP_FUTURE.DWG



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAB 32 EXPIRES: 2006-06-30
COPYRIGHT ©2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR TRANSMISSION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

PROFESSIONAL SEAL

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO.	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE: AS SHOWN					

131ST ST. - MEMORIAL TO MINGO

SHEET NAME
131ST ST FUTURE
DRAINAGE AREA
MAP

SHEET
22

BIXBY, OKLAHOMA

Page 25 of 215

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\12 STORMWATER MANAGEMENT PLAN.DWG

STORM WATER MANAGEMENT PLAN

SITE DESCRIPTION

PROJECT LIMITS: 131ST STREET FROM MEMORIAL DR. TO MINGO RD.
BIXBY, OKLAHOMA

PROJECT DESCRIPTION: ROADWAY RECONSTRUCTION AND REHABILITATION WITH DRAINAGE IMPROVEMENTS

- SUGGESTED SEQUENCE OF EROSION CONTROL ACTIVITIES:
- 1. VEGETATIVE STRIPPING
 - 2. UNDERCUT & STOCKPILE EXISTING TOPSOIL. PRESERVE AS MUCH NATIVE VEGETATION AS POSSIBLE
 - 3. INSTALL SEDIMENT CONTROLS
 - 4. REMOVE EXISTING PAVEMENT
 - 5. INSTALL DRAINAGE IMPROVEMENTS
 - 6. FINISH STREET AND SIDEWALK PAVING
 - 7. SPREAD TOPSOIL
 - 8. INSTALL SOLID SLAB SOD

SOIL TYPE: FINE SANDY LOAM, CLAY, SILTY CLAY LOAM

TOTAL AREA OF THE CONSTRUCTION SITE: 12.10 ACRES

ESTIMATED AREA TO BE DISTURBED: 10.72 ACRES

OFFSITE AREA TO BE DISTURBED: (FOR CONTRACTOR USE)

TOTAL IMPERVIOUS AREA PRE-CONSTRUCTION: 3.48 ACRES

TOTAL IMPERVIOUS AREA POST-CONSTRUCTION: 5.74 ACRES

POST-CONSTRUCTION RUNOFF COEFFICIENT OF THE SITE: 0.61

LATITUDE & LONGITUDE OF CENTER OF PROJECT: 35°58'25.46" N, 95°52'41.69" W

PROJECT WILL DISCHARGE TO:

NAME OF RECEIVING WATERS: ARKANSAS RIVER

SENSITIVE WATERS OR WATERSHEDS: YES ☒ NO ☐

303(d) IMPAIRED WATERS: YES ☐ NO ☒

IF YES, LIST IMPAIRMENT:

LOCATED IN A TMDL: YES ☐ NO ☒

LAKE THUNDERBIRD TMDL: YES ☐ NO ☒

MS4 ENTITY: YES ☐ NO ☒

IF YES, LOCATION:

NOTE:
THIS SHEET SHOULD BE USED IN CONJUNCTION WITH A DRAINAGE MAP THAT ILLUSTRATES THE DRAINAGE PATTERNS/PATHWAYS AND RECEIVING WATERS FOR THIS PROJECT. THIS SHEET SHOULD ALSO BE USED WITH THE EROSION CONTROL SUMMARIES, PAY ITEMS, & NOTES.

EROSION AND SEDIMENT CONTROLS

SOIL STABILIZATION PRACTICES:

- TEMPORARY SEEDING
- ☒ PERMANENT SODDING, SPRIGGING OR SEEDING
- VEGETATIVE MULCHING
- SOIL RETENTION BLANKET
- ☒ PRESERVATION OF EXISTING VEGETATION
- HYDROMULCH / HYDROSEED

NOTE: TEMPORARY EROSION CONTROL METHODS MUST BE USED ON ALL DISTURBED AREAS WHERE CONSTRUCTION ACTIVITIES HAVE CEASED FOR OVER 14 DAYS. METHODS USED WILL BE AS SHOWN ON PLANS, OR AS DIRECTED BY THE ENGINEER.

STRUCTURAL PRACTICES:

- STABILIZED CONSTRUCTION EXIT
- ☒ TEMPORARY SILT FENCE
- ☒ TEMPORARY SILT DIKES
- TEMPORARY FIBER LOG
- DIVERSION, INTERCEPTOR OR PERIMETER DIKES
- DIVERSION, INTERCEPTOR OR PERIMETER SWALES
- ROCK FILTER DAMS
- TEMPORARY SLOPE DRAIN
- PAVED DITCH W/ DITCH LINER PROTECTION
- TEMPORARY DIVERSION CHANNELS
- TEMPORARY SEDIMENT BASINS
- TEMPORARY SEDIMENT TRAPS
- ☒ TEMPORARY SEDIMENT FILTERS
- ☒ TEMPORARY SEDIMENT REMOVAL
- RIP RAP
- ☒ INLET SEDIMENT FILTER
- TEMPORARY BRUSH SEDIMENT BARRIERS
- SANDBAG BERMS
- TEMPORARY STREAM CROSSINGS
- FLEXAMAT / ARTICULATED CONCRETE BLOCK
- COMPOST FILTER SOCKS
- EROSION CONTROL MATS AND BLANKETS

OFFSITE VEHICLE TRACKING:

- ☒ HAUL ROADS DAMPENED FOR DUST CONTROL
- ☒ LOADED HAUL TRUCKS TO BE COVERED WITH TARPAULIN
- EXCESS DIRT ON ROAD REMOVED DAILY

NOTES:

THE CONTRACTOR SHALL ALSO BE RESPONSIBLE FOR THE FOLLOWING:

MAINTENANCE AND INSPECTION:

ALL EROSION AND SEDIMENT CONTROLS WILL BE MAINTAINED IN GOOD WORKING ORDER FROM THE BEGINNING OF CONSTRUCTION UNTIL AN ACCEPTABLE VEGETATIVE COVER IS ESTABLISHED. INSPECTION BY THE CONTRACTOR AND ANY NECESSARY REPAIRS SHALL BE PERFORMED ONCE EVERY 7 CALENDAR DAYS AND WITHIN 24 HOURS AFTER ANY STORM EVENT GREATER THAN 0.5 INCH AS RECORDED BY A NON-FREEZING RAIN GAUGE TO BE LOCATED ON SITE. POTENTIALLY ERODIBLE AREAS, DRAINAGEWAYS, MATERIAL STORAGE, STRUCTURAL DEVICES, CONSTRUCTION ENTRANCES AND EXITS ALONG WITH EROSION AND SEDIMENT CONTROL LOCATIONS ARE EXAMPLES OF SITES THAT NEED TO BE INSPECTED.

WASTE MATERIALS:

PROPER MANAGEMENT AND DISPOSAL OF CONSTRUCTION WASTE MATERIAL IS REQUIRED BY THE CONTRACTOR. MATERIALS INCLUDE STOCKPILES, SURPLUS, DEBRIS AND ALL OTHER BY-PRODUCTS FROM THE CONSTRUCTION PROCESS. PRACTICES INCLUDE DISPOSAL, PROPER MATERIALS HANDLING, SPILL PREVENTION AND CLEANUP MEASURES. CONTROLS AND PRACTICES SHALL MEET THE REQUIREMENTS OF ALL FEDERAL, STATE AND LOCAL AGENCIES.

HAZARDOUS MATERIALS:

PROPER MANAGEMENT AND DISPOSAL OF HAZARDOUS WASTE MATERIALS IS REQUIRED. THE CONTRACTOR IS RESPONSIBLE FOR FOLLOWING MANUFACTURER'S RECOMMENDATIONS, STATE AND FEDERAL REGULATIONS TO ENSURE CORRECT HANDLING, DISPOSAL, SPILL PREVENTION AND CLEANUP MEASURES. EXAMPLES INCLUDE BUT ARE NOT LIMITED TO: PAINTS, ACIDS, CLEANING SOLVENTS, CHEMICAL ADDITIVES, CONCRETE CURING COMPOUNDS AND CONTAMINATED SOILS.

GENERAL NOTES:

A STORM WATER POLLUTION PREVENTION PLAN (SWPPP) IS REQUIRED TO COMPLY WITH THE OKLAHOMA POLLUTION DISCHARGE ELIMINATION SYSTEM (OPDES) REGULATIONS. THIS PLAN IS INITIATED DURING THE DESIGN PHASE, CONFIRMED IN THE PRE-WORK MEETINGS AND AVAILABLE ON THE JOB SITE ALONG WITH COPIES OF THE NOTICE OF INTENT (NOI) FORM AND PERMIT CERTIFICATE THAT HAVE BEEN FILED WITH THE OKLAHOMA DEPARTMENT OF ENVIRONMENTAL QUALITY (ODEQ). THE PLAN MUST BE KEPT CURRENT WITH UP-TO-DATE AMENDMENTS DURING THE PROGRESSION OF THE PROJECT. ALL CONTRACTOR OFF-SITE OPERATIONS ASSOCIATED WITH THE PROJECT MUST BE DOCUMENTED IN THE SWPPP, I.E., BORROW PITS, WORK ROADS, DISPOSAL SITES, ASPHALT/CONCRETE PLANTS, ETC. THE BASIC GOAL OF STORM WATER MANAGEMENT IS TO IMPROVE WATER QUALITY BY REDUCING POLLUTANTS IN STORM WATER DISCHARGES. RUNOFF FROM CONSTRUCTION SITES HAS A POTENTIAL FOR POLLUTION DUE TO EXPOSED SOILS AND THE PRESENCE OF HAZARDOUS MATERIALS USED IN THE CONSTRUCTION PROCESS. THE PREVENTION OF SOIL EROSION, CONTAINMENT OF HAZARDOUS MATERIALS AND/OR THE INTERCEPTION OF THESE POLLUTANTS BEFORE LEAVING THE CONSTRUCTION SITE ARE THE BEST PRACTICES FOR CONTROLLING STORM WATER POLLUTION.

THE FOLLOWING SECTIONS OF THE 2019 ODOT STANDARD SPECIFICATIONS SHOULD BE NOTED:

- 103.05 BONDING REQUIREMENTS
- 104.10 FINAL CLEANING UP
- 104.12 CONTRACTOR'S RESPONSIBILITY FOR WORK
- 104.13 ENVIRONMENTAL PROTECTION
- 106.08 STORAGE AND HANDLING OF MATERIAL
- 107.01 LAWS, RULES AND REGULATIONS TO BE OBSERVED
- 107.20 STORM WATER MANAGEMENT
 - 220 MANAGEMENT OF EROSION, SEDIMENTATION AND STORM WATER POLLUTION PREVENTION
 - 221 TEMPORARY SEDIMENT CONTROL

IN ADDITION:

"ODEQ GENERAL PERMIT (OKR10) FOR STORM WATER DISCHARGES FROM CONSTRUCTION ACTIVITIES WITHIN THE STATE OF OKLAHOMA." ODEQ, WATER QUALITY DIVISION, OCTOBER 18, 2022.

ADDITIONAL PERMITS REQUIRED FROM OKLAHOMA WATER RESOURCES BOARD AND/OR MUNICIPALITY FOR USE OF SURFACE, GROUND OR CITY WATER SOURCES FOR ACTIVITIES SUCH AS WATERING

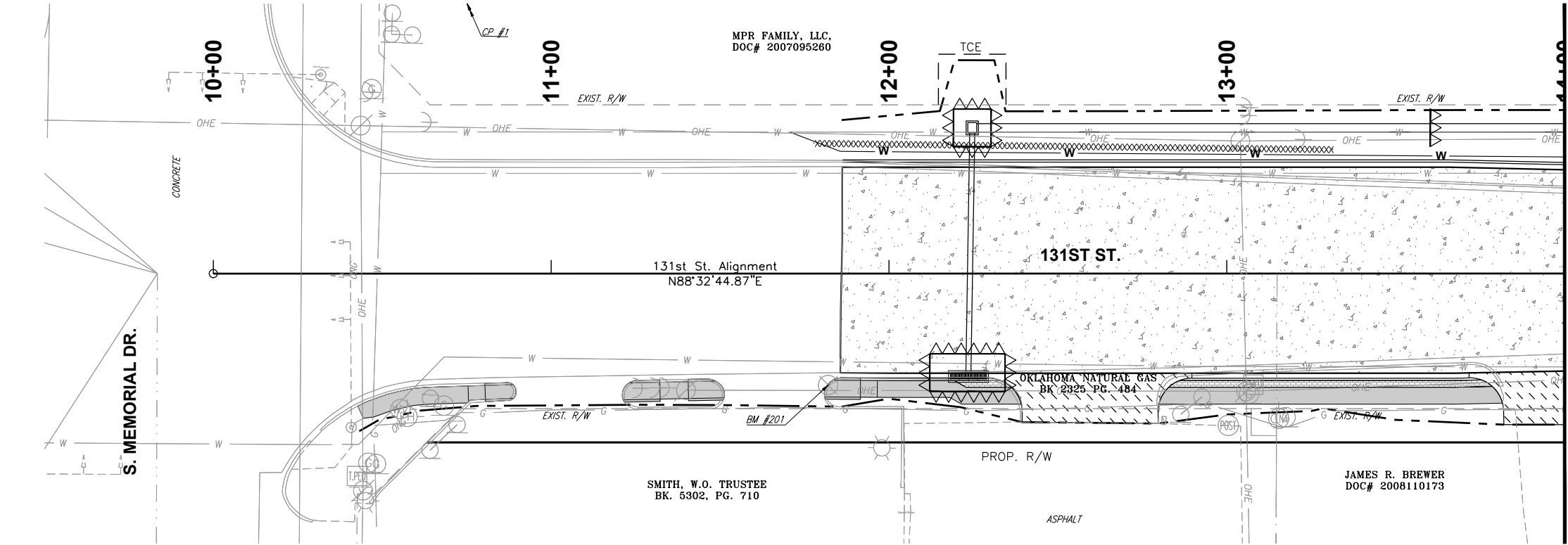


CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
STATE OF OK CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES: 2004-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
NO PART OF THIS DOCUMENT MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.

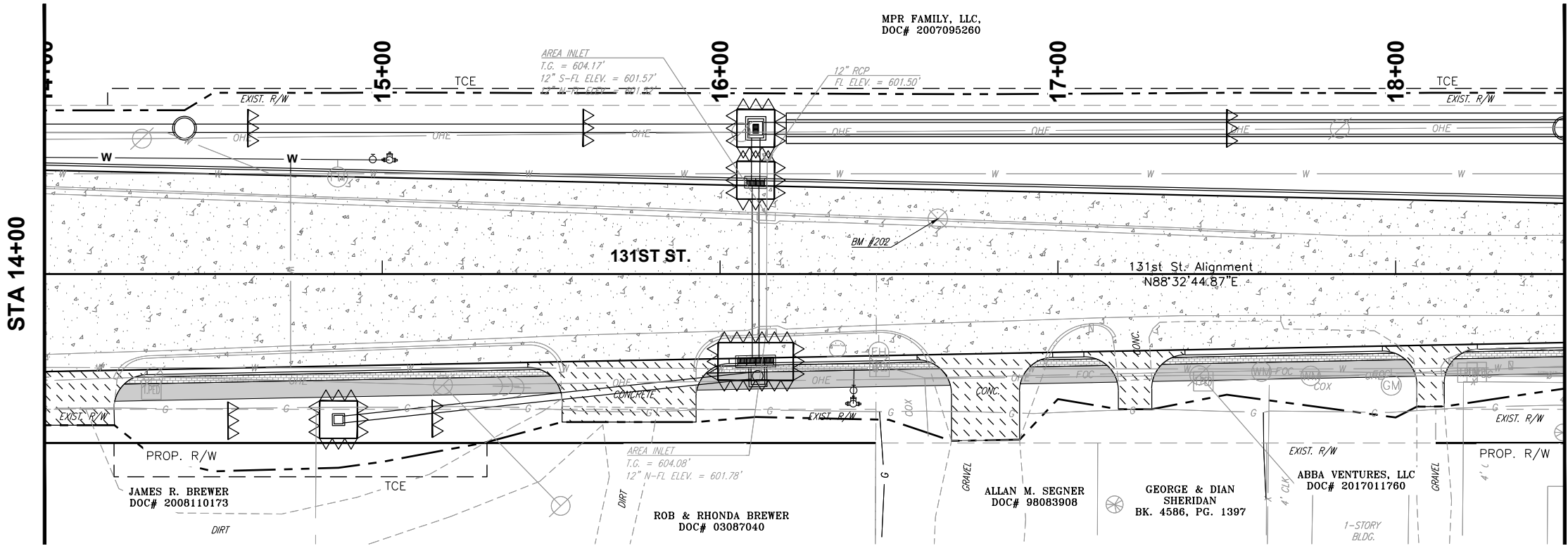


SUBMITTAL:		PRELIMINARY		REVISION HISTORY			
DATE:	PROJECT NO.	DATE:	PROJECT NO.	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102						
DESIGNED BY: J.L.C.							
DRAWN BY: J.L.C.							
APPROVED BY: S.N.H.							
SCALE:							

131ST ST. - MEMORIAL TO MINGO	
SHEET NAME STORMWATER MANAGEMENT PLAN	
SHEET 23	
BIXBY, OKLAHOMA	



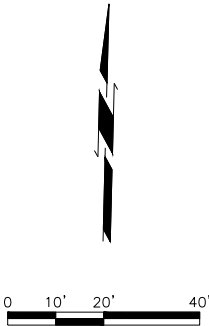
STA 14+00



STA 18+50
SEE SHEET 25

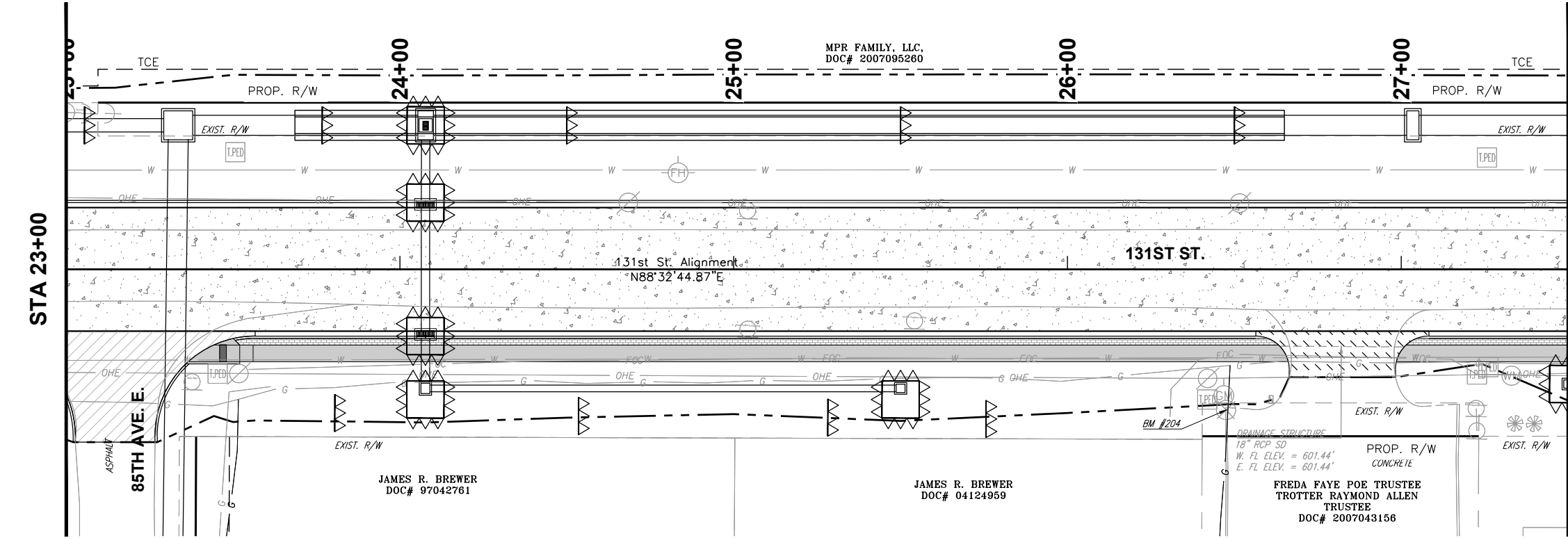
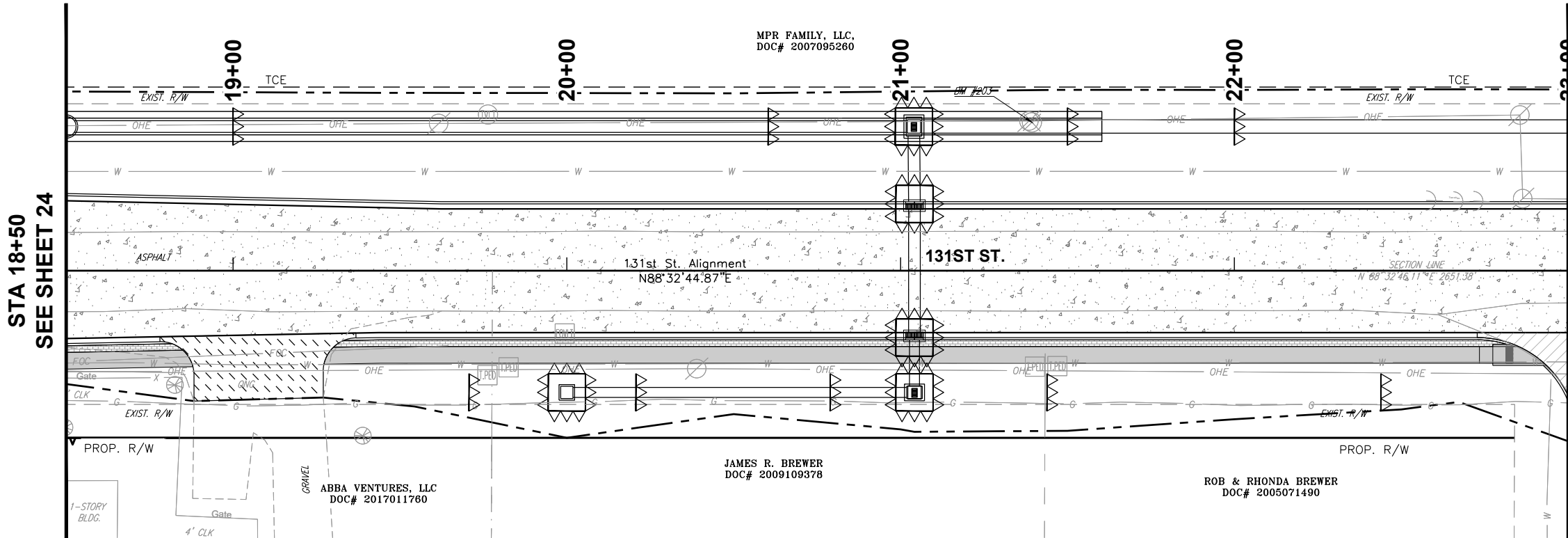
LEGEND

- PROPOSED SILT DIKE
- PROPOSED SILT FENCE
- PROPOSED SEDIMENT FILTER
- TURF REINFORCEMENT MAT



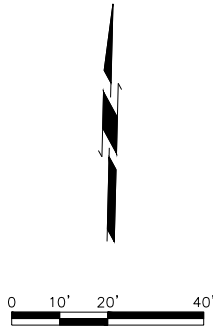
CEC			
STATE OF OKLAHOMA TULSA, OKLAHOMA 74119 WWW.CONNEXTEC.COM CAN 32 EXPIRES 10/01/30 COPYRIGHT ©2017 CEC. ALL RIGHTS RESERVED. THIS DRAWING IS THE PROPERTY OF CEC. ANY REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED.			
PROFESSIONAL SEAL THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT			
REVISION HISTORY			
SUBMITTAL:	PRELIMINARY		
DATE:	NO.	DESCRIPTION	DATE
11/30/2023			
PROJECT NO. 170231.0102			
DESIGNED BY: J.L.C.			
DRAWN BY: J.L.C.			
APPROVED BY: S.N.H.			
SCALE: AS SHOWN			
131ST ST. - MEMORIAL TO MINGO			
SHEET NAME EROSION CONTROL (1 OF 6)			
SHEET 24			

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\18 EROSION CONTROL (6 OF 6).DWG



LEGEND

- PROPOSED SILT DIKE
- PROPOSED SILT FENCE
- PROPOSED SEDIMENT FILTER
- TURF REINFORCEMENT MAT



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXTEC.COM
STATE OF OK CERTIFICATE OF AUTHORIZATION
CAR 32 EXPIRES: 08/06/30
COPYRIGHT 2017 CEC. ALL RIGHTS RESERVED.
NO PART OF THIS DOCUMENT MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IS PROHIBITED.

PROFESSIONAL SEAL

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT.

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO.:	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE: AS SHOWN					

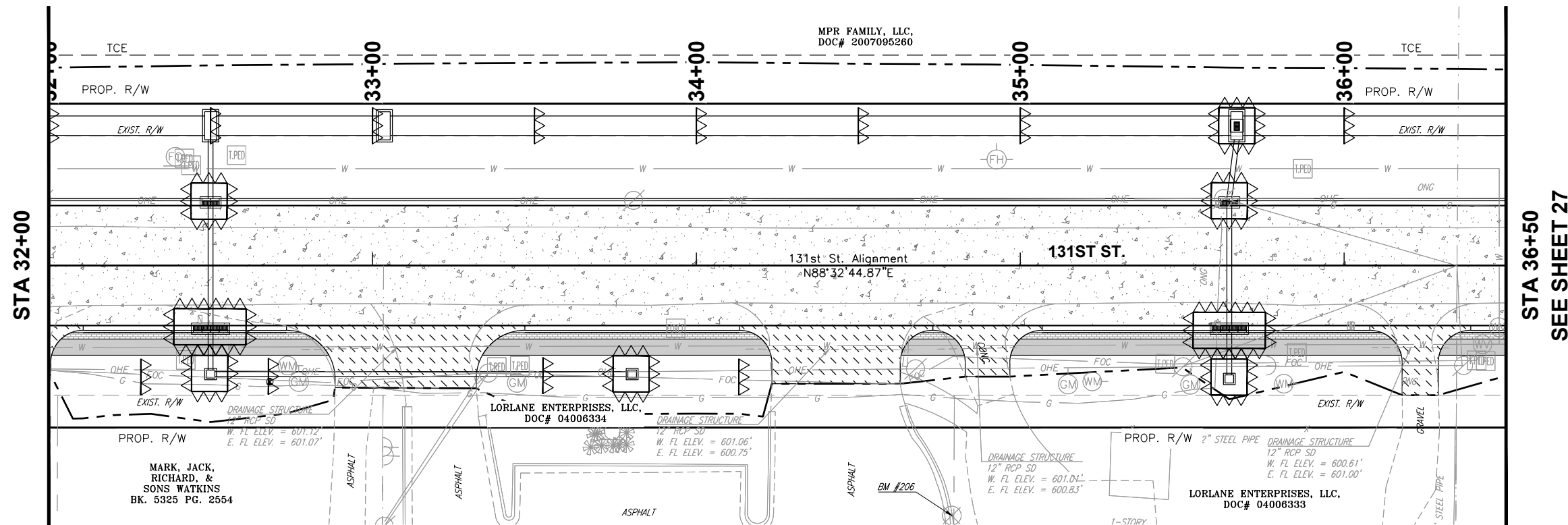
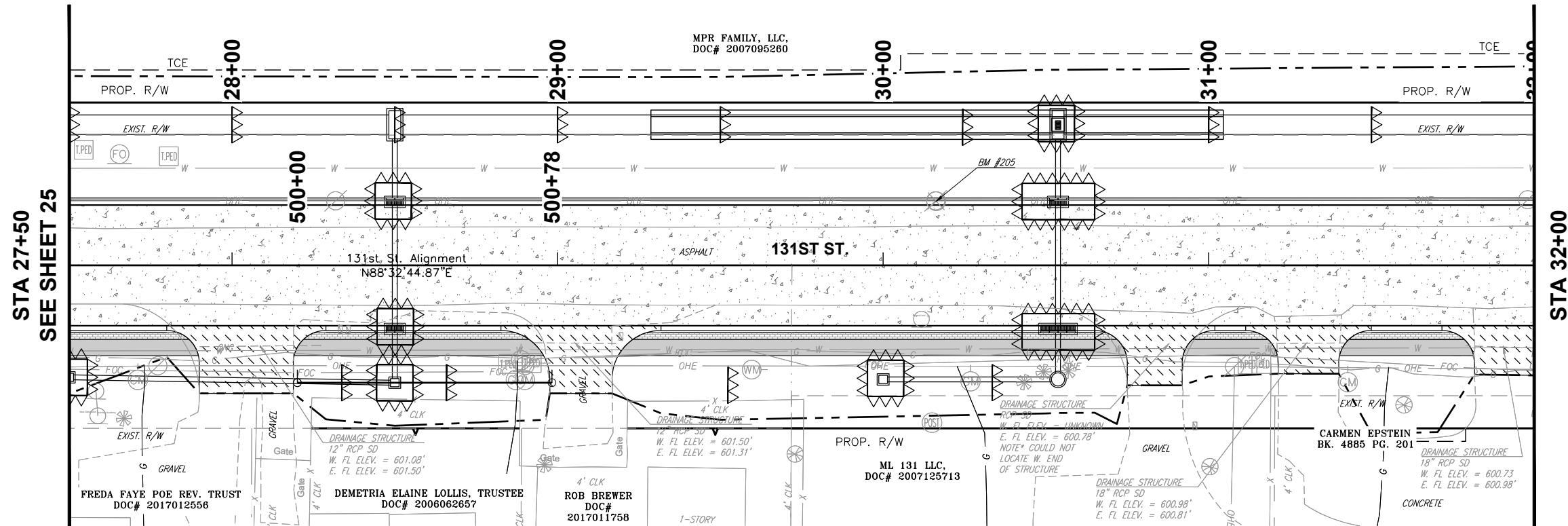
131ST ST. - MEMORIAL TO MINGO

SHEET NAME
EROSION CONTROL
(2 OF 6)

SHEET
25

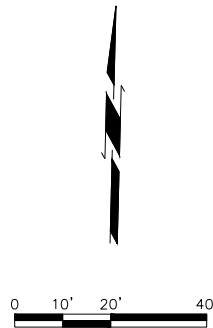
BIXBY, OKLAHOMA

Page 28 of 215



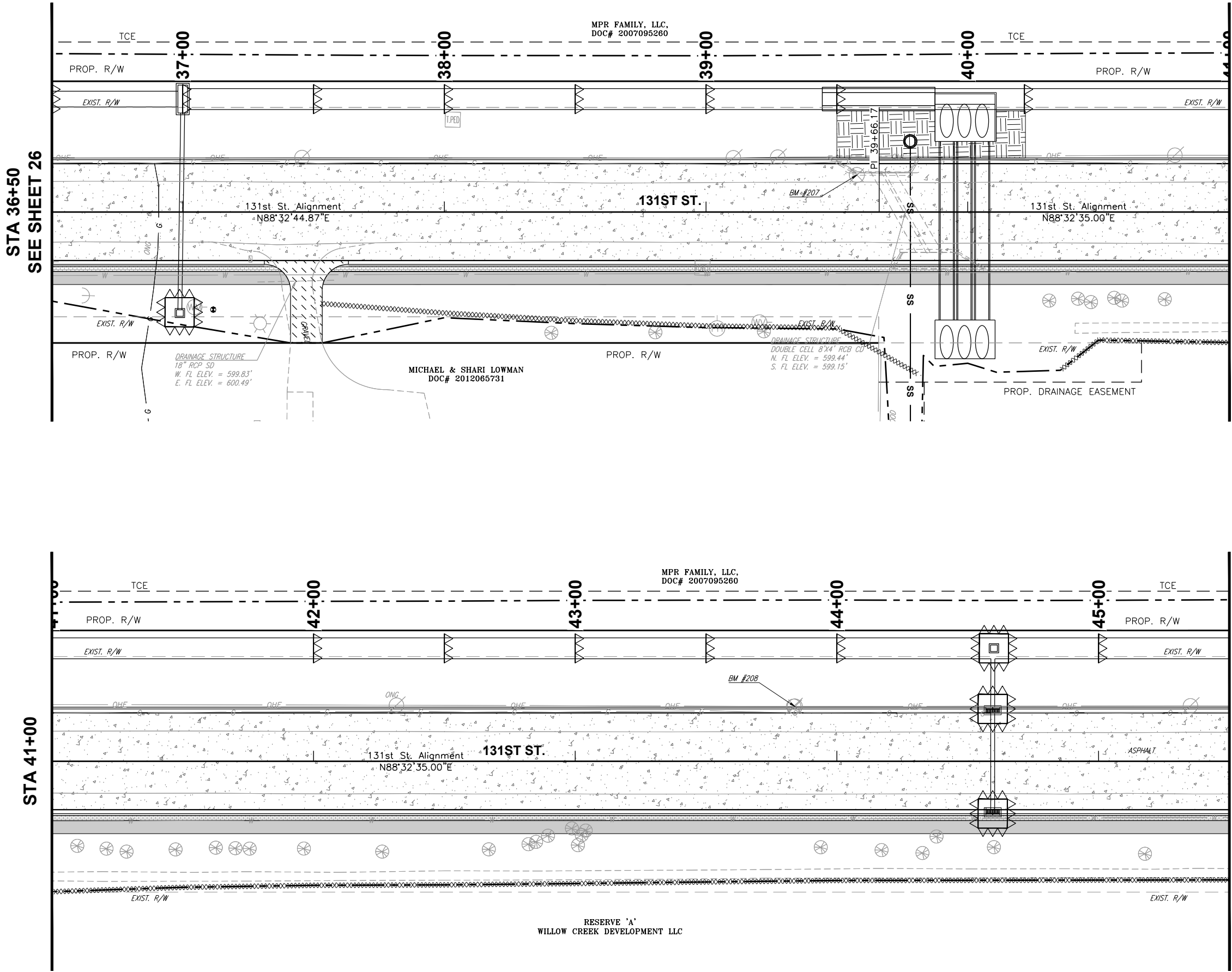
LEGEND

	PROPOSED SILTS DIKE
	PROPOSED SILTS FENCE
	PROPOSED SEDIMENT FILTER
	TURF REINFORCEMENT MAT



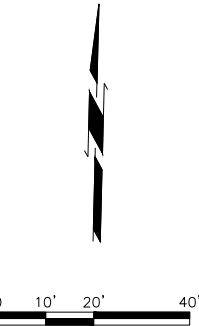
SHEET 26	SHEET NAME EROSION CONTROL (3 OF 6)	131ST ST. - MEMORIAL TO MINGO	SUBMITTAL:	PRELIMINARY	REVISION HISTORY			THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT. CEC CORPORATION TULSA, OKLAHOMA 74119 WWW.CONNEXUSCEC.COM STATE OF OK CERTIFICATE OF AUTHORIZATION JANUARY 1, 2019 CLASS 32 EXPIRES: 2024-01-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. THIS DRAWING IS PROPERTY OF CEC. ANY UNAUTHORIZED REUSE OR REPRODUCTION WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED. CEC
					DATE:	11/30/2023	NO.	
		PROJECT NO:	170231-0102					
		DESIGNED BY:	J.L.C.					
		DRAWN BY:	J.L.C.					
		APPROVED BY:	S.N.H.					
		SCALE:	AS SHOWN					

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\18 EROSION CONTROL (6 OF 6).DWG



LEGEND

- PROPOSED SILT DIKE
- PROPOSED SILT FENCE
- PROPOSED SEDIMENT FILTER
- TURF REINFORCEMENT MAT



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXTEC.COM
STATE OF OK CERTIFICATE OF AUTHORIZATION
CAB 32 EXPIRES: 08/06/30
COPYRIGHT 2017 CEC. ALL RIGHTS RESERVED.
NO PART OF THIS DOCUMENT MAY
BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.

PROFESSIONAL SEAL

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO:	NO.	DESCRIPTION	NO.	DATE
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE:	AS SHOWN				

131ST ST. - MEMORIAL TO MINGO

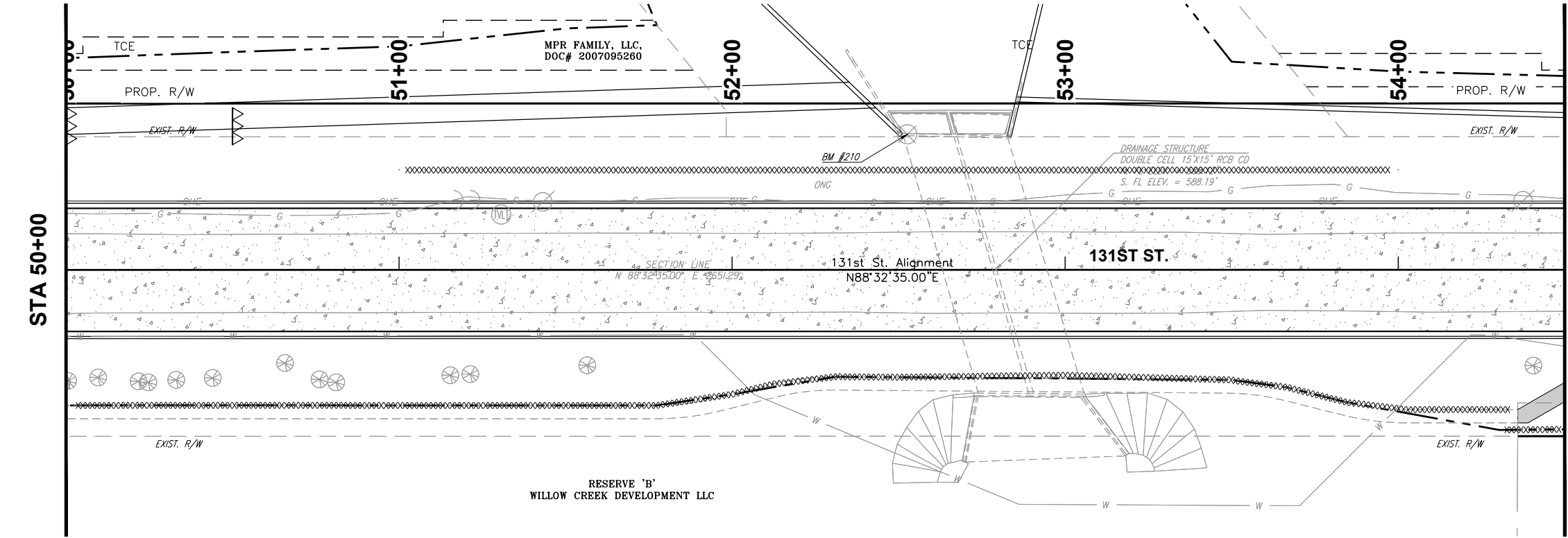
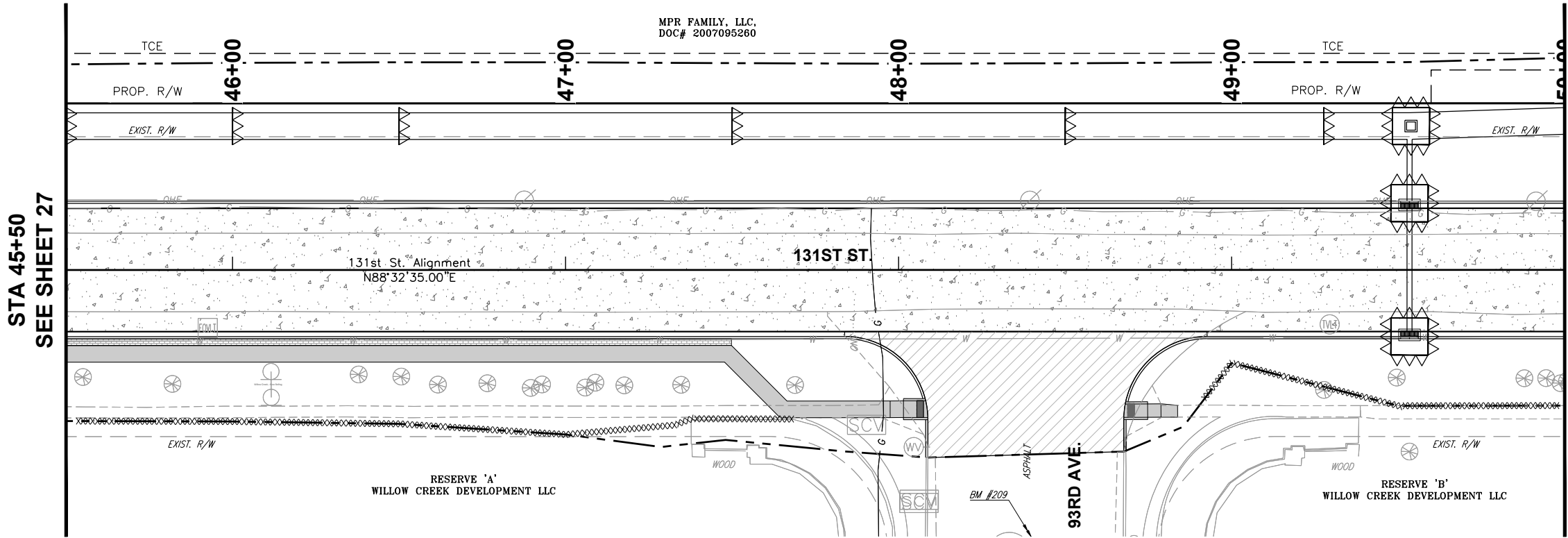
SHEET NAME
EROSION CONTROL
(4 OF 6)

SHEET
27

BIXBY, OKLAHOMA

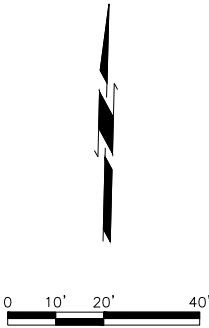
Page 30 of 215

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\18 EROSION CONTROL (6 OF 6).DWG



LEGEND

- PROPOSED SILT DIKE
- PROPOSED SILT FENCE
- PROPOSED SEDIMENT FILTER
- TURF REINFORCEMENT MAT



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
STATE OF OK CERTIFICATE OF AUTHORIZATION
CEN 32 EXPIRES: 08/06/30
COPYRIGHT 2017 CEC. ALL RIGHTS RESERVED.
NO PART OF THIS DOCUMENT MAY
BE REPRODUCED OR USED IN ANY MANNER
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC. IT IS PROHIBITED.

131ST ST. - MEMORIAL TO MINGO

SHEET NAME
EROSION CONTROL
(5 OF 6)

SHEET
28

REVISION HISTORY

NO.	DESCRIPTION	DATE

SUBMITTAL:

PRELIMINARY	NO.	DESCRIPTION	DATE
DATE:	11/30/2023	PROJECT NO. 170231.0102	
DESIGNED BY:	J.L.C.		
DRAWN BY:	J.L.C.		
APPROVED BY:	S.N.H.		
SCALE:	AS SHOWN		

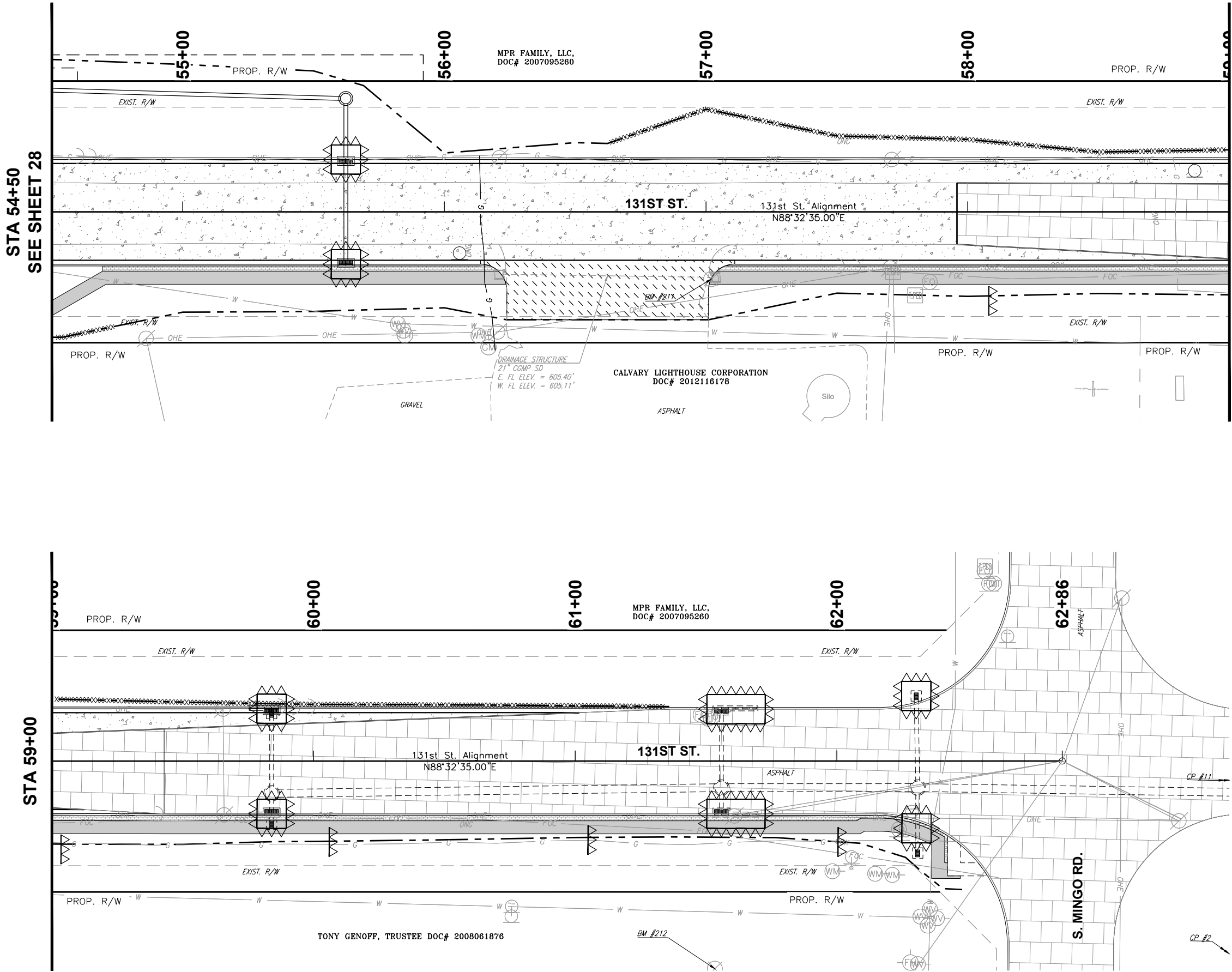
BIXBY, OKLAHOMA

SHEET NAME
EROSION CONTROL
(5 OF 6)

SHEET
28

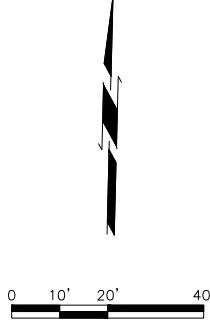
Page 31 of 215

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\18 EROSION CONTROL (6 OF 6).DWG



LEGEND

- PROPOSED SILT DIKE
- PROPOSED SILT FENCE
- PROPOSED SEDIMENT FILTER
- TURF REINFORCEMENT MAT



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXTEC.COM
CAN 32 EXPIRES: 08/06/30
STATE OF OK CERTIFICATE OF AUTHORIZATION
WWW.CONNEXTEC.COM
COPYRIGHT 2017 CEC. ALL RIGHTS RESERVED.
NO PART OF THIS DOCUMENT MAY
BE REPRODUCED OR TRANSMITTED
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC. IT IS PROHIBITED.

PROFESSIONAL
ENGINEER
THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

131ST ST. - MEMORIAL TO MINGO

SHEET NAME
EROSION
CONTROL
(6 OF 6)

SHEET
29

REVISION HISTORY

NO.	DESCRIPTION	DATE

SUBMITTAL:

PRELIMINARY

DATE: 11/30/2023

PROJECT NO: 170231.0102

DESIGNED BY: J.L.C.

DRAWN BY: J.L.C.

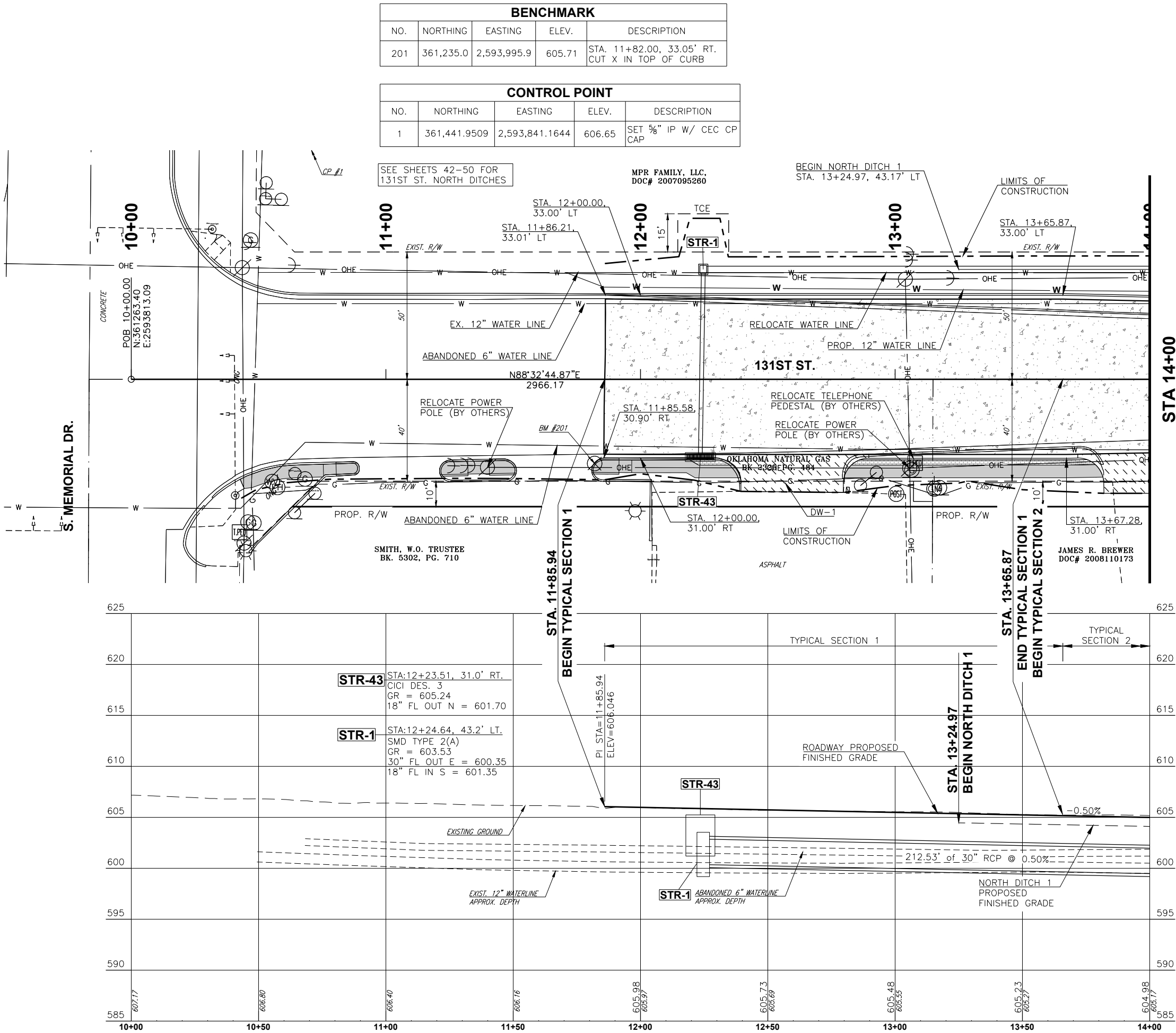
APPROVED BY: S.N.H.

SCALE: AS SHOWN

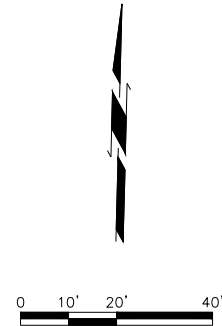
BIXBY, OKLAHOMA

Page 32 of 215

PLOT DATE: August 2, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINCO\PROJECT DRAWINGS\30 PLAN & PROFILE (12 OF 12).DWG



LEGEND	
RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAP 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
NO PART OF THIS DOCUMENT MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IS PROHIBITED.

PROFESSIONAL ENGINEER
THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT

REVISION HISTORY	
NO.	DESCRIPTION

SUBMITTAL:	PRELIMINARY
DATE:	11/30/2023
PROJECT NO.	170231.0102
DESIGNED BY:	J.L.C.
DRAWN BY:	J.L.C.
APPROVED BY:	S.N.H.
SCALE:	AS SHOWN

131ST ST. - MEMORIAL TO MINGO

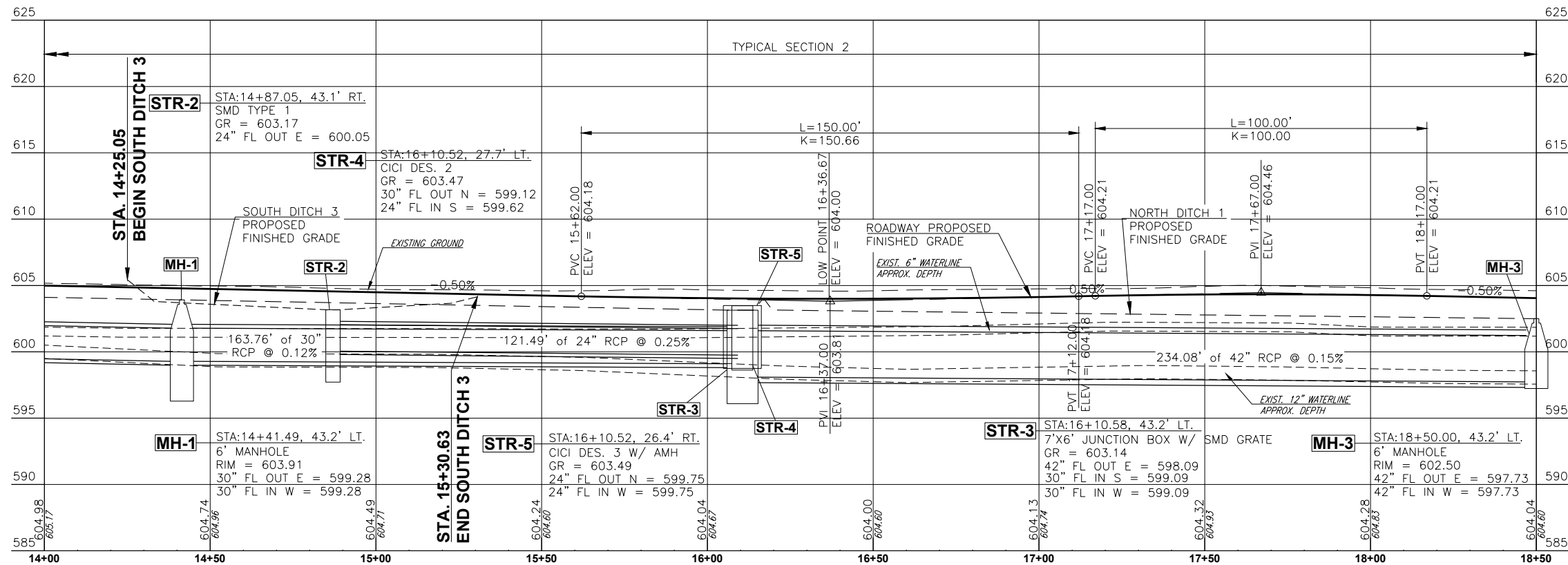
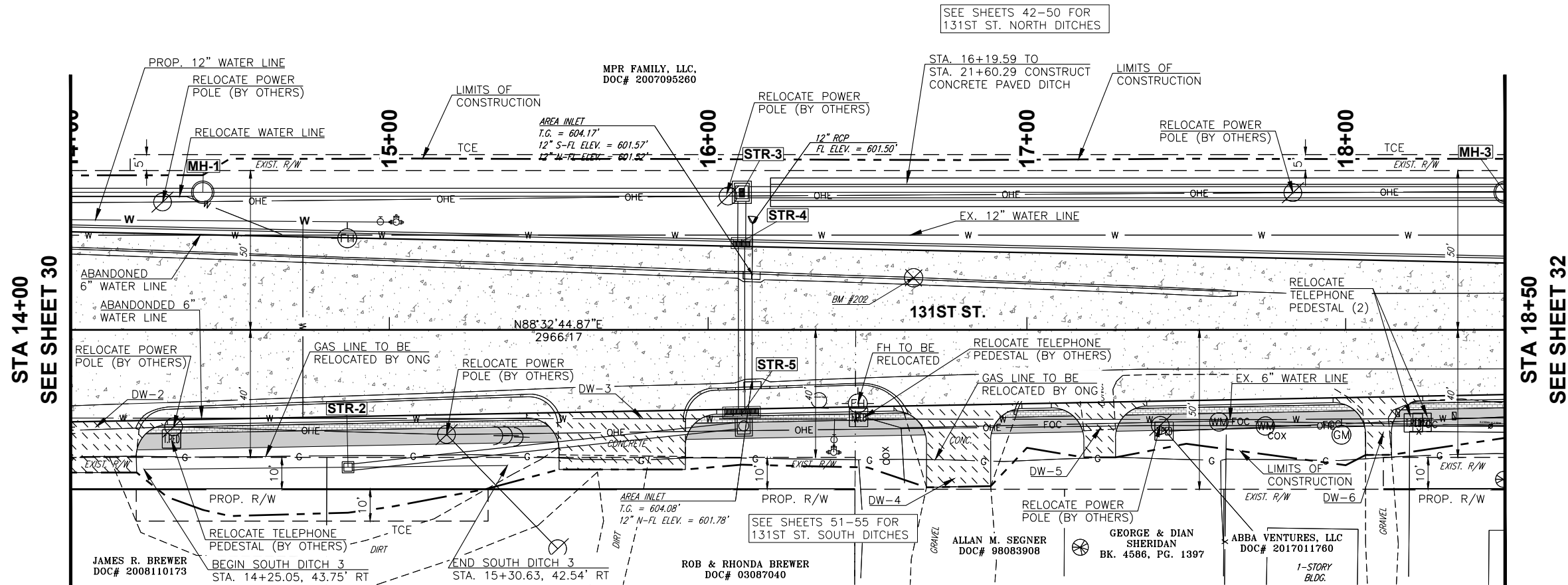
SHEET NAME
PLAN & PROFILE
(1 OF 12)

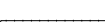
SHEET
30

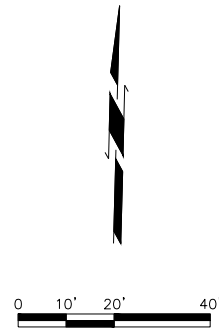
BIXBY, OKLAHOMA

Page 33 of 215

BENCHMARK				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
202	361,296.6	2,594,476.9	604.81	STA. 16+64.47, 16.35' LT. CUT X IN TOP OF CURB

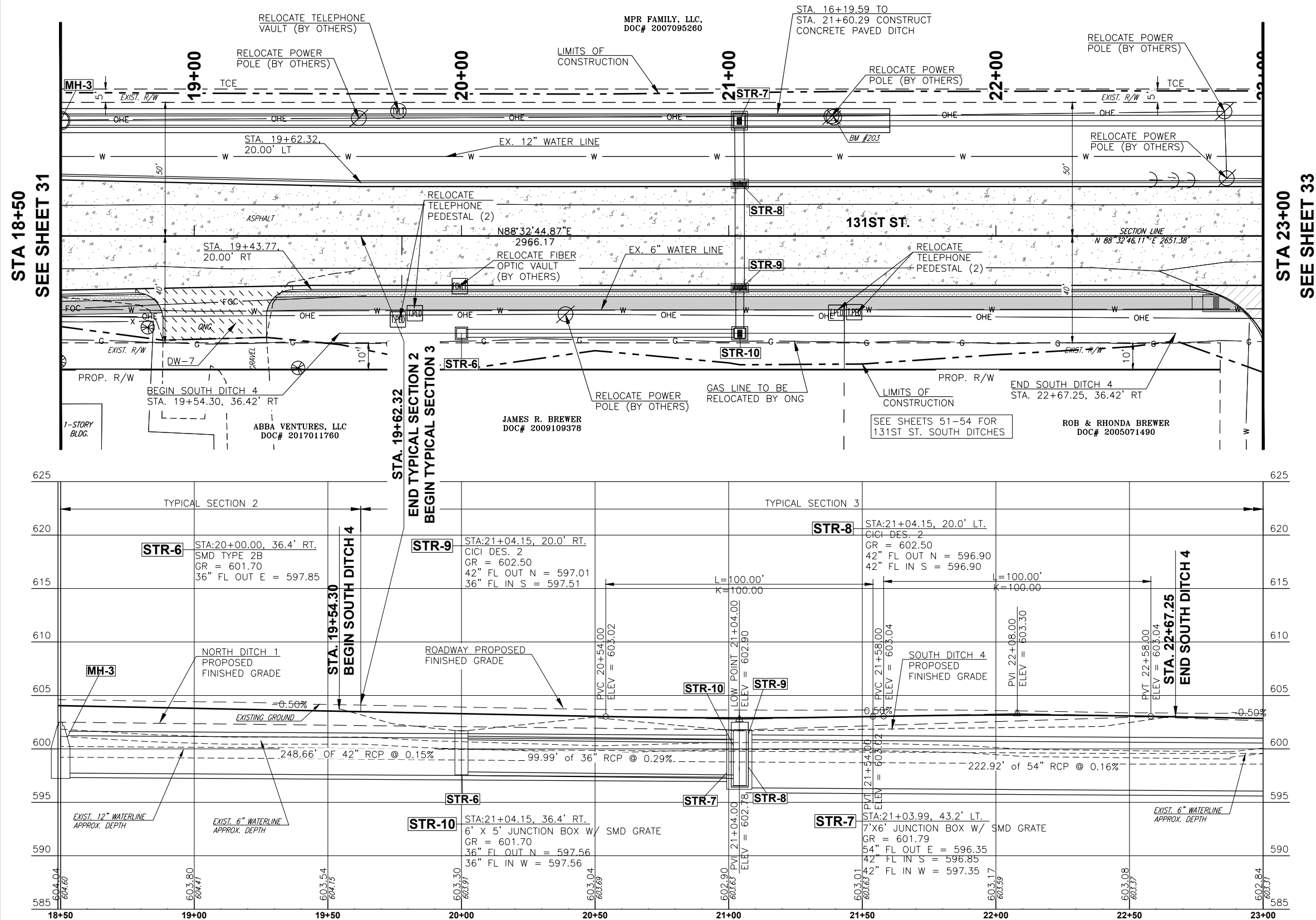


LEGEND	
RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	

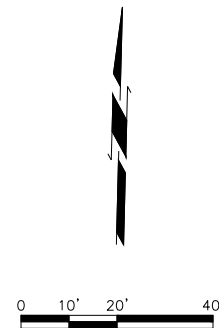


BENCHMARK				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
203	361,336.7	2,594,951.0	603.62	STA. 21+39.37, 33.05' RT. SET RAILROAD SPIKE IN S. FACE OF POWER POLE

SEE SHEETS 42-50 FOR
131ST ST. NORTH DITCHES



LEGEND	
RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	



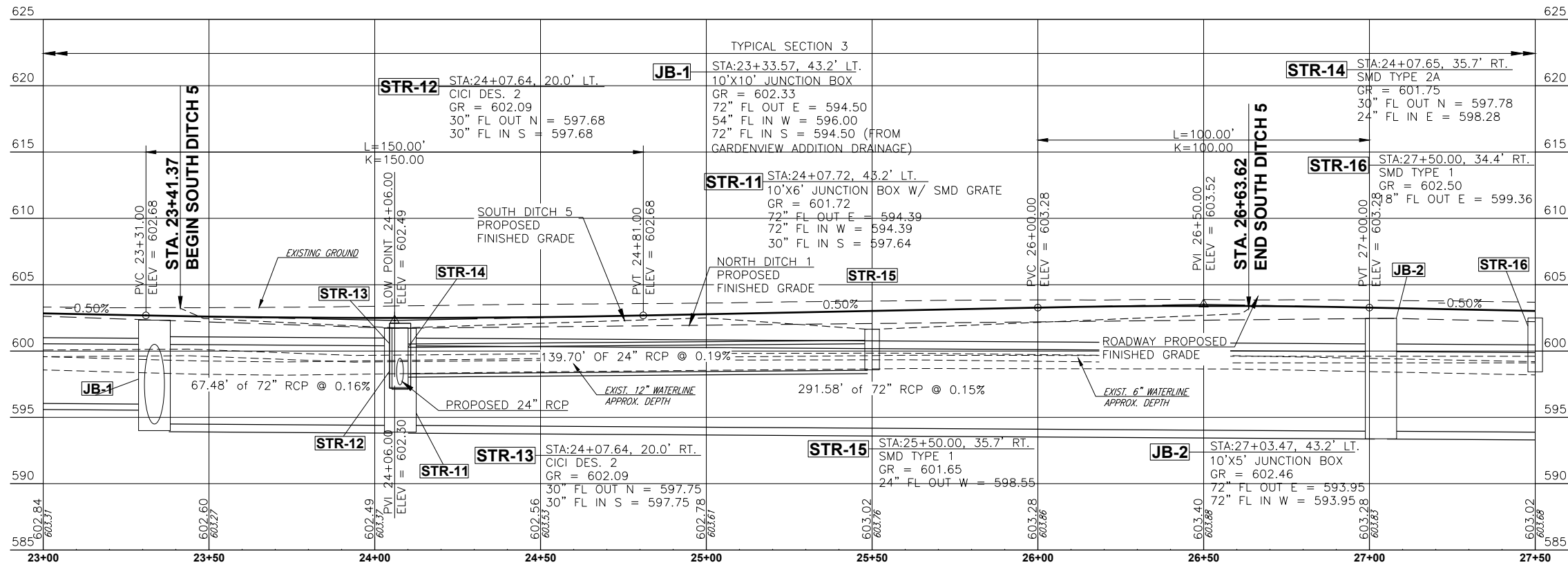
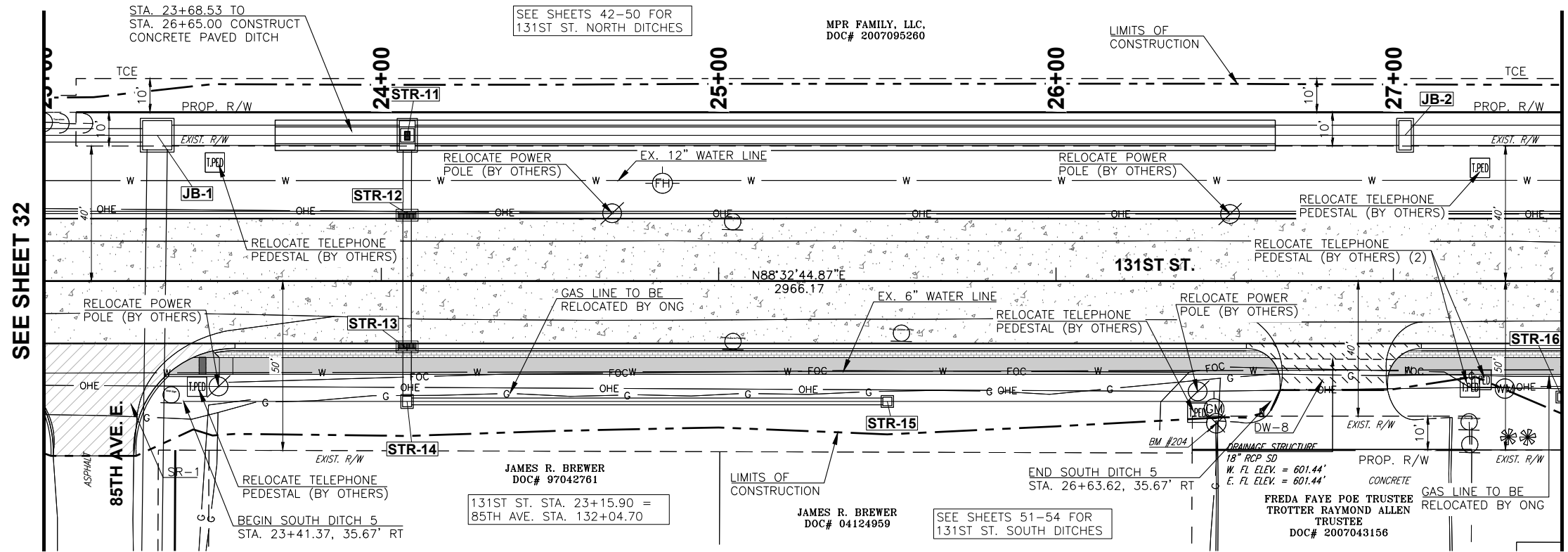
PLOT DATE: August 2, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\30 PLAN & PROFILE (12 OF 12).DWG

STA 23+00
SEE SHEET 32

STA 27+50
SEE SHEET 34

BENCHMARK				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
204	361,263.1	2,595,461.2	603.44	STA. 25+47.53, 42.16' RT. CUT X IN TOP OF CURB IN NW COR. OF PARKING LOT

LEGEND	
RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	



CEC

STATE OF OKLAHOMA
TULSA, OKLAHOMA 74119
WWW.CONNEXIONCEC.COM
CAN 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DOCUMENT IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED ON THE DRAWING. WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.

REVISION HISTORY		SUBMITTAL	
DATE	DESCRIPTION	PRELIMINARY	DATE
		11/30/2023	
		PROJECT NO. 170231.0102	
		DESIGNED BY: J.L.C.	
		DRAWN BY: J.L.C.	
		APPROVED BY: S.N.H.	
		SCALE: AS SHOWN	

131ST ST. - MEMORIAL TO MINGO

SHEET NAME
PLAN & PROFILE
(4 OF 12)

SHEET
33

BIXBY, OKLAHOMA

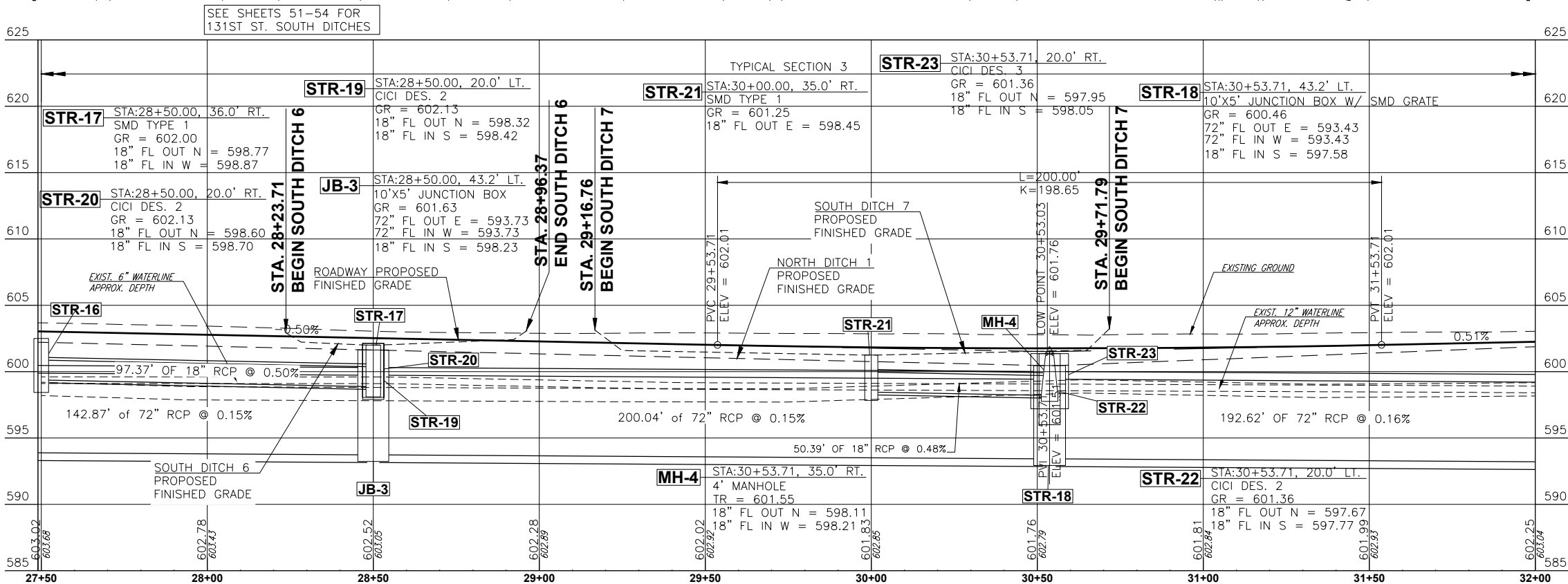
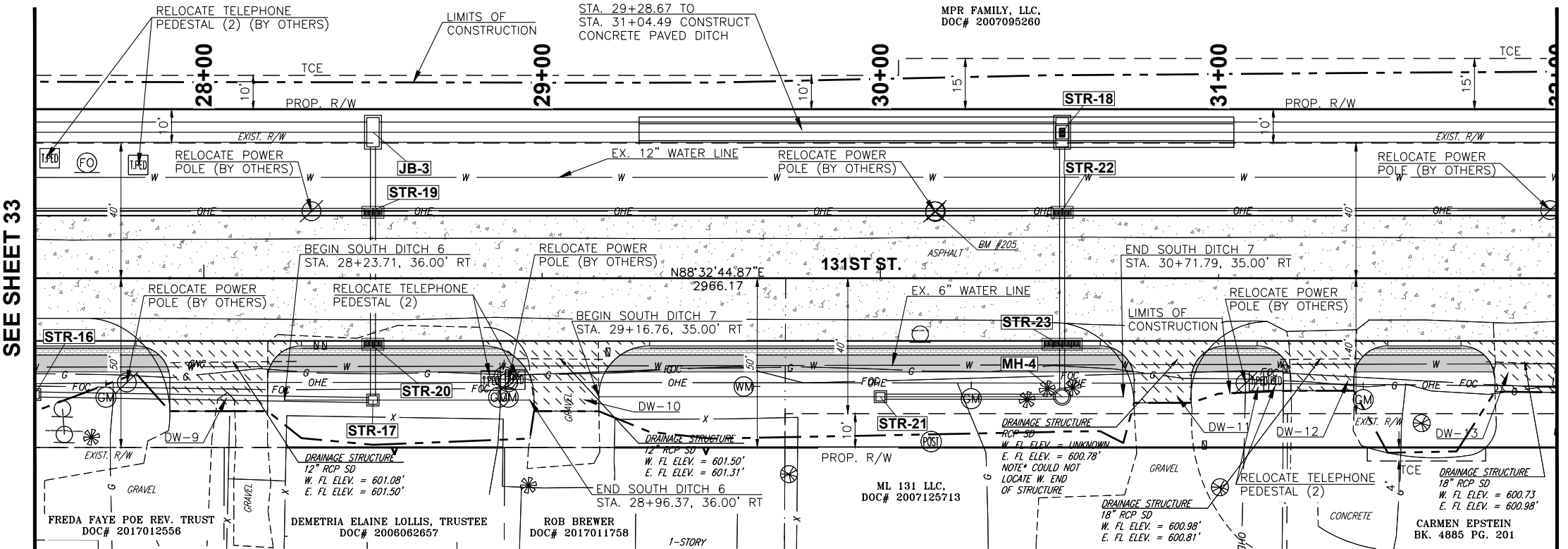
PLOT DATE: August 2, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\30 PLAN & PROFILE (12 OF 12).DWG

STA 27+50
SEE SHEET 33

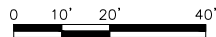
STA 32+00
SEE SHEET 35

BENCHMARK				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
205	361,334.2	2,595,828.2	604.24	STA. 30+16.28, 19.69' LT. SET RAILROAD SPIKE IN S. FACE OF POWER POLE

SEE SHEETS 42-50 FOR
131ST ST. NORTH DITCHES



LEGEND	
RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	



CEC

STATE OF OKLAHOMA
TULSA, OKLAHOMA 74119
WWW.CONNEXIONCEC.COM
CAN 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REUSE OR REPRODUCTION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

REVISION HISTORY	
DATE	DESCRIPTION

PRELIMINARY	
NO.	DESCRIPTION

SUBMITTAL	
DATE	DESCRIPTION
11/30/2023	PROJECT NO. 170231.0102
DESIGNED BY: J.L.C.	DRAWN BY: J.L.C.
APPROVED BY: S.N.H.	SCALE: AS SHOWN

131ST ST. - MEMORIAL TO MINGO

SHEET NAME
PLAN & PROFILE
(5 OF 12)

SHEET
34

Page 37 of 215

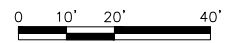
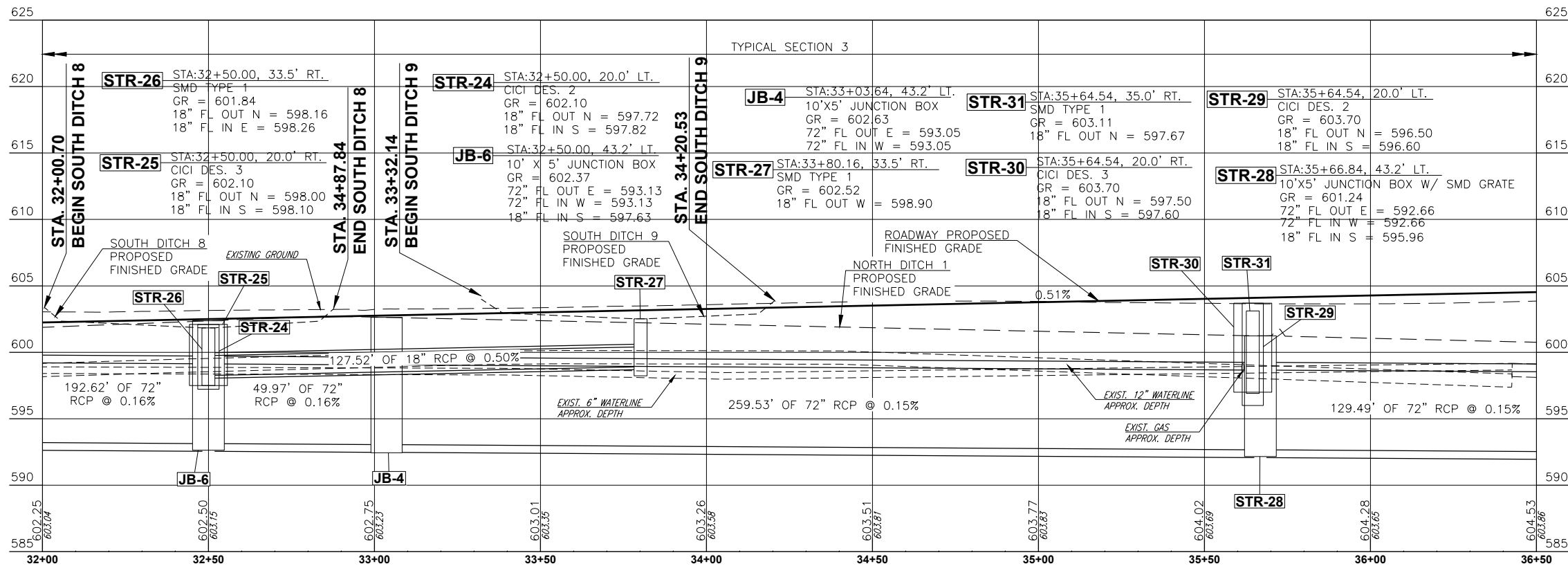
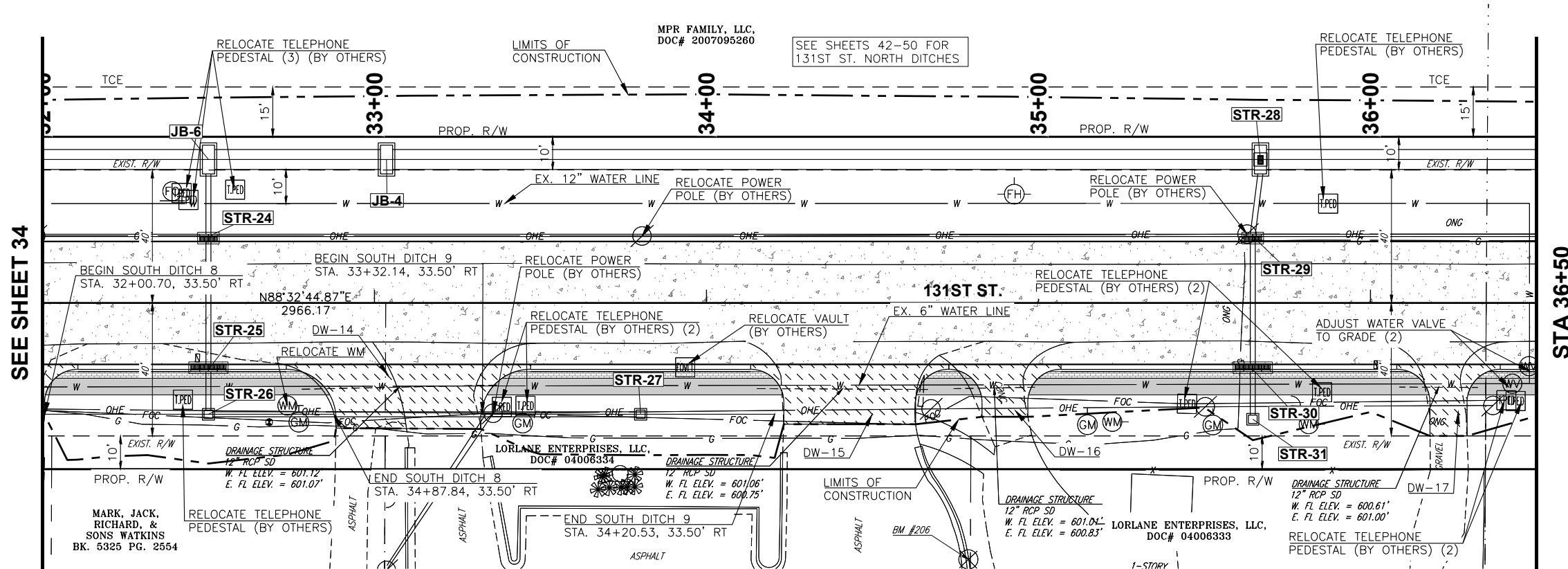
PLOT DATE: August 2, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\30 PLAN & PROFILE (12 OF 12).DWG

STA 32+00
SEE SHEET 34

STA 36+50
SEE SHEET 36

BENCHMARK				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
206	361,249.2	2,596,293.1	606.29	STA. 34+78.88, 77.15' RT. CUT X IN TOP OF CURB

LEGEND	
RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAP 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING IS TO BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.

PROFESSIONAL ENGINEER

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT

REVISION HISTORY	
NO.	DESCRIPTION

SUBMITTAL	
PRELIMINARY	DATE
11/30/2023	17/0231.0102
DESIGNED BY: J.L.C.	DRAWN BY: J.L.C.
APPROVED BY: S.N.H.	SCALE: AS SHOWN

131ST ST. - MEMORIAL TO MINGO

SHEET NAME
PLAN & PROFILE
(6 OF 12)

SHEET
35

Page 38 of 215

PLOT DATE: August 2, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINCO\PROJECT DRAWINGS\30 PLAN & PROFILE (12 OF 12).DWG

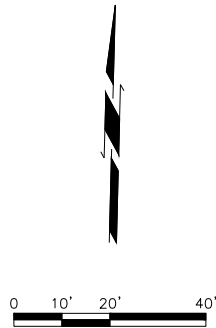
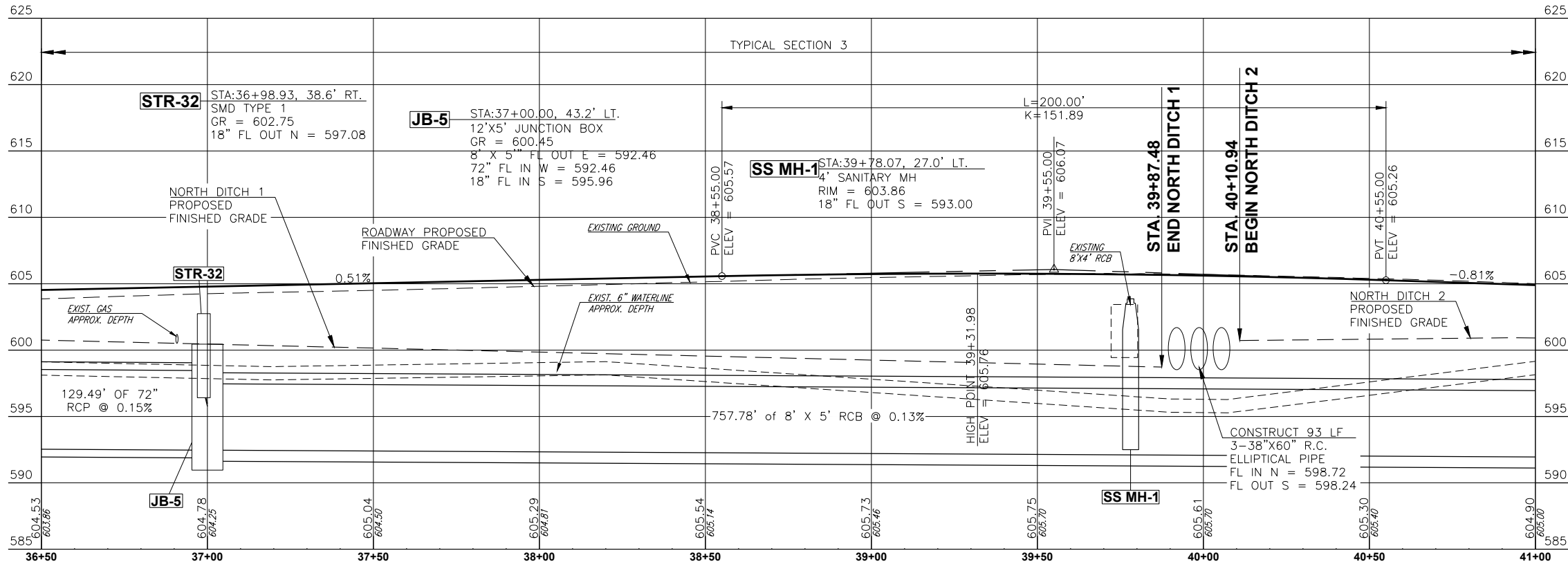
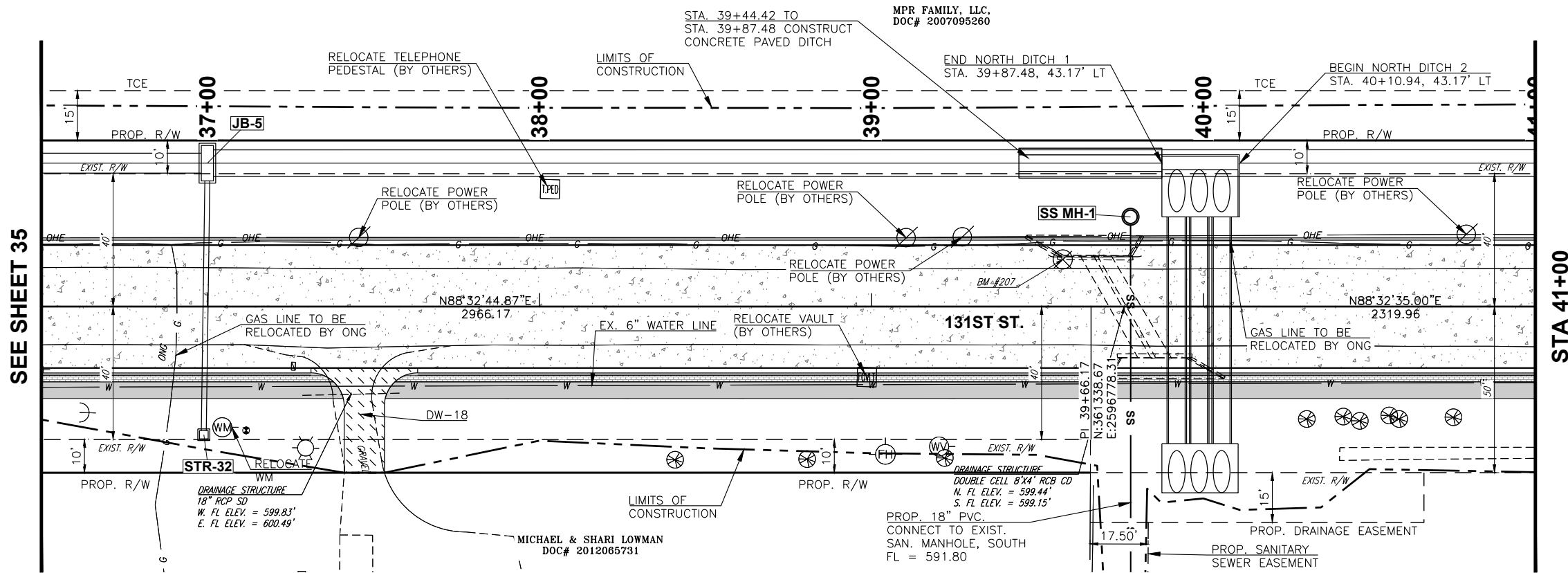
BENCHMARK				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
207	361,352.6	2,596,769.5	606.29	STA. 39+57.67, 14.15' LT. CUT X IN TOP OF HEADWALL

SEE SHEETS 42-50 FOR
131ST ST. NORTH DITCHES

SEE SHEET 65 SANITARY
SEWER PLAN & PROFILE

STA 36+50
SEE SHEET 35

STA 41+00
SEE SHEET 37



LEGEND	
RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	



CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CEN 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING
MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY
MEANS, ELECTRONIC OR MECHANICAL, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC. IT IS PROHIBITED.



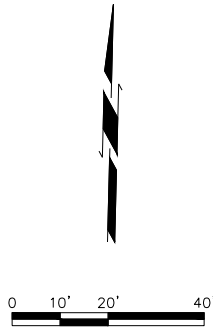
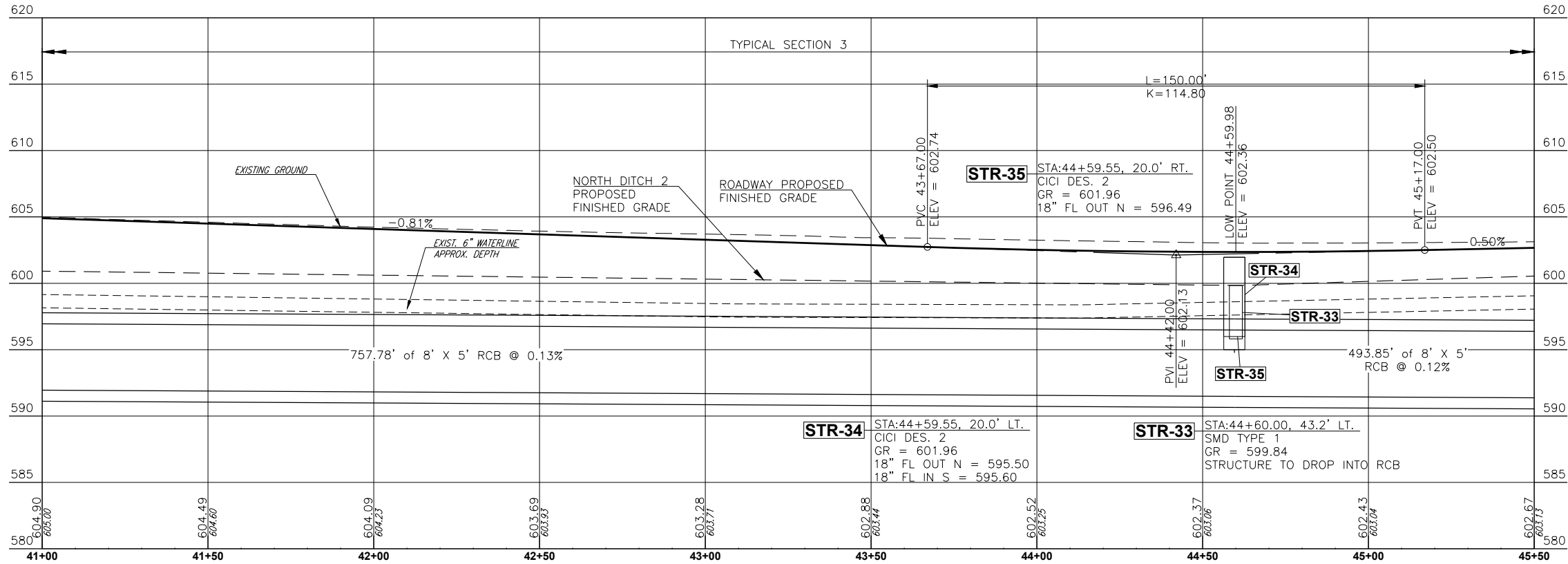
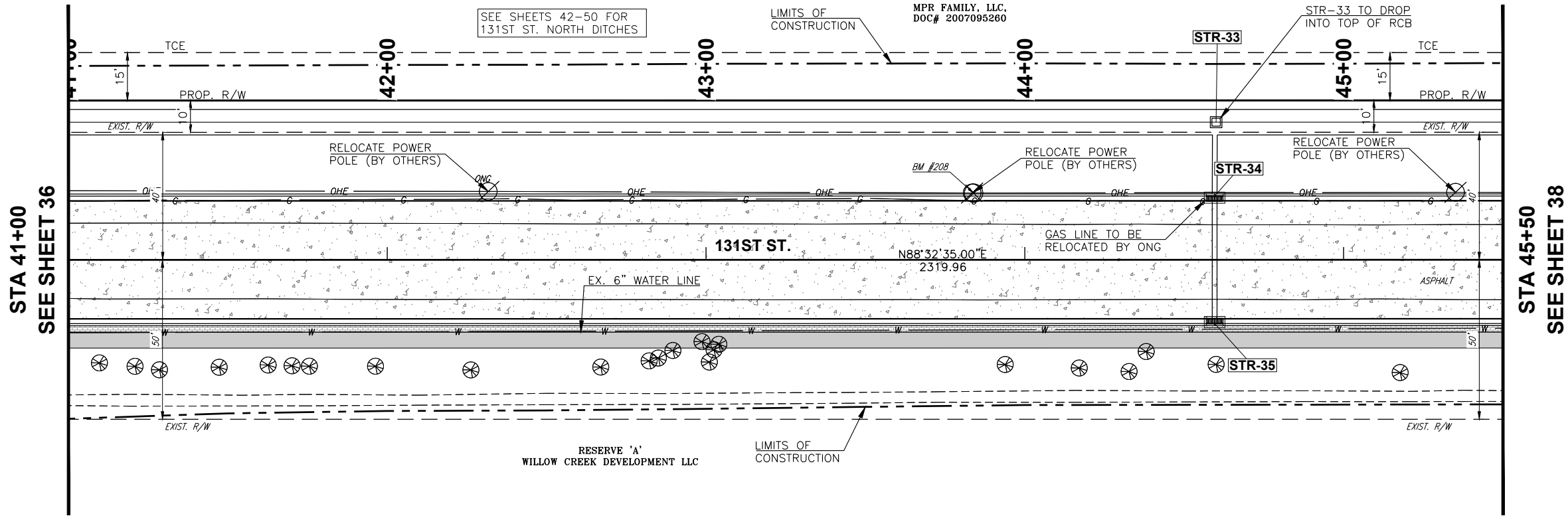
REVISION HISTORY	
DATE	DESCRIPTION
11/30/2023	DATE
170231.0102	NO.
J.L.C.	DESIGNED BY:
J.L.C.	DRAWN BY:
S.N.H.	APPROVED BY:
AS SHOWN	SCALE:

131ST ST. - MEMORIAL TO MINCO	
SHEET NAME PLAN & PROFILE (7 OF 12)	
SHEET 36	
BIXBY, OKLAHOMA	

PLOT DATE: August 2, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\30 PLAN & PROFILE (12 OF 12).DWG

BENCHMARK				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
208	361,370.2	2,597,195.4	604.32	STA. 43+83.96, 20.92' LT. SET RAILROAD SPIKE IN S. FACE OF POWER POLE

LEGEND	
RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAP 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING
MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.

PROFESSIONAL SEAL

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT

SUBMITTAL:	PRELIMINARY		REVISION HISTORY	
	DATE:	PROJECT NO.	NO.	DESCRIPTION
	11/30/2023	170231.0102		
	DESIGNED BY: J.L.C.			
	DRAWN BY: J.L.C.			
	APPROVED BY: S.N.H.			
	SCALE: AS SHOWN			

131ST ST. - MEMORIAL TO MINGO

SHEET NAME
PLAN & PROFILE
(8 OF 12)

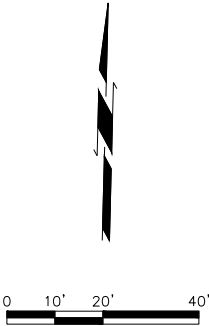
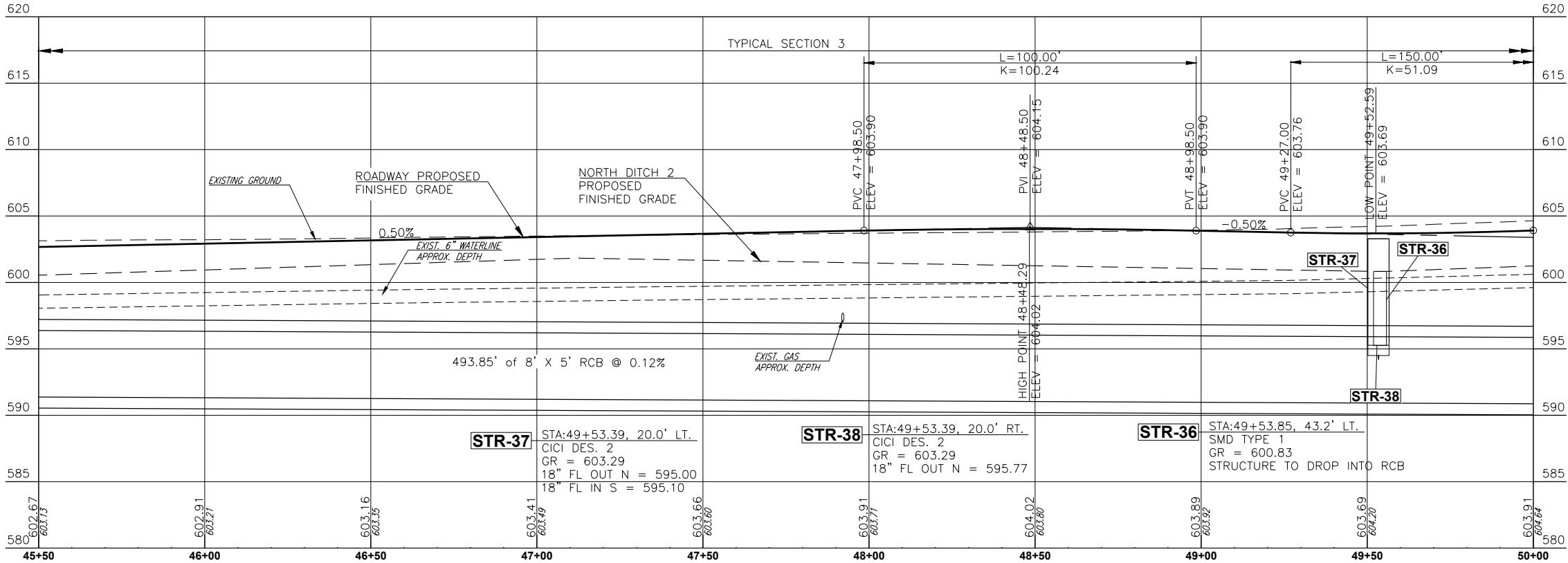
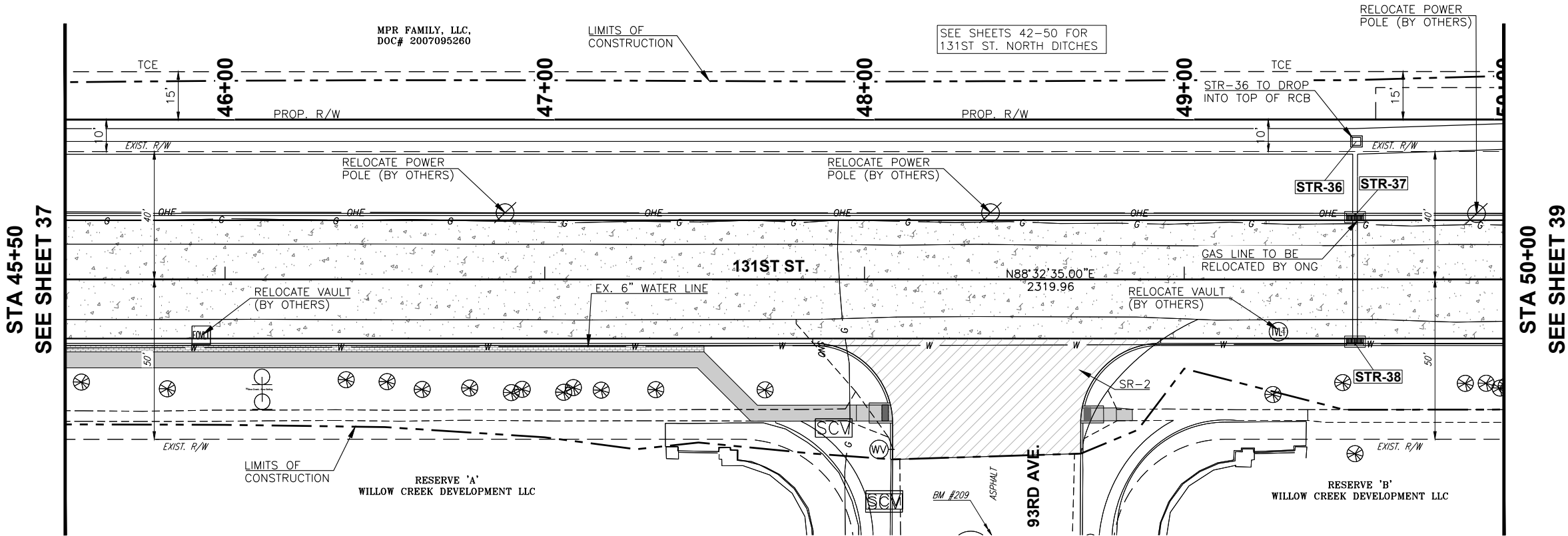
SHEET
37

BIXBY, OKLAHOMA

PLOT DATE: August 2, 2024, DRAWING FILE: N:\TULSA\TULSA PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\30 PLAN & PROFILE (12 OF 12).DWG

BENCHMARK				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
209	361,235.6	2,597,683.1	604.23	STA. 48+68.03, 126.08' RT. CUT X IN TOP OF CURB

LEGEND	
RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED.

PROFESSIONAL SEAL

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

REVISION HISTORY	
NO.	DESCRIPTION

SUBMITTAL:	
DATE:	11/30/2023
PROJECT NO.:	170231.0102
DESIGNED BY:	J.L.C.
DRAWN BY:	J.L.C.
APPROVED BY:	S.N.H.
SCALE:	AS SHOWN

131ST ST. - MEMORIAL TO MINGO

SHEET NAME
PLAN & PROFILE
(9 OF 12)

SHEET
38

BIXBY, OKLAHOMA

Page 41 of 215

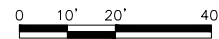
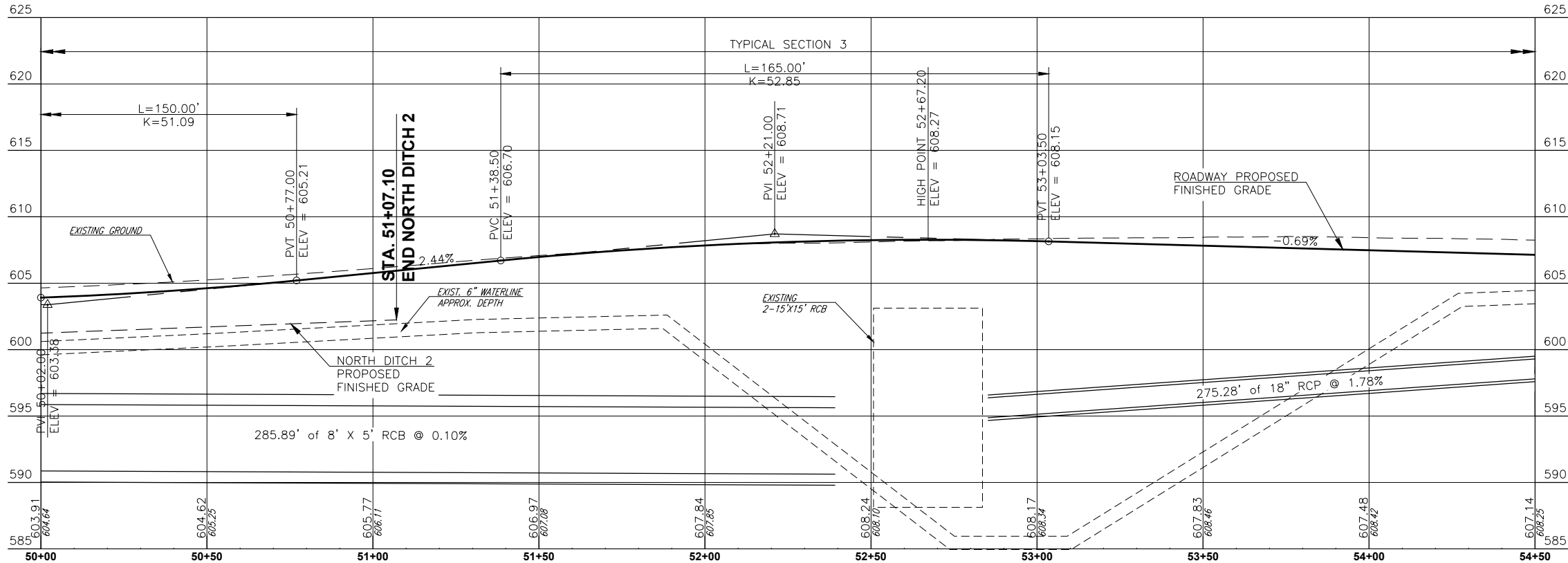
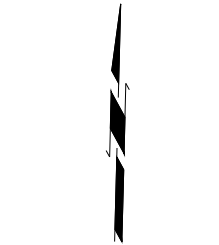
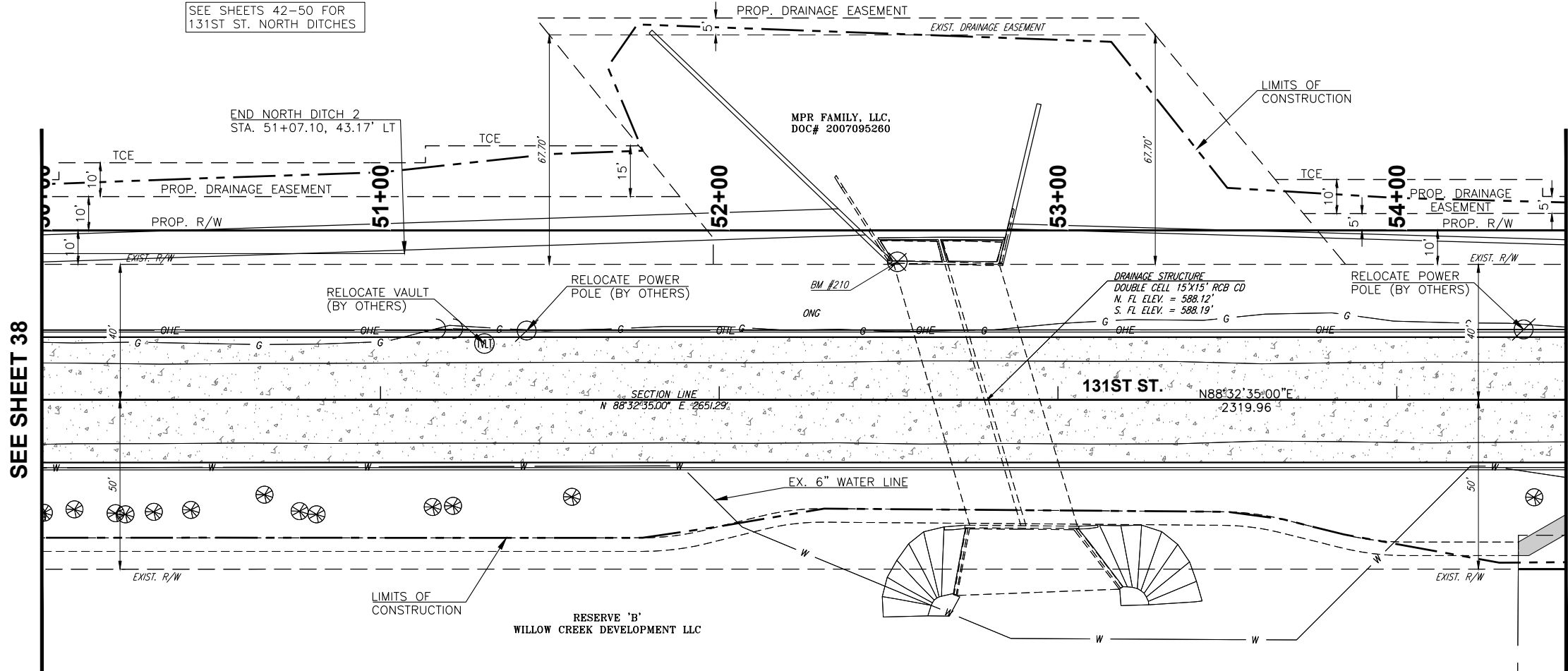
PLOT DATE: August 2, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\30 PLAN & PROFILE (12 OF 12).DWG

STA 50+00
SEE SHEET 38

STA 54+50
SEE SHEET 40

BENCHMARK				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
210	361,412.1	2,598,063.3	604.81	STA. 52+52.60, 40.71' LT. CUT X IN TOP OF HEADWALL

SEE SHEETS 42-50 FOR
131ST ST. NORTH DITCHES



LEGEND	
RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	

CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAP 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREON.
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.

PROFESSIONAL SEAL

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT.

SUBMITTAL:		REVISION HISTORY	
DATE:	DESCRIPTION:	NO.	DESCRIPTION:
11/30/2023	PROJECT NO. 170231.0102		
DESIGNED BY: J.L.C.			
DRAWN BY: J.L.C.			
APPROVED BY: S.N.H.			
SCALE: AS SHOWN			

131ST ST. - MEMORIAL TO MINGO

SHEET NAME
PLAN & PROFILE
(10 OF 12)

SHEET
39

Page 42 of 215

PLOT DATE: August 2, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\30 PLAN & PROFILE (12 OF 12).DWG

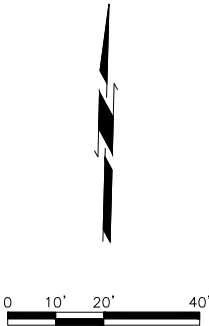
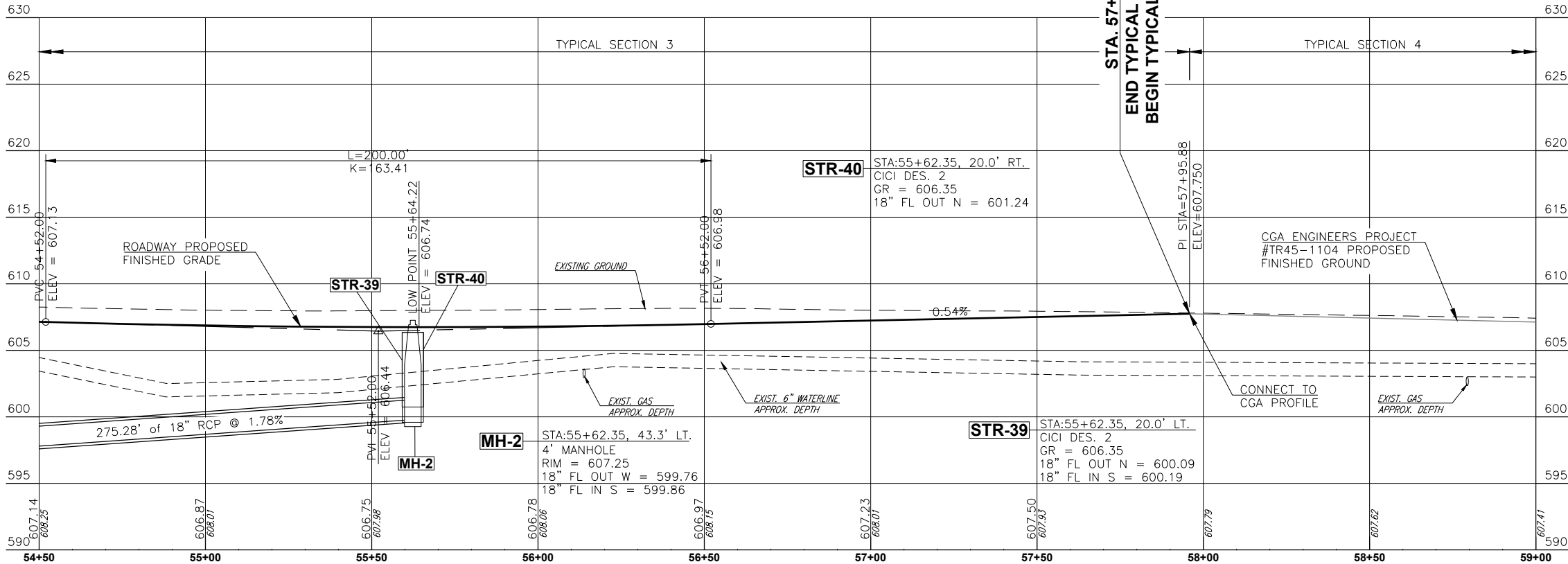
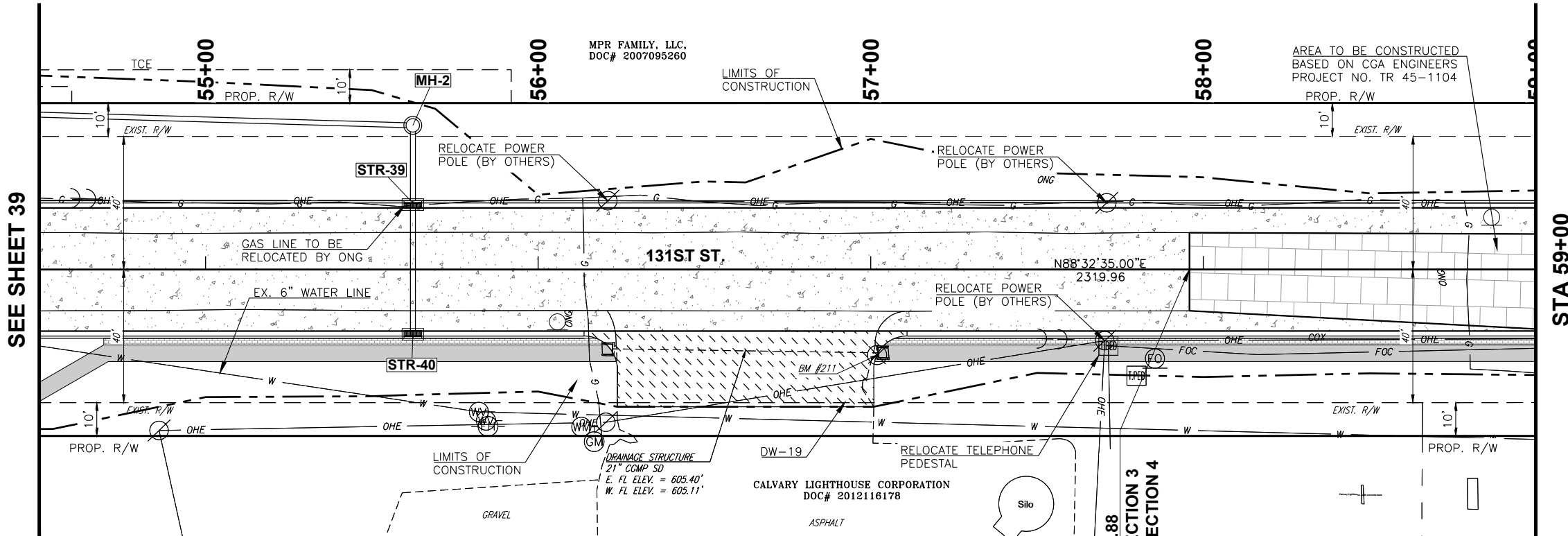
STA 54+50
SEE SHEET 39

STA 59+00
SEE SHEET 41

BENCHMARK				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
211	361,357.1	2,598,514.2	607.92	STA. 57+01.95, 25.73' RT. CUT X IN TOP OF HEADWALL

CONTROL POINT				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
2	361,296.6851	2,599,206.0991	605.17	SET 5/8" IP W/ CEC CP CAP

LEGEND	
RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAP 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED.

PROFESSIONAL SEAL

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT

SUBMITTAL:	PRELIMINARY		REVISION HISTORY	
	DATE:	11/30/2023	NO.	DESCRIPTION
DESIGNED BY:	PROJECT NO.	170231.0102		
DRAWN BY:	J.L.C.			
APPROVED BY:	J.L.C.			
SCALE:	S.N.H.			
	AS SHOWN			

131ST ST. - MEMORIAL TO MINGO

SHEET NAME
PLAN & PROFILE
(11 OF 12)

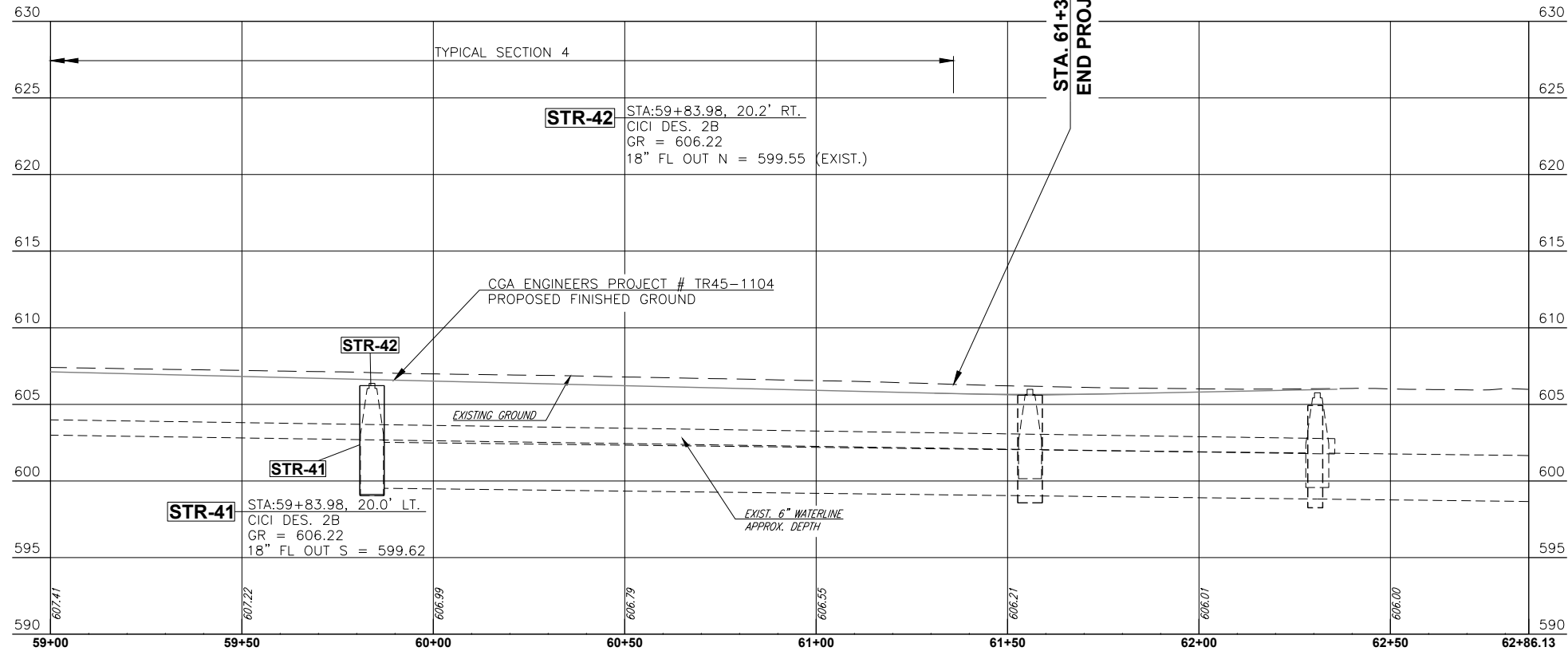
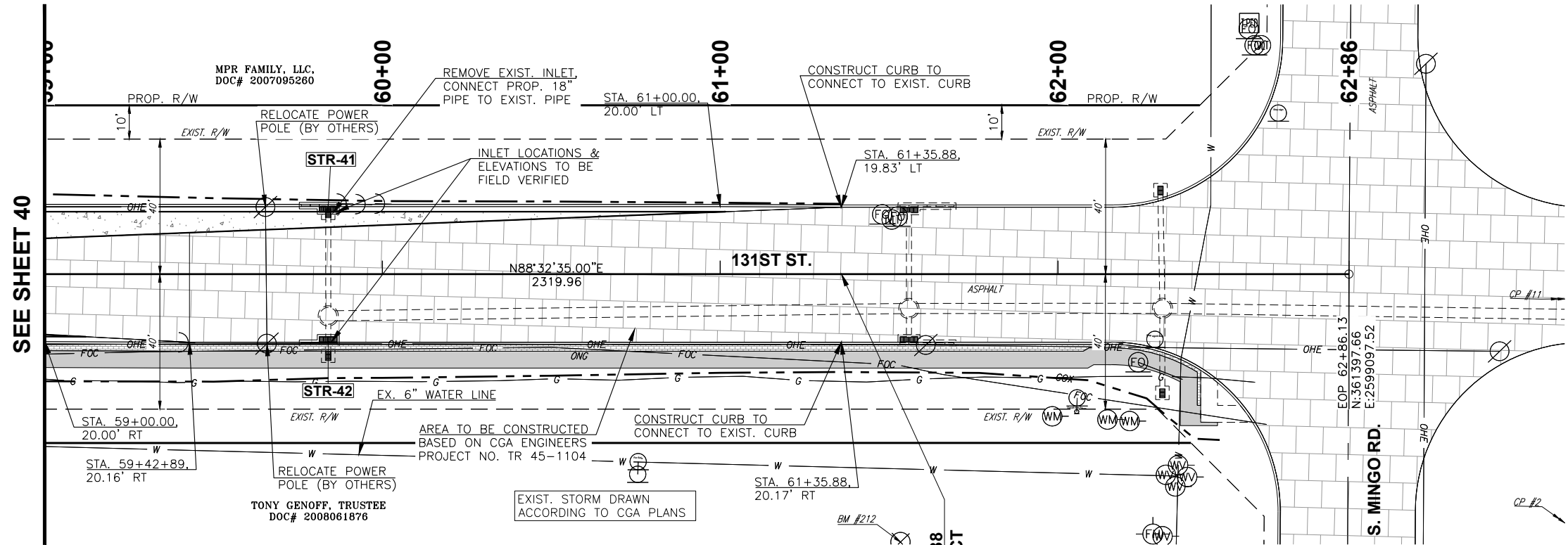
SHEET
40

BIXBY, OKLAHOMA

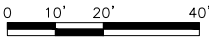
Page 43 of 215

PLOT DATE: August 2, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\30 PLAN & PROFILE (12 OF 12).DWG

STA 59+00
SEE SHEET 40



LEGEND	
RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
CAN 32 EXPIRES: 2026-06-30
STATE OF OK CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REUSE OR REPRODUCTION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

PROFESSIONAL
THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

REVISION HISTORY	
NO.	DESCRIPTION

SUBMITTAL	
PRELIMINARY	DATE: 11/30/2023
DATE:	PROJECT NO. 170231.0102
DESIGNED BY:	J.L.C.
DRAWN BY:	J.L.C.
APPROVED BY:	S.N.H.
SCALE:	AS SHOWN

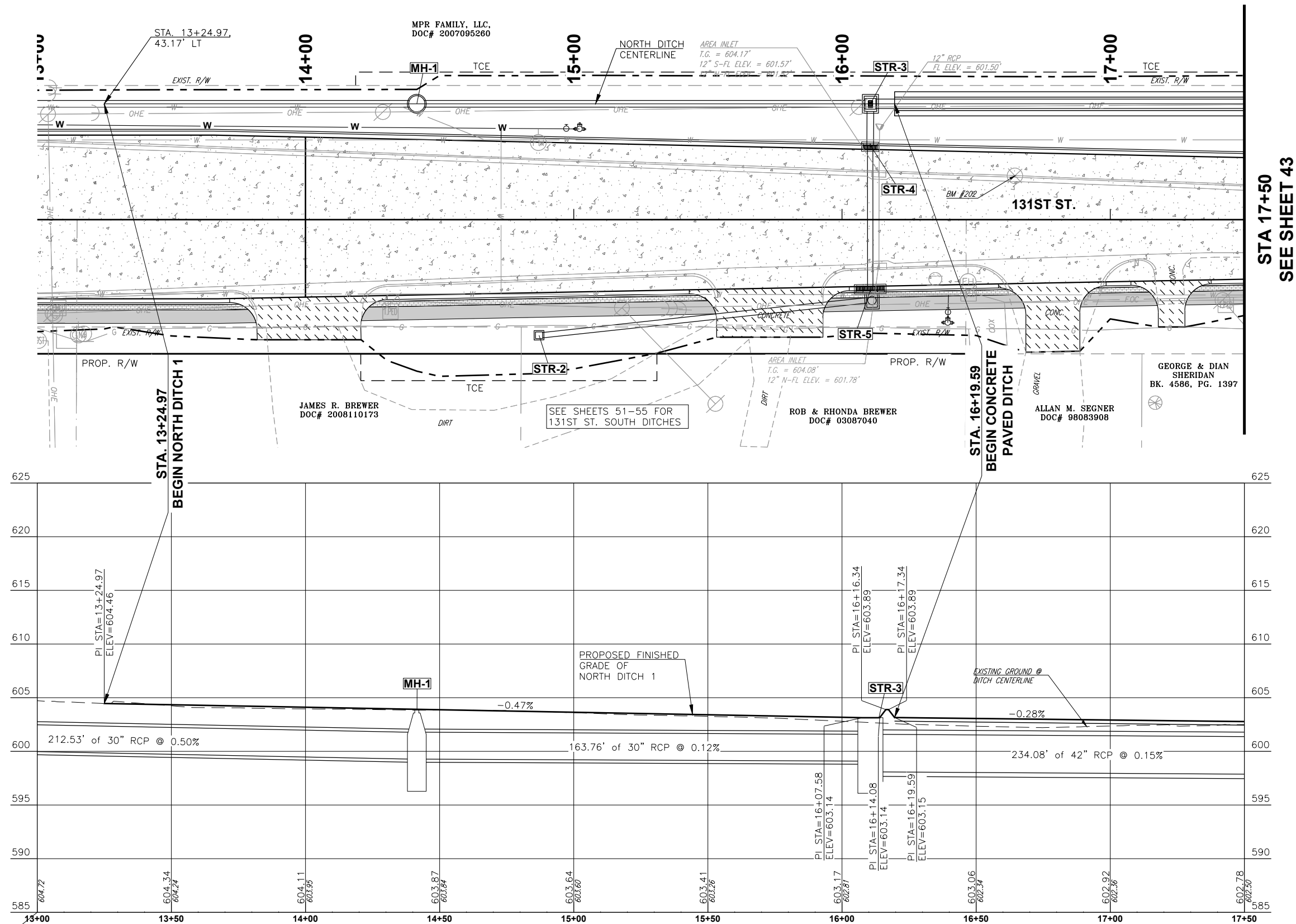
131ST ST. - MEMORIAL TO MINGO

SHEET NAME
PLAN & PROFILE
(12 OF 12)

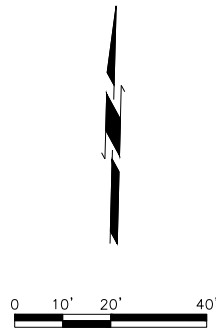
SHEET
41

BIXBY, OKLAHOMA

Page 44 of 215



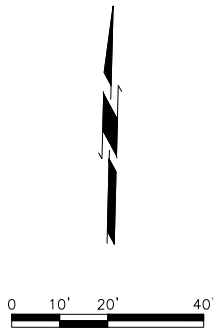
**STA 17+50
SEE SHEET 43**



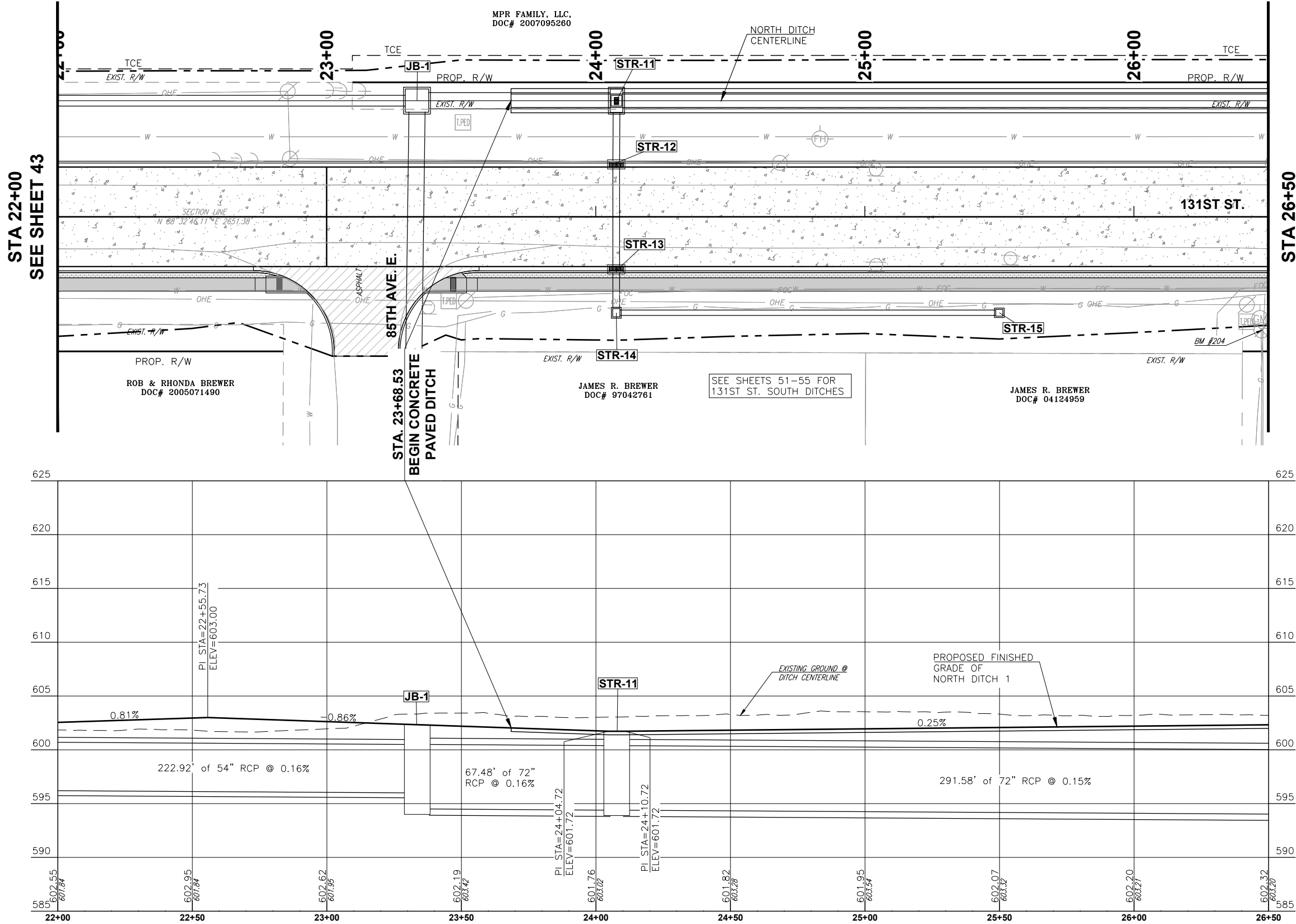
THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

PRELIMINARY		REVISION HISTORY	
SUBMITTAL:		NO.	DESCRIPTION
DATE:	11/30/2023		DATE
PROJECT NO:	170231.0102		
DESIGNED BY:	J.L.C.		
DRAWN BY:	J.L.C.		
APPROVED BY:	S.N.H.		
SCALE:	AS SHOWN		

131ST ST. - MEMORIAL TO MINGO	
	BIXBY, OKLAHOMA
SHEET NAME 131ST ST NORTH DITCH PLAN & PROFILE (1 OF 9)	



PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\131ST ST NORTH DITCH P&PS.DWG



STA 22+00
SEE SHEET 43

STA 26+50
SEE SHEET 45

CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAR 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED.

PROFESSIONAL
THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

REVISION HISTORY

NO.	DESCRIPTION	DATE

SUBMITTAL:

PRELIMINARY	DATE	PROJECT NO.	DESIGNED BY:	DRAWN BY:	APPROVED BY:	SCALE:
11/30/2023	170231.0102	J.L.C.	J.L.C.	S.N.H.	AS SHOWN	

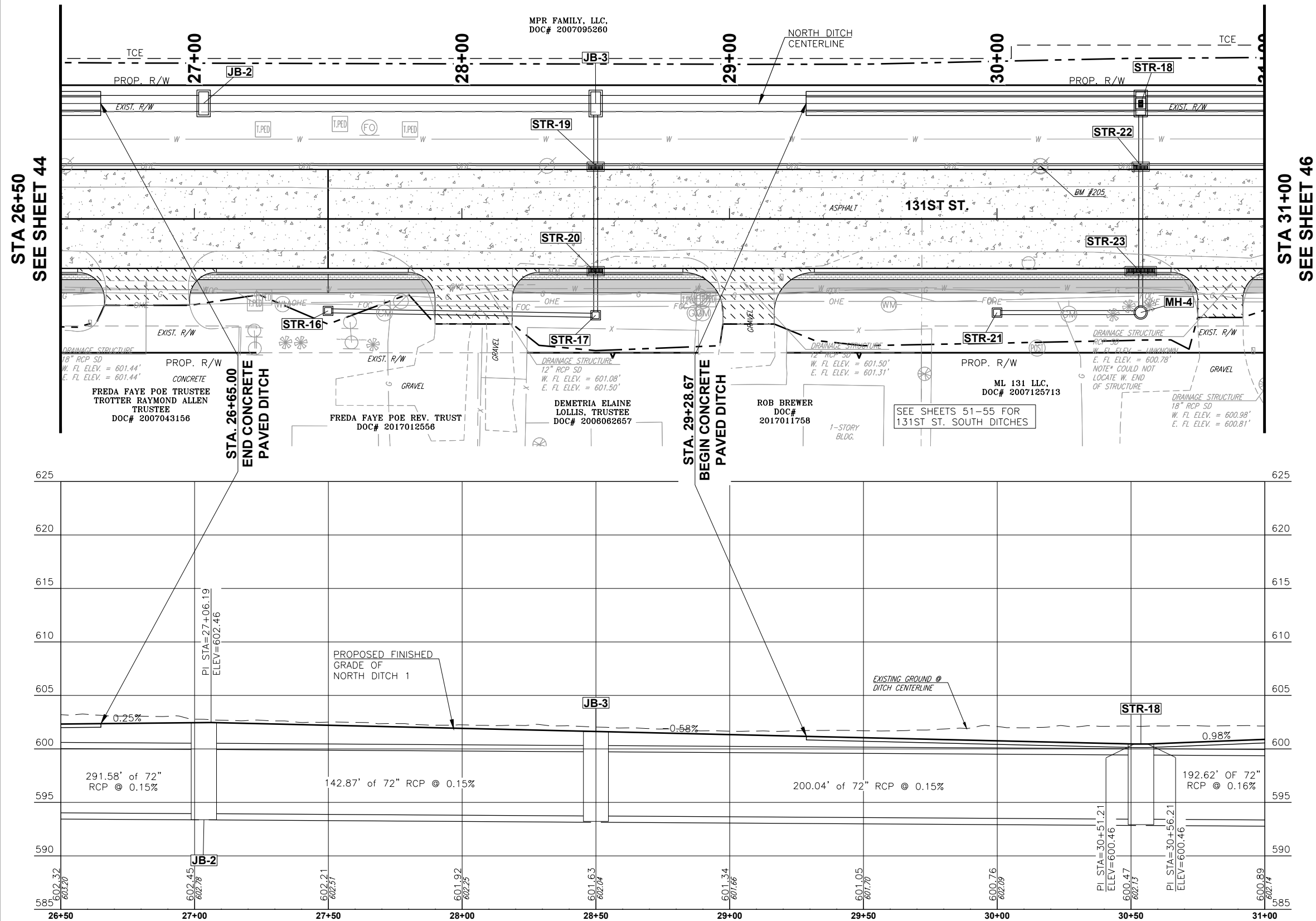
131ST ST. - MEMORIAL TO MINGO

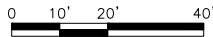
SHEET NAME
131ST ST NORTH
DITCH PLAN &
PROFILE (3 OF 9)

SHEET
44

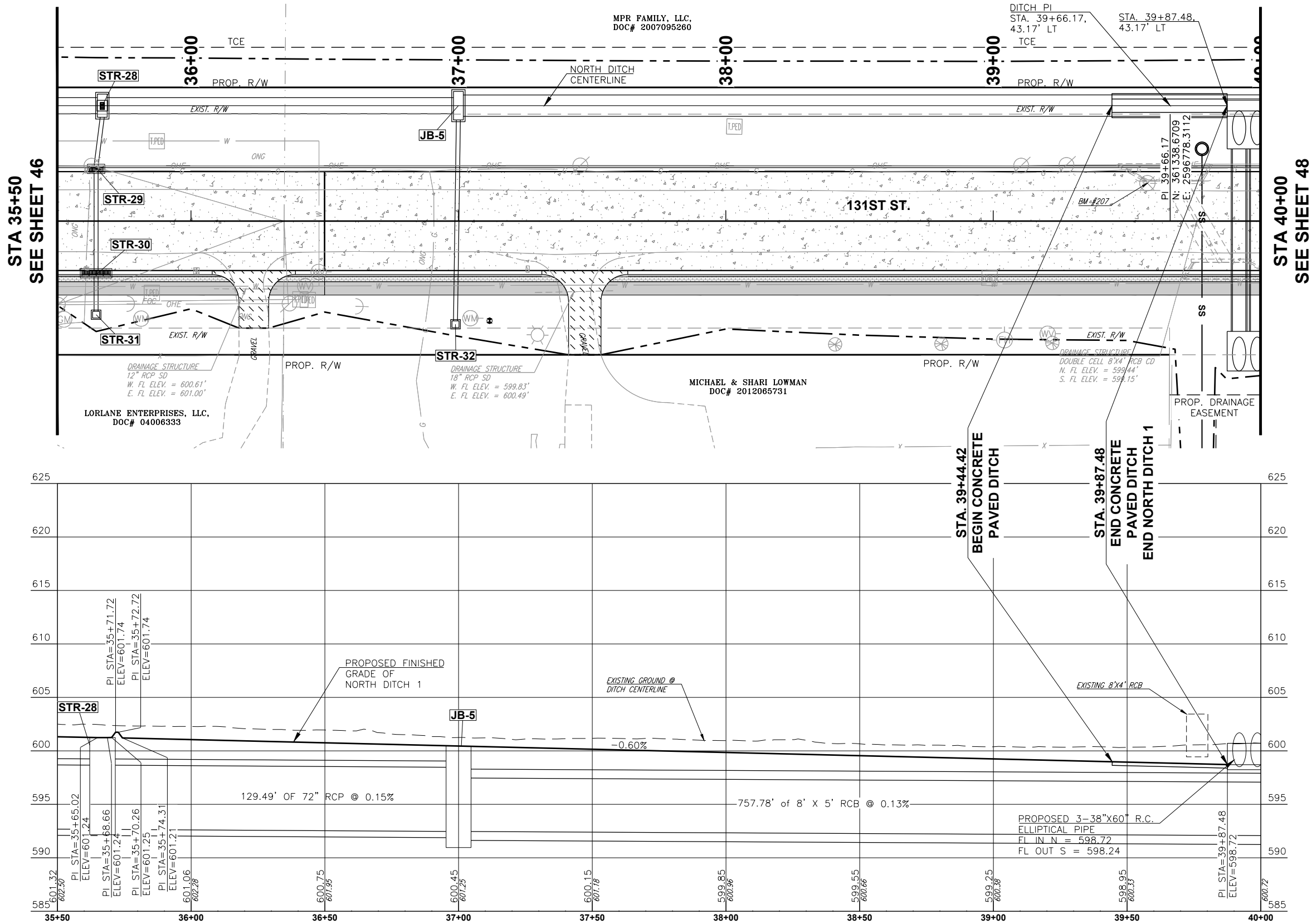
BIXBY, OKLAHOMA

Page 47 of 215





PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\131ST ST NORTH DITCH P&PS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAB 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED.

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	11/30/2023	NO.	DESCRIPTION	NO.	DATE
PROJECT NO.	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

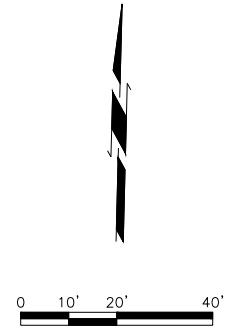
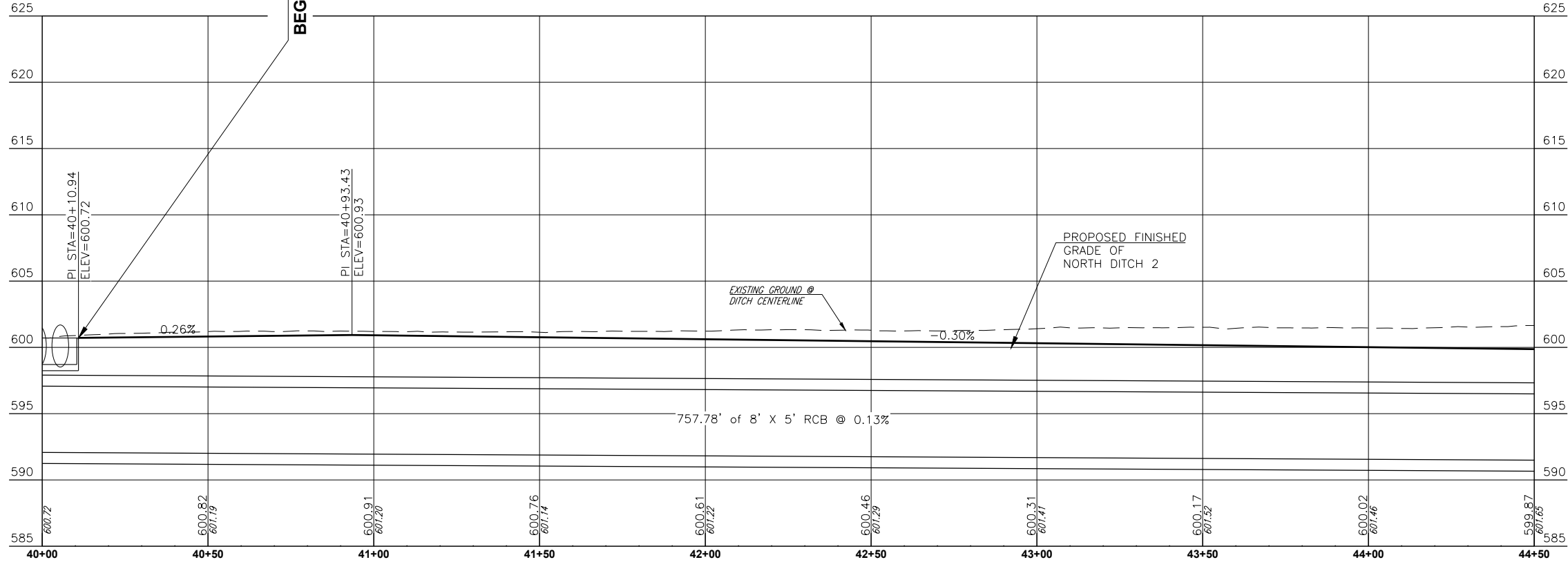
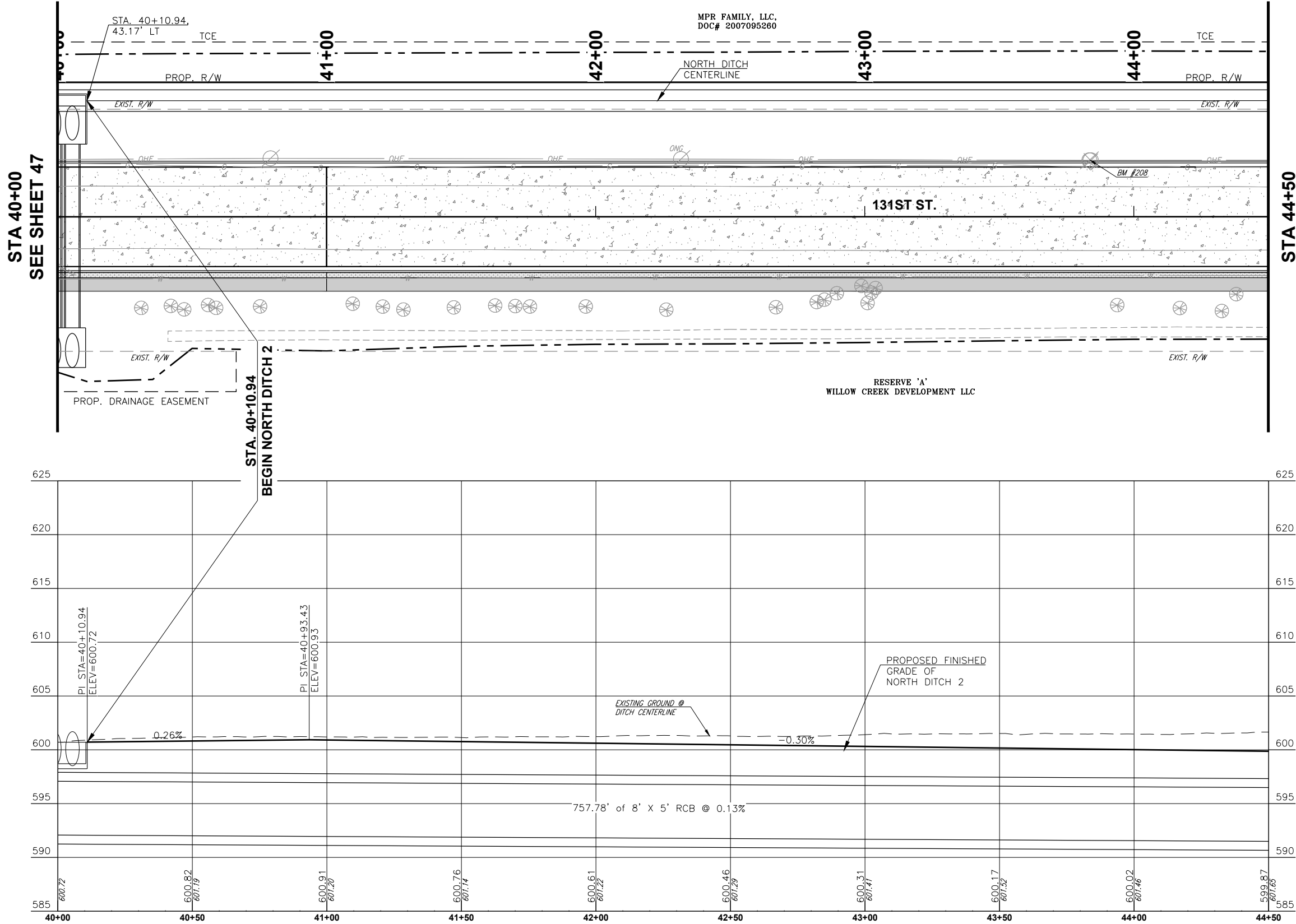
131ST ST. - MEMORIAL TO MINGO

SHEET NAME
131ST ST NORTH
DITCH PLAN &
PROFILE (6 OF 9)

SHEET
47

BIXBY, OKLAHOMA

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\131ST ST NORTH DITCH P&PS.DWG



STA 40+00
SEE SHEET 47

STA 44+50
SEE SHEET 49



CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAP 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	11/30/2023	NO.	DESCRIPTION	NO.	DATE
PROJECT NO.:	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

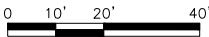
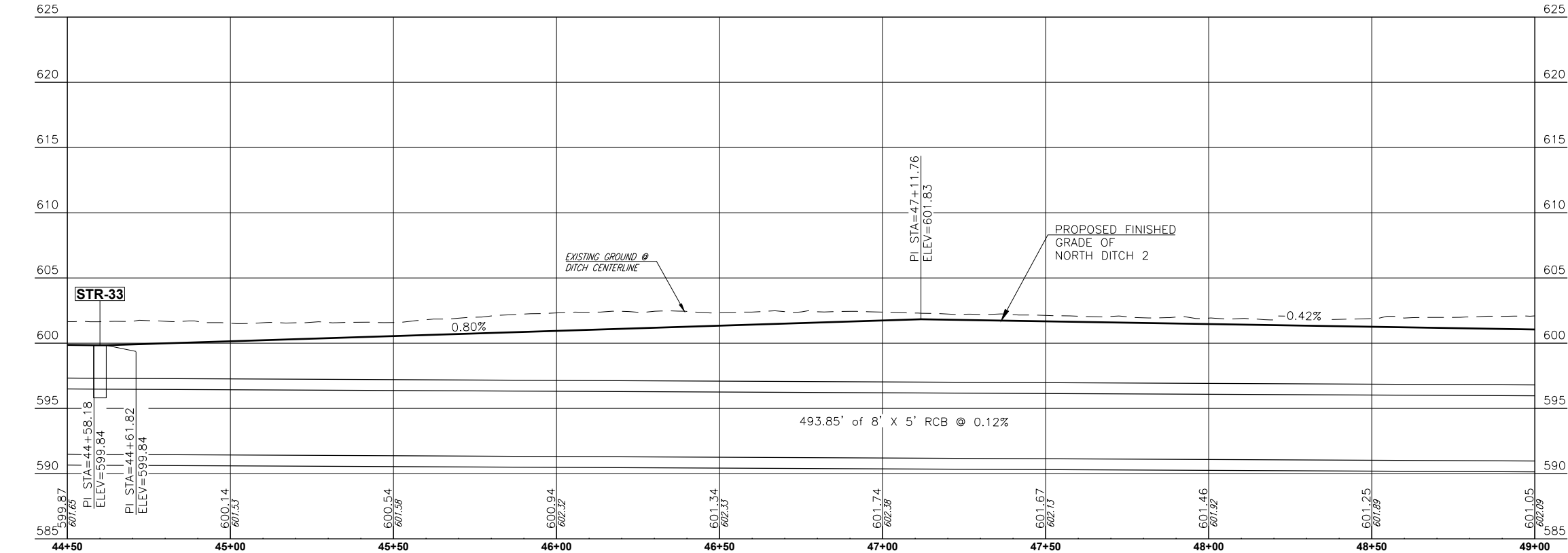
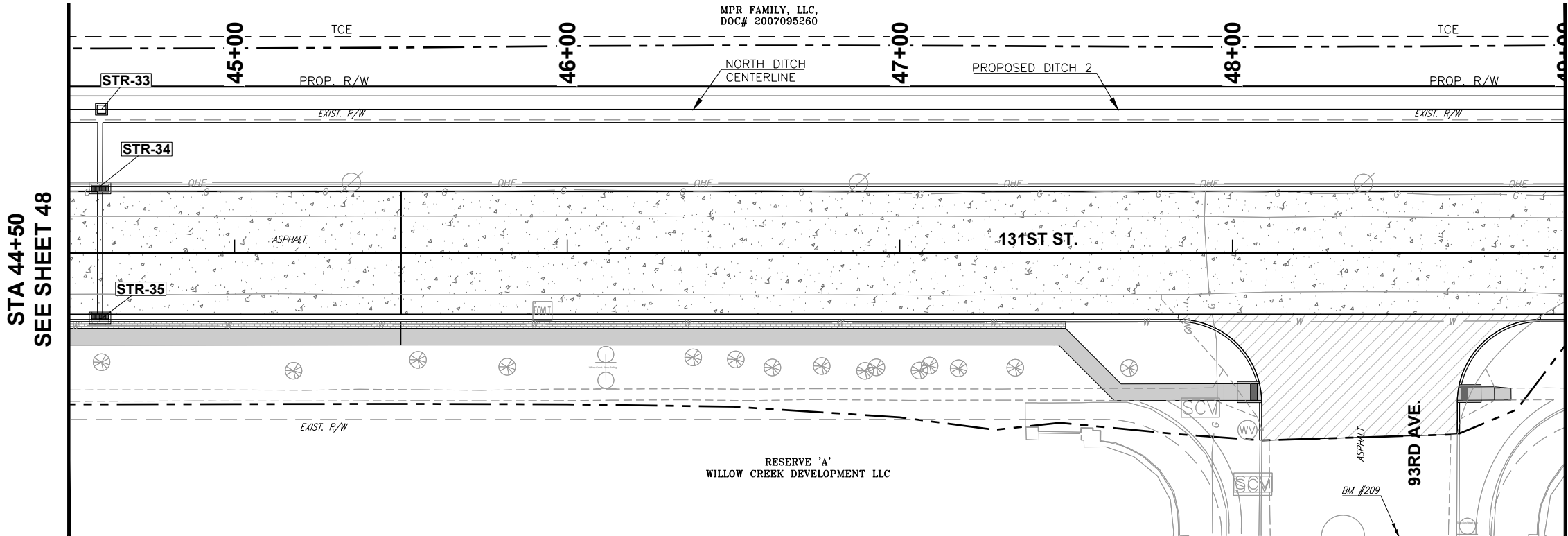
131ST ST. - MEMORIAL TO MINGO

SHEET NAME
131ST ST NORTH
DITCH PLAN &
PROFILE (7 OF 9)

SHEET
48

BIXBY, OKLAHOMA

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\131ST ST NORTH DITCH P&PS.DWG



STA 44+50
SEE SHEET 48

STA 49+00
SEE SHEET 50



CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAP 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED.

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	11/30/2023	NO.	DESCRIPTION	NO.	DATE
PROJECT NO:	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

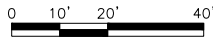
131ST ST. - MEMORIAL TO MINGO

SHEET NAME
131ST ST NORTH
DITCH PLAN &
PROFILE (8 OF 9)

SHEET
49

BIXBY, OKLAHOMA

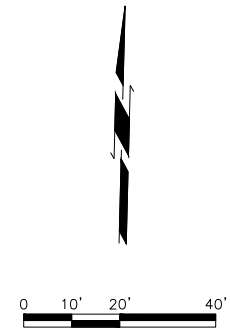
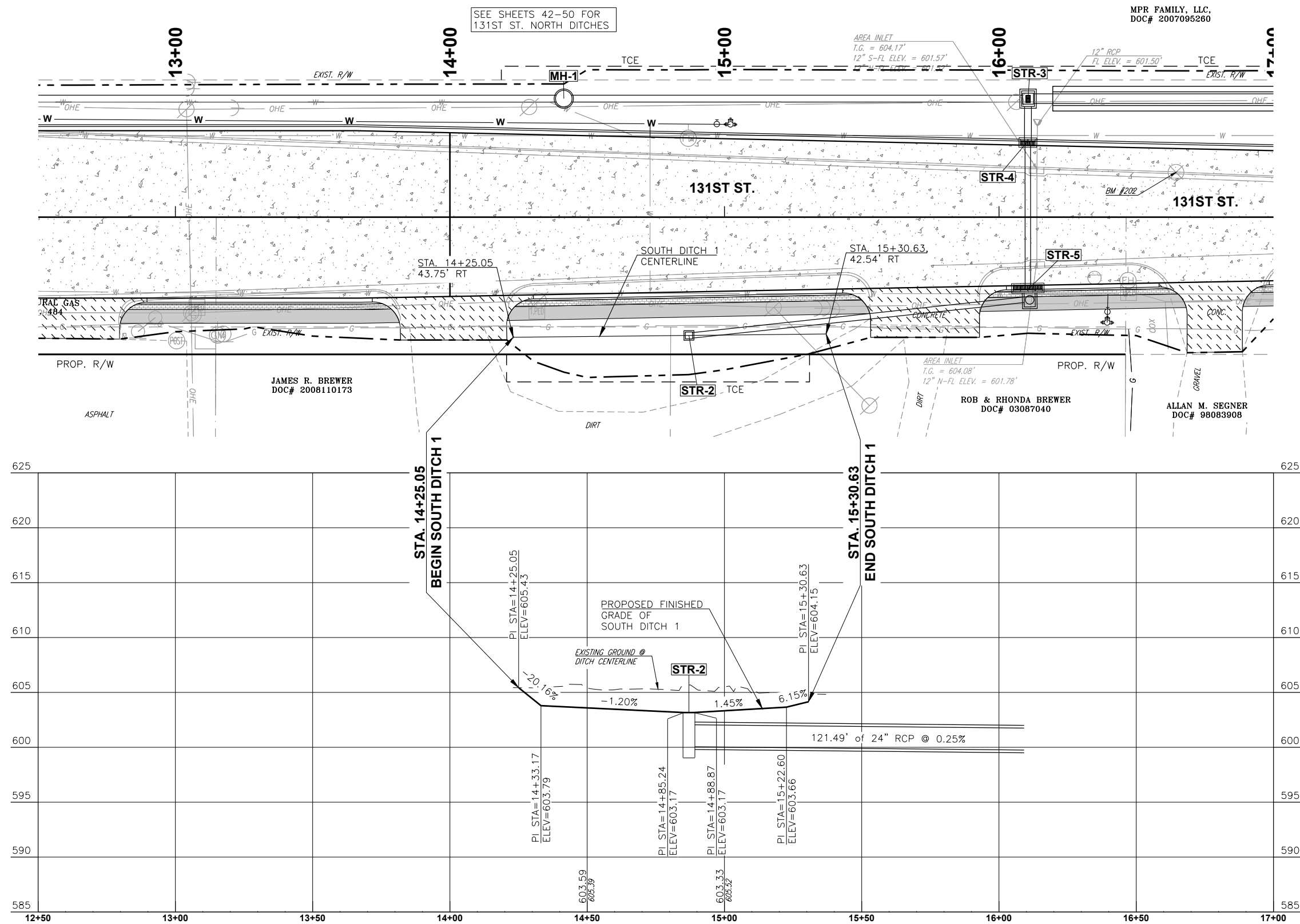
Page 52 of 215



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

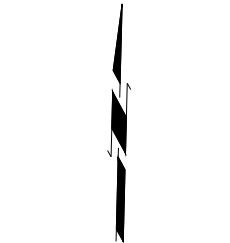
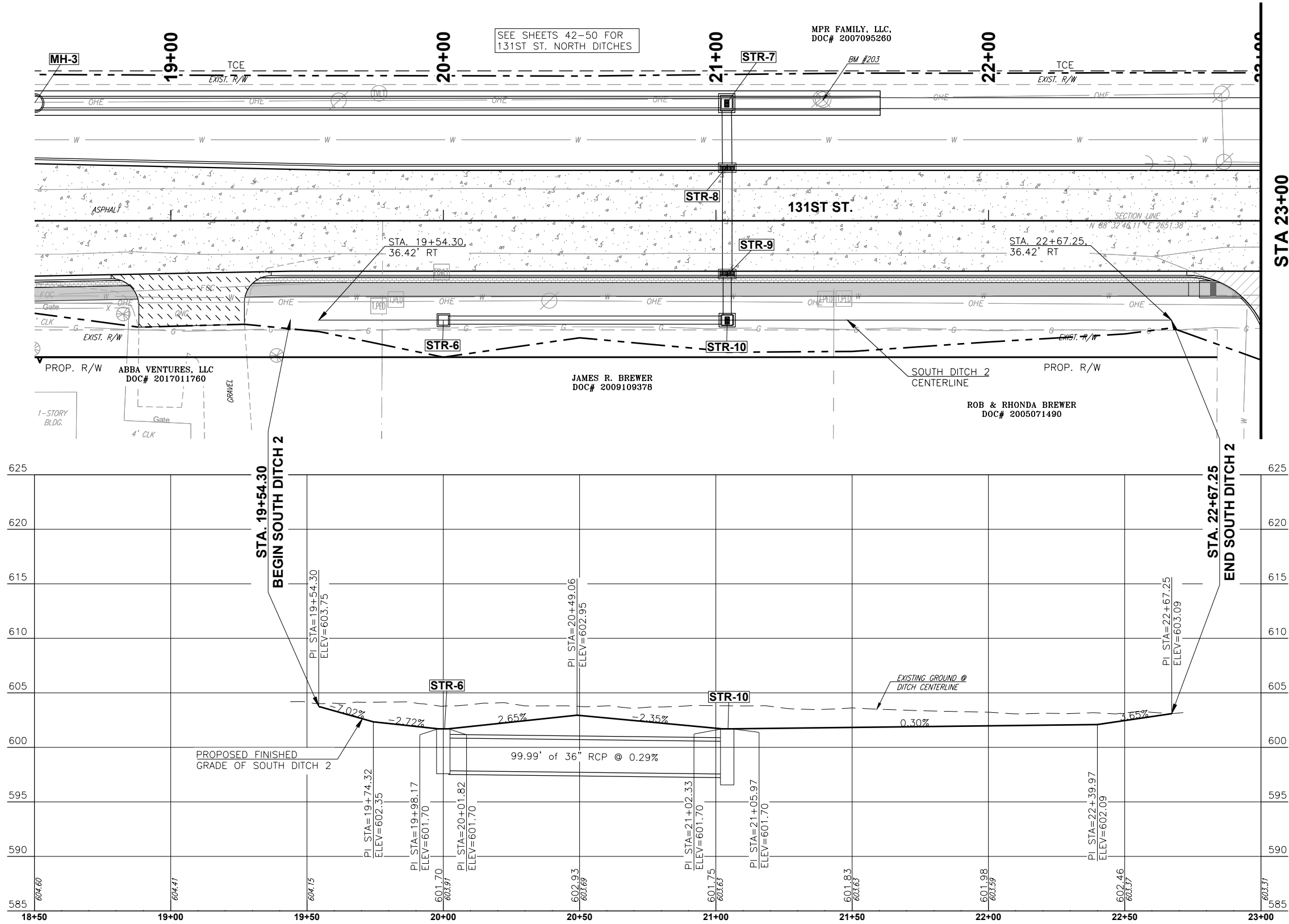
SUBMITTAL: DATE: PROJECT NO: DESIGNED BY: DRAWN BY: APPROVED BY: SCALE:	PRELIMINARY	REVISION HISTORY		
	11/30/2023	NO.	DESCRIPTION	DATE
	170231.0102			
	J.L.C.			
	J.L.C.			
	S.N.H.			
	AS SHOWN			

131ST ST. - MEMORIAL TO MINGO	BIXBY, OKLAHOMA
	SHEET NAME 131ST ST NORTH DITCH PLAN & PROFILE (9 OF 9)
SHEET 50	Page 52 of 52



SHEET 51	SHEET NAME 131ST ST SOUTH DITCH PLAN & PROFILES (1 OF 5)		131ST ST. - MEMORIAL TO MINGO		BIXBY, OKLAHOMA		
CEC CORPORATION 1308 S. MAIN STREET TULSA, OKLAHOMA 74106 TEL: 918.663.0261 WWW.CEC-CORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CASE NO. 2020-06-30 EXPIRATION DATE: 2026-06-30 COPYRIGHT ©2017 CEC. ALL RIGHTS RESERVED. NO PART OF THIS DOCUMENT MAY BE REPRODUCED OR MODIFIED OR USED IN THE DRAWING WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. © PROHIBITED		SUBMITTAL:		PRELIMINARY	REVISION HISTORY		
		DATE:	11/30/2023	NO.	DESCRIPTION	DATE	
		PROJECT NO:	170231 0102				
		DESIGNED BY:	J.L.C.				
		DRAWN BY:	J.L.C.				
		APPROVED BY:	S.N.H.				
		SCALE:	AS SHOWN				

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\131ST ST SOUTH DITCH P&PS.DWG



STA 23+00
SEE SHEET 53



CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
CAR 32 EXPIRES: 2026-06-30

STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR TRANSMISSION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

REVISION HISTORY	
NO.	DESCRIPTION

SUBMITTAL:	PRELIMINARY	DATE:	11/30/2023
DESIGNED BY: <td>J.L.C.<td>PROJECT NO:<td>170231.0102</td></td></td>	J.L.C. <td>PROJECT NO:<td>170231.0102</td></td>	PROJECT NO: <td>170231.0102</td>	170231.0102
DRAWN BY: <td>J.L.C.<td> </td><td> </td></td>	J.L.C. <td> </td> <td> </td>		
APPROVED BY: <td>S.N.H.<td> </td><td> </td></td>	S.N.H. <td> </td> <td> </td>		
SCALE: <td>AS SHOWN<td> </td><td> </td></td>	AS SHOWN <td> </td> <td> </td>		

131ST ST. - MEMORIAL TO MINGO

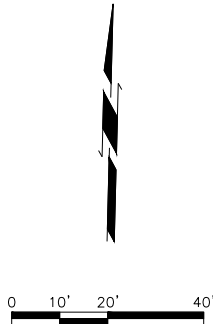
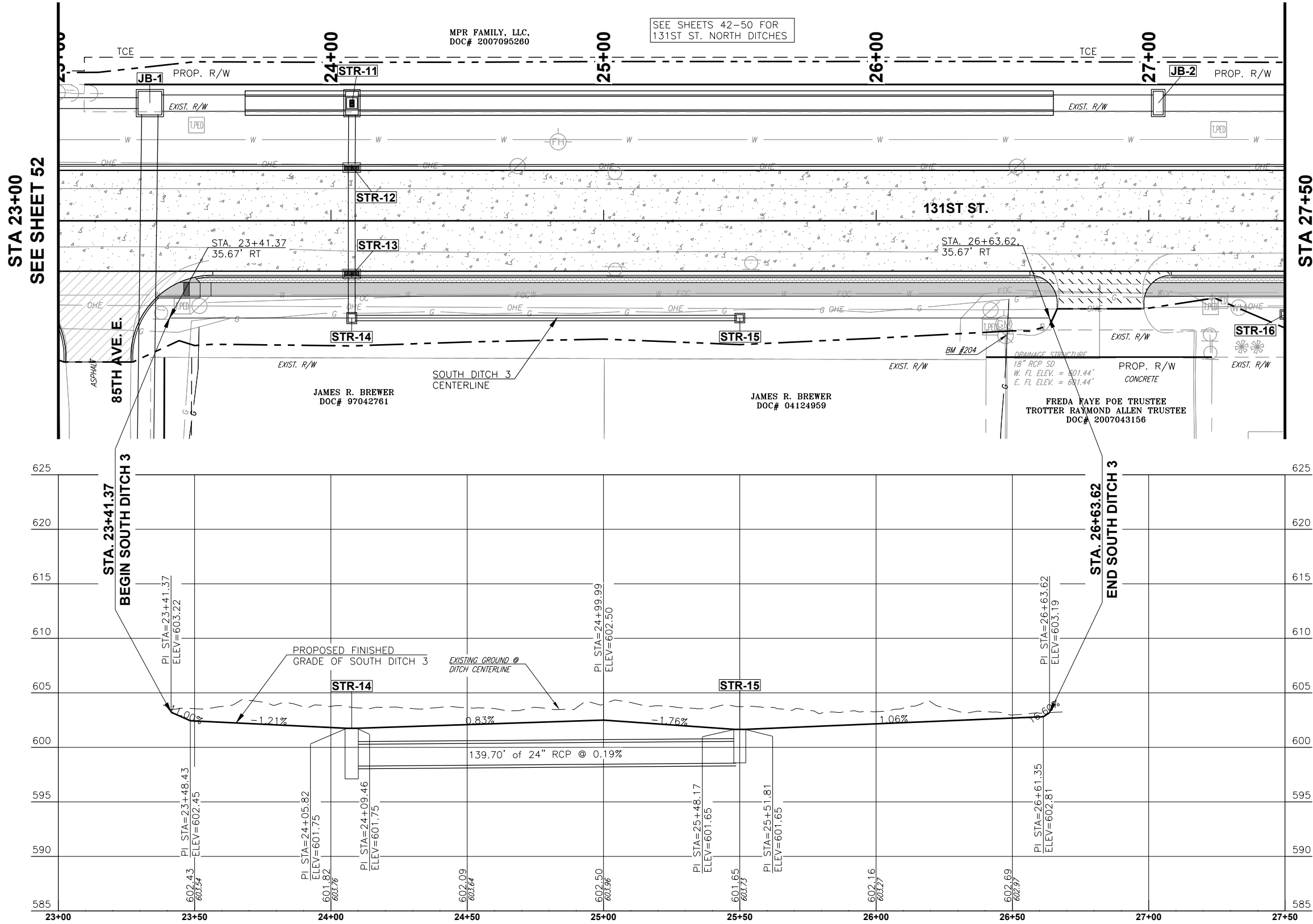
SHEET NAME
131ST ST SOUTH
DITCH PLAN &
PROFILES (2 OF 5)

SHEET
52

BIXBY, OKLAHOMA

Page 55 of 215

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\131ST ST SOUTH DITCH P&PS.DWG



STA 23+00
SEE SHEET 52

STA 27+50
SEE SHEET 54

CEC

SEE CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXTEC.COM
CAR 32 EXPIRES: 2026-06-30

STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR DISTRIBUTION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

PROFESSIONAL
ENGINEER
THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

REVISION HISTORY	
DATE	DESCRIPTION
11/30/2023	
170231.0102	
J.L.C.	
J.L.C.	
S.N.H.	
AS SHOWN	

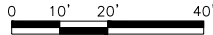
131ST ST. - MEMORIAL TO MINGO

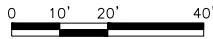
SHEET NAME
131ST ST SOUTH
DITCH PLAN &
PROFILES (3 OF 5)

SHEET
53

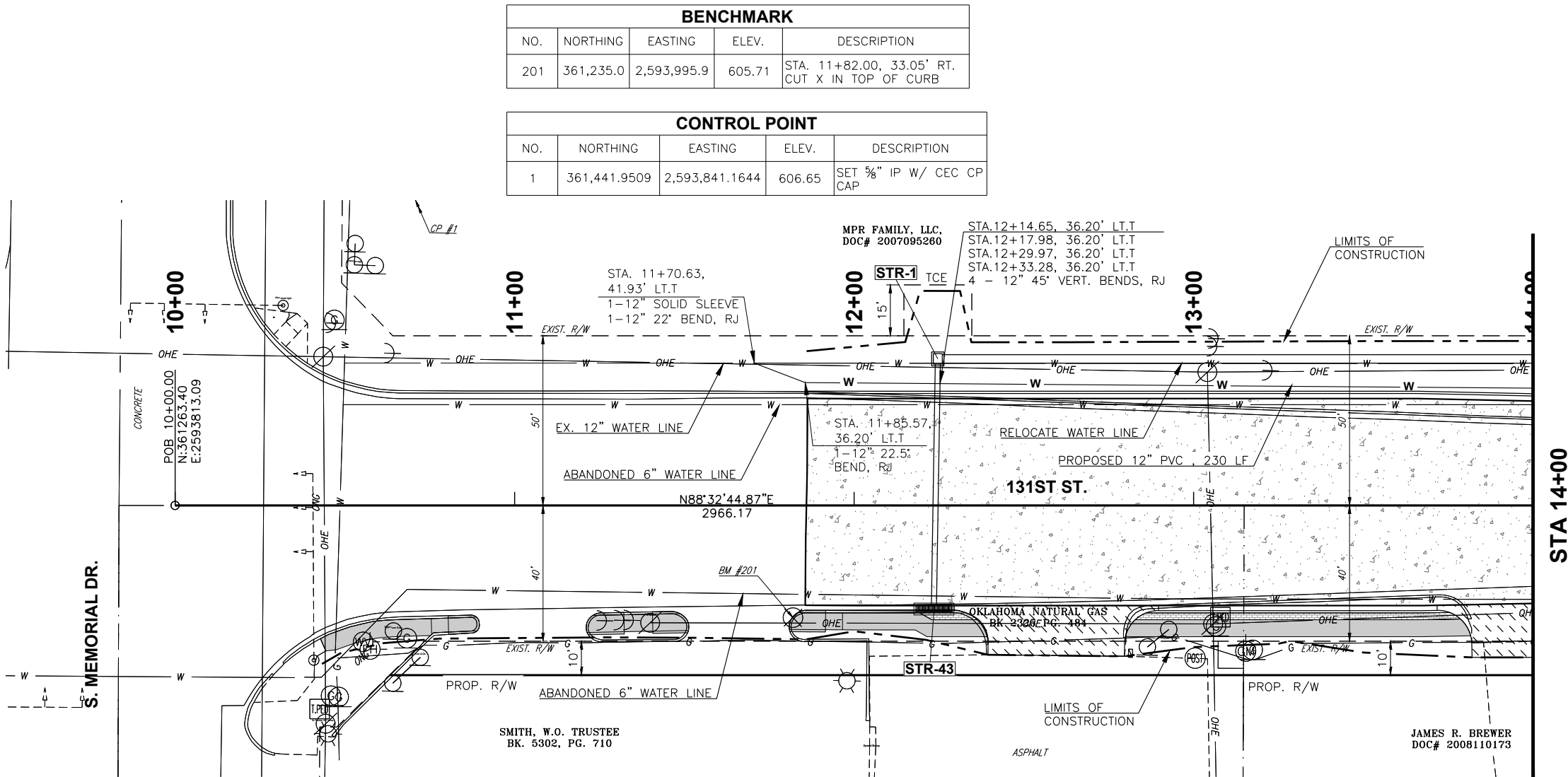
BIXBY, OKLAHOMA

Page 56 of 215

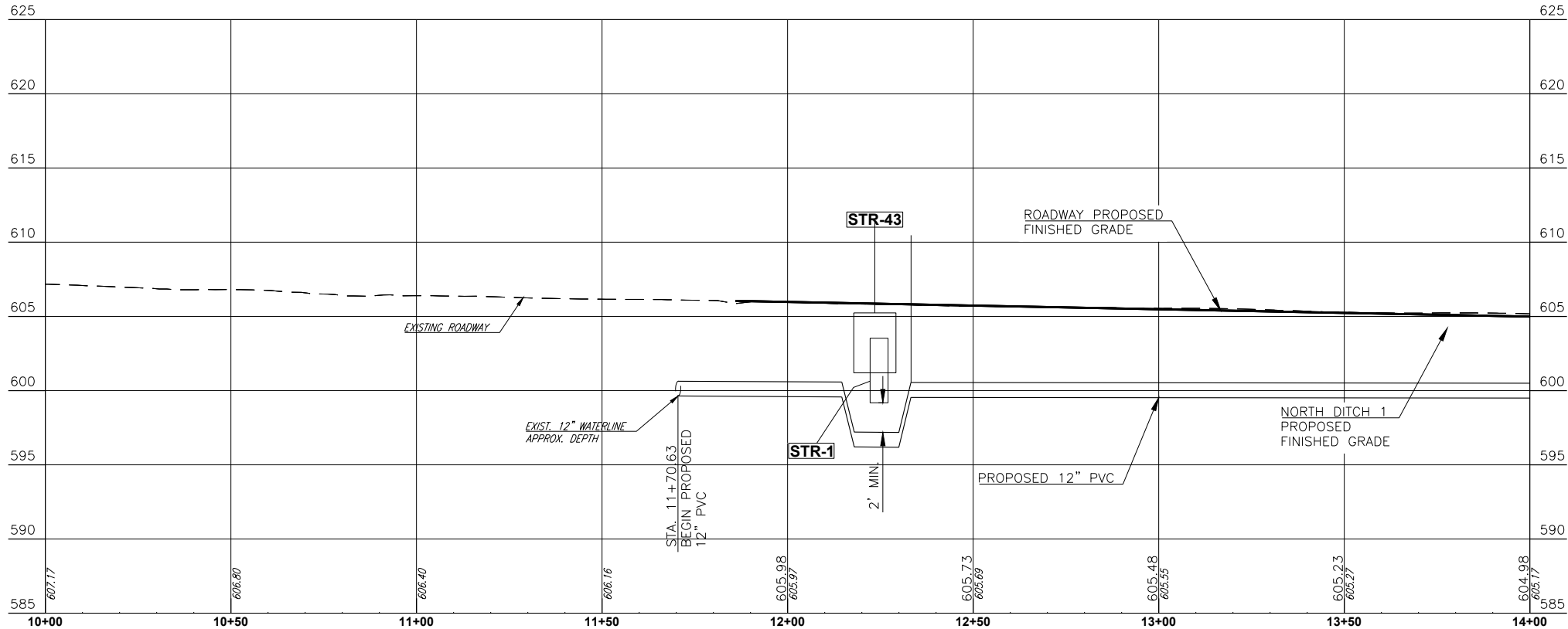
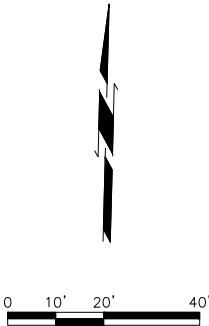




PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\WATER PLAN & PROFILES.DWG



LEGEND	
RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	



NOTE: MAINTAIN SEPARATION
(5' HORIZONTAL, 2' VERTICAL)
BETWEEN WATER AND STORM
UTILITIES.

CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAP 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND LOCATION SPECIFICALLY IDENTIFIED HEREON. ANY REUSE OR MODIFICATION OF THIS DRAWING WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED.

PROFESSIONAL ENGINEER

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL SIGNED AND SEALED DOCUMENT

SUBMITTAL:		REVISION HISTORY	
DATE:	PRELIMINARY	NO.	DESCRIPTION
11/30/2023			
PROJECT NO. 170231.0102			
DESIGNED BY: J.L.C.			
DRAWN BY: J.L.C.			
APPROVED BY: S.N.H.			
SCALE: AS SHOWN			

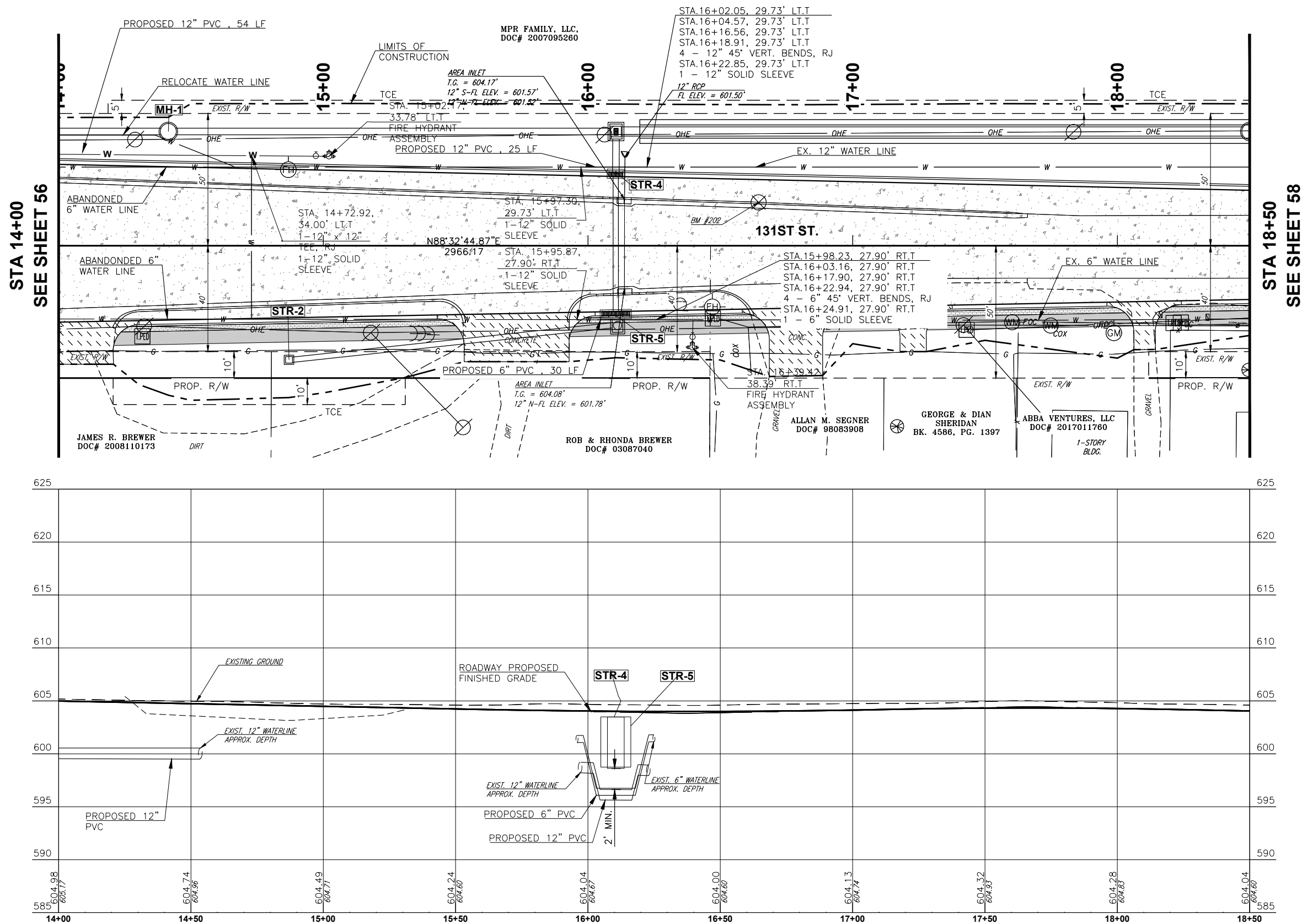
131ST ST. - MEMORIAL TO MINGO

SHEET NAME
WATER PLAN & PROFILE (1 OF 9)

SHEET
56

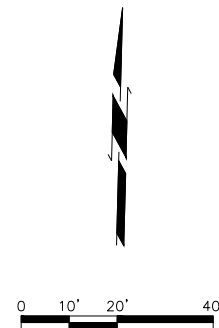
BIXBY, OKLAHOMA

BENCHMARK				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
202	361,296.6	2,594,476.9	604.81	STA. 16+64.47, 16.35' LT. CUT X IN TOP OF CURB



LEGEND

RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	



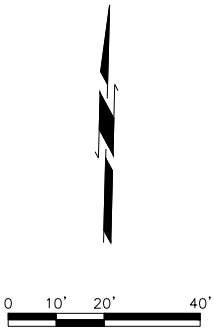
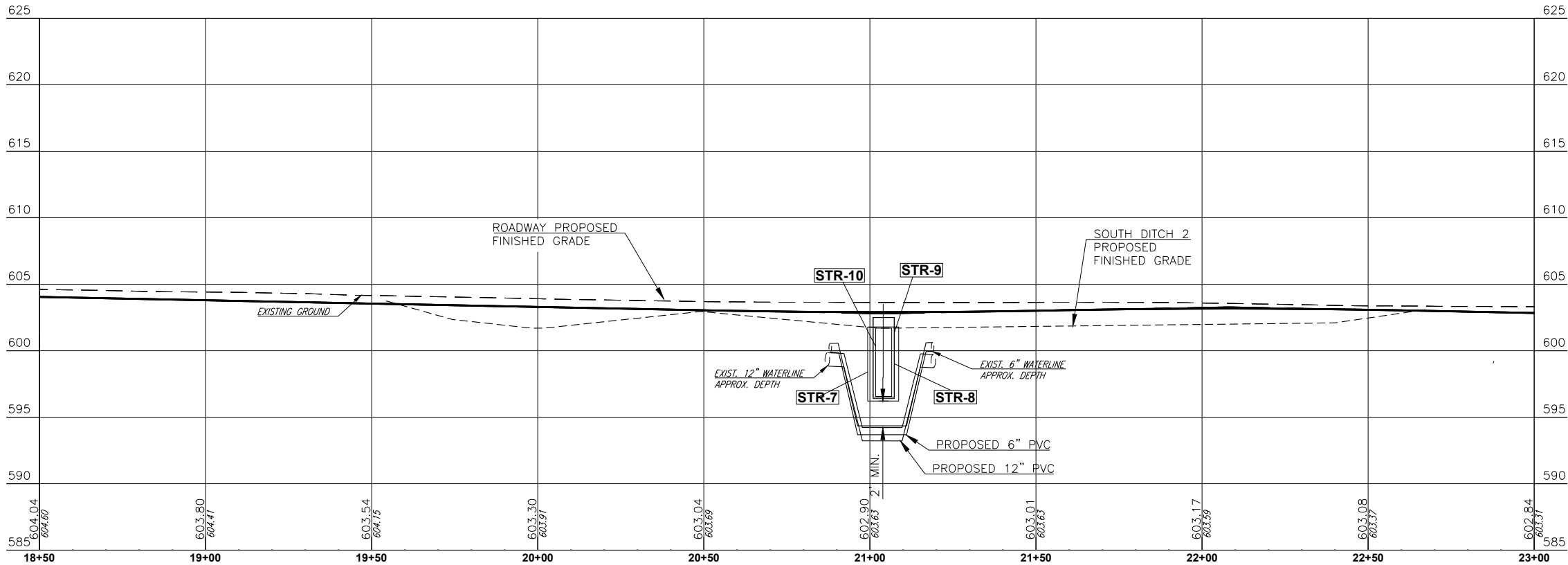
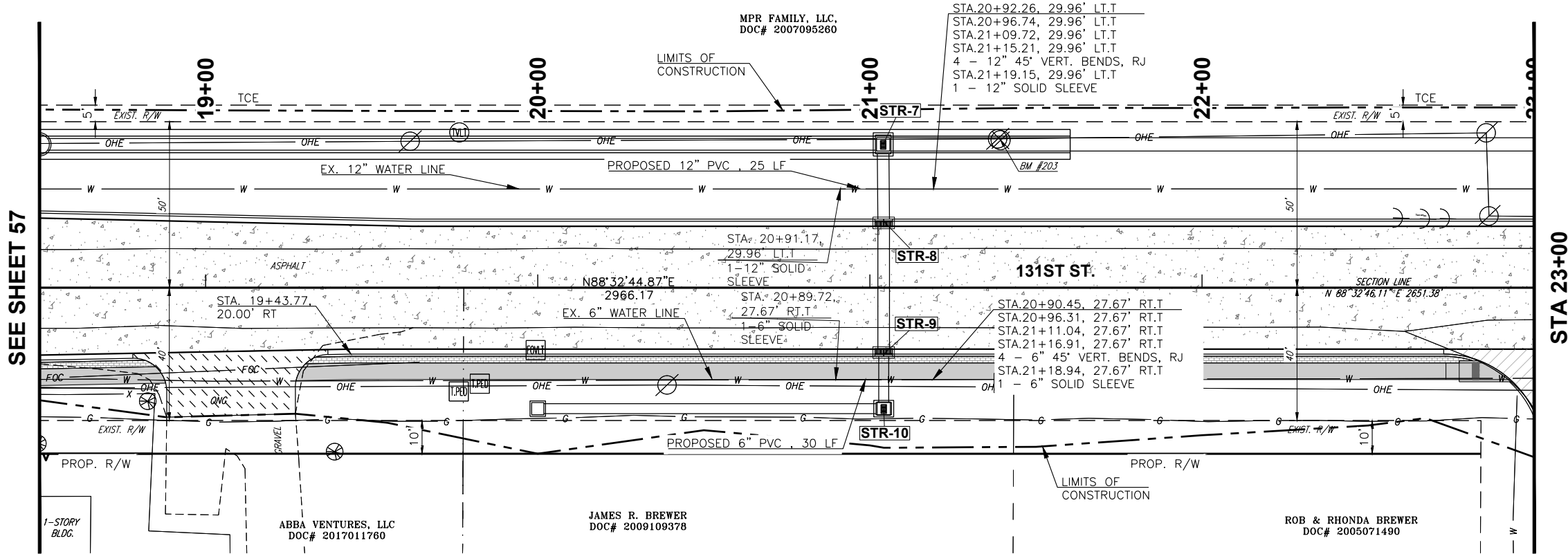
PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\WATER PLAN & PROFILES.DWG

STA 18+50
SEE SHEET 57

STA 23+00
SEE SHEET 59

BENCHMARK				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
203	361,336.7	2,594,951.0	603.62	STA. 21+39.37, 33.05' RT. SET RAILROAD SPIKE IN S. FACE OF POWER POLE

LEGEND	
RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
STATE OF OK CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR TRANSMISSION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

PROFESSIONAL
THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL DESIGN
AND SEALED
DOCUMENT

REVISION HISTORY	
NO.	DESCRIPTION

SUBMITTAL	
PRELIMINARY	DATE
11/30/2023	170231.0102
DESIGNED BY: J.L.C.	J.L.C.
DRAWN BY: J.L.C.	J.L.C.
APPROVED BY: S.N.H.	S.N.H.
SCALE: AS SHOWN	

131ST ST. - MEMORIAL TO MINGO

WATER PLAN & PROFILE (3 OF 9)

SHEET
58

BIXBY, OKLAHOMA

Page 61 of 215

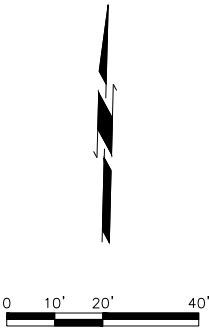
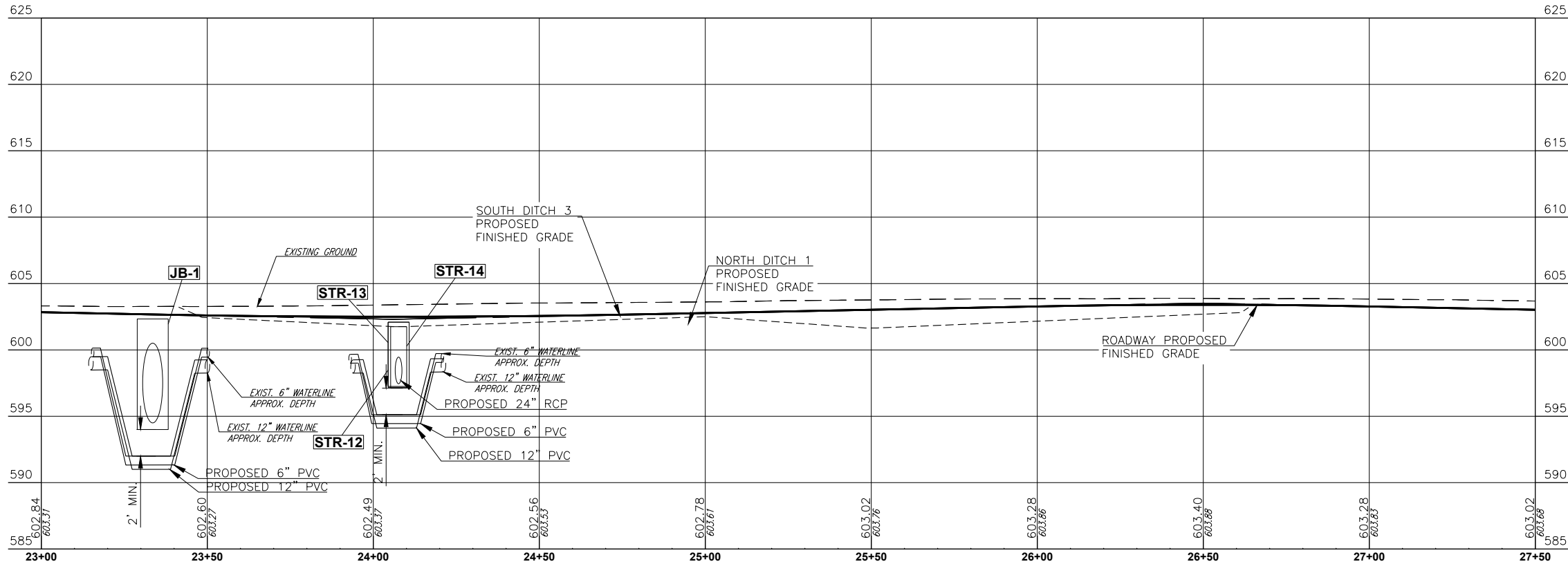
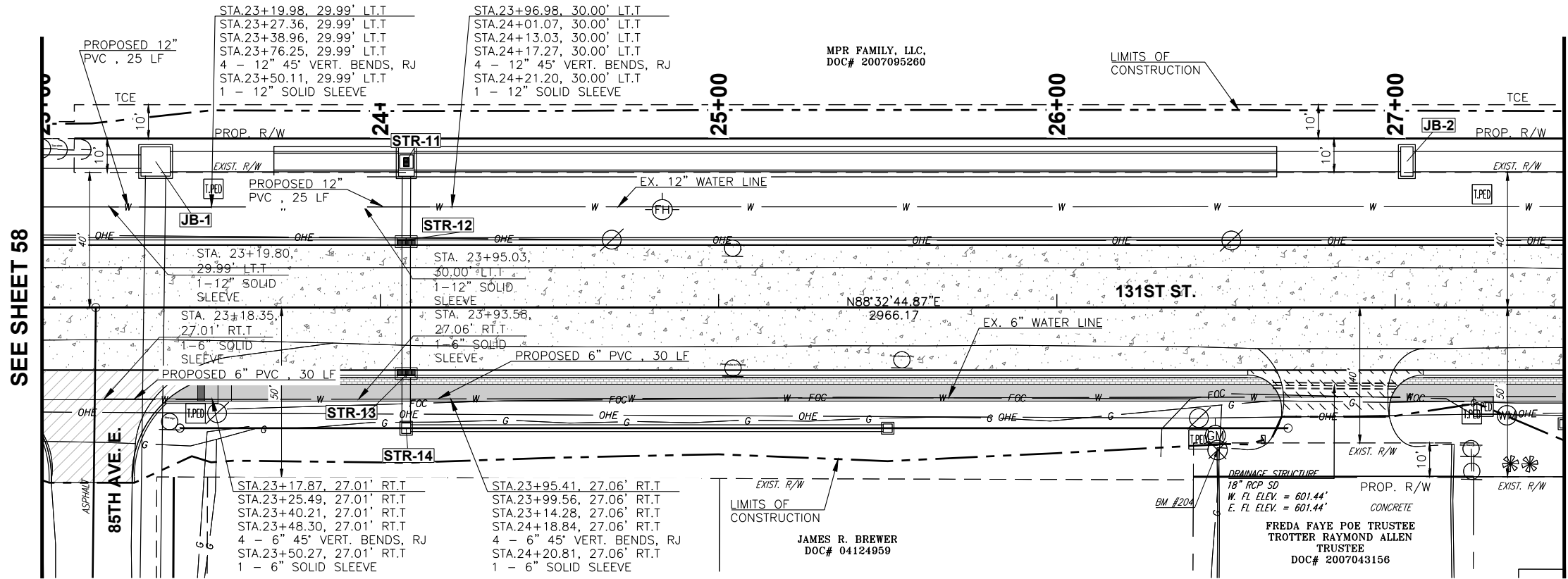
PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\WATER PLAN & PROFILES.DWG

STA 23+00
SEE SHEET 58

STA 27+50
SEE SHEET 60

BENCHMARK				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
204	361,263.1	2,595,461.2	603.44	STA. 25+47.53, 42.16' RT. CUT X IN TOP OF CURB IN NW COR. OF PARKING LOT

LEGEND	
RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXTEC.COM
CAN 32 EXPIRES: 2026-06-30
STATE OF OK CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REUSE OR REPRODUCTION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

PROFESSIONAL
THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

REVISION HISTORY	
NO.	DESCRIPTION

SUBMITTAL:	
DATE:	11/30/2023
PROJECT NO:	170231.0102
DESIGNED BY:	J.L.C.
DRAWN BY:	J.L.C.
APPROVED BY:	S.N.H.
SCALE:	AS SHOWN

131ST ST. - MEMORIAL TO MINGO

SHEET NAME
WATER PLAN &
PROFILE (4 OF 9)

SHEET
59

BIXBY, OKLAHOMA

Page 62 of 215

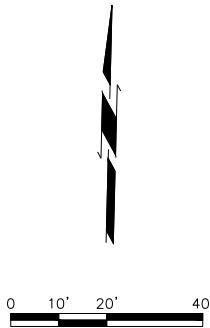
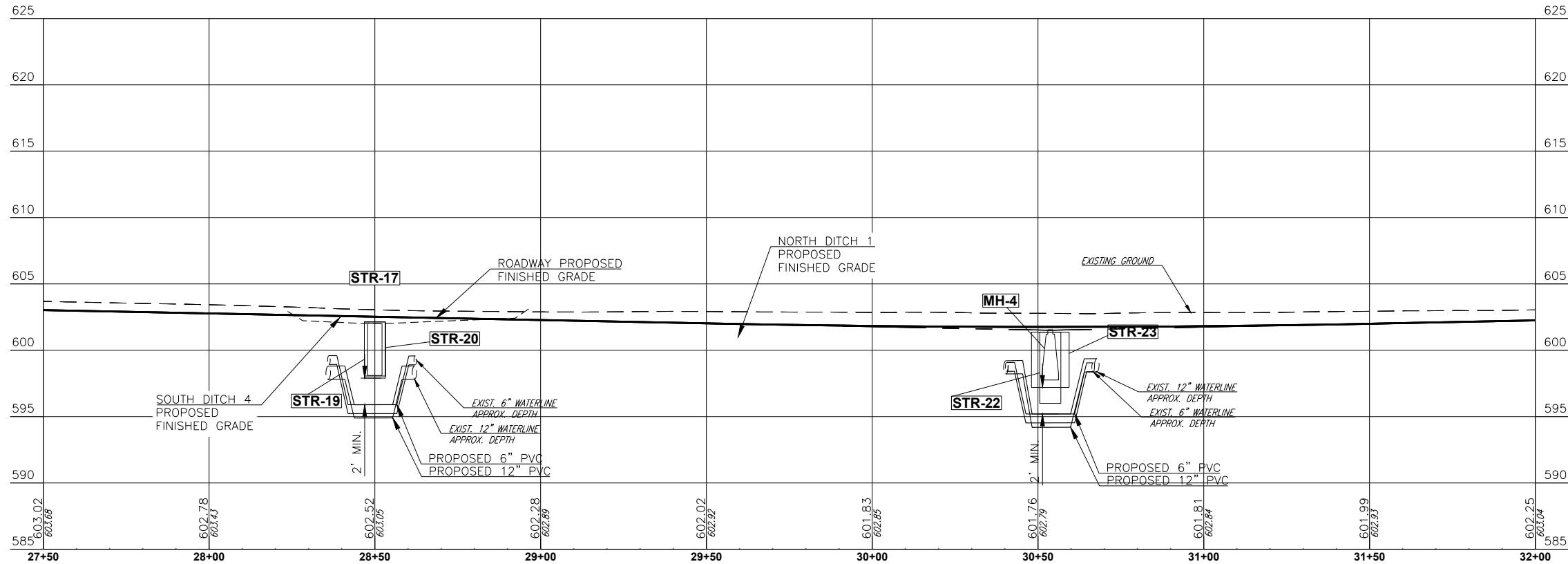
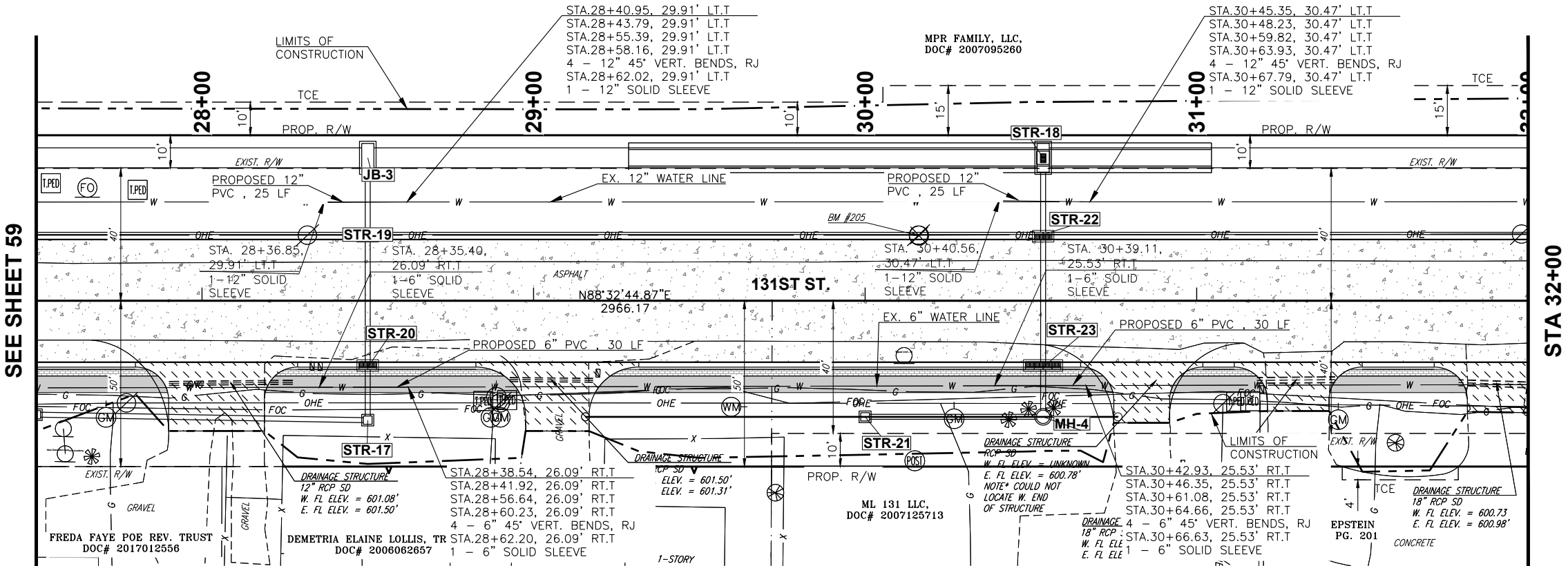
PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\WATER PLAN & PROFILES.DWG

STA 27+50
SEE SHEET 59

STA 32+00
SEE SHEET 61

BENCHMARK				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
205	361,334.2	2,595,828.2	604.24	STA. 30+16.28, 19.69' LT. SET RAILROAD SPIKE IN S. FACE OF POWER POLE

LEGEND	
RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR TRANSMISSION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

PROFESSIONAL
ENGINEER
THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL DESIGN
AND SEALED
DOCUMENT

REVISION HISTORY	
NO.	DESCRIPTION

SUBMITTAL	
PRELIMINARY	DATE: 11/30/2023
DATE:	PROJECT NO. 170231.0102
DESIGNED BY:	J.L.C.
DRAWN BY:	J.L.C.
APPROVED BY:	S.N.H.
SCALE:	AS SHOWN

131ST ST. - MEMORIAL TO MINGO

WATER PLAN &
PROFILE (5 OF 9)

SHEET
60

BIXBY, OKLAHOMA

Page 63 of 215

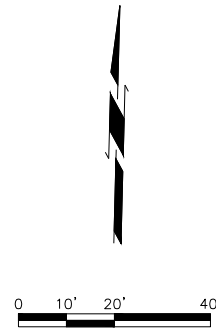
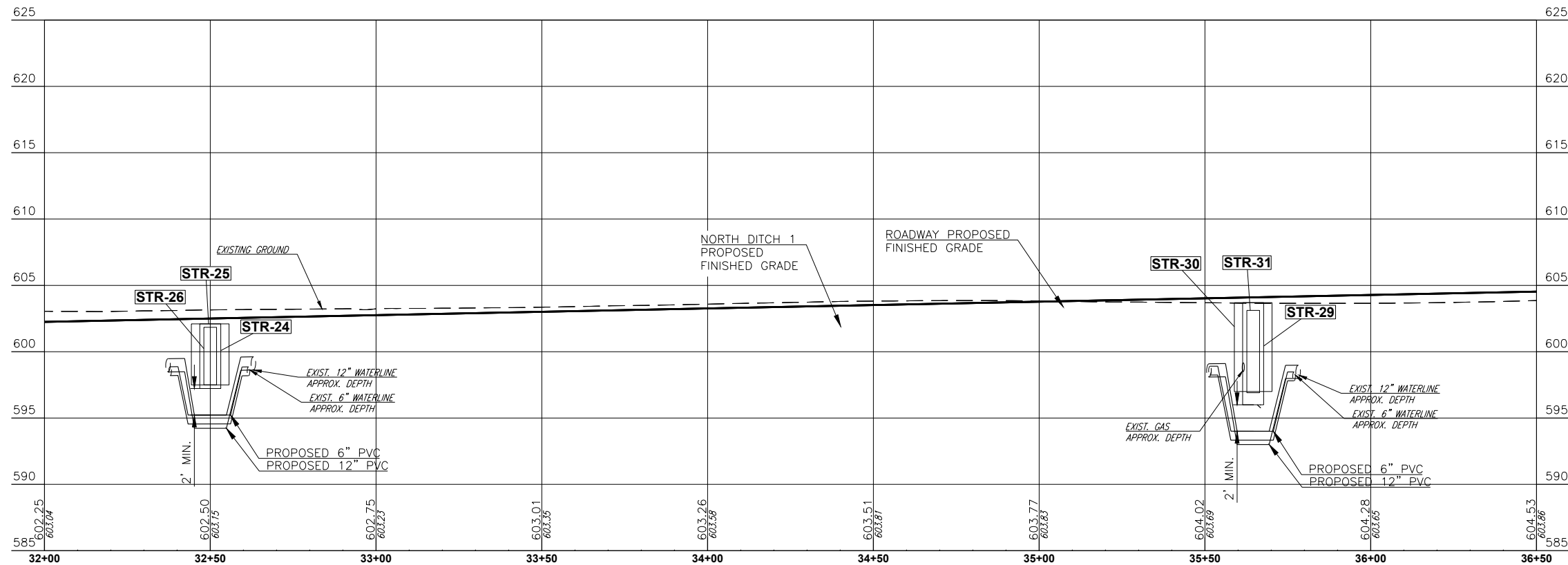
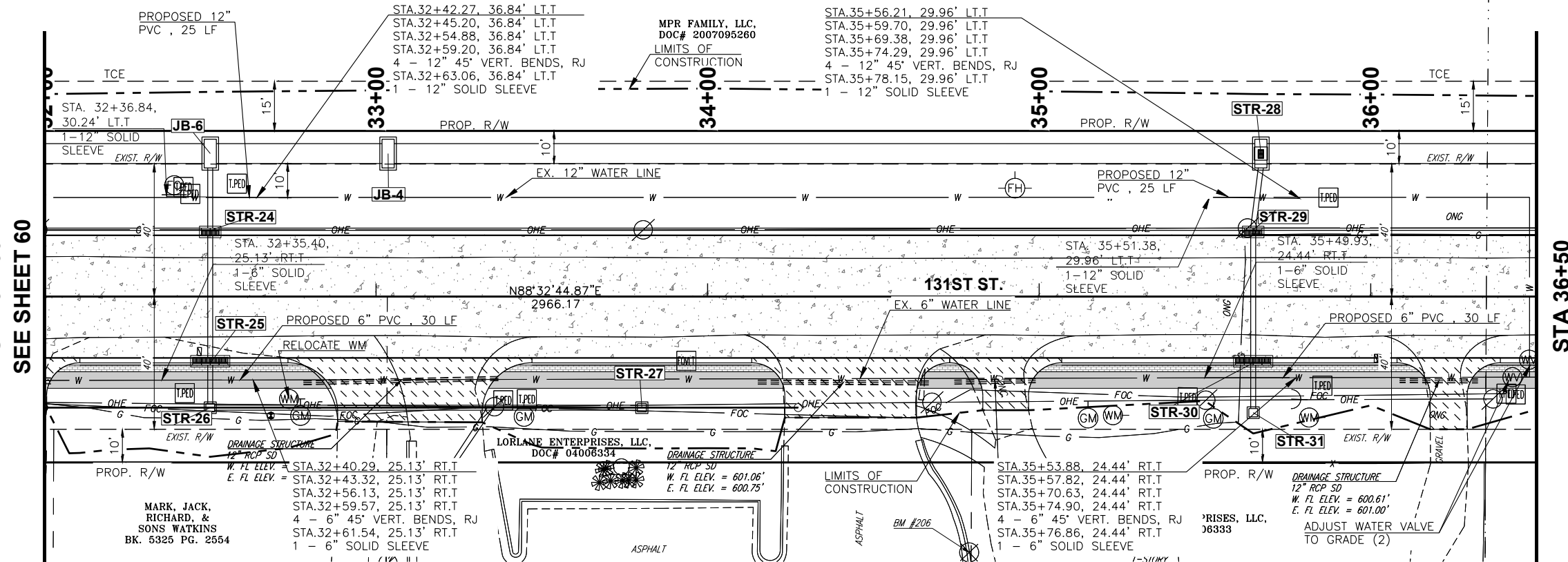
PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\WATER PLAN & PROFILES.DWG

STA 32+00
SEE SHEET 60

STA 36+50
SEE SHEET 62

BENCHMARK				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
206	361,249.2	2,596,293.1	606.29	STA. 34+78.88, 77.15' RT. CUT X IN TOP OF CURB

LEGEND	
RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAP 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IS PROHIBITED.

PROFESSIONAL
THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL DESIGN
AND SEALED
DOCUMENT

REVISION HISTORY	
DATE	DESCRIPTION

PRELIMINARY	
SUBMITTAL:	DATE:
	11/30/2023
	PROJECT NO. 170231.0102
DESIGNED BY:	J.L.C.
DRAWN BY:	J.L.C.
APPROVED BY:	S.N.H.
SCALE:	AS SHOWN

131ST ST. - MEMORIAL TO MINGO

WATER PLAN & PROFILE (6 OF 9)

SHEET
61

BIXBY, OKLAHOMA

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\WATER PLAN & PROFILES.DWG

STA 36+50
SEE SHEET 61

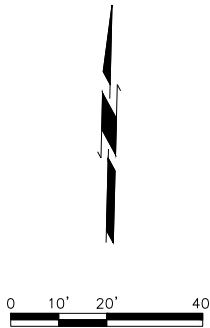
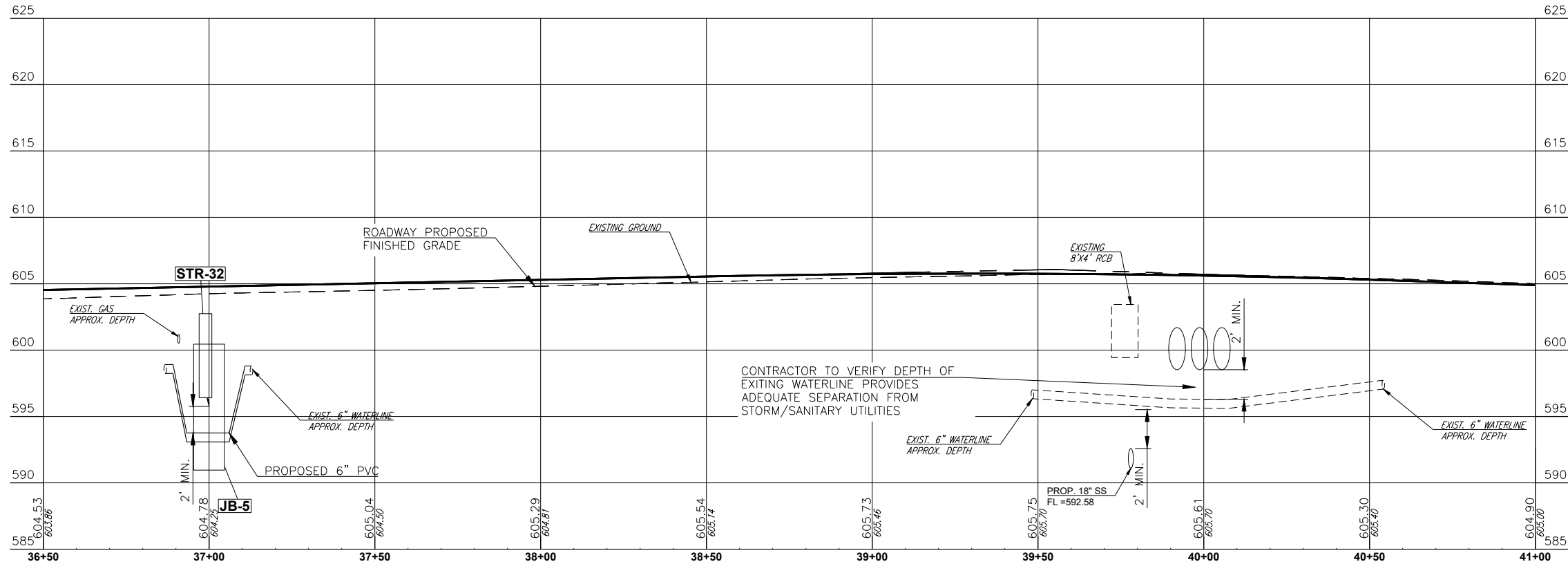
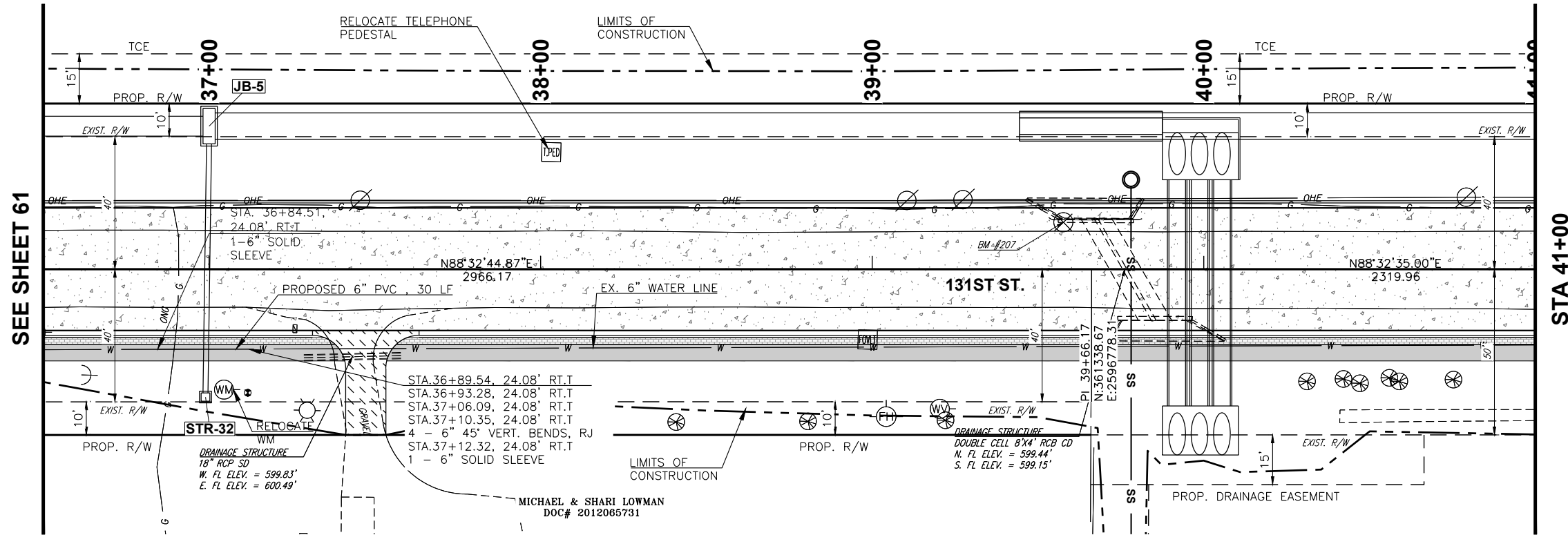
STA 41+00
SEE SHEET 63

BENCHMARK				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
207	361,352.6	2,596,769.5	606.29	STA. 39+57.67, 14.15' LT. CUT X IN TOP OF HEADWALL

SEE SHEETS 42-50 FOR
131ST ST. NORTH DITCHES

MPR FAMILY, LLC,
DOC# 2007095260

LEGEND	
RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
NO WARRANTY IS MADE BY CEC FOR THE USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

PROFESSIONAL
THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL DESIGN
AND SEALED
DOCUMENT

REVISION HISTORY	
NO.	DESCRIPTION

SUBMITTAL:	
DATE:	11/30/2023
PROJECT NO:	170231.0102
DESIGNED BY:	J.L.C.
DRAWN BY:	J.L.C.
APPROVED BY:	S.N.H.
SCALE:	AS SHOWN

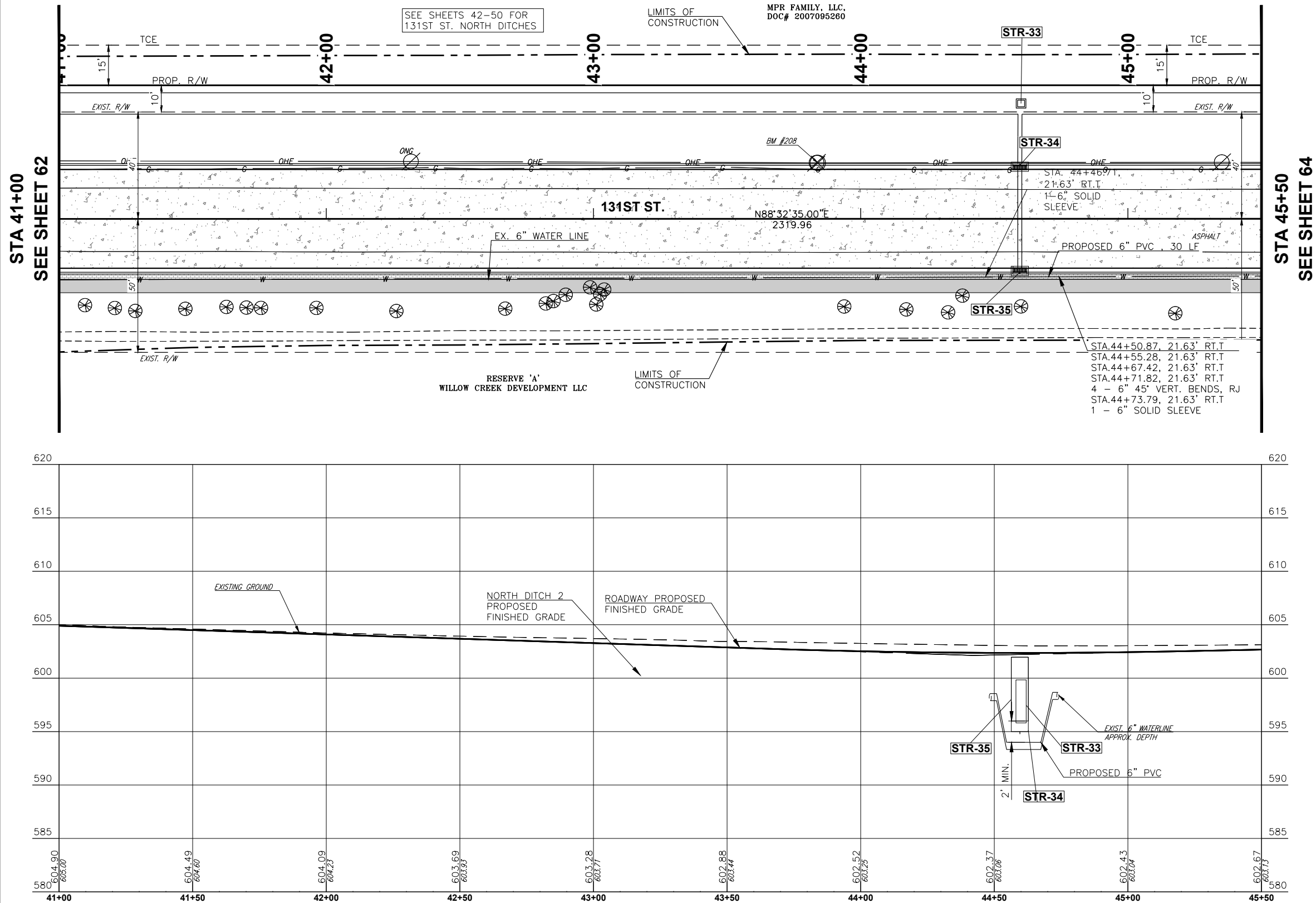
131ST ST. - MEMORIAL TO MINGO

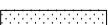
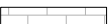
WATER PLAN &
PROFILE (7 OF 9)

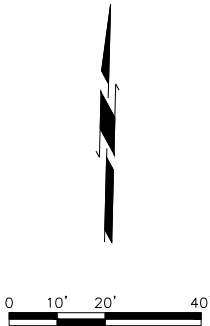
SHEET
62

BIXBY, OKLAHOMA

BENCHMARK				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
208	361,370.2	2,597,195.4	604.32	STA. 43+83.96, 20.92' LT. SET RAILROAD SPIKE IN S. FACE OF POWER POLE



LEGEND	
RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	



SHEET 63	SHEET NAME WATER PLAN & PROFILE (8 OF 9)	131ST ST. - MEMORIAL TO MINGO BIXBY, OKLAHOMA
		
THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL SIGNED AND SEALED DOCUMENT		
CEC CORPORATION 1100 WEST 10TH AVENUE TULSA, OKLAHOMA 74119 WWW.CECNETS.COM STATE OF OKLAHOMA DEPARTMENT OF REVENUE TAX DIVISION 1000 EAST 17TH AVENUE TULSA, OKLAHOMA 74103 405-505-6000 CEC IS PROHIBITED FROM REPRODUCING OR TRANSMITTING IN ANY FORM OR BY ANY MEANS, WITHOUT WRITTEN PERMISSION OF CEC. ALL RIGHTS RESERVED. COPYRIGHT © 2007 CEC.		
  		
CEC CORPORATION 1100 WEST 10TH AVENUE TULSA, OKLAHOMA 74119 WWW.CECNETS.COM STATE OF OKLAHOMA DEPARTMENT OF REVENUE TAX DIVISION 1000 EAST 17TH AVENUE TULSA, OKLAHOMA 74103 405-505-6000 CEC IS PROHIBITED FROM REPRODUCING OR TRANSMITTING IN ANY FORM OR BY ANY MEANS, WITHOUT WRITTEN PERMISSION OF CEC. ALL RIGHTS RESERVED. COPYRIGHT © 2007 CEC.		
  		
  		
  		
  		
  		
  		
  		
  		
  		
  		
  		
  		
  		
  		
  		
  		
  		
  		
  		

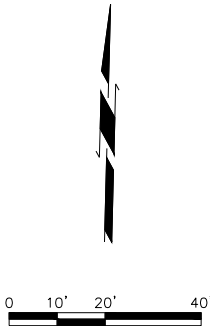
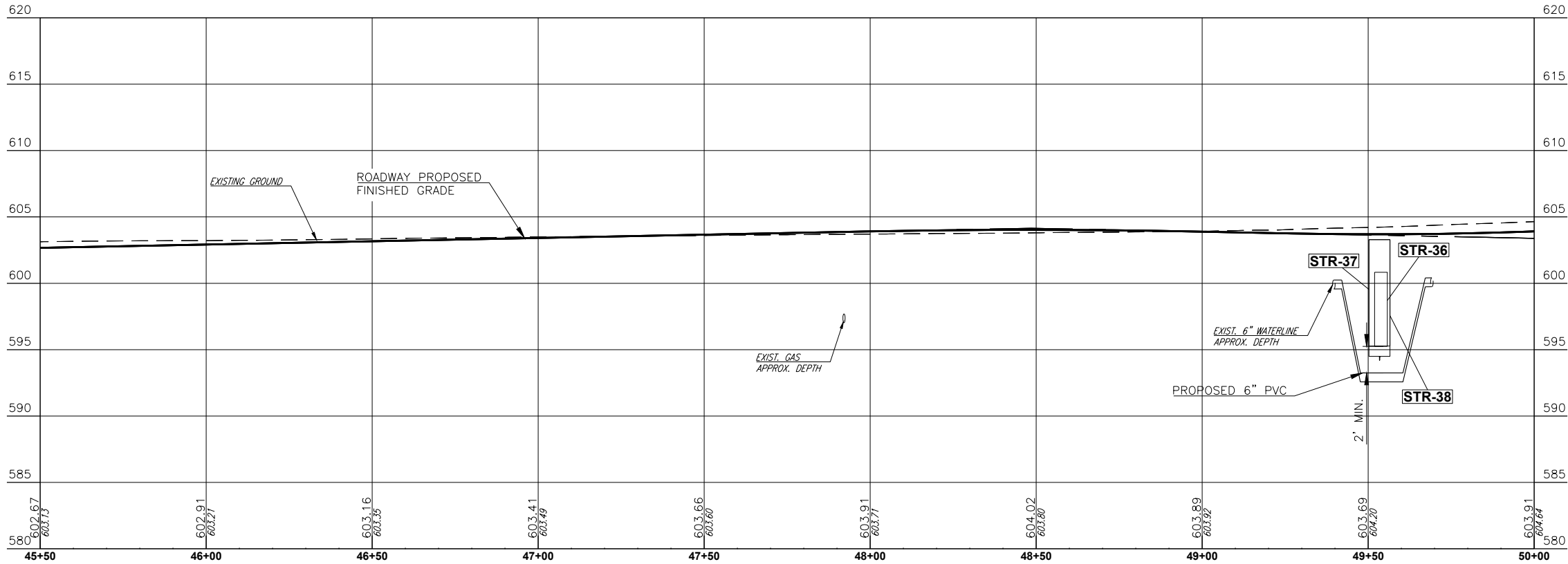
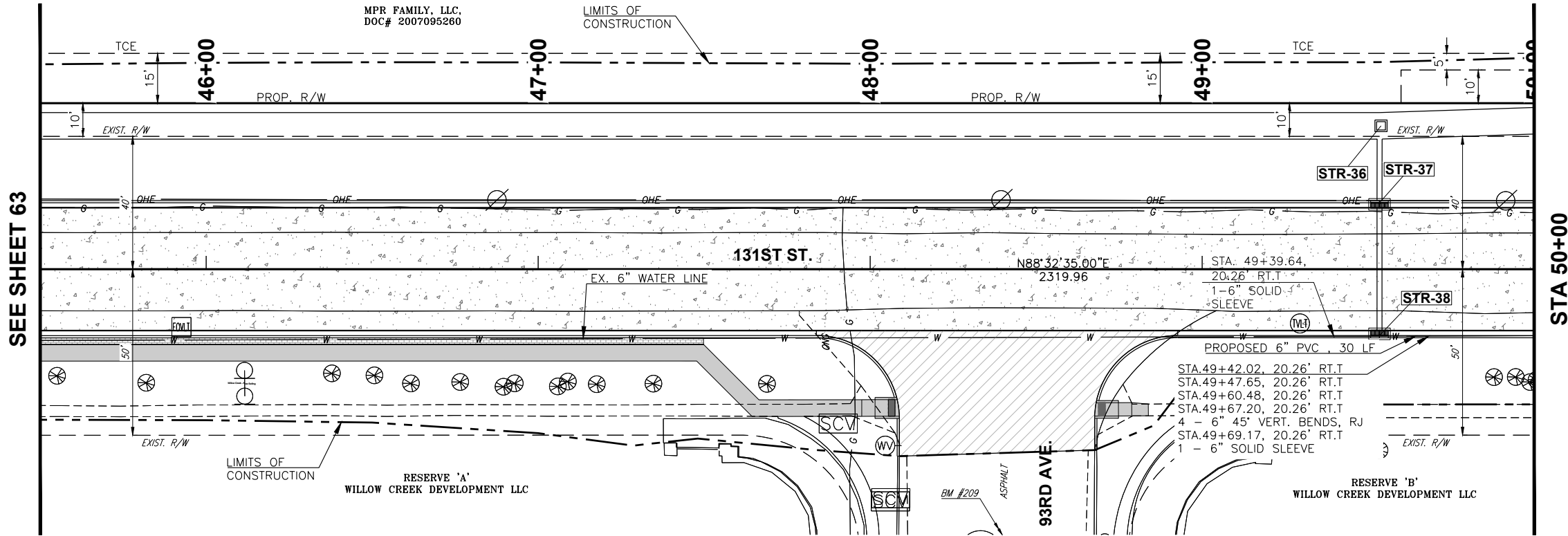
PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\WATER PLAN & PROFILES.DWG

STA 45+50
SEE SHEET 63

STA 50+00

BENCHMARK				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
208	361,370.2	2,597,195.4	604.32	STA. 43+83.96, 20.92' LT. SET RAILROAD SPIKE IN S. FACE OF POWER POLE

LEGEND	
RECONSTRUCT ROADWAY	
AC PATCH	
REMOVE AND REPLACE DRIVEWAY	
PROPOSED STREET RETURN	
MILL AND OVERLAY	
CGA PROJECT	
PROPOSED SIDEWALK	



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM

STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES: 2026-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED.

PROFESSIONAL
THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL DESIGN
AND SEALED
DOCUMENT

REVISION HISTORY	
NO.	DESCRIPTION

PRELIMINARY	
DATE:	11/30/2023
PROJECT NO:	170231.0102
DESIGNED BY:	J.L.C.
DRAWN BY:	J.L.C.
APPROVED BY:	S.N.H.
SCALE:	AS SHOWN

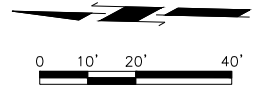
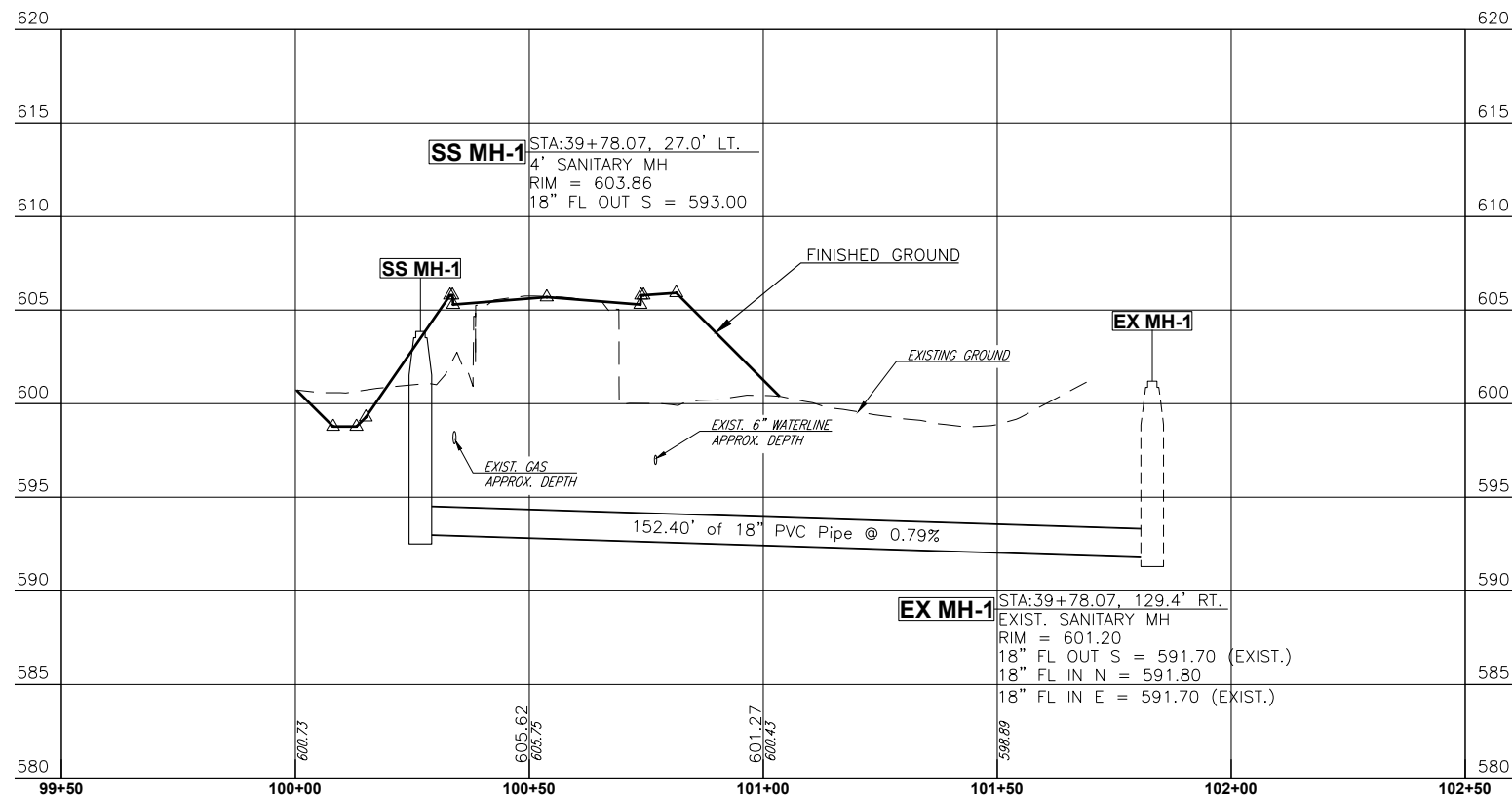
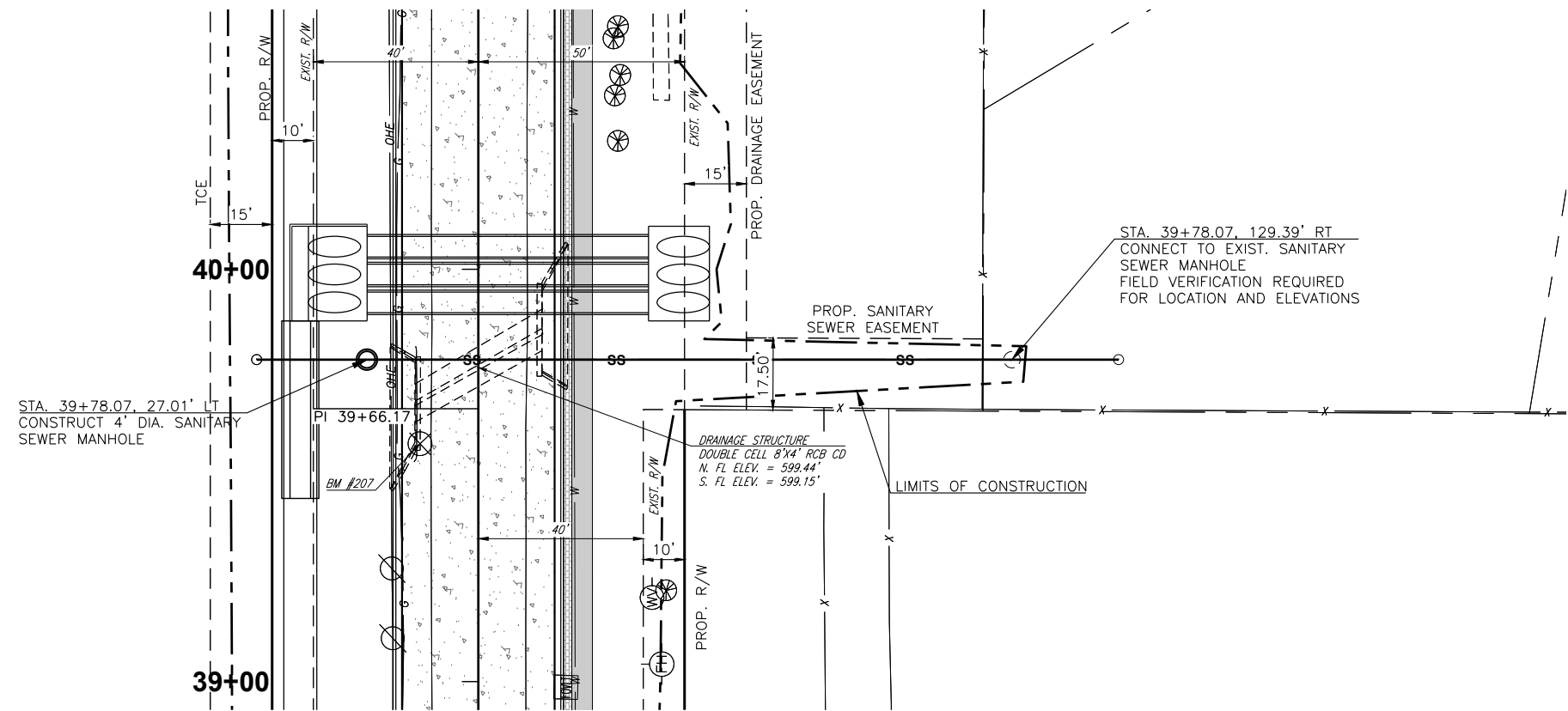
131ST ST. - MEMORIAL TO MINGO

SHEET NAME
WATER PLAN &
PROFILE (9 OF 9)

SHEET
64

BIXBY, OKLAHOMA

Page 67 of 215



1300 S. MAIN STREET
TULSA, OKLAHOMA 74119
P. 918.683.9401
WWW.CONNECTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAP. 32 EXPIRES: 2026-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



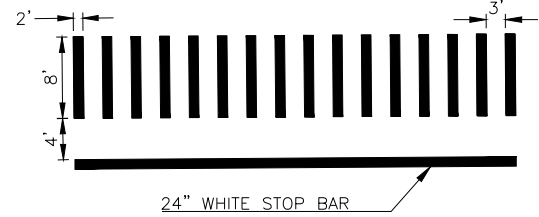
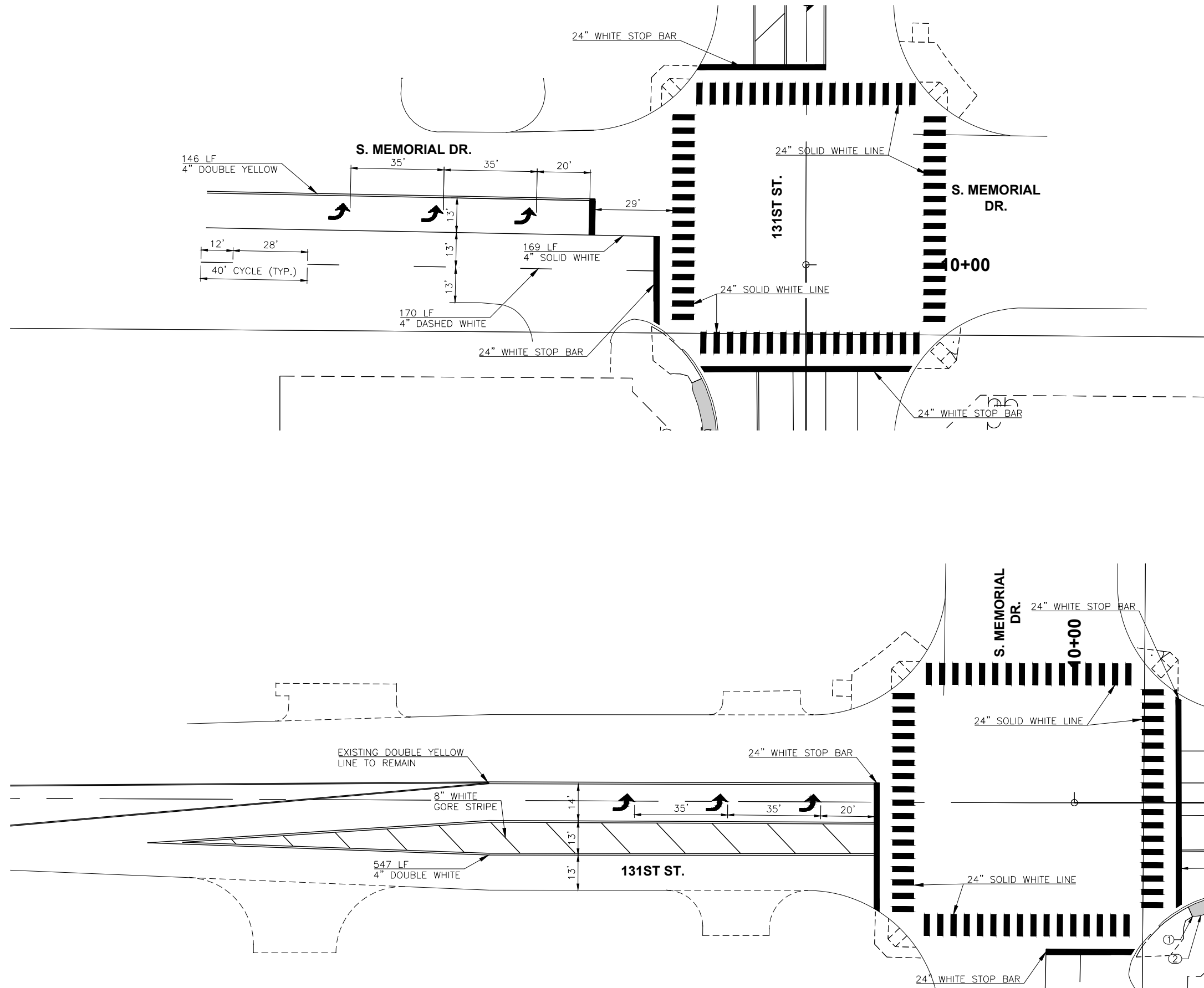
PRELIMINARY		REVISION HISTORY		
SUBMITTAL:		NO.	DESCRIPTION	DATE
DATE:	11/30/2023			
PROJECT NO:	170231.0102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:	S.N.H.			
SCALE:	AS SHOWN			

131ST ST. - MEMORIAL TO MINGO

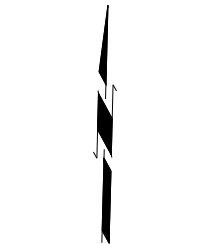
SHEET NAME
SANITARY
SEWER PLAN &
PROFILE

HEET

BIXBY, OKLAHOMA

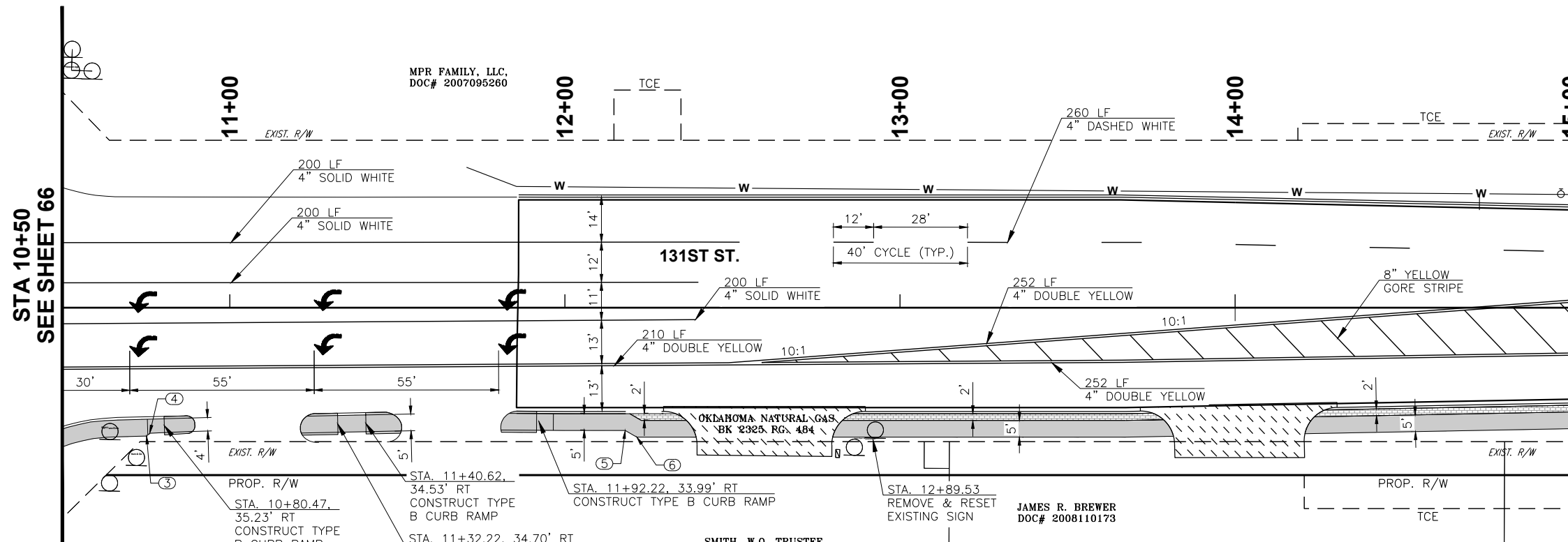


CONTINENTAL CROSSWALK DETAIL

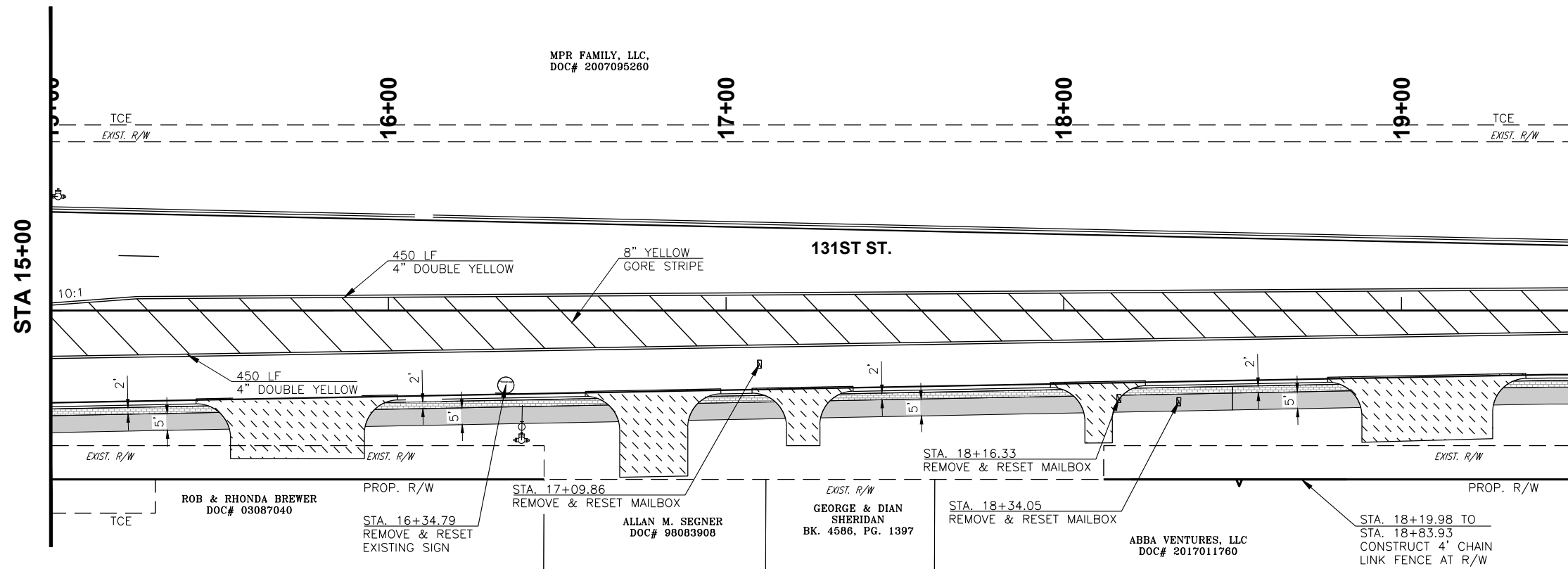


**STA 10+50
SEE SHEET 67**

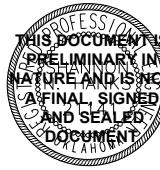
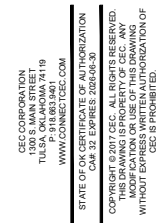
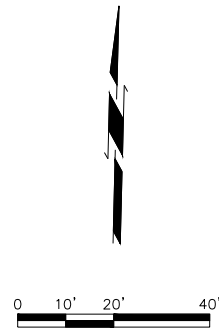
[illegible]



SEE SHEET 72 FOR
SIDEWALK DATA



SHEET NAME SIGNING, STRIPING, AND SIDEWALK (2 OF 7)		131ST ST. - MEMORIAL TO MINGO		BIXBY, OKLAHOMA	
SHEET 67					

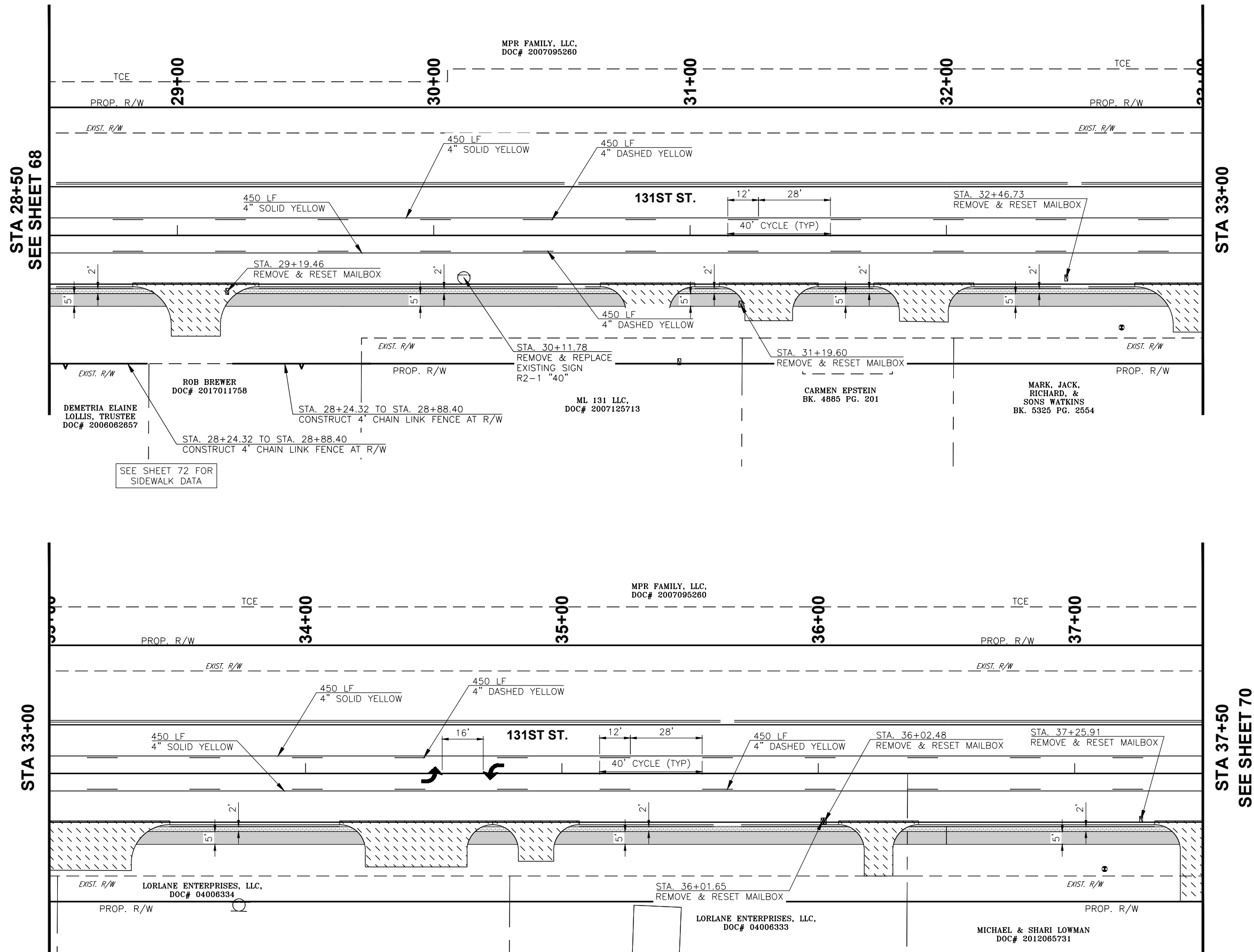


SUBMITTAL:		PRELIMINARY	REVISION HISTORY		
DATE:	PROJECT NO:		NO.	DESCRIPTION	DATE
	170231 0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

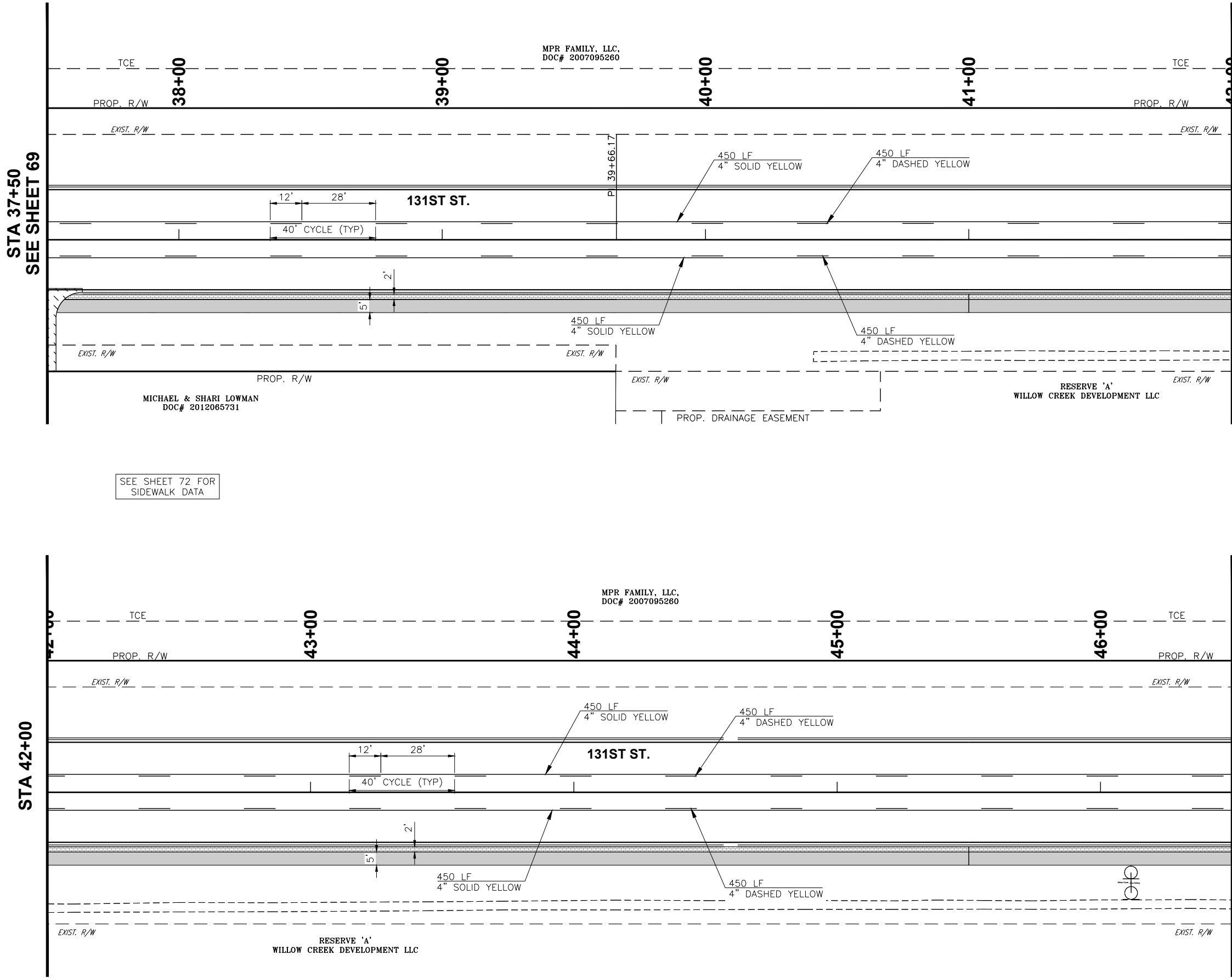
131ST ST. - MEMORIAL TO MINGO

SHEET NAME
SIGNING,
STRIPING, AND
SIDEWALK (3 OF 7)

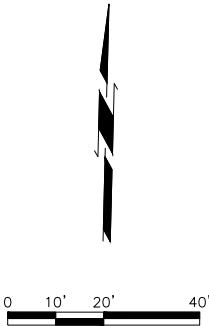
SHEET
68



PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\51 SIGNING, STRIPING, AND SIDEWALK (7 OF 7).DWG



SEE SHEET 72 FOR
SIDEWALK DATA



STA 37+50
SEE SHEET 69

STA 42+00

STA 42+00

STA 46+50
SEE SHEET 71

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
STATE OF OK CERTIFICATE OF AUTHORIZATION
CAB 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
NO PART OF THIS DOCUMENT MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

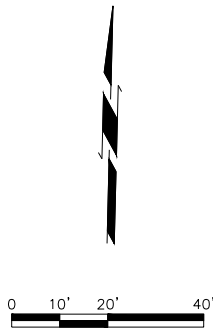
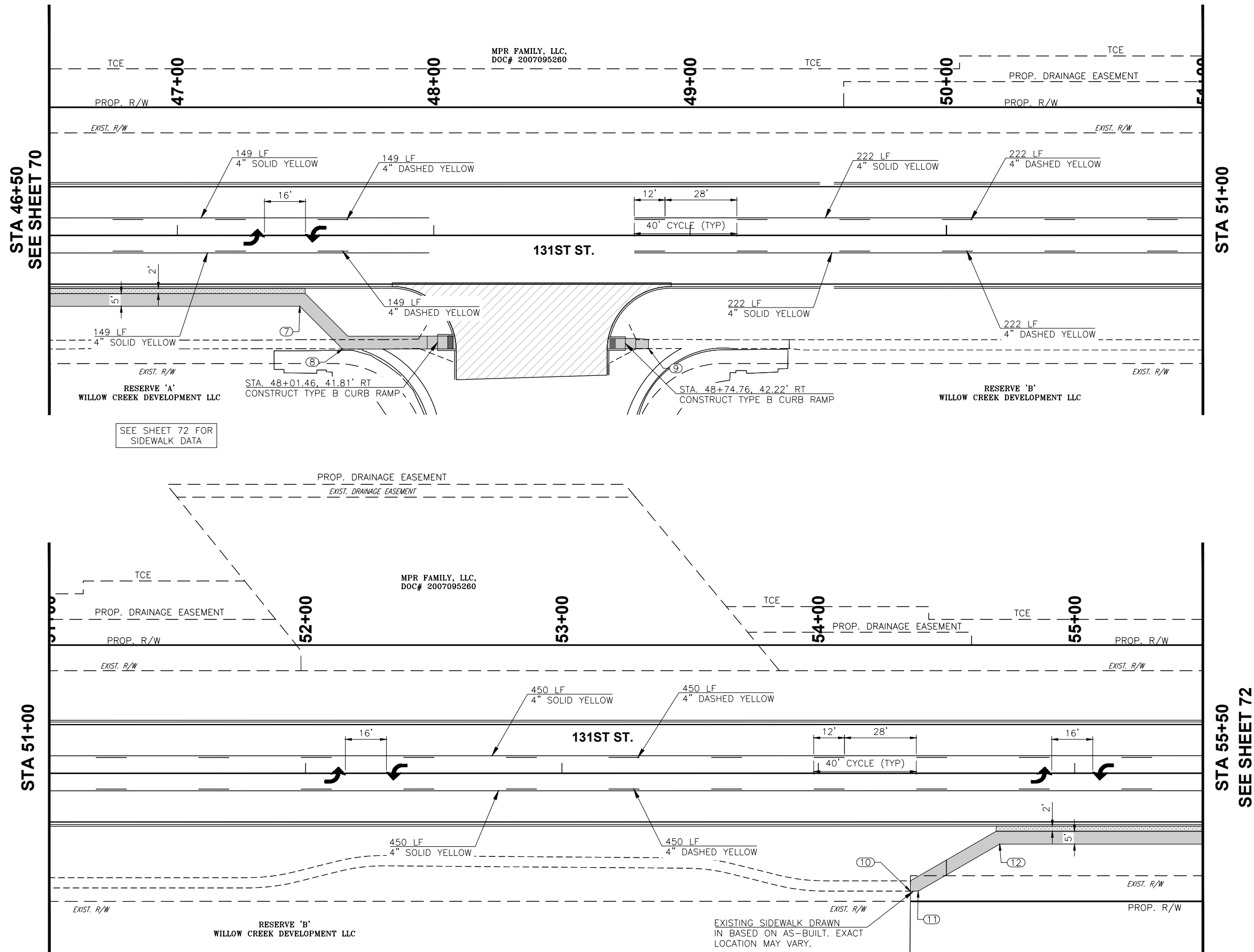
SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO.:	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE:	AS SHOWN				

131ST ST. - MEMORIAL TO MINGO

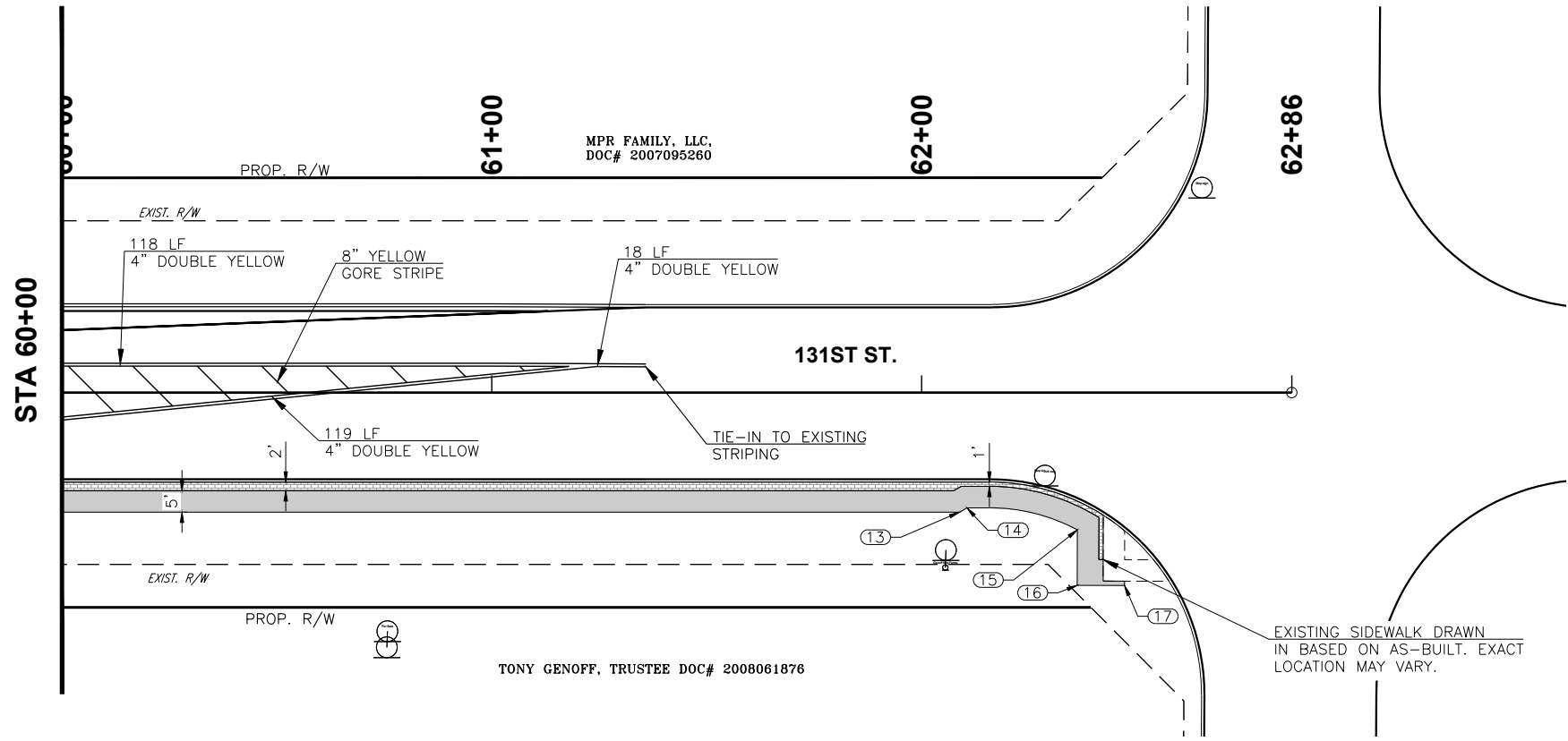
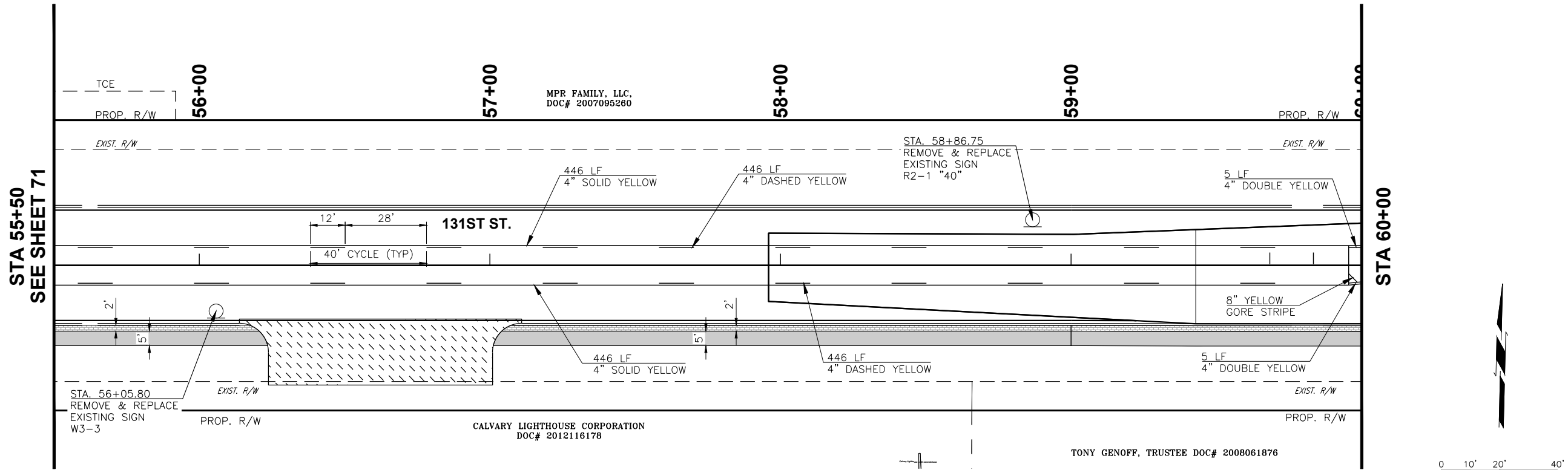
SHEET NAME
SIGNING,
STRIPING, AND
SIDEWALK (5 OF 7)

SHEET
70

BIXBY, OKLAHOMA



PLOT DATE: July 31, 2024. DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\51 SIGNING AND SIDEWALK (7 OF 7).DWG



COORDINATE TABLE		
POINT NO.	NORTHING	EASTING
1	361221.68	2593858.56
2	361222.13	2593861.64
3	361226.99	2593889.22
4	361227.85	2593890.14
5	361232.27	2594031.95
6	361230.36	2594035.47
7	361330.89	2597560.33
8	361314.61	2597577.45
9	361317.84	2597696.74
10	361330.05	2598248.72
11	361330.13	2598251.81
12	361349.27	2598283.09
13	361367.87	2599020.93
14	361368.91	2599022.64
15	361364.43	2599048.45
16	361351.54	2599048.75
17	361351.79	2599059.74

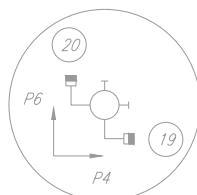
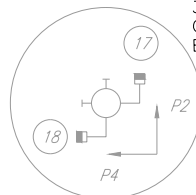
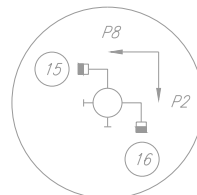
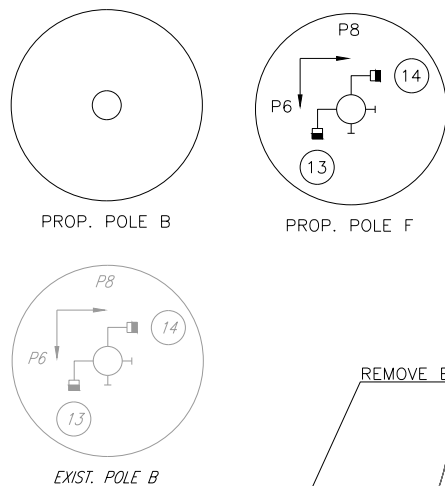
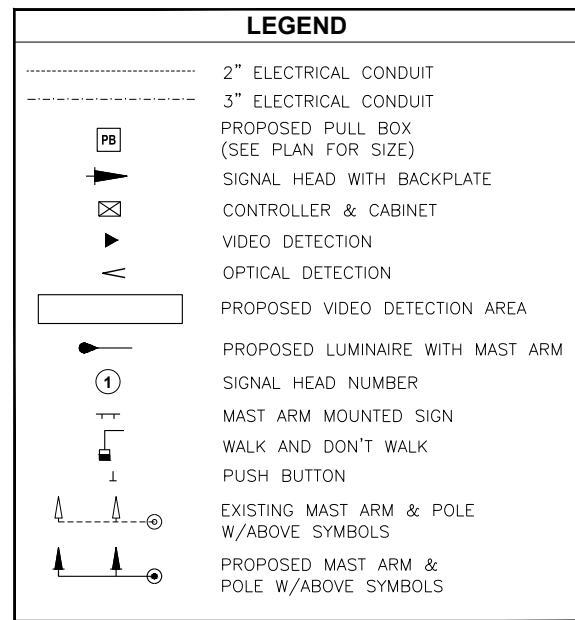
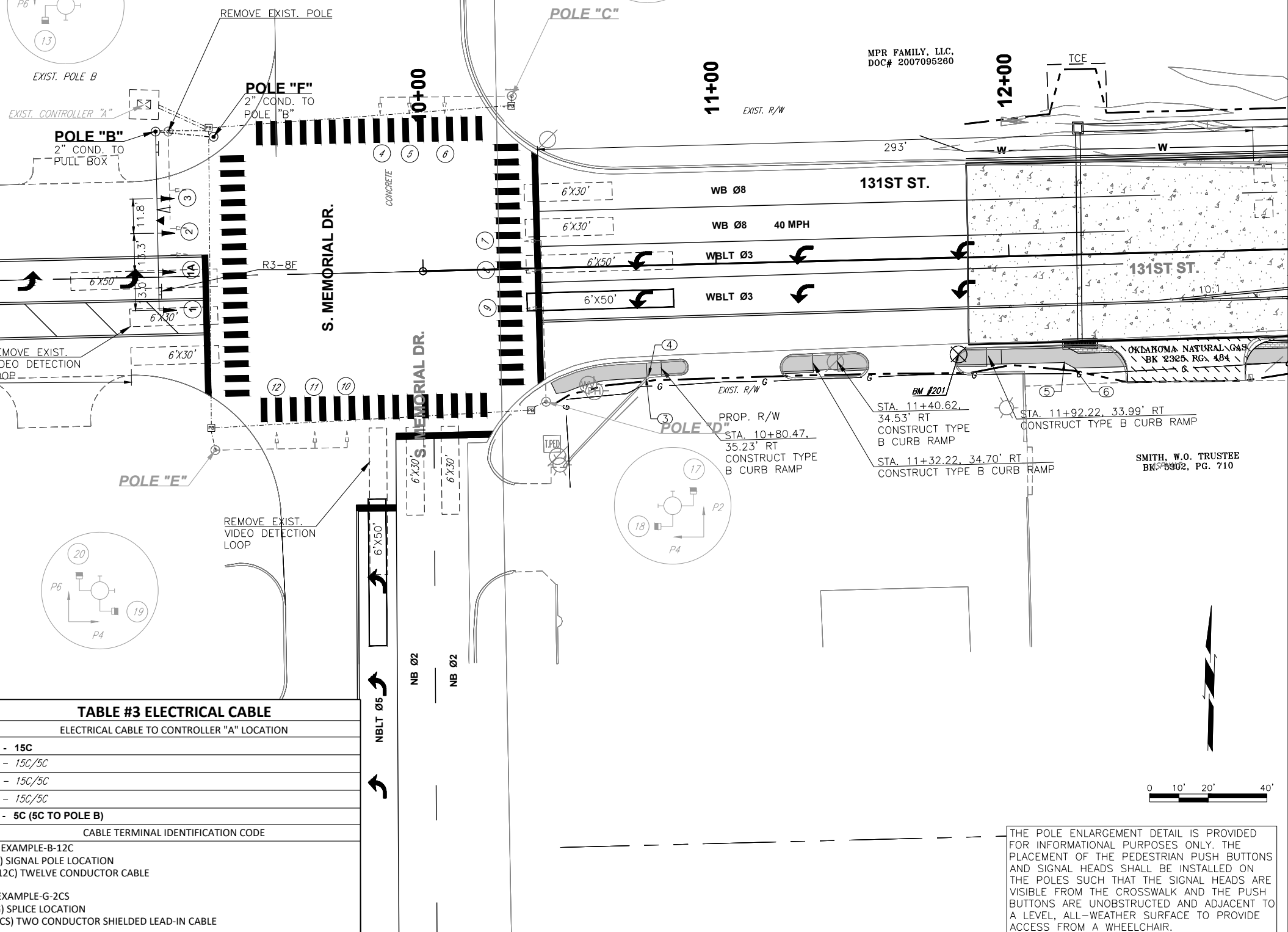


TABLE #1 SIGNAL HEADS				
SIGNAL HEAD NUMBER	NUMBER & TYPE	MOUNTING	VISOR	BACKPLATE
5,6,8,9,11,12	6 - ONEWAY (S-6)	MAST ARM	V-1	B-2
2,3	2 - ONEWAY (S-6)	MAST ARM	V-1	B-2
7	1 - ONEWAY (S-19L)	MAST ARM	V-1	B-2
4,10	2 - ONEWAY (S-9)	MAST ARM	V-1	B-2
1,1A	2 - ONEWAY (S-9)	MAST ARM	V-1	B-2
13,14	8 - ONEWAY (S-20)	CLAMP	V-3	
15,16,17,18,19,20	8 - ONEWAY (S-20)	CLAMP	V-3	

TABLE #2 MAST ARMS & POLES			
LOCATION	TYPE	MAST ARMS	FOUNDATION
<i>B,C</i>	<i>POLE</i>	<i>45' T.S.</i>	<i>S-45</i>
<i>D</i>	<i>POLE</i>	<i>32' MH, 55' T.S. AND 15'L</i>	<i>S-55</i>
<i>E</i>	<i>POLE</i>	<i>32' MH, 45' T.S. AND 15'L</i>	<i>S-45</i>
B	POLE	62' T.S.	S-65*
F	PED. POLE	10' PED. PUSH BUTTON POLE	P-3

TABLE #3 ELECTRICAL CABLE	
ELECTRICAL CABLE TO CONTROLLER "A" LOCATION	
B - 15C	
<i>C - 15C/5C</i>	
<i>D - 15C/5C</i>	
<i>E - 15C/5C</i>	
F - 5C (5C TO POLE B)	
CABLE TERMINAL IDENTIFICATION CODE	
EXAMPLE-B-12C	
(B) SIGNAL POLE LOCATION	
(12C) TWELVE CONDUCTOR CABLE	
EXAMPLE-G-2CS	
(G) SPLICE LOCATION	
(2CS) TWO CONDUCTOR SHIELDED LEAD-IN CABLE	



THE POLE ENLARGEMENT DETAIL IS PROVIDED FOR INFORMATIONAL PURPOSES ONLY. THE PLACEMENT OF THE PEDESTRIAN PUSH BUTTONS AND SIGNAL HEADS SHALL BE INSTALLED ON THE POLES SUCH THAT THE SIGNAL HEADS ARE VISIBLE FROM THE CROSSWALK AND THE PUSH BUTTONS ARE UNOBSTRUCTED AND ADJACENT TO A LEVEL, ALL-WEATHER SURFACE TO PROVIDE ACCESS FROM A WHEELCHAIR.

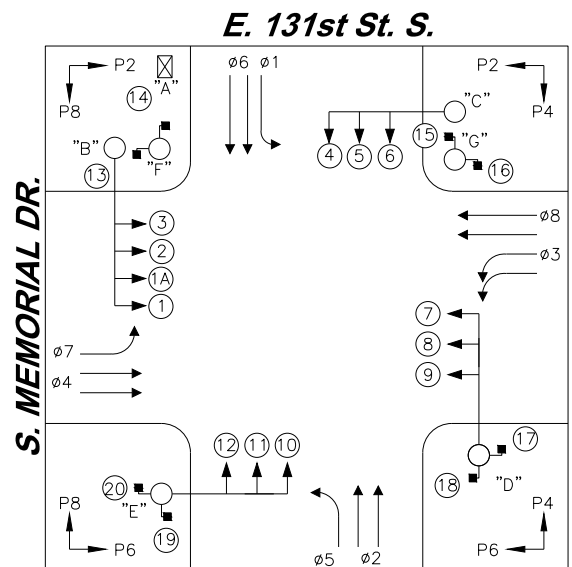
PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\52 SIGNAL PHASING DIAGRAM.DWG

PHASING DIAGRAM	
PHASE "A" E 131ST ST. S.	PHASE "B" S MEMORIAL DR.



TO B1,B3,B8,B11,A1,A3,
A8 OR A11

TO A1, A3, A8, A11,
B1, B3, B8 OR B10



INTERSECTION PHASE AND SIGNAL HEAD NUMBERS

SEQUENCE CHART															
DIRECTION	BLOCK No.	PHASE													
		3	8	8	5	2	7	4	4	1	6	P8	P2	P4	P6
		SIGNAL HEAD NUMBER													
03 & 07 R.O.W.	A1	→G	R	R	R	R	→G	R	R	R	R	DW	DW	DW	DW
03 & 07 CL	A2	→Y	R	R	R	R	→Y	R	R	R	R	DW	DW	DW	DW
04 & 08 R.O.W., P4 & P8 R.O.W.	A3	R	G	G	R	R	G	G	G	R	R	W	DW	W	DW
04 & 08 R.O.W., P4 & P8 CL	A4	R	G	G	R	R	G	G	G	R	R	FDW	DW	FDW	DW
04 & 08 CL	A5	R	Y	Y	R	R	Y	Y	Y	R	R	DW	DW	DW	DW
ALL RED	A6	R	R	R	R	R	R	R	R	R	R	DW	DW	DW	DW
03 R.O.W., 07 CL	A7	→G	R	R	R	R	→Y	R	R	R	R	DW	DW	DW	DW
03 & 04 R.O.W., P8 R.O.W.	A8	→G	G	G	R	R	R	R	R	R	R	W	DW	DW	DW
03 CL, 08 R.O.W., P8 CL	A9	→Y	G	G	R	R	R	R	R	R	R	W	DW	DW	DW
03 CL, 07 R.O.W.	A10	→Y	R	R	R	R	→G	R	R	R	R	DW	DW	DW	DW
04 & 07 R.O.W., P4 R.O.W.	A11	R	R	R	R	R	→G	G	G	R	R	DW	DW	W	DW
04 R.O.W., 07 CL, P4 CL	A12	R	R	R	R	R	→Y	G	G	R	R	DW	DW	W	DW
01 & 05 R.O.W.	B1	R	R	R	→G	R	R	R	R	→G	R	DW	DW	DW	DW
01 & 05 CL	B2	R	R	R	→Y	R	R	R	R	→Y	R	DW	DW	DW	DW
02 & 06, P2 & P6 R.O.W.	B3	R	R	R	R	G	R	R	R	R	G	DW	W	DW	W
02 & 06 R.O.W., P2 & P6 CL	B4	R	R	R	R	G	R	R	R	R	G	DW	FDW	DW	FDW
02 & 06 CL	B5	R	R	R	R	Y	R	R	R	R	Y	DW	DW	DW	DW
ALL RED	B6	R	R	R	R	R	R	R	R	R	R	DW	DW	DW	DW
05 R.O.W. 01 CL	B7	R	R	R	→G	R	R	R	R	→Y	R	DW	DW	DW	DW
02, 05, & P6 R.O.W.	B8	R	R	R	→G	G	R	R	R	R	R	DW	DW	DW	W
02 R.O.W., 05, P6 CL	B9	R	R	R	→Y	G	R	R	R	R	R	DW	DW	DW	W
01 R.O.W. & 05 CL	B10	R	R	R	→Y	R	R	R	R	→G	R	DW	DW	DW	DW
01, 06, P6 R.O.W.	B11	R	R	R	R	R	R	R	R	→G	G	DW	W	DW	DW
06 R.O.W., 01 & P6	B12	R	R	R	R	R	R	R	R	→Y	G	DW	FDW	DW	DW
FLASHING OPERATION		FR	FR	FR	FR	FR	FR	FR	FR	FR	FR	DW	DW	DW	DW

G = GREEN	→G = GREEN ARROW	W = WALK
Y = YELLOW	→Y = YELLOW ARROW	DW = DON'T WALK
R = RED		FDW = FLASHING DON'T WALK
		FR = FLASHING RED
		CL = CLEAR
		R.O.W.= RIGHT OF WAY

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
CAR 32 EXPIRES: 2026-06-30
STATE OF OK CERTIFICATE OF AUTHORIZATION
COPYRIGHT ©2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING
MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT

REVISION HISTORY		PRELIMINARY		SUBMITTAL:	
DATE	DESCRIPTION	DATE	NO.	DATE	NO.
		11/30/2023	170231.0102		
		DESIGNED BY: J.L.C.			
		DRAWN BY: J.L.C.			
		APPROVED BY: S.N.H.			
		SCALE: AS SHOWN			

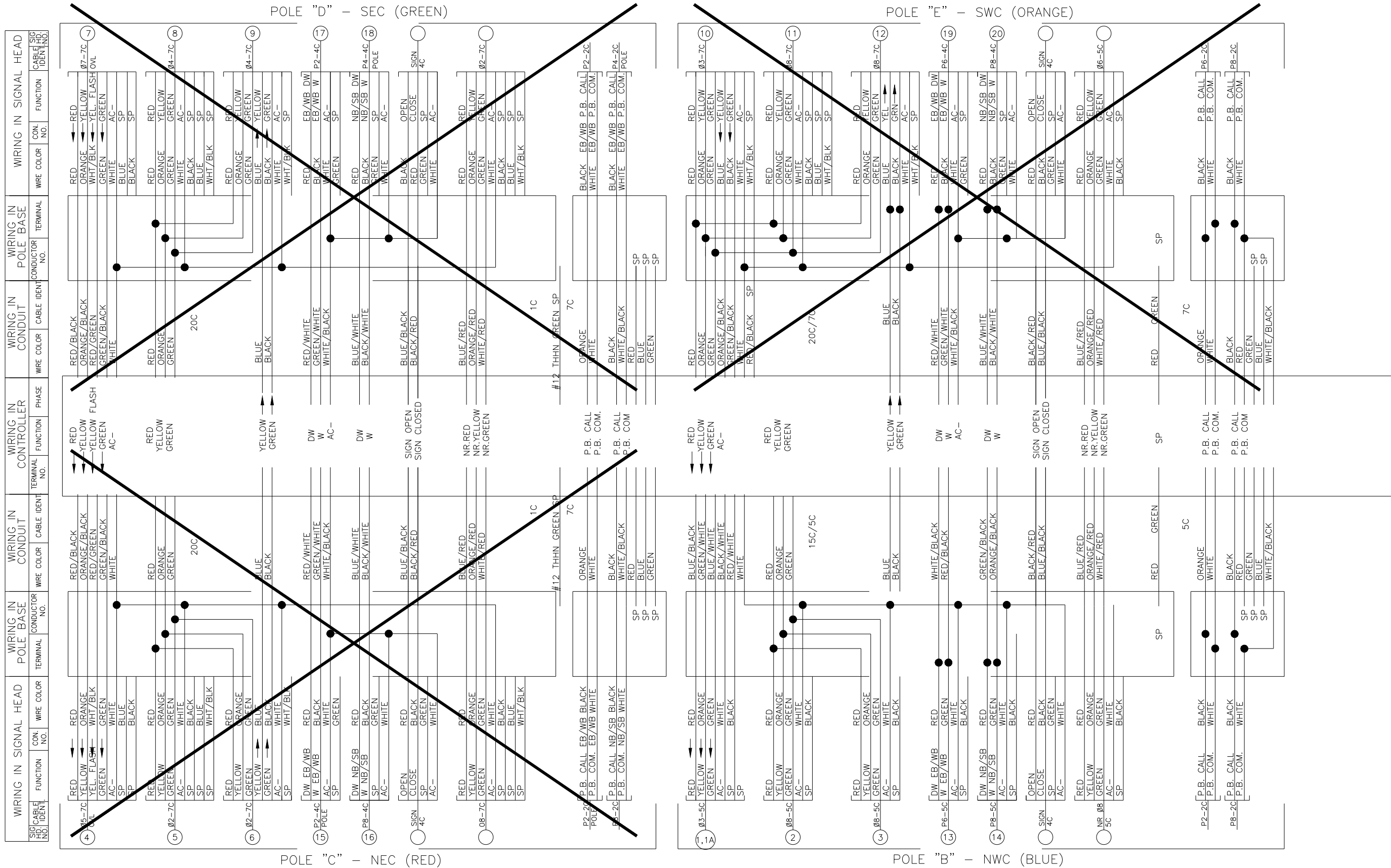
131ST ST. - MEMORIAL TO MINGO

SHEET NAME
SIGNAL PHASING
DIAGRAM

SHEET
74

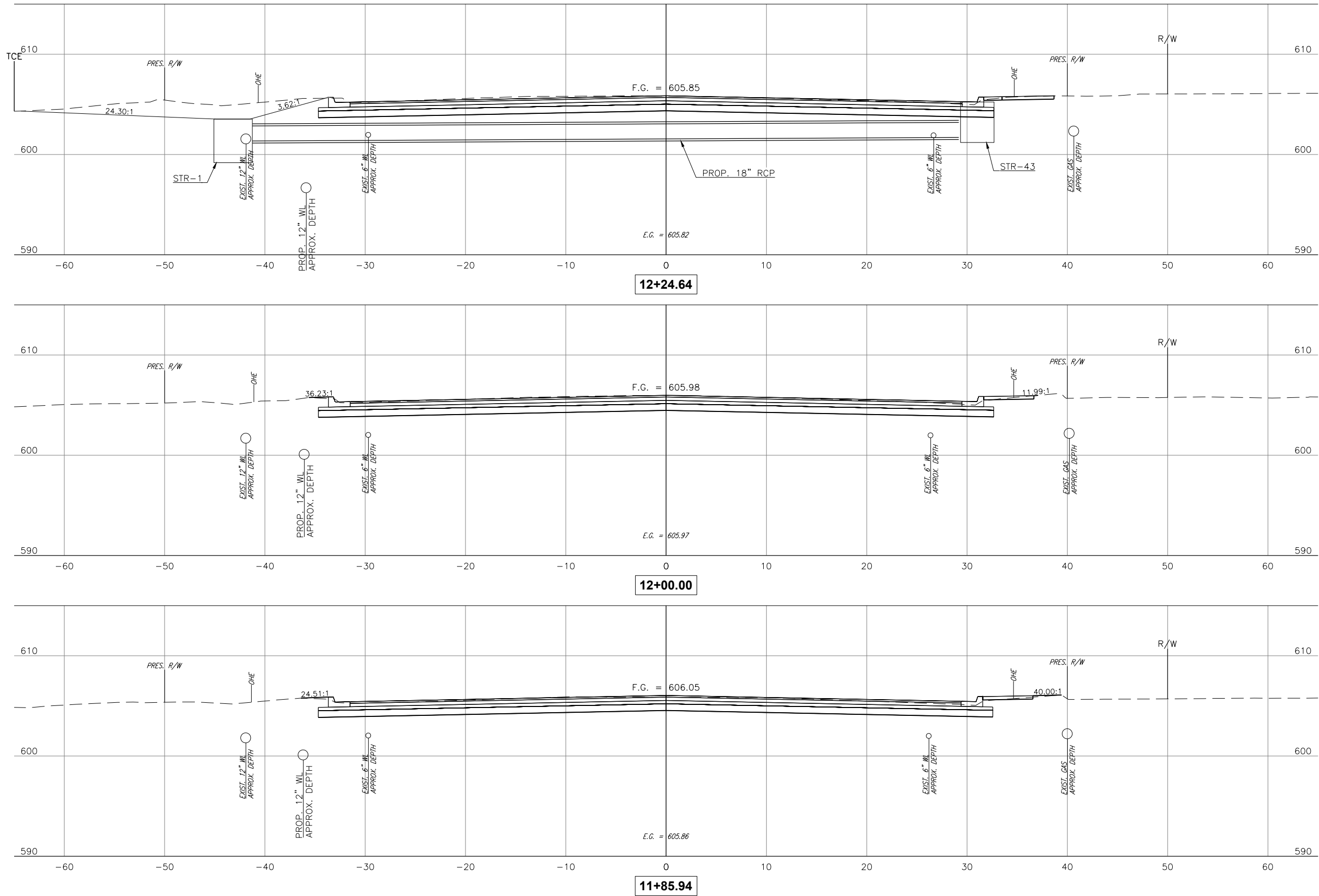
BIXBY, OKLAHOMA

Page 77 of 215



NOTE:
IF JUMPERS OR OTHER CONNECTIONS ARE MADE IN THE FIELD DURING INSTALLATION,
AND ARE ACCEPTED BY THE ENGINEER, THIS SHOULD BE SHOWN ON THE WIRING
DIAGRAM FOR FUTURE REFERENCE.

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
CAN 32 EXPIRES: 2026-06-30

STATE OF OK CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR DISTRIBUTION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO.	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE: AS SHOWN					

131ST ST. - MEMORIAL TO MINGO

SHEET NAME

XS 1

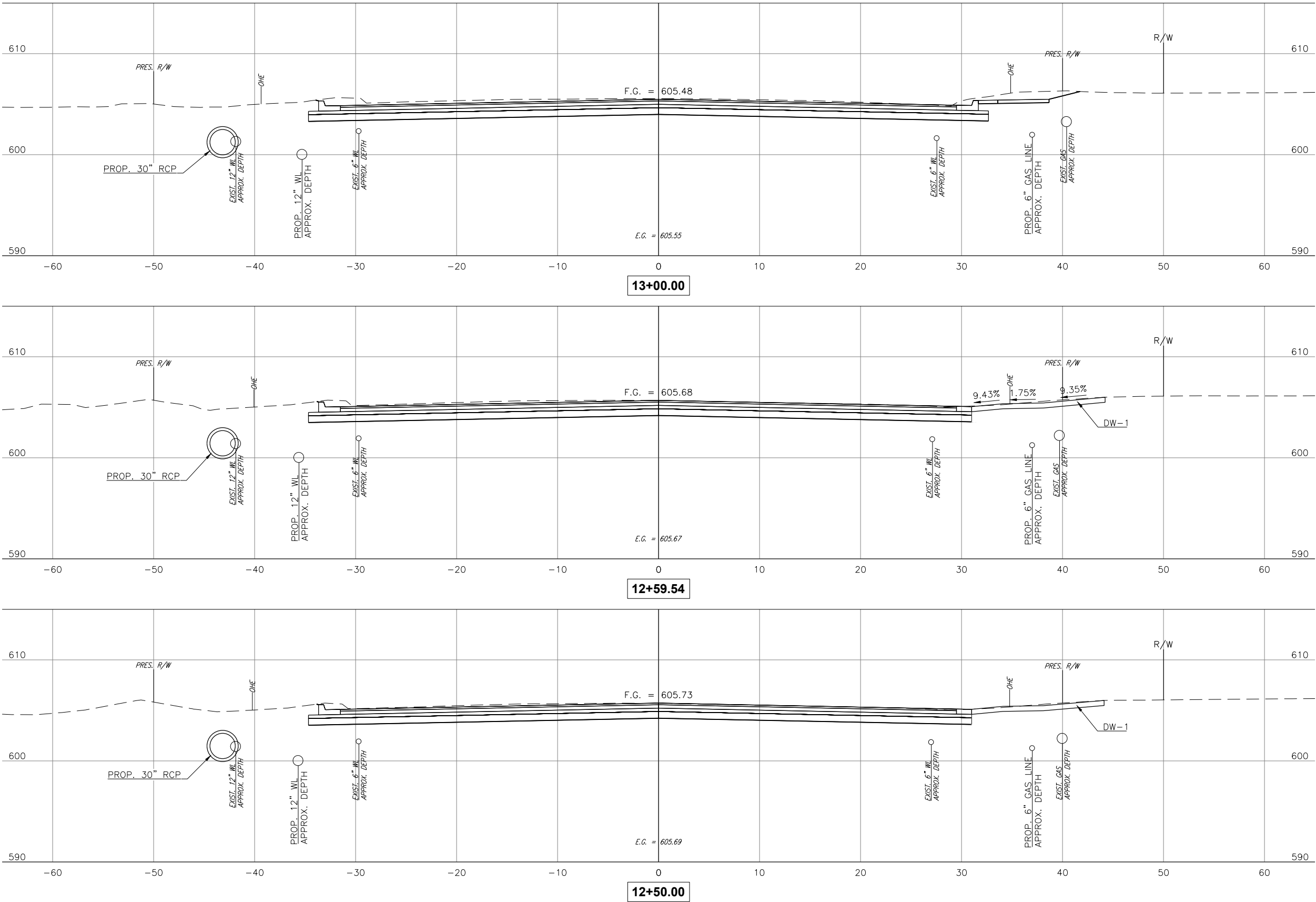
SHEET

XS 1

BIXBY, OKLAHOMA

Page 79 of 215

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG





CEC
CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
CAN 32 EXPIRES: 08/06/30
STATE OF OK CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REUSE OR REPRODUCTION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

PROFESSIONAL
ENGINEER
TULSA, OKLAHOMA

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO.:	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE: AS SHOWN					

131ST ST. - MEMORIAL TO MINGO

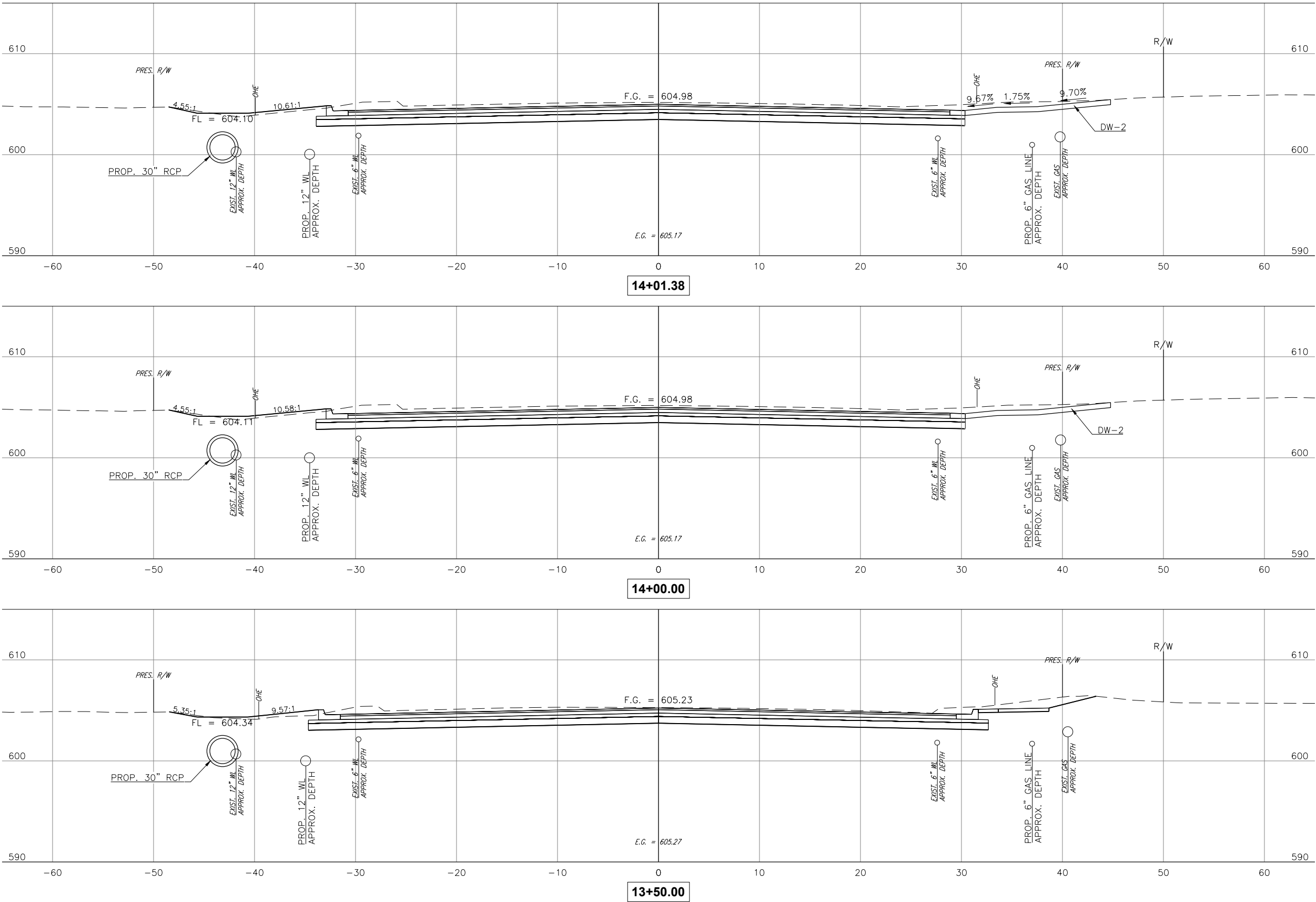
SHEET NAME
XS 2

SHEET
XS 2

BIXBY, OKLAHOMA

Page 80 of 215

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG





CEC

CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
CAN 12 EXPIRES: 08/06/30

STATE OF OK CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO.:	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE: AS SHOWN					

131ST ST. - MEMORIAL TO MINGO

SHEET NAME

XS 3

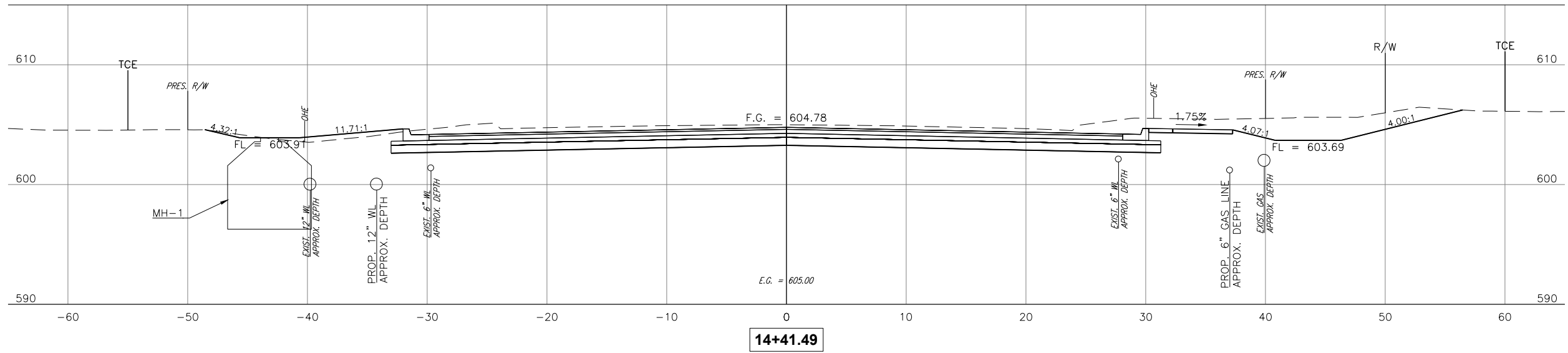
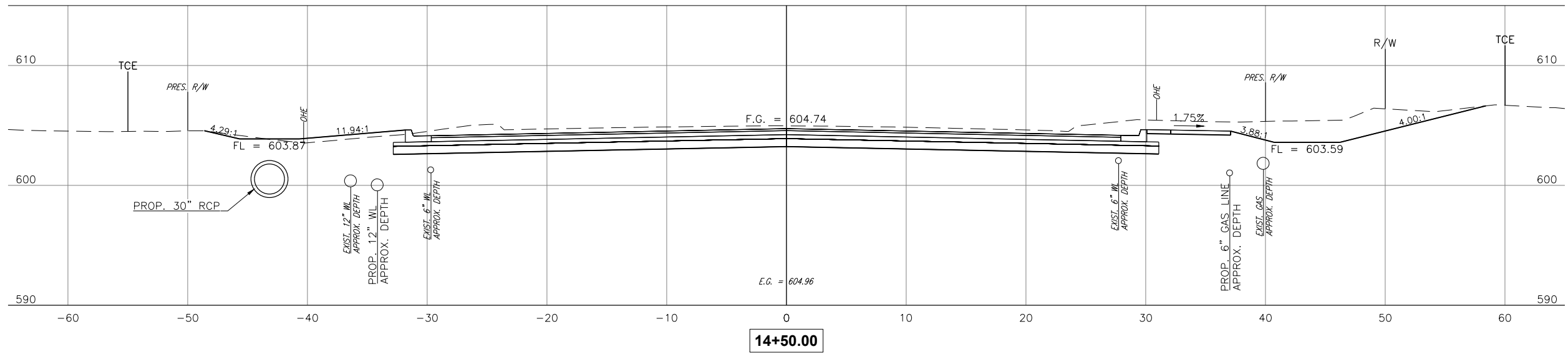
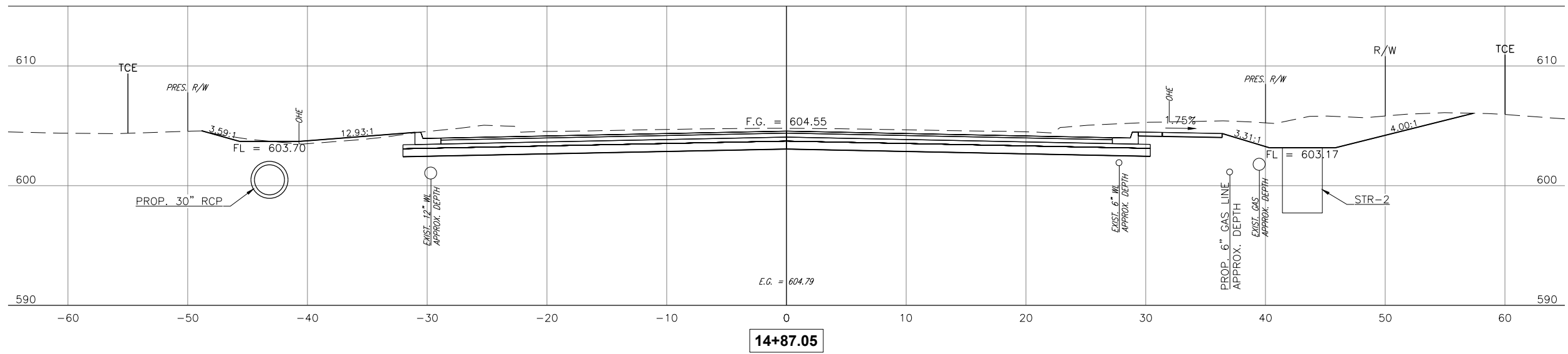
SHEET

XS 3

BIXBY, OKLAHOMA

Page 81 of 215

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



OK CORPORATION
10000 NORTH
TULSA, OKLAHOMA 74119
P. 918.863.9401
WWW.CONNECTCOC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAP. 32. EXPIRES: 2020-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



SUBMITTAL:		PRELIMINARY	REVISION HISTORY	
DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE
	170231.0102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:	S.N.H.			
SCALE:	AS SHOWN			

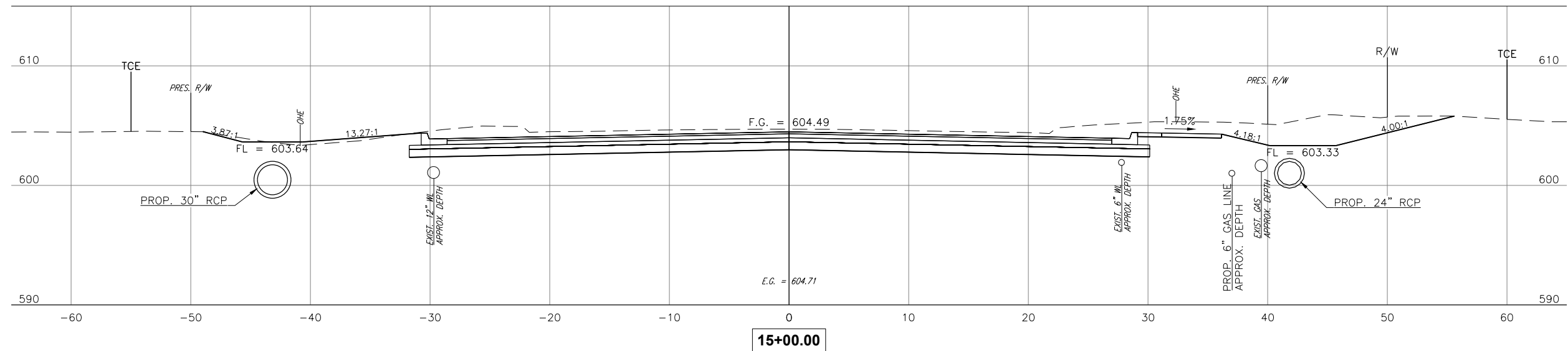
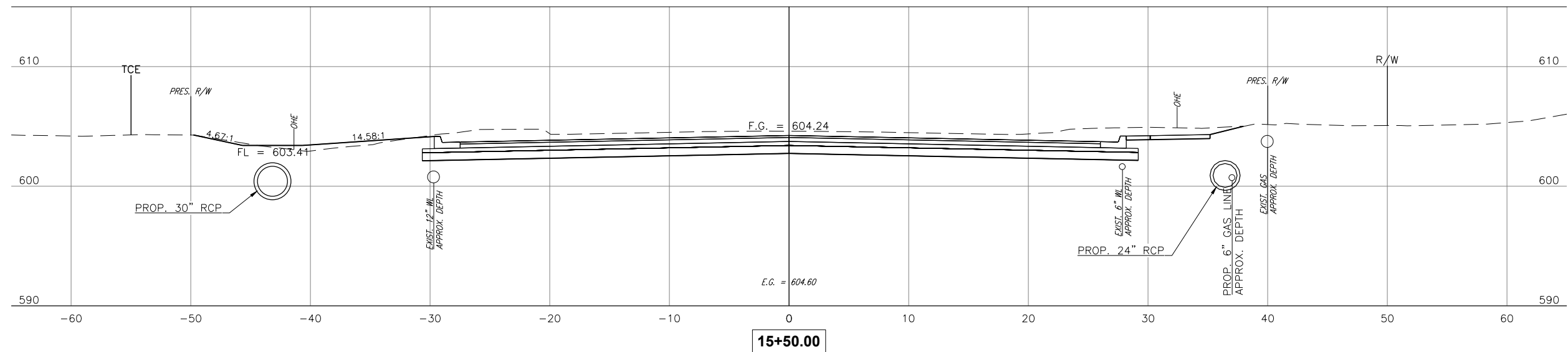
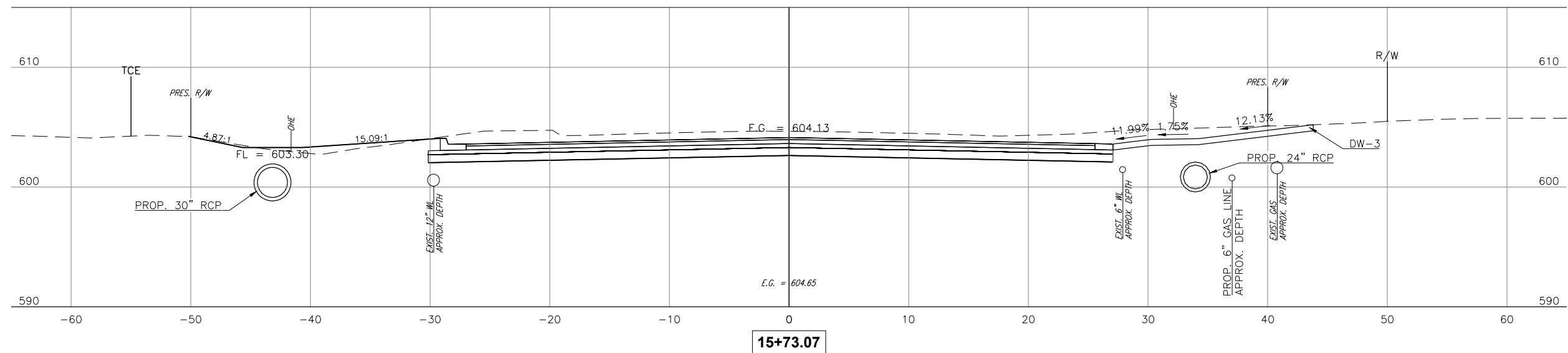
131ST ST. - MEMORIAL TO MINGO

SHEET NAME

XS 4

SHEET
XS 4

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



CEC CORPORATION
1300 S MAIN STREET
TULSA, OKLAHOMA 74119
P. 918.463.0400
WWW.CONNECTCEC.COM

STATE OF OK. CERTIFICATE OF AUTHORIZATION
CAM 32 EXPIRES: 2020-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



SUBMITTAL:		PRELIMINARY	REVISION HISTORY		
DATE:	11/30/2023		NO.	DESCRIPTION	DATE
PROJECT NO:	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

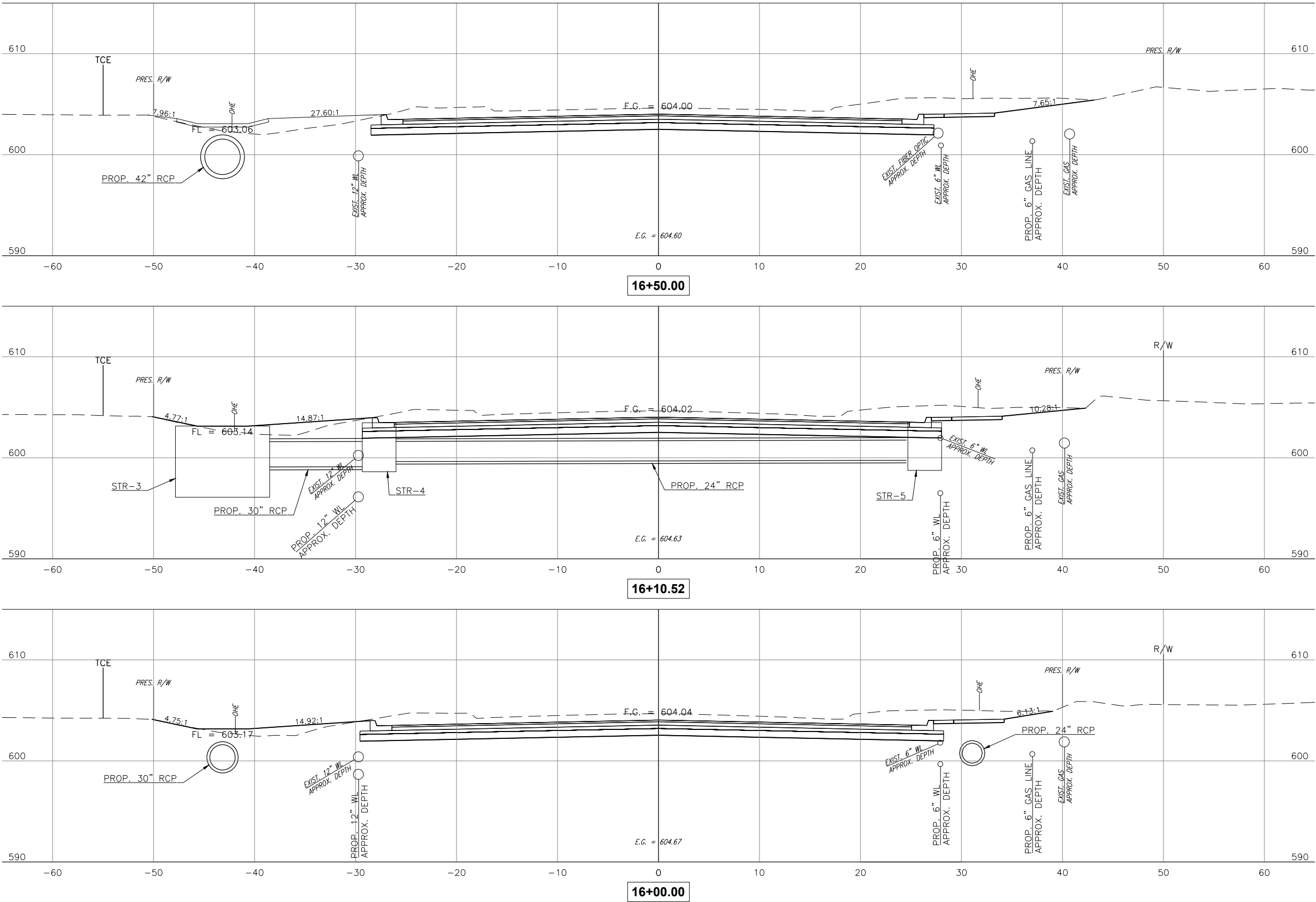
131ST ST. - MEMORIAL TO MINGO

SHEET NAME

XS 5

SHEET
XS 5

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
CAN 32 EXPIRES: 2024-06-30
STATE OF OK CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO.	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE: AS SHOWN					

131ST ST. - MEMORIAL TO MINGO

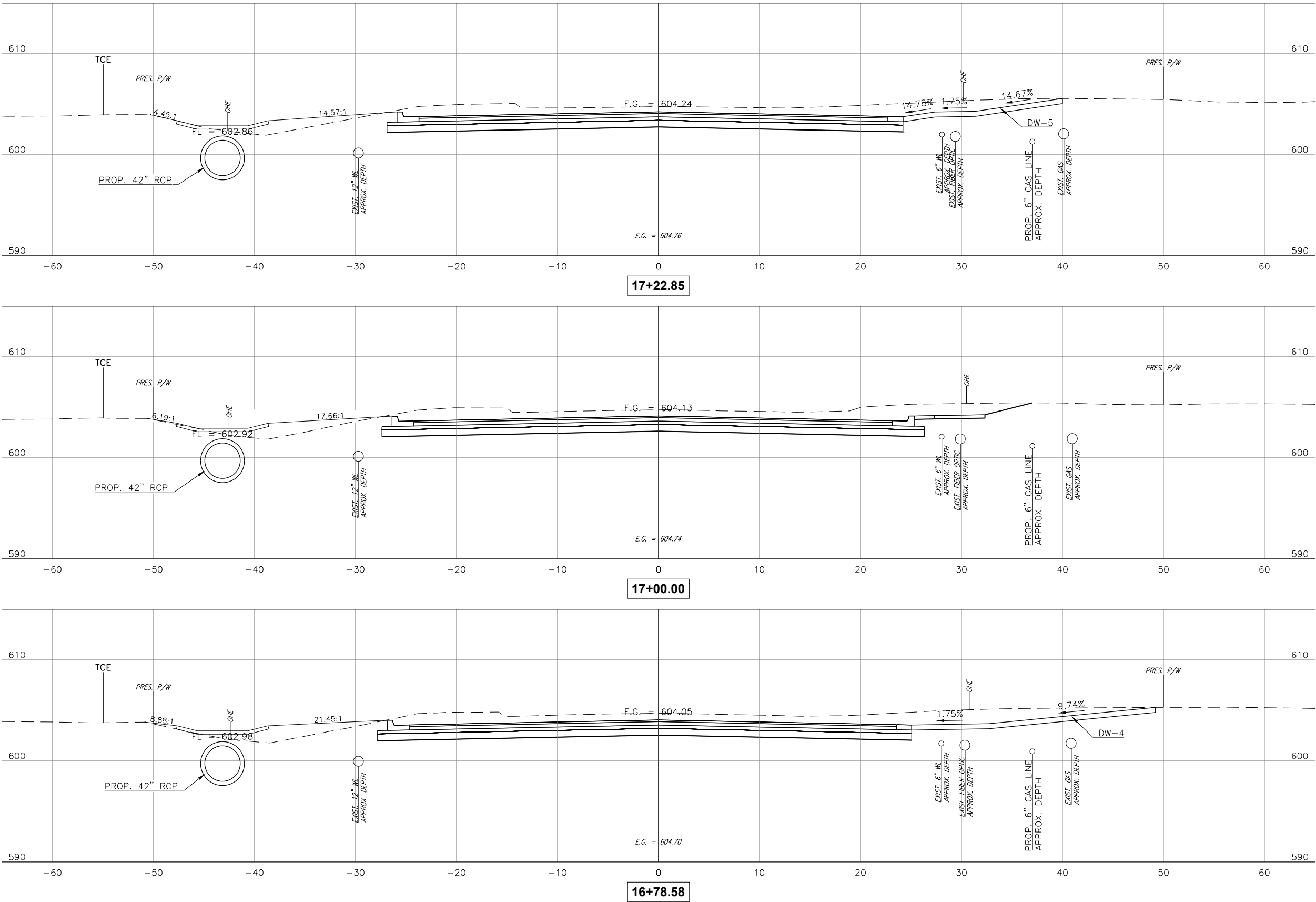
SHEET NAME
XS 6

SHEET
XS 6

BIXBY, OKLAHOMA

Page 84 of 215

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXTEC.COM
CAN 32 EXPIRES: 2024-06-30
STATE OF OK CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE:	AS SHOWN				

131ST ST. - MEMORIAL TO MINGO

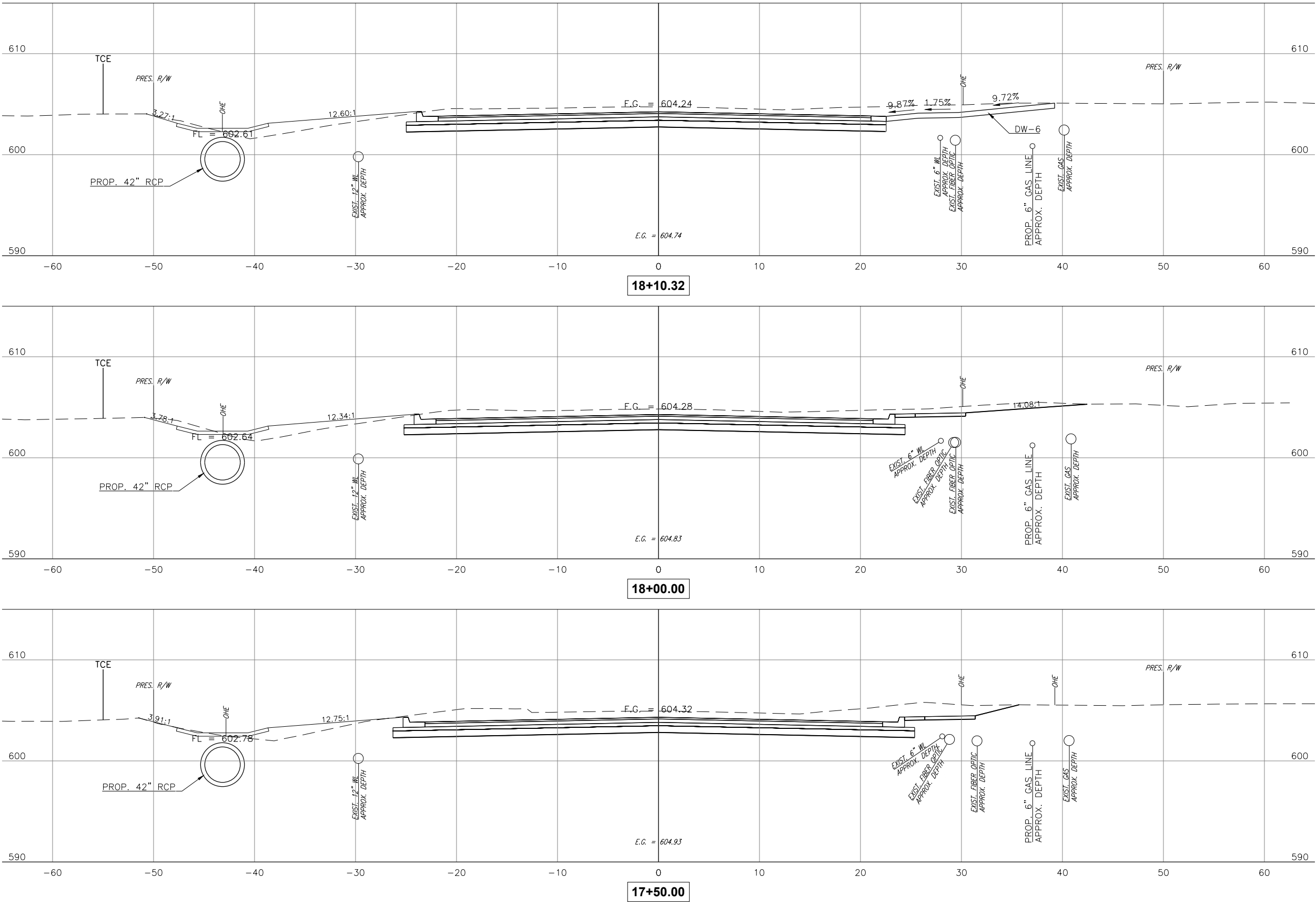
SHEET NAME
XS 7

SHEET
XS 7

BIXBY, OKLAHOMA

Page 85 of 215

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
CAN 32 EXPIRES: 2004-06-30

STATE OF OK CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT.
NO PART OF THIS DOCUMENT MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT.

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO.:	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE: AS SHOWN					

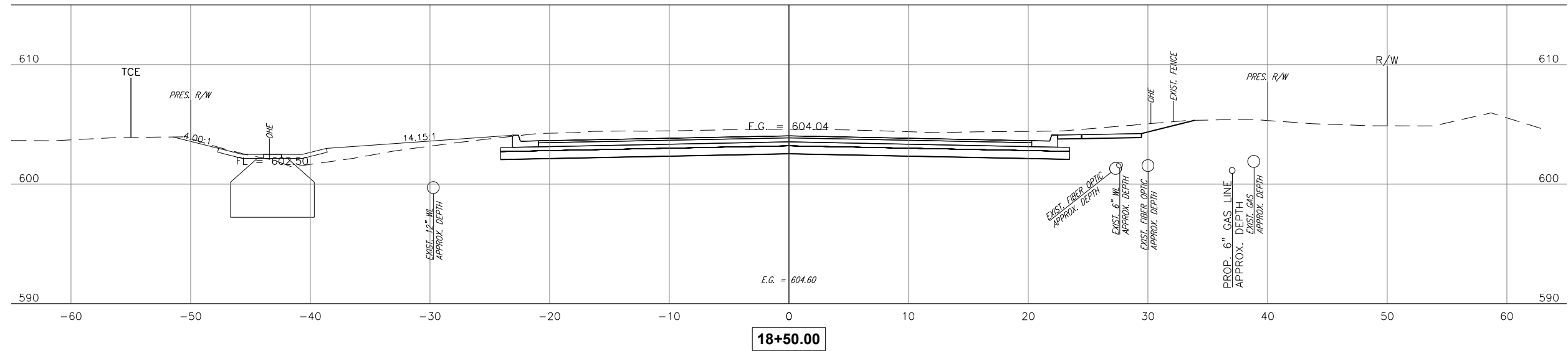
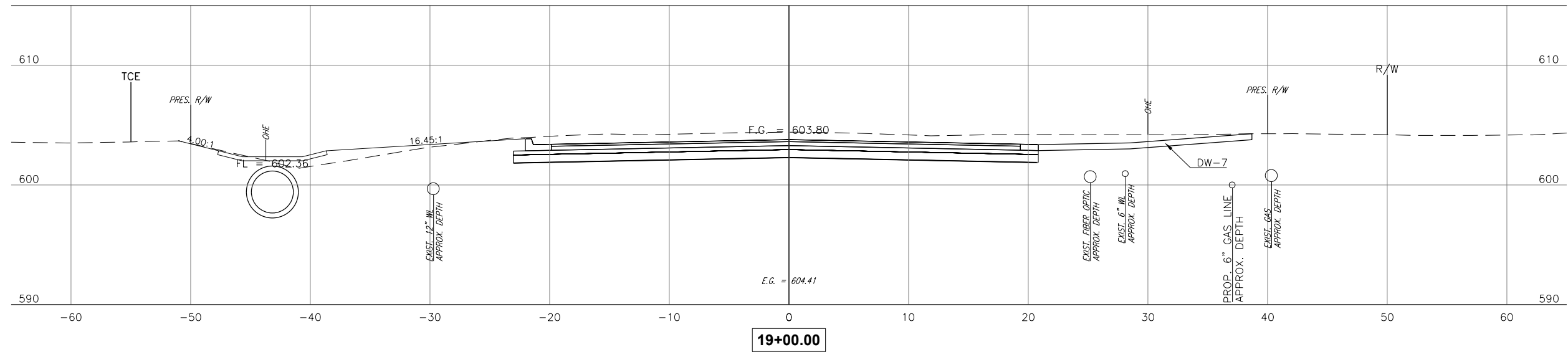
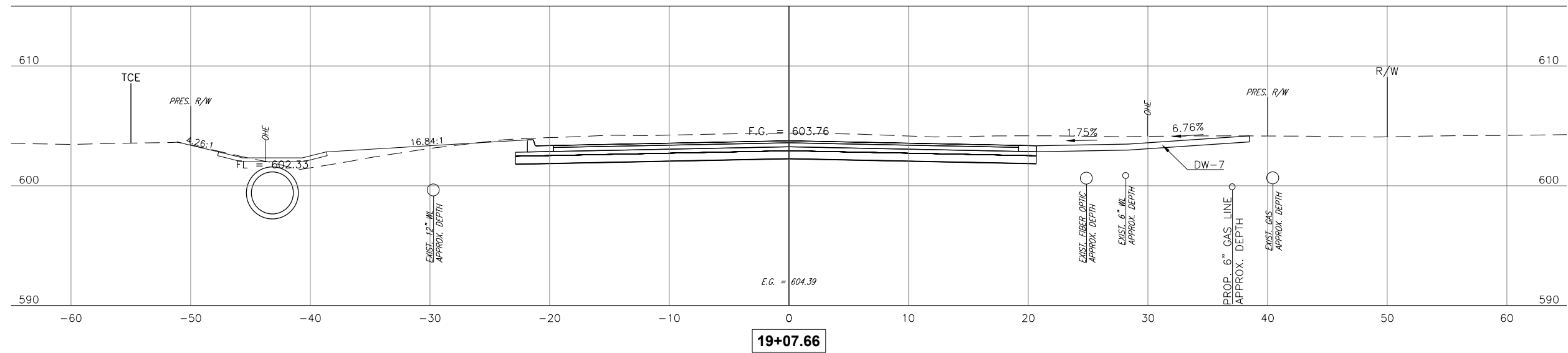
131ST ST. - MEMORIAL TO MINGO

SHEET NAME XS 8

SHEET XS 8

BIXBY, OKLAHOMA

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



1300 S. MAIN STREET
TULSA, OKLAHOMA 74119
P. 918.603.9601
WWW.CONNECTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAP. 32 EXPIRES: 2020-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



SUBMITTAL:		PRELIMINARY	REVISION HISTORY		
DATE:	11/30/2023		NO.	DESCRIPTION	DATE
PROJECT NO:	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

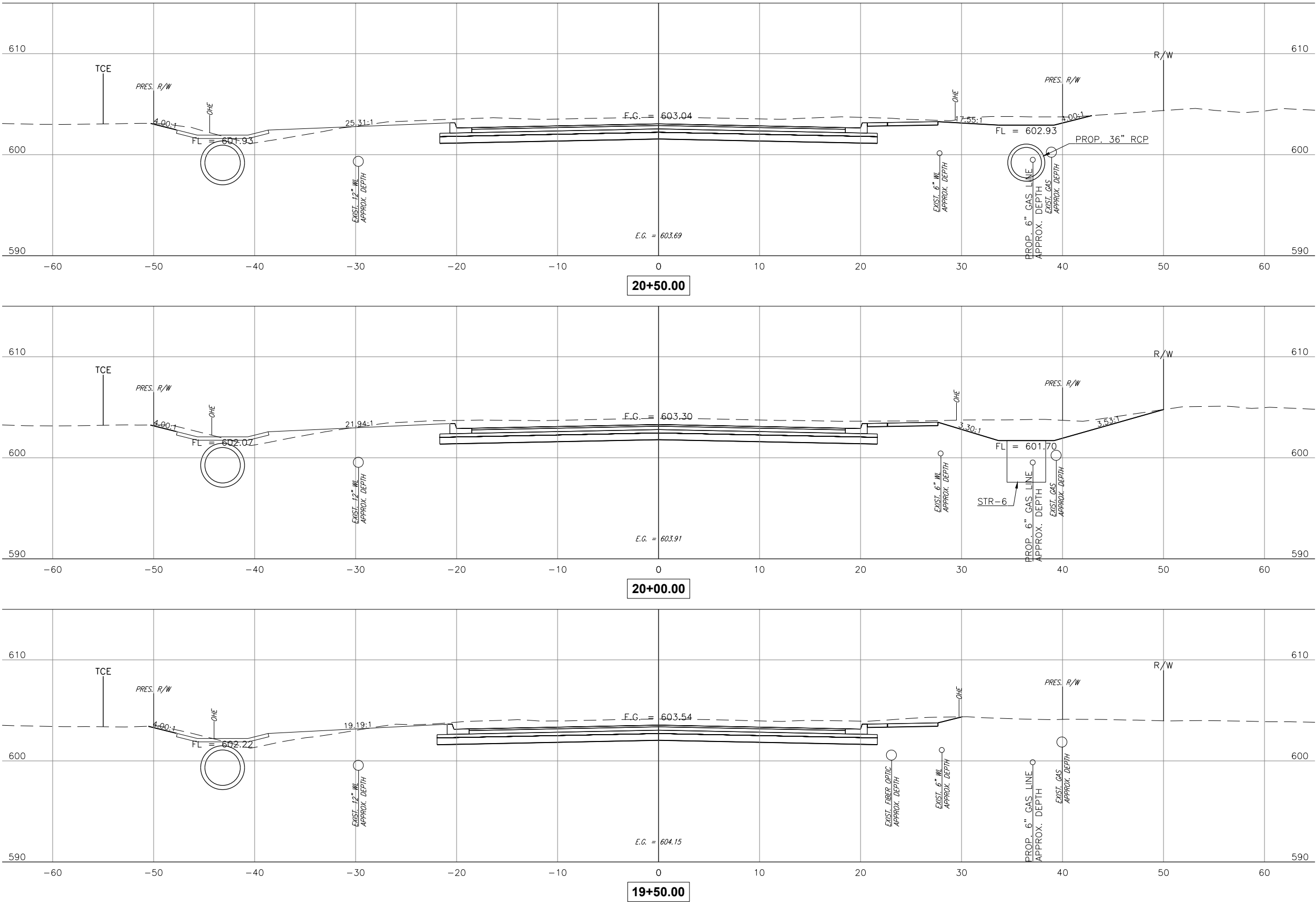
131ST ST. - MEMORIAL TO MINGO

SHEET NAME

XS 9

SHEET
XS 9

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXTEC.COM
STATE OF OK CERTIFICATE OF AUTHORIZATION
CAB 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR TRANSMISSION OF THIS
DRAWING WITHOUT THE WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO:	DATE:	PROJECT NO:	NO.	DESCRIPTION
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE: AS SHOWN					

131ST ST. - MEMORIAL TO MINGO

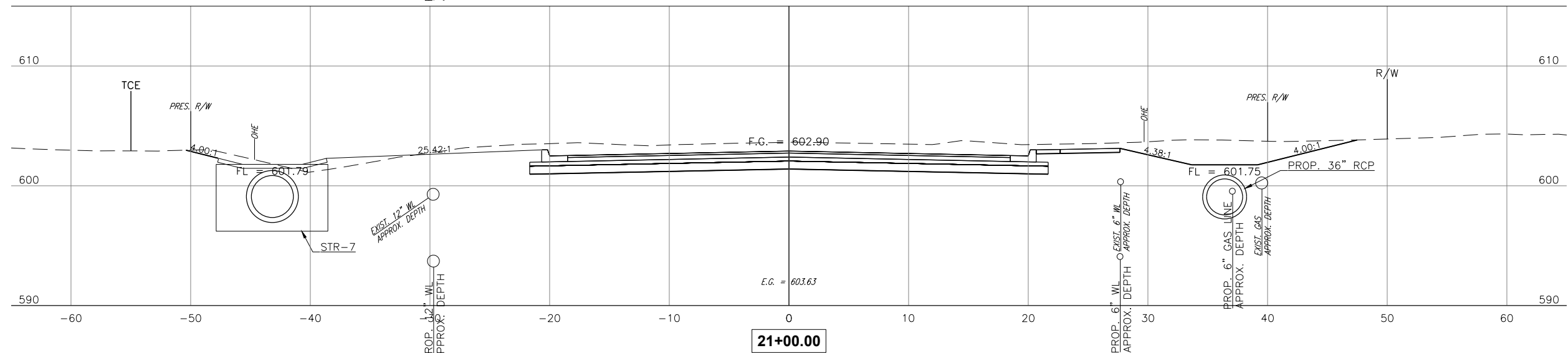
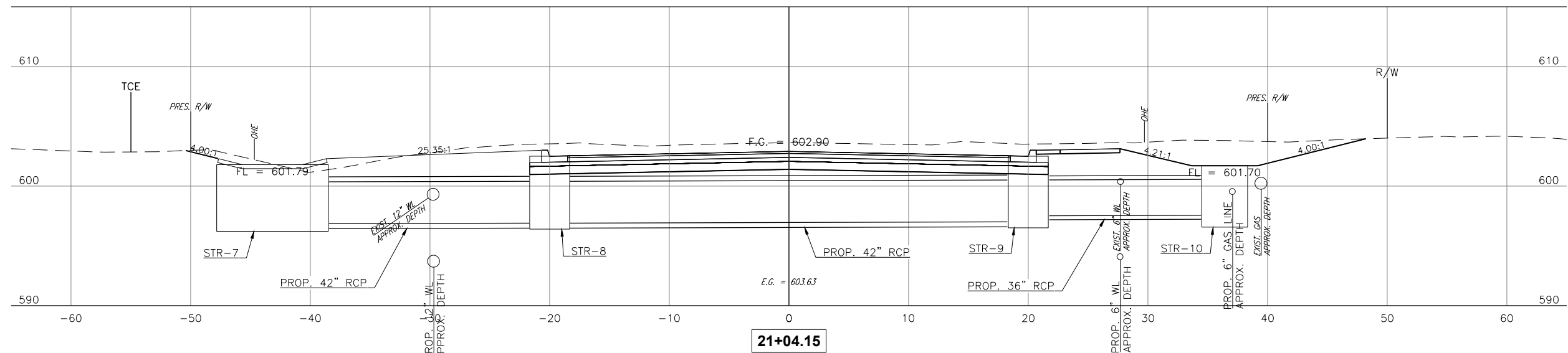
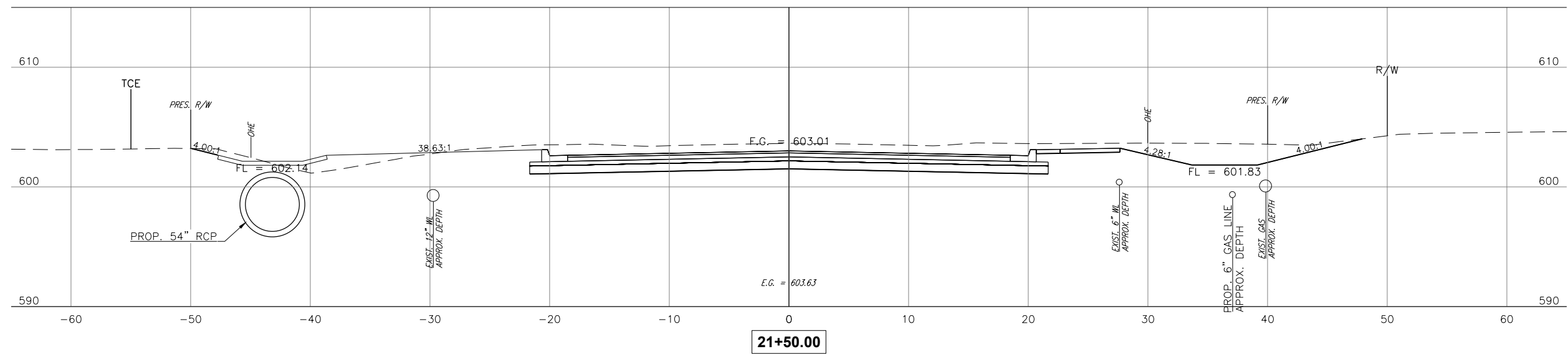
SHEET NAME
XS 10

SHEET
XS 10

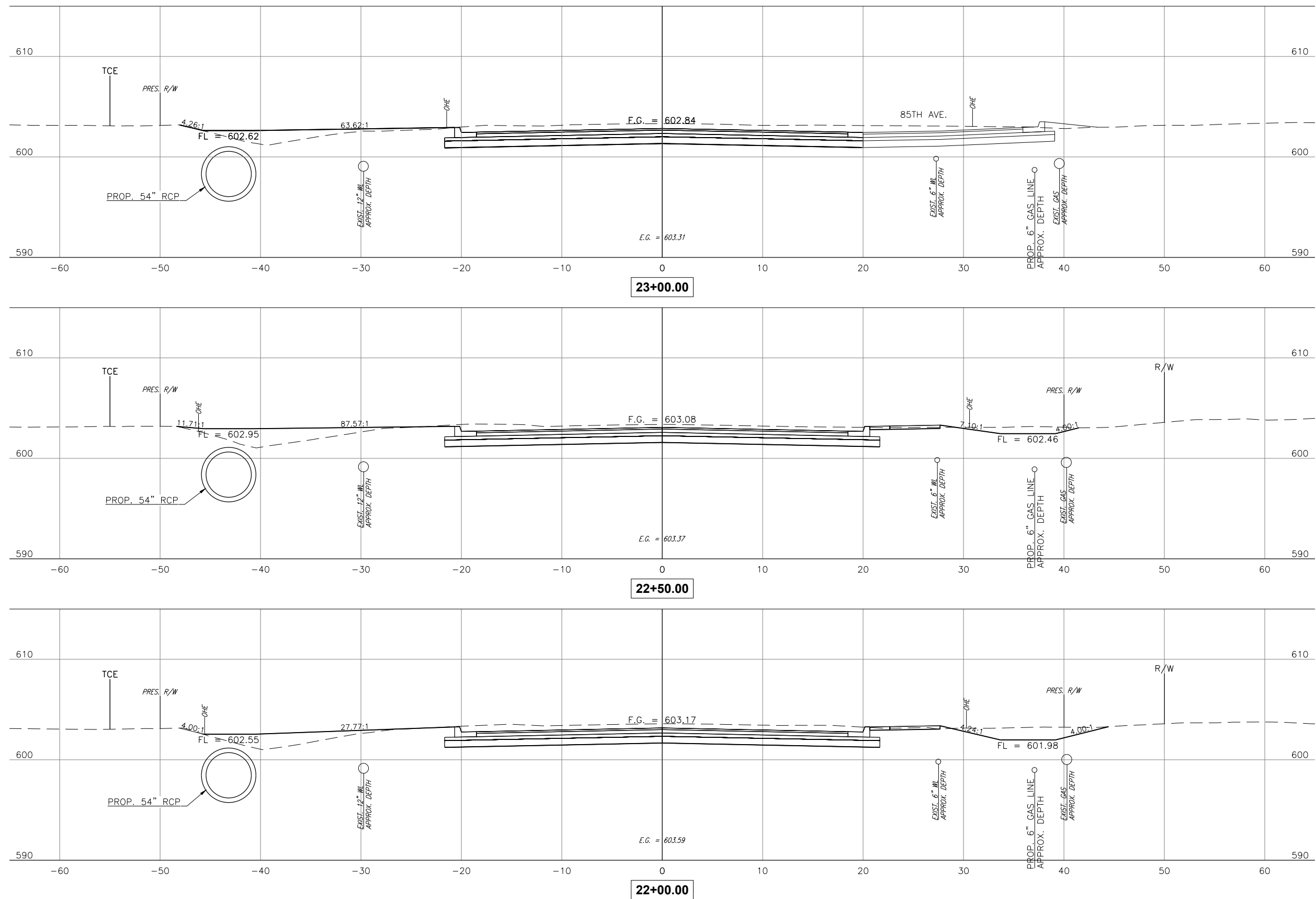
BIXBY, OKLAHOMA

Page 88 of 215

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



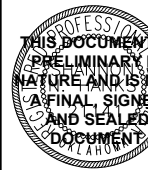
PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



CEC CORPORATION
1300 S. MAIN STREET
TULSA, OKLAHOMA 74119
P. 918.083.9401
WWW.CONNECTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAP 32 EXPIRES: 06/26/06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT THE WRITTEN PERMISSION OF CEC
IS PROHIBITED.



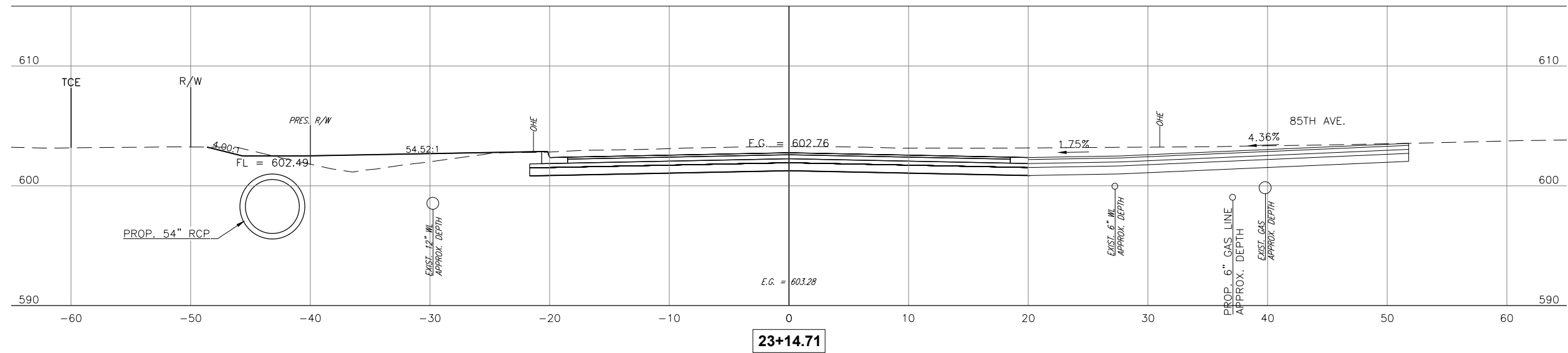
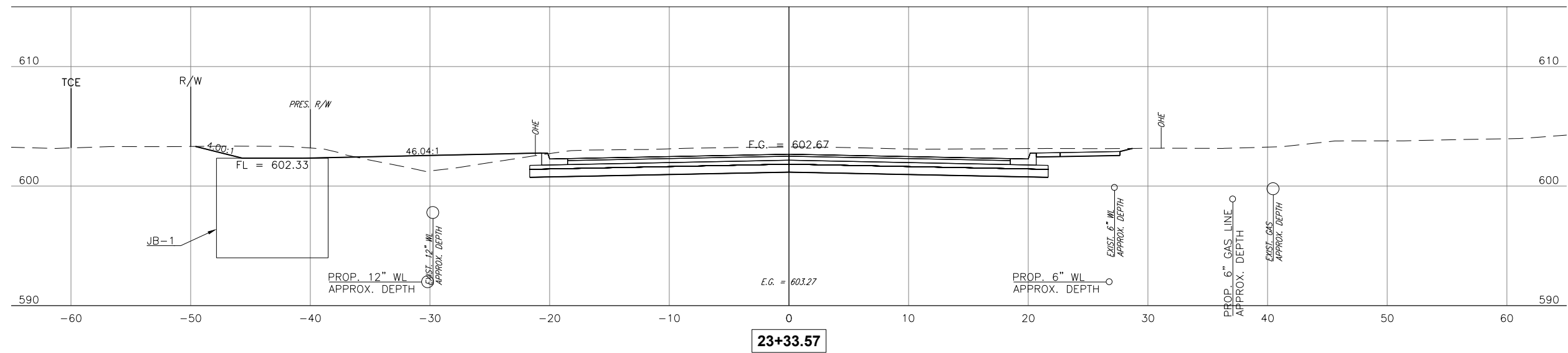
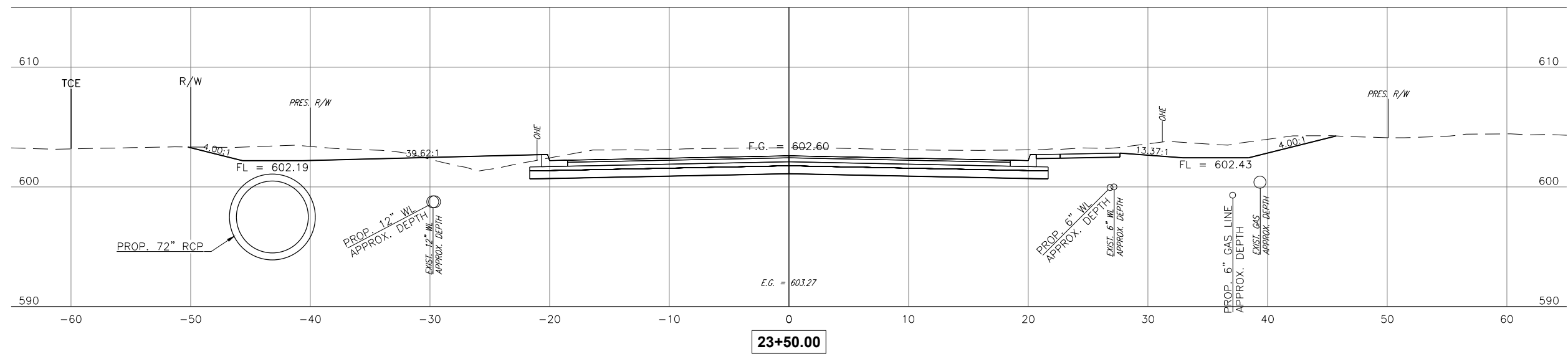
SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	11/30/2023	NO.	DESCRIPTION	DATE	
PROJECT NO:	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
CHECKED BY:	J.L.C.				

131ST ST. - MEMORIAL TO MINGO

SHEET NAME
XS 12

SHEET
XS 12

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



CEC CORPORATION
1300 S MAIN STREET
TULSA OKLAHOMA 74119
P. 918.463.0461
WWW.CONNECTCEC.COM

STATE OF OK. CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES 02/26/06-05-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



SUBMITTAL:		PRELIMINARY	REVISION HISTORY		
DATE:	PROJECT NO:		NO.	DESCRIPTION	DATE
	170231.0102				
	DESIGNED BY:	J.L.C.			
	DRAWN BY:	J.L.C.			
	APPROVED BY:	S.N.H.			
	SCALE:	AS SHOWN			

131ST ST. - MEMORIAL TO MINGO

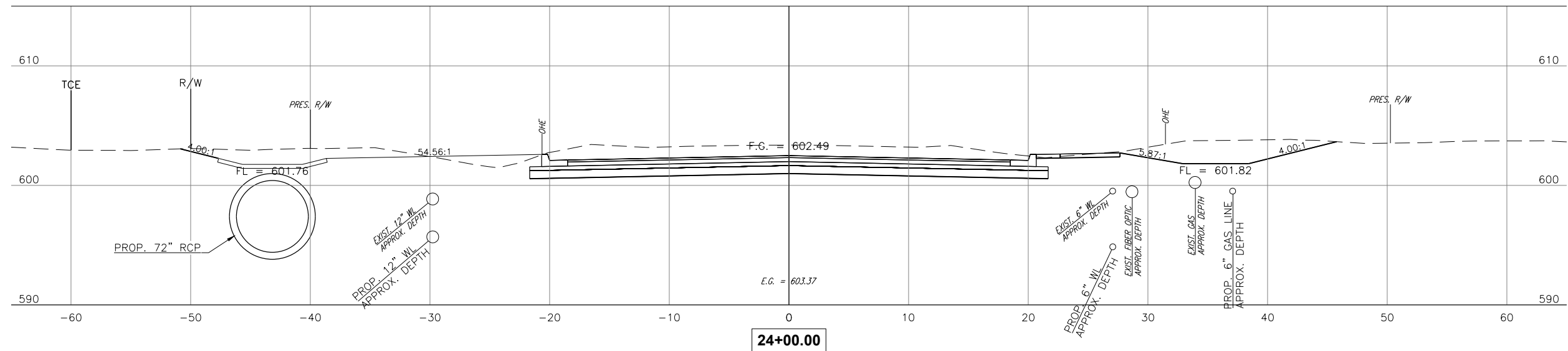
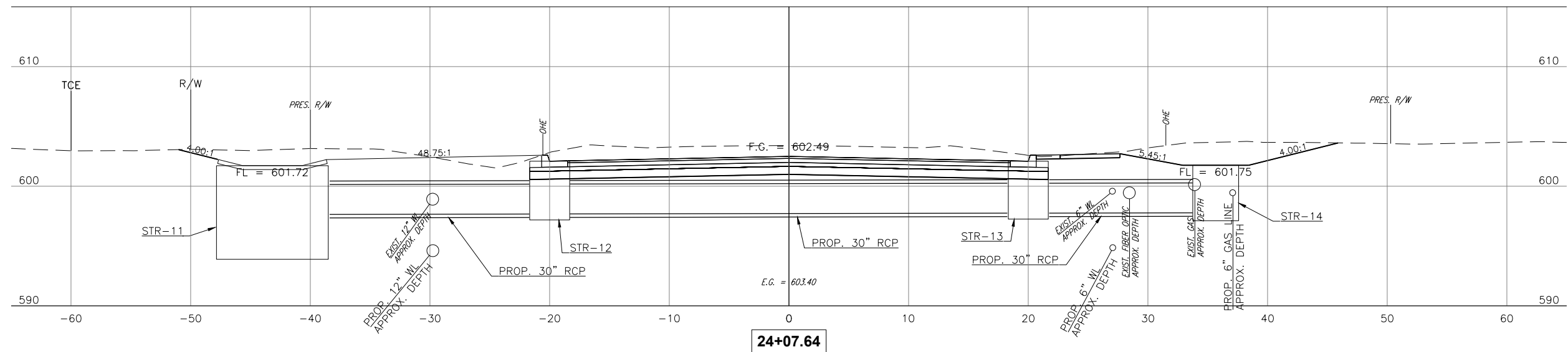
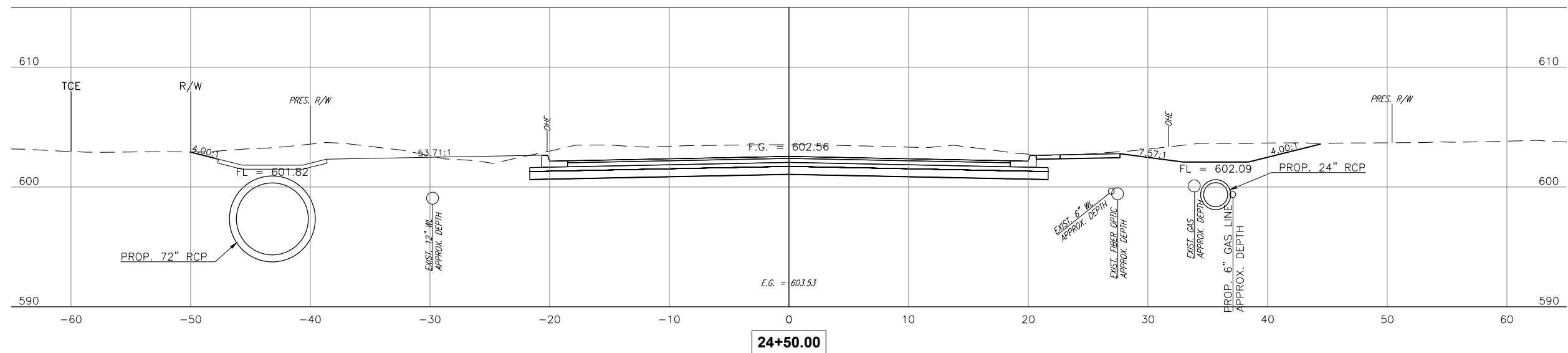
SHEET NAME

XS 13

SHEET

XS 13

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



CEC CORPORATION
1300 S MAIN STREET
TULSA OKLAHOMA 74119
P 918 483 0461
WWW.CONNECTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES 02/26/06-05-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



SUBMITTAL:		PRELIMINARY	REVISION HISTORY		
DATE:	11/30/2023		NO.	DESCRIPTION	DATE
PROJECT NO:	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

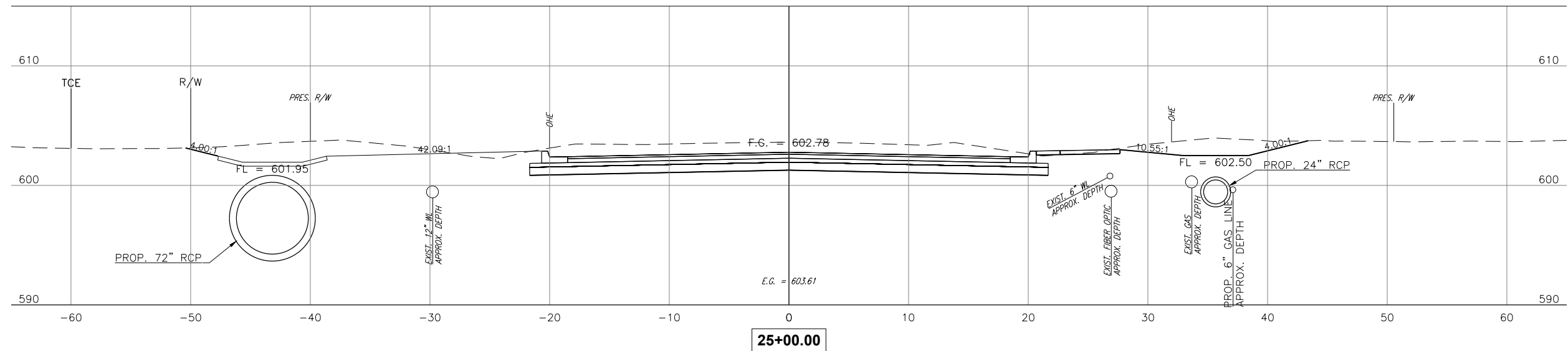
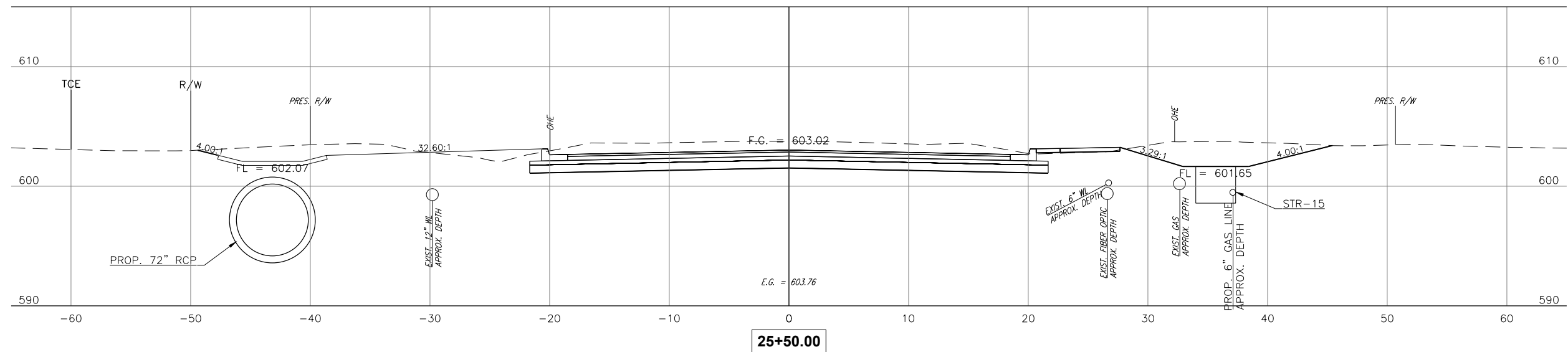
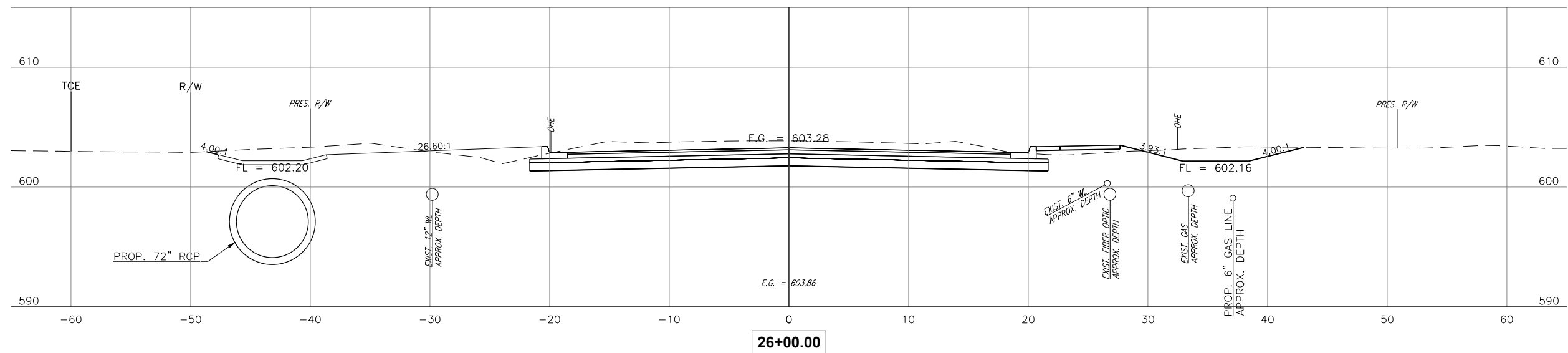
131ST ST. - MEMORIAL TO MINGO

SHEET NAME

XS 14

XS 14

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



CEC CORPORATION
1300 S MAIN STREET
TULSA OKLAHOMA 74119
P. 918.463.0461
WWW.CONNECTCEC.COM

STATE OF OK. CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES 02/26/06-05-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



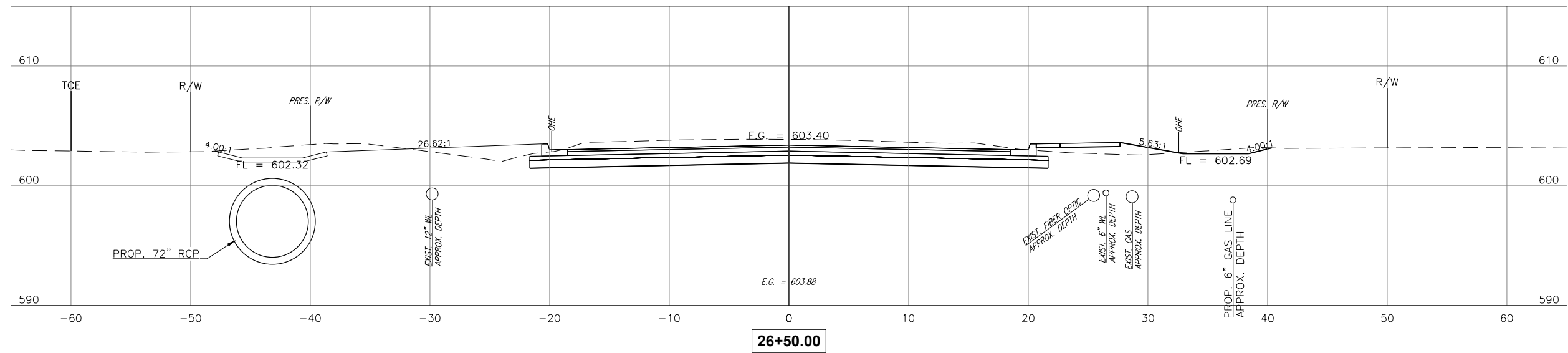
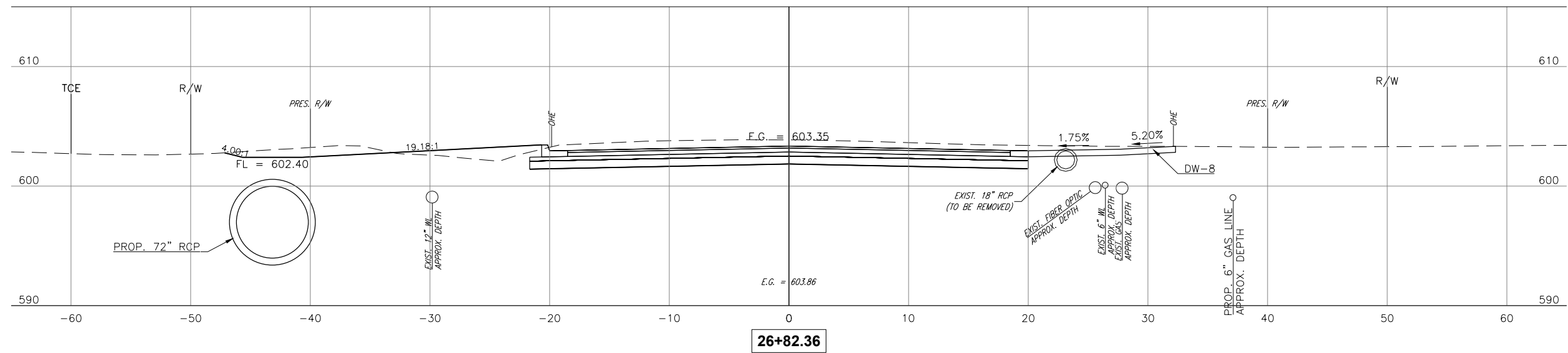
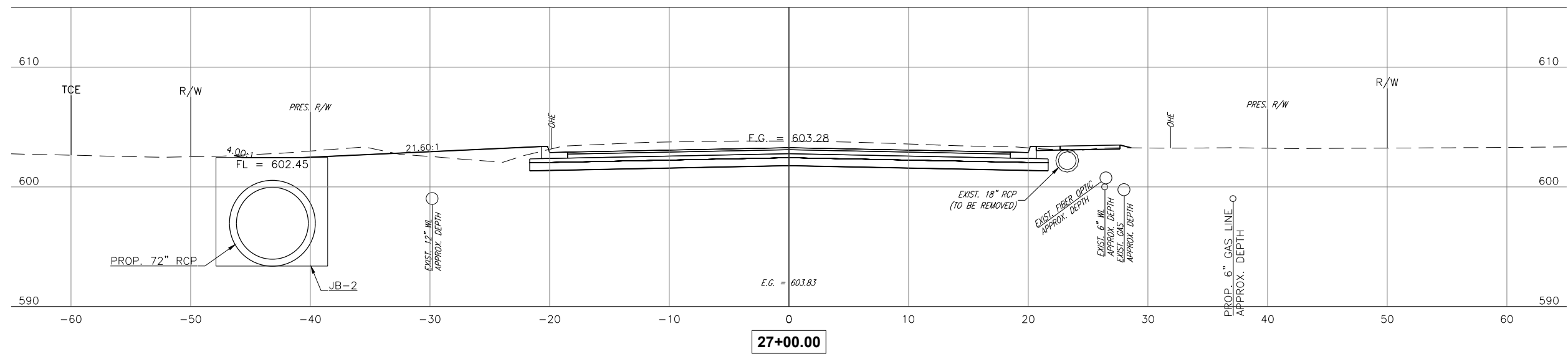
SUBMITTAL:		PRELIMINARY	REVISION HISTORY	
DATE:	11/30/2023.		NO.	DESCRIPTION
PROJECT NO:	170231 0 102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:	S.N.H.			
SCALE:	AS SHOWN			
				DATE

131ST ST. - MEMORIAL TO MINGO

SHEET NAME

SHEET
XS 15

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



1300 S. MAIN STREET
TULSA, OKLAHOMA 74119
P. 918.683.9401
WWW.CONNECTTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAP. 32 EXPIRES: 02/28/2030

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



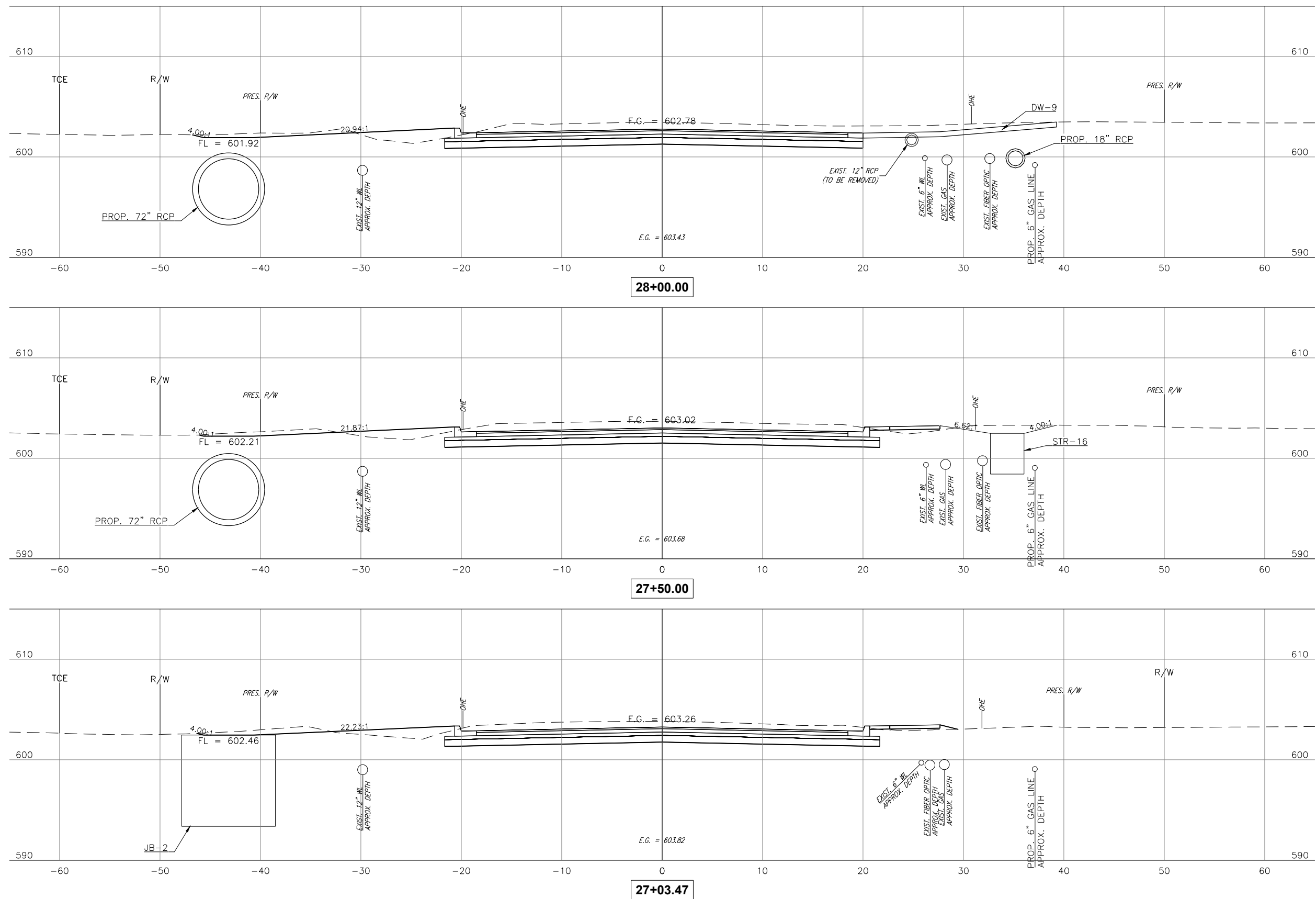
SUBMITTAL:		PRELIMINARY	REVISION HISTORY		
DATE:	PROJECT NO:	11/30/2023	NO.	DESCRIPTION	DATE
	DESIGNED BY:	170231.0102			
		J.L.C.			
	DRAWN BY:				
		J.L.C.			
	APPROVED BY:				
		S.N.H.			
	SCALE:	AS SHOWN			

131ST ST. - MEMORIAL TO MINGO

SHEET NAME

SHEET
XS 16

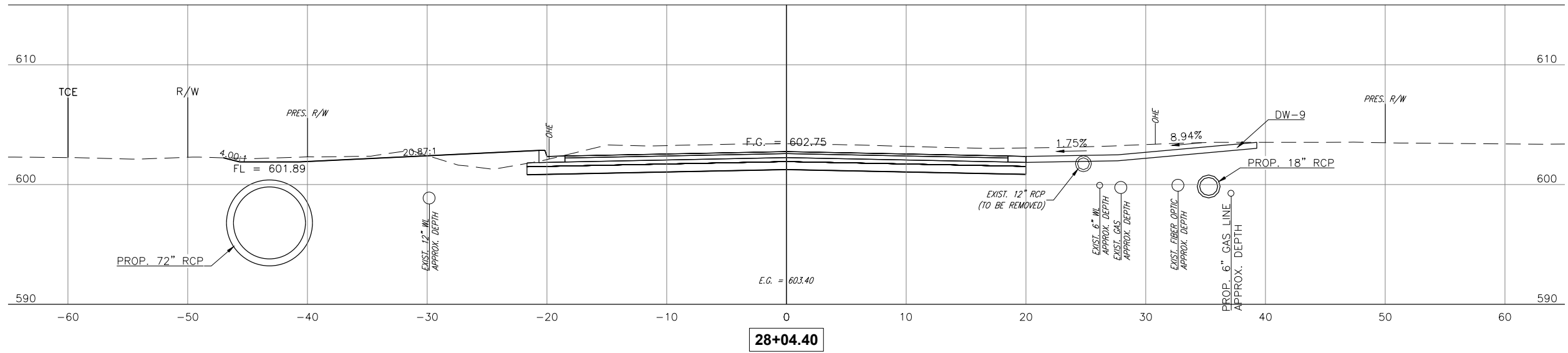
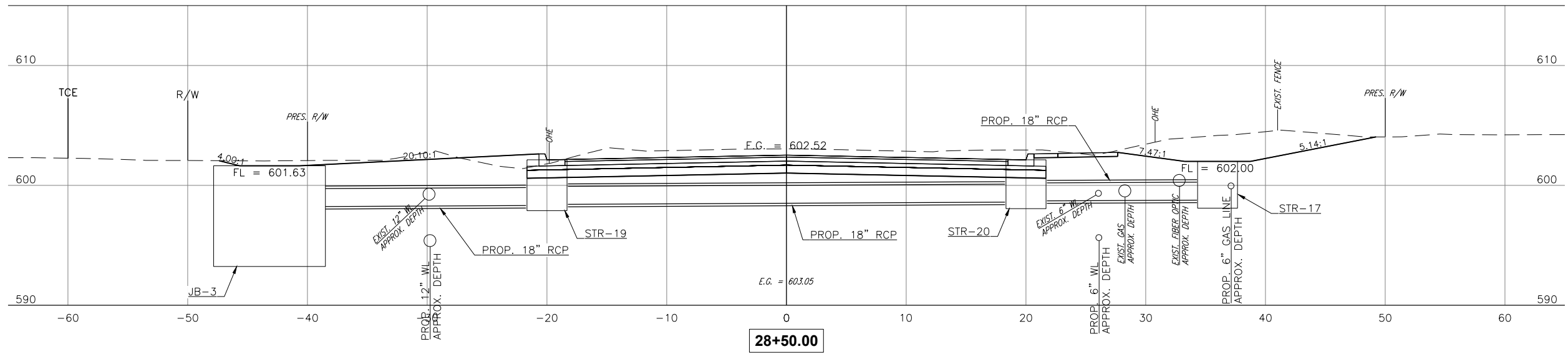
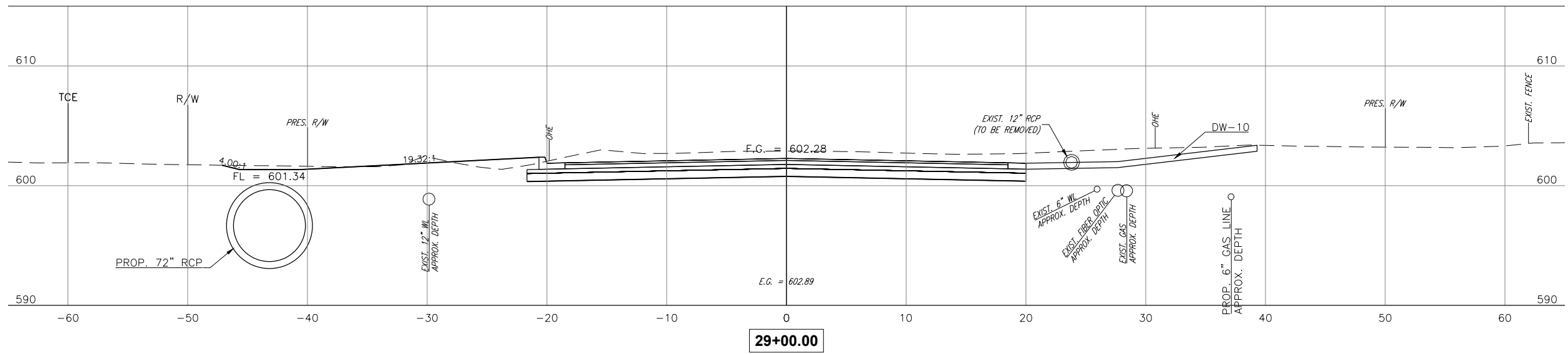
PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



SUBMITTAL:		PRELIMINARY	REVISION HISTORY	
DATE:	11/30/2023		NO.	DESCRIPTION
PROJECT NO:	170231.0102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:	S.N.H.			
SCALE:	AS SHOWN			

131ST ST. - MEMORIAL TO MINGO	BIXBY, OKLAHOMA
SHEET NAME	
XS 17	
SHEET	
XS 17	

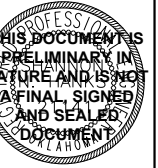
PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



1300 S. MAIN STREET
TULSA, OKLAHOMA 74119
P: 918.663.9401
WWW.CONNECTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAB 32 EXPIRES: 2034-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



SUBMITTAL:		PRELIMINARY	REVISION HISTORY	
DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE
	DESIGNED BY: J.L.C.			
	DRAWN BY: J.L.C.			
	APPROVED BY: S.N.H.			
	SCALE:	AS SHOWN		

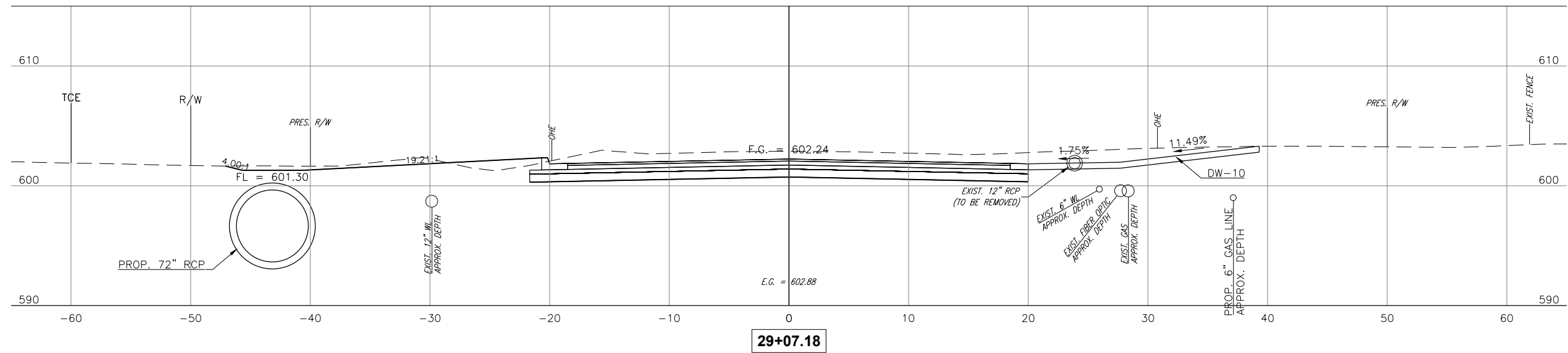
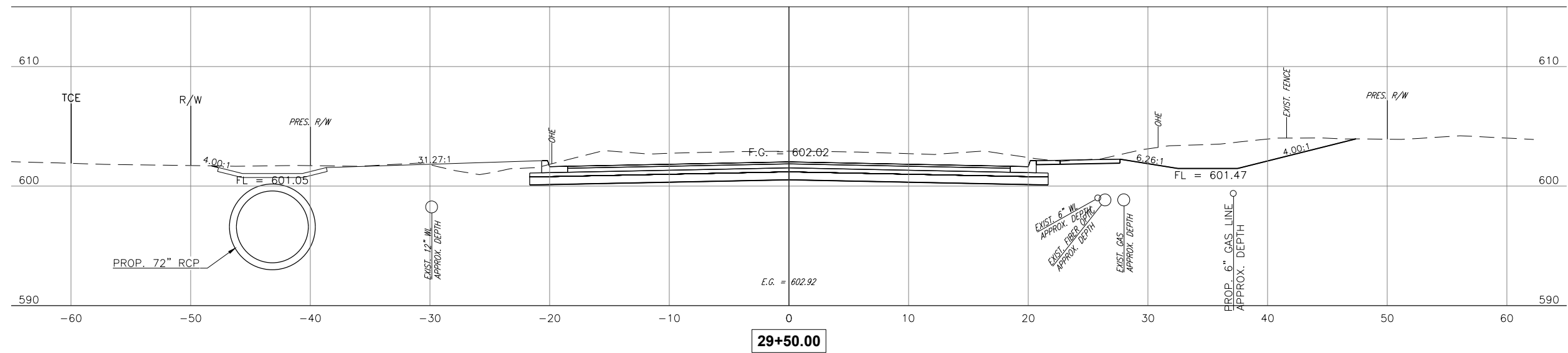
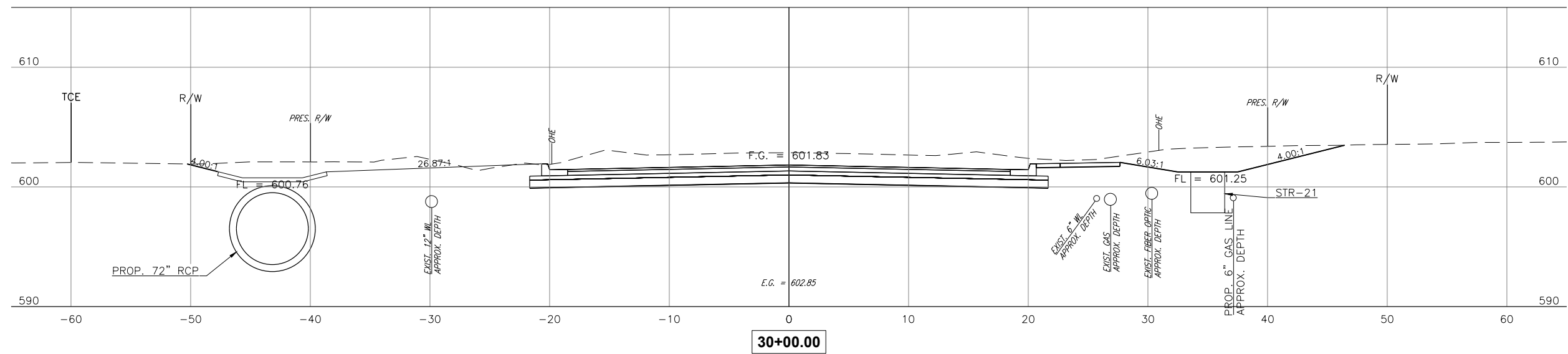
131ST ST. - MEMORIAL IO MINGO

SHEET NAME

SHEET

KS 18

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



CEC CORPORATION
1300 S MAIN STREET
TULSA OKLAHOMA 74119
P. 918.463.0461
WWW.CONNECTCEC.COM

STATE OF OK. CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES 02/26/06-05-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



SUBMITTAL:		PRELIMINARY	REVISION HISTORY		
DATE:	PROJECT NO:		NO.	DESCRIPTION	DATE
	170231.0102				
	DESIGNED BY:	J.L.C.			
	DRAWN BY:	J.L.C.			
	APPROVED BY:	S.N.H.			
	SCALE:	AS SHOWN			

131ST ST. - MEMORIAL TO MINGO

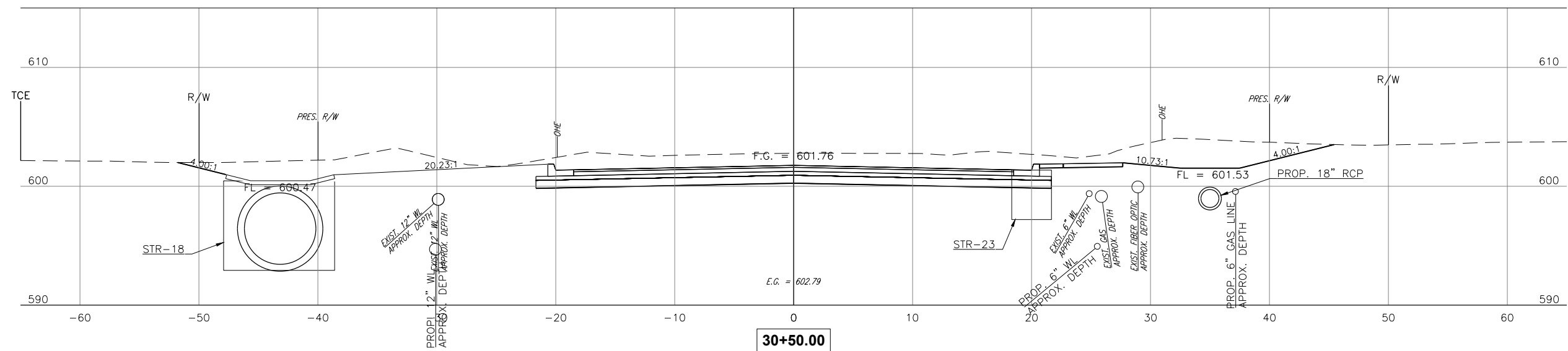
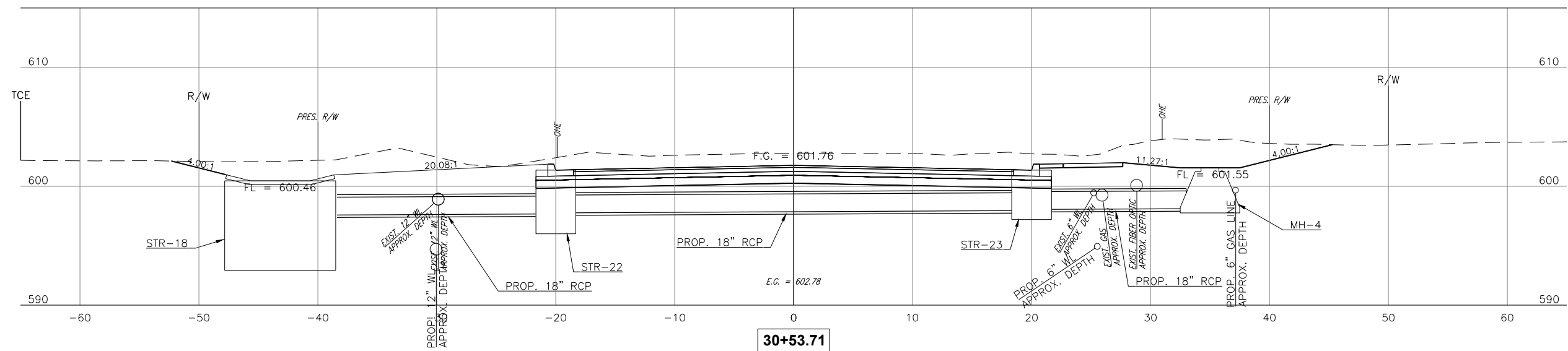
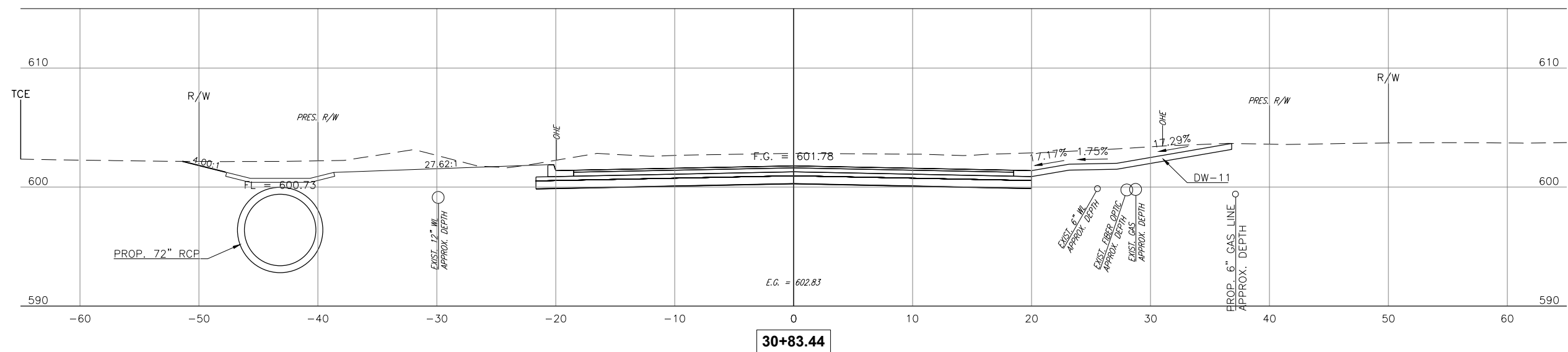
SHEET NAME

SHEET

XS 19

~~Page 97 of 215~~

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



CEC CORPORATION
1300 S. MAIN STREET
TULSA, OKLAHOMA 74119
P: 918.663.9421
WWW.CONNECTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAP 32 EXPIRES: 2026-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



SUBMITTAL:		PRELIMINARY	REVISION HISTORY		
DATE:	11/30/2023		NO.	DESCRIPTION	DATE
DESIGNED BY:					
DRAWN BY:	J.L.C.				
APPROVED BY:	J.L.C.				
SCALE:	S.N.H.				
	AS SHOWN				

131ST ST. - MEMORIAL TO MINGO

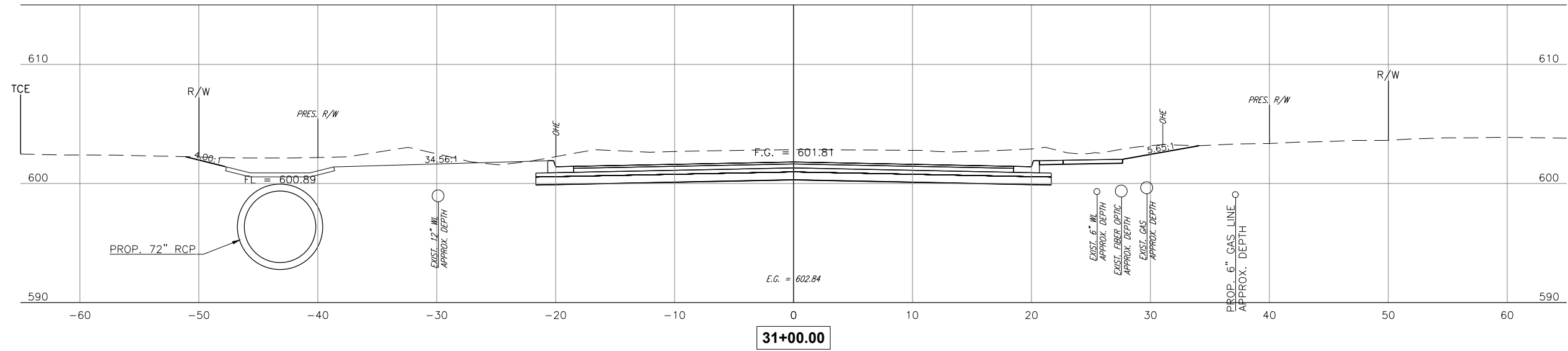
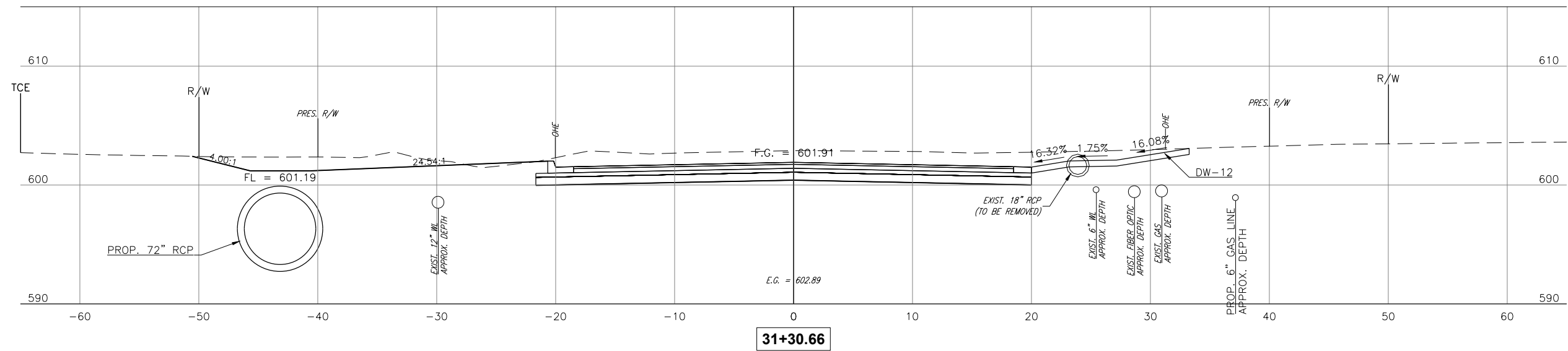
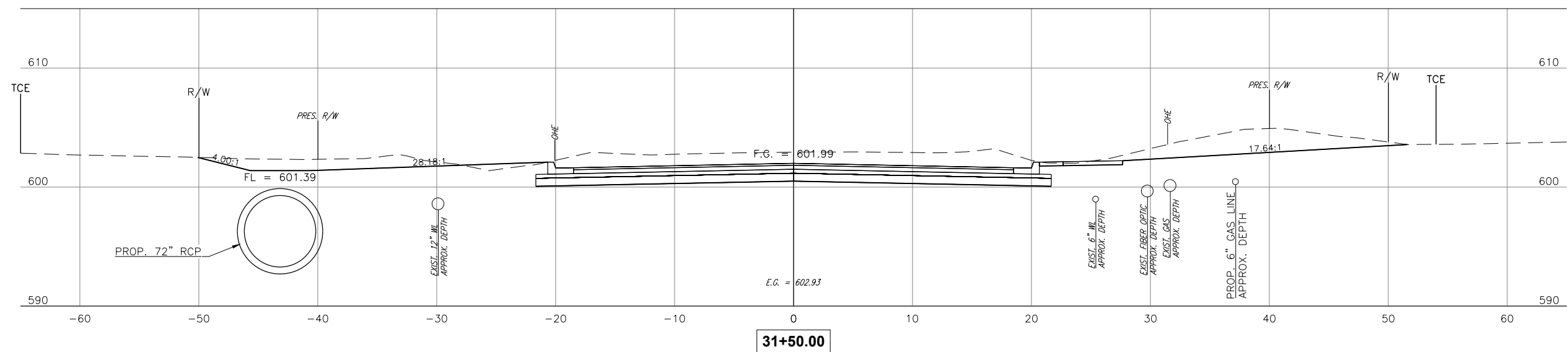
SHEET NAME

SHEET

XS 20

~~Page 98 of 215~~

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



CEC CORPORATION
1300 S. MAIN STREET
TULSA, OKLAHOMA 74119
P: 918.663.9401
WWW.CONNECTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAP 32 EXPIRES: 2026-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



SUBMITTAL:		PRELIMINARY	REVISION HISTORY		
DATE:	11/30/2023		NO.	DESCRIPTION	DATE
PROJECT NO:	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:					
SCALE:	AS SHOWN				

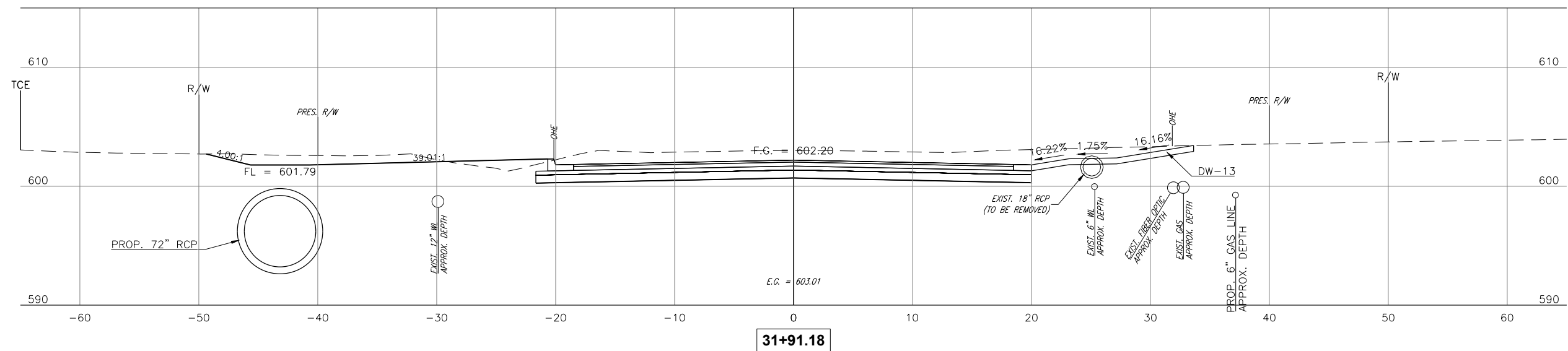
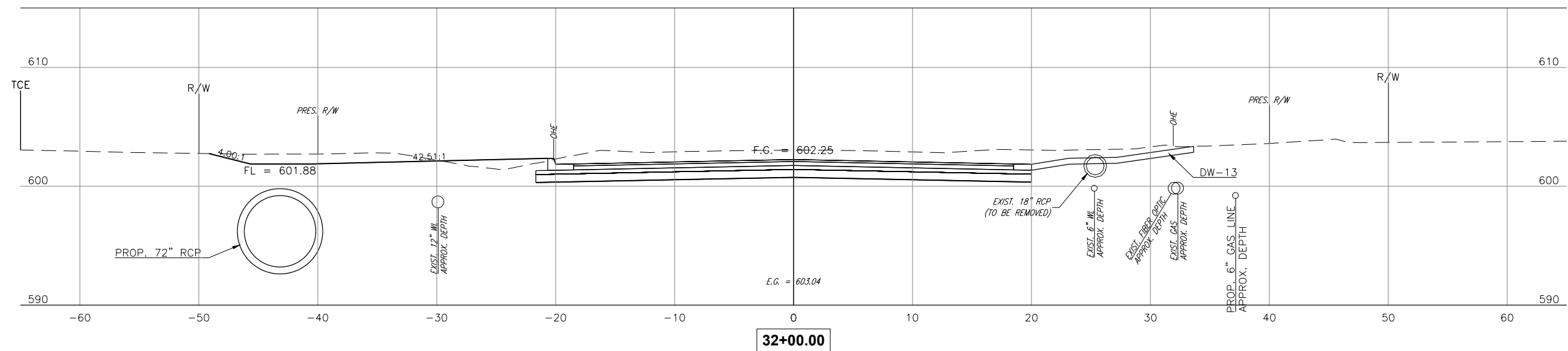
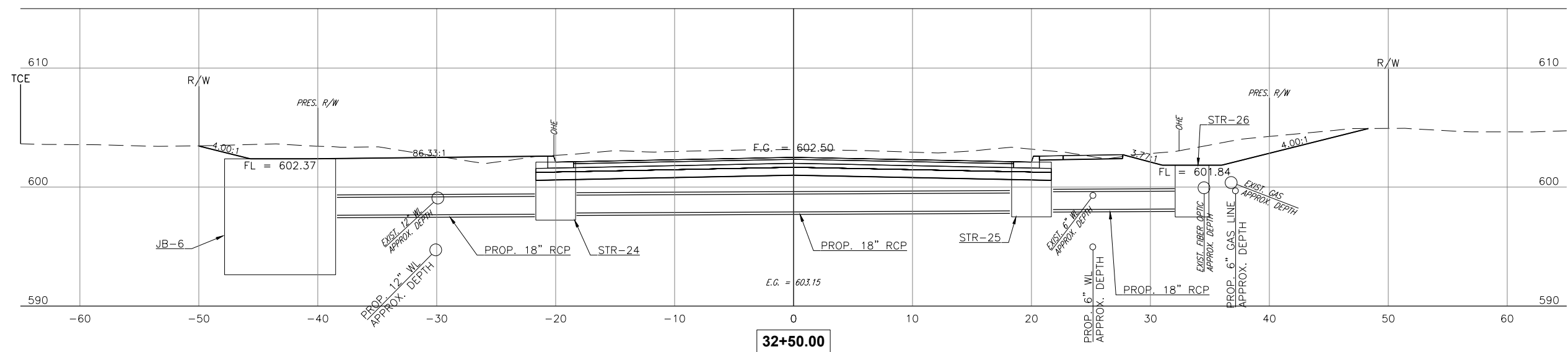
131ST ST. - MEMORIAL TO MINGO

SHEET NAME

XS 21

SHEET
XS 21

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



CEC CORPORATION
1300 S. MAIN STREET
TULSA, OKLAHOMA 74119
P: 918.663.9421
WWW.CONNECTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAP 32 EXPIRES: 2026-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



SUBMITTAL:		PRELIMINARY	REVISION HISTORY		
DATE:	11/30/2023		NO.	DESCRIPTION	DATE
PROJECT NO:	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

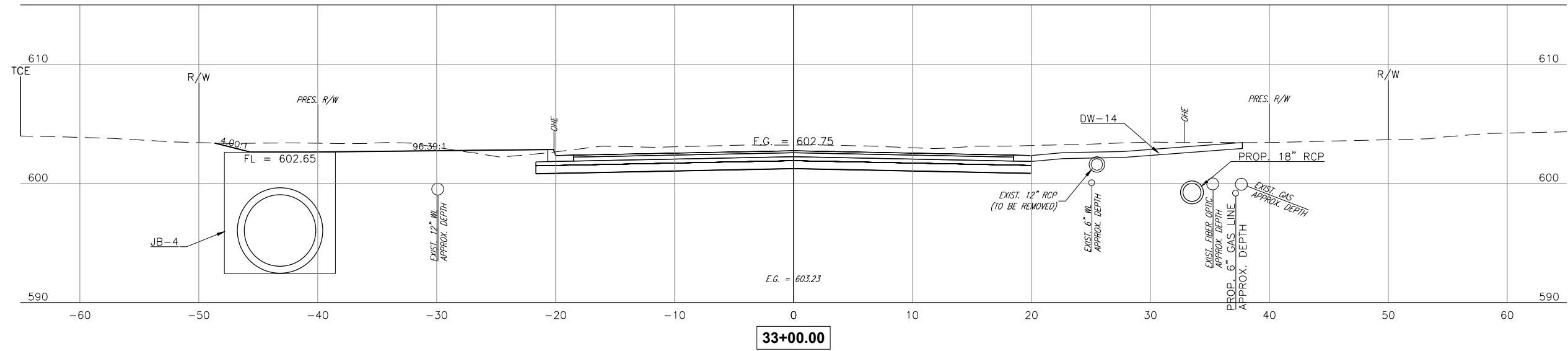
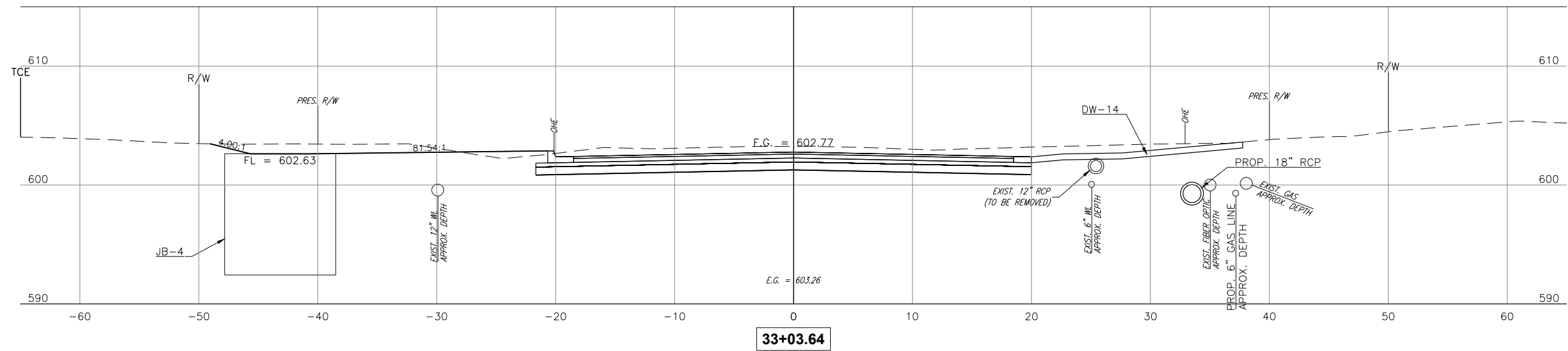
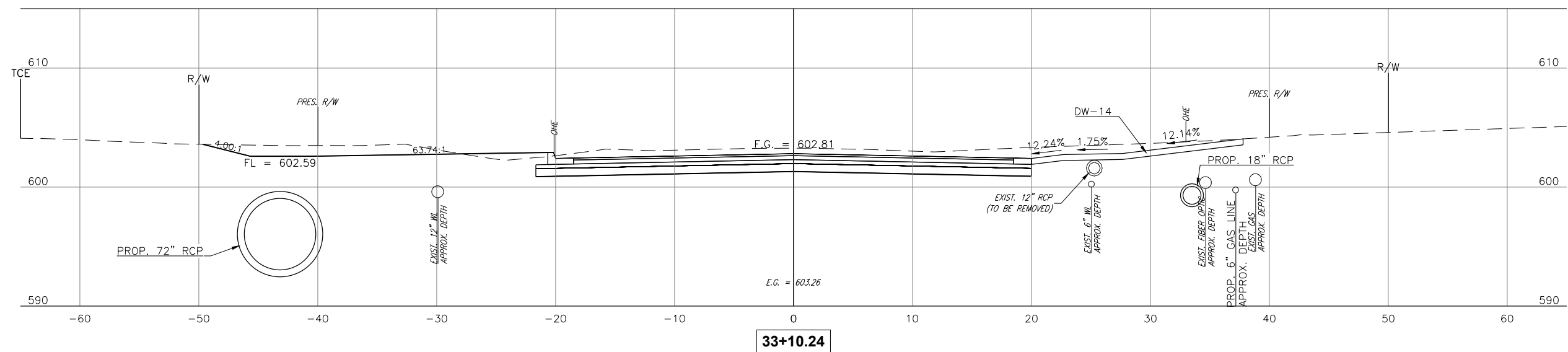
131ST ST. - MEMORIAL TO MINGO

SHEET NAME

XS 22

SHEET
XS 22

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



CEC CORPORATION
1300 S MAIN STREET
TULSA OKLAHOMA 74119
P 918 483 0461
WWW.CONNECTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES 02/26/06-05-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



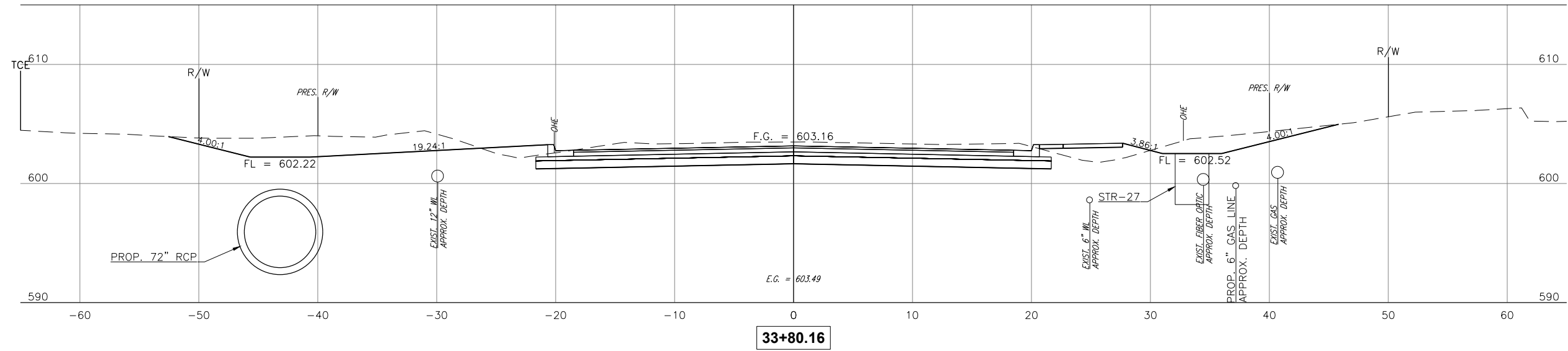
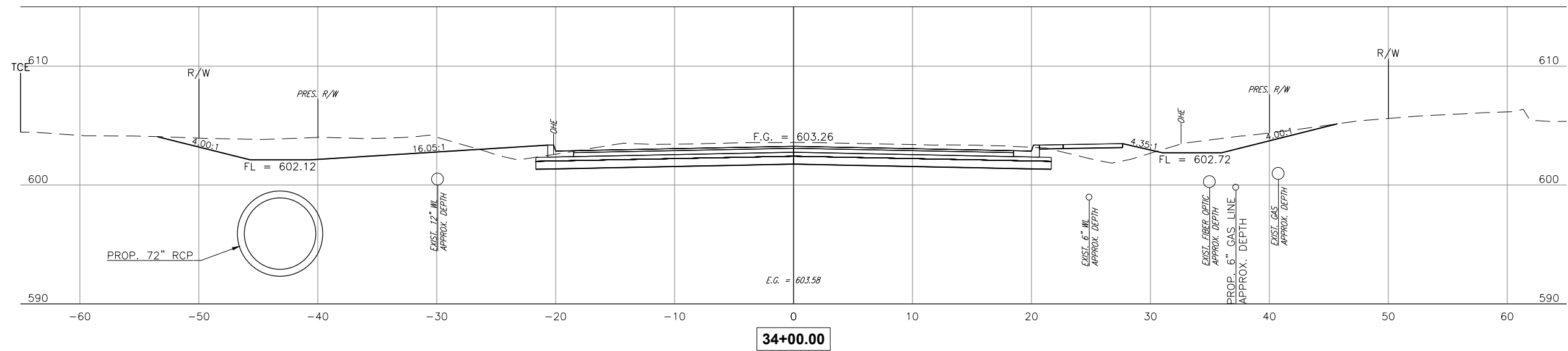
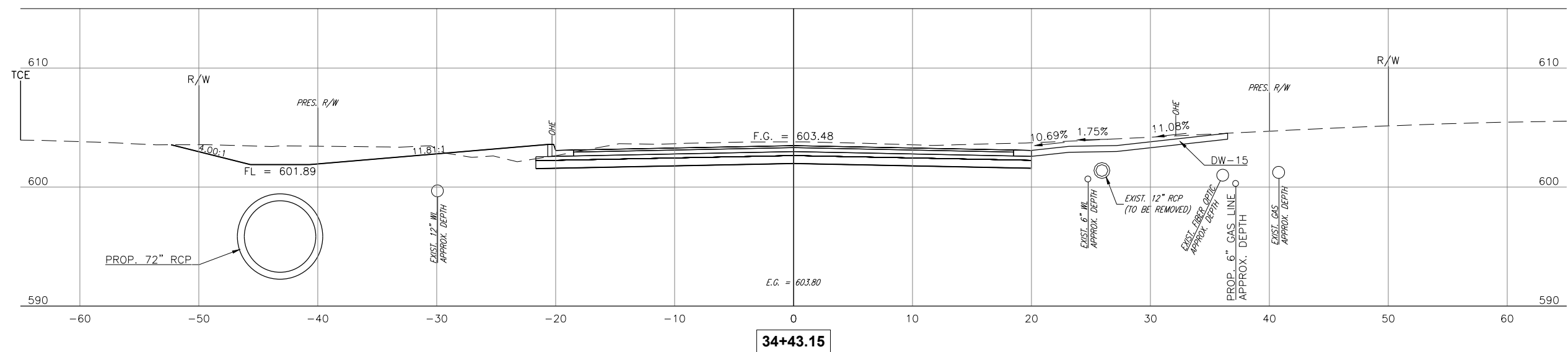
SUBMITTAL:		PRELIMINARY	REVISION HISTORY		
DATE:	PROJECT NO:	11/30/2023	NO.	DESCRIPTION	DATE
	DESIGNED BY:	170231.0102			
	DRAWN BY:	J.L.C.			
	APPROVED BY:	J.L.C.			
	SCALE:	AS SHOWN			

131ST ST. - MEMORIAL TO MINGO

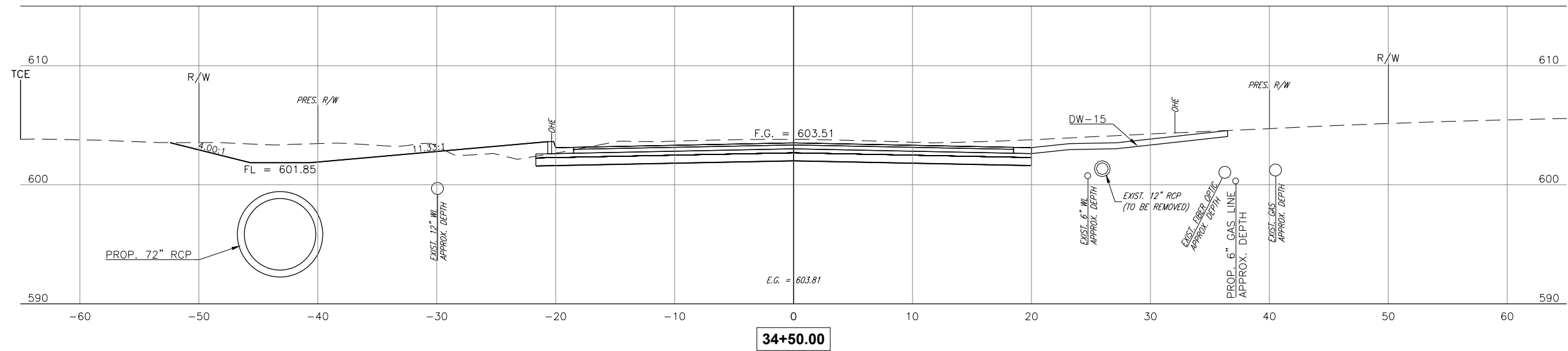
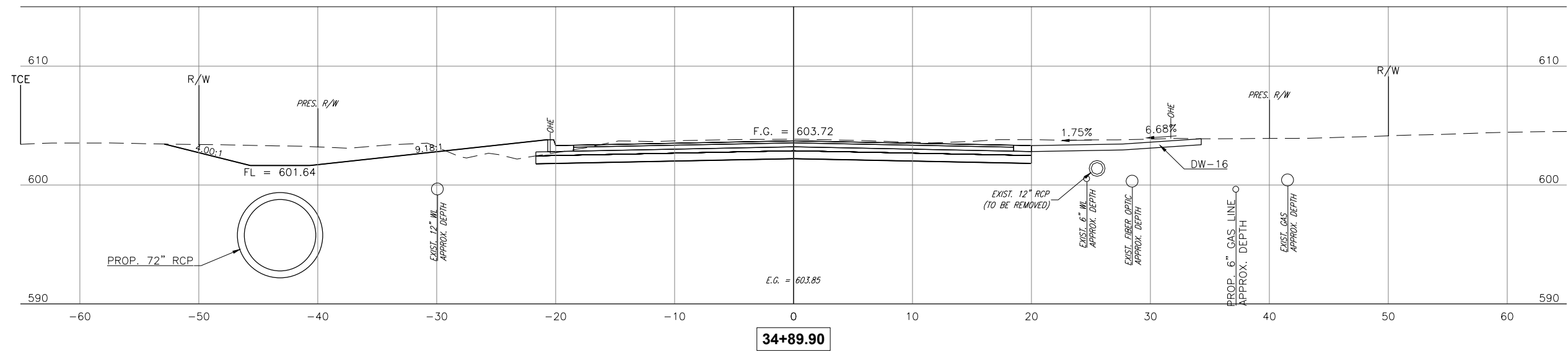
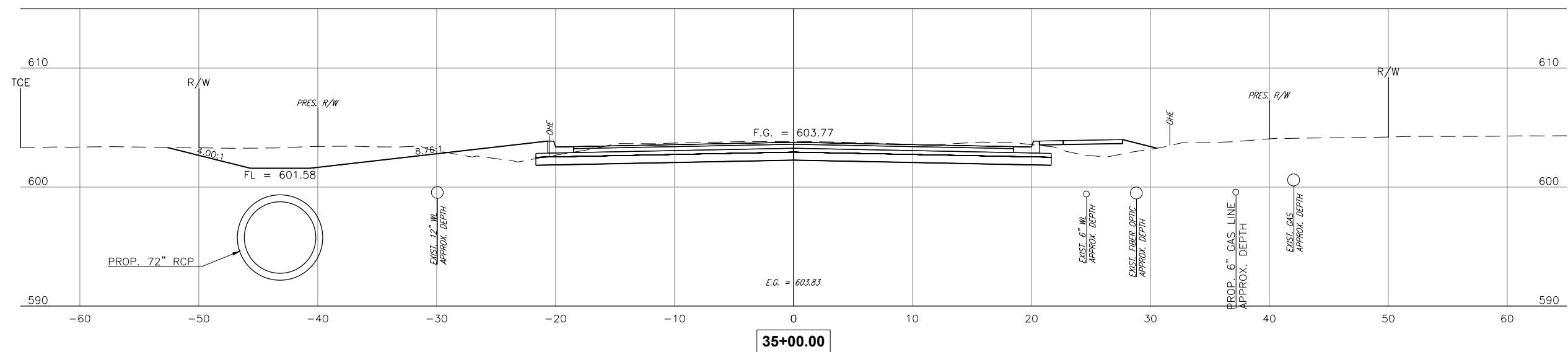
SHEET NAME

SHEET
XS 23

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



CEC CORPORATION
1300 S. MAIN STREET
TULSA, OKLAHOMA 74119
P: 918.663.9421
WWW.CONNECTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAP 32 EXPIRES: 2026-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



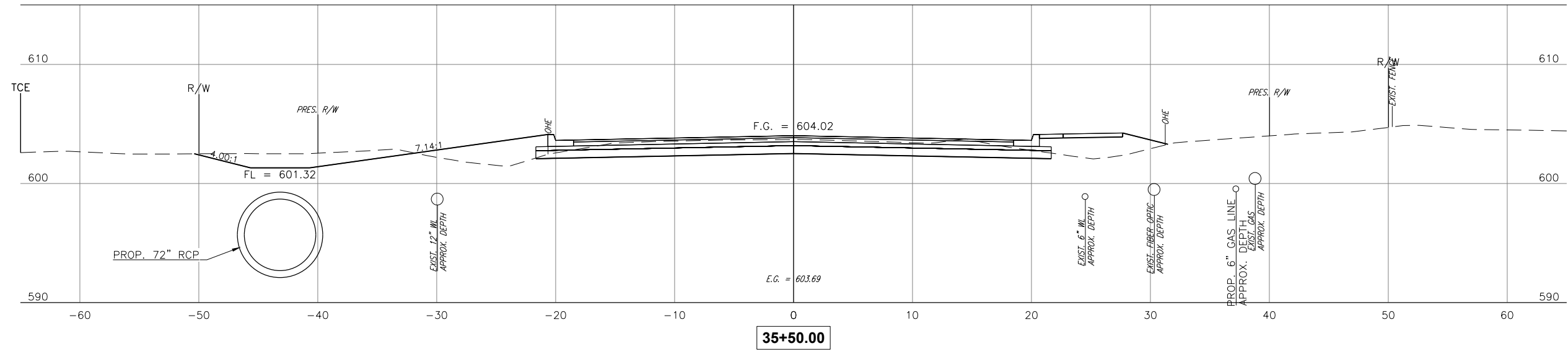
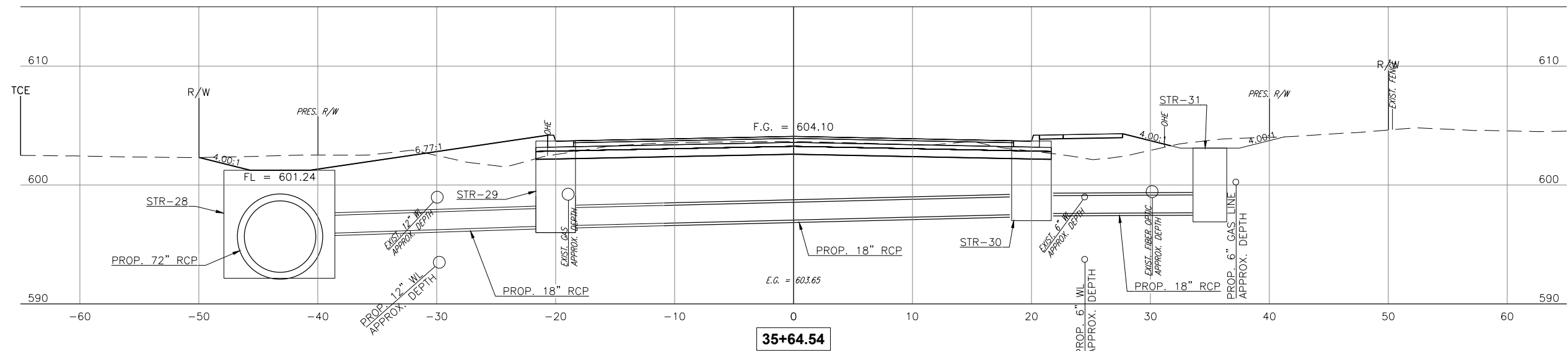
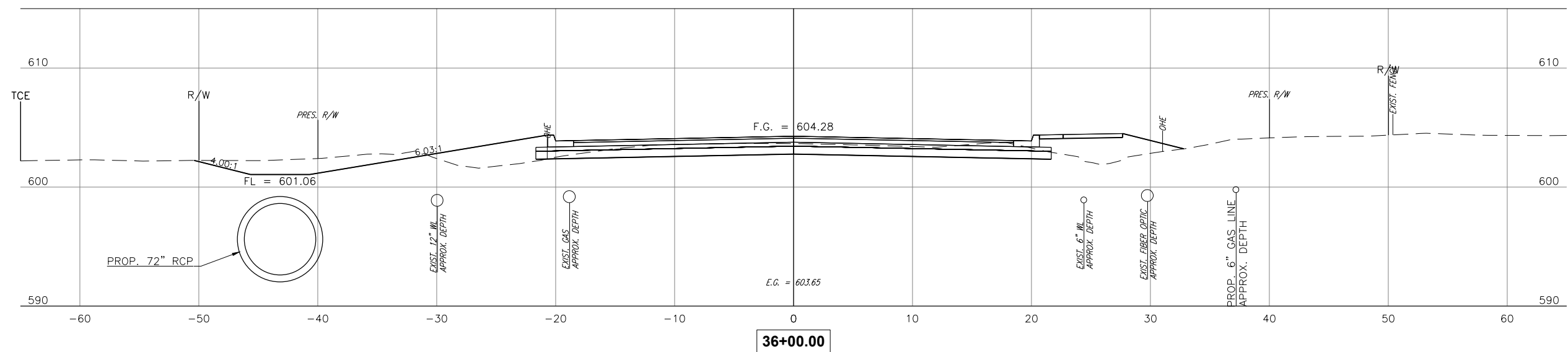
SUBMITTAL:		PRELIMINARY	REVISION HISTORY		
DATE:	PROJECT NO:	11/30/2023	NO.	DESCRIPTION	DATE
	DESIGNED BY:	170231.0102			
	DRAWN BY:	J.L.C.			
	APPROVED BY:	J.L.C.			
	SCALE:	AS SHOWN			

131ST ST. - MEMORIAL TO MINGO

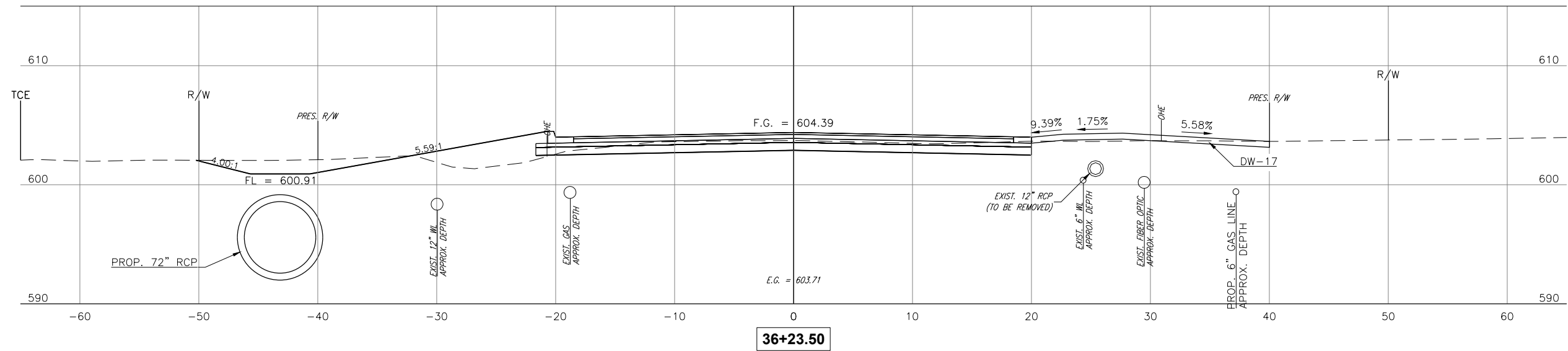
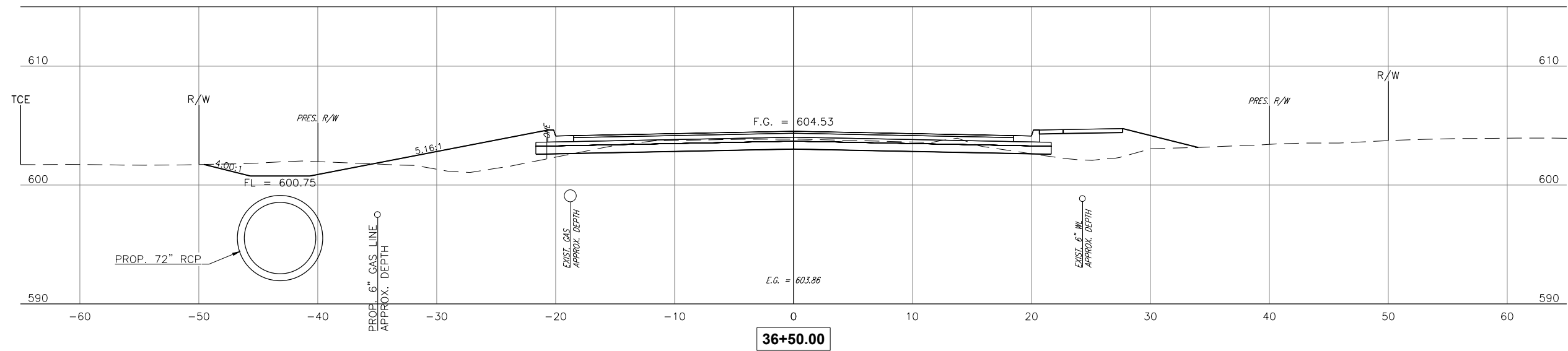
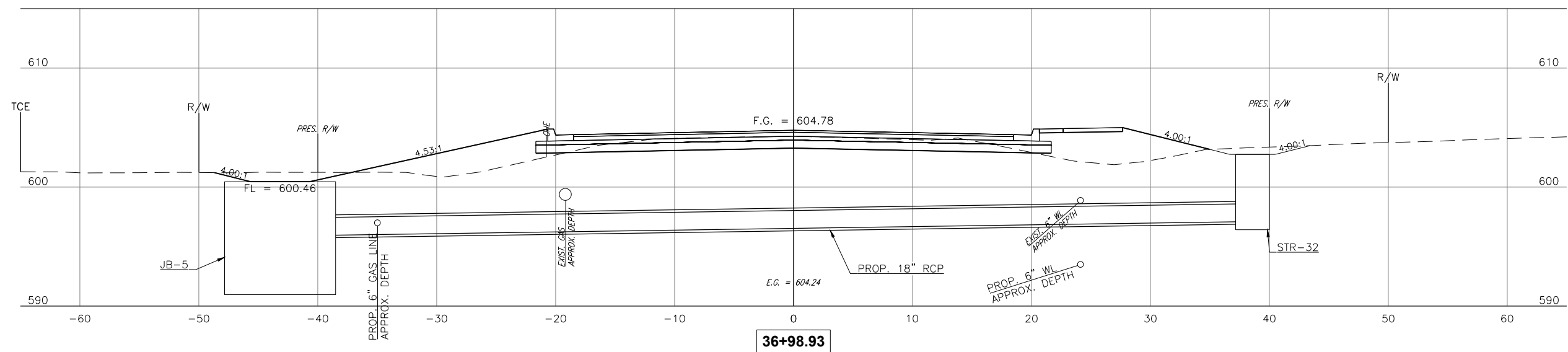
SHEET NAME

SHEET
XS 25

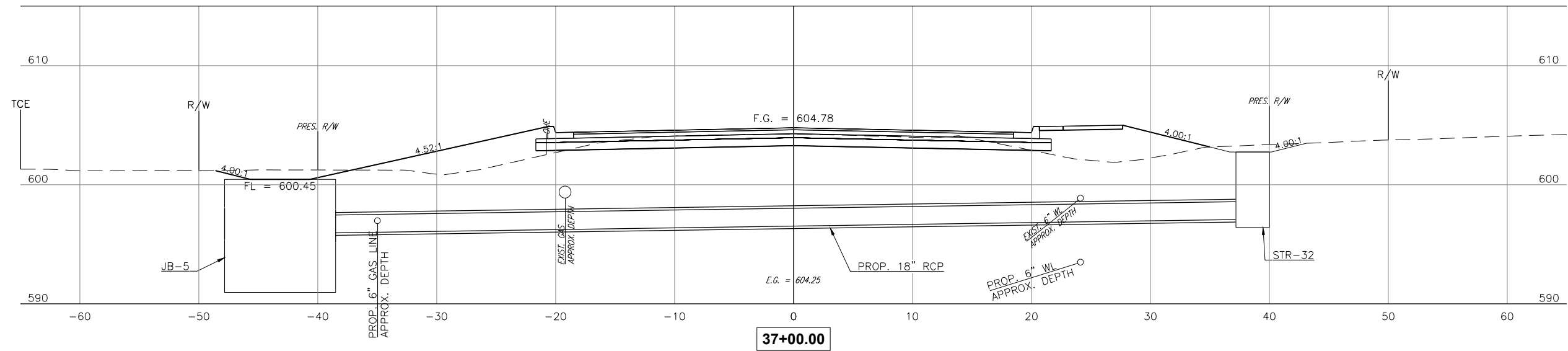
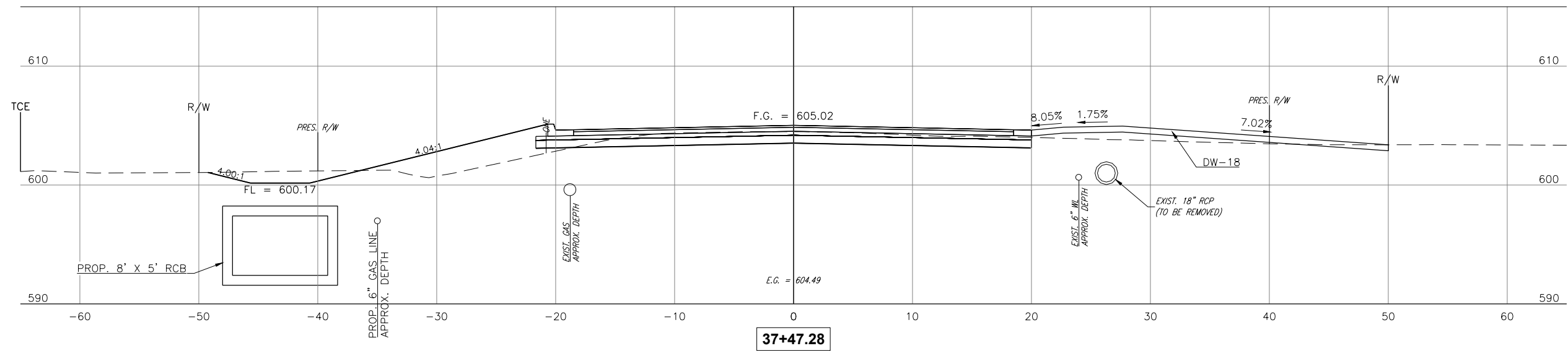
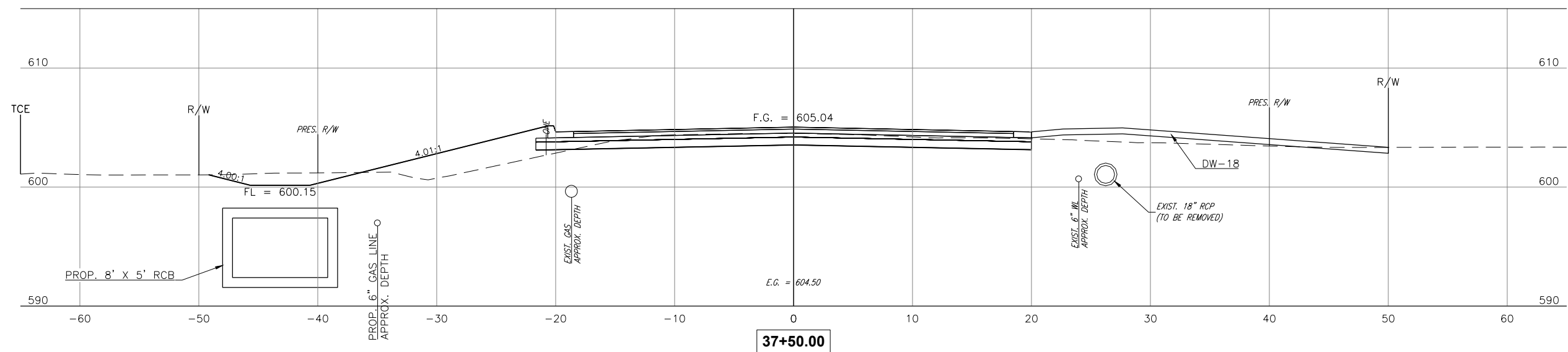
PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



CEC CORPORATION
1300 S MAIN STREET
TULSA OKLAHOMA 74119
P. 918.463.0461
WWW.CONNECTCEC.COM

STATE OF OK. CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES 02/26/06-05-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



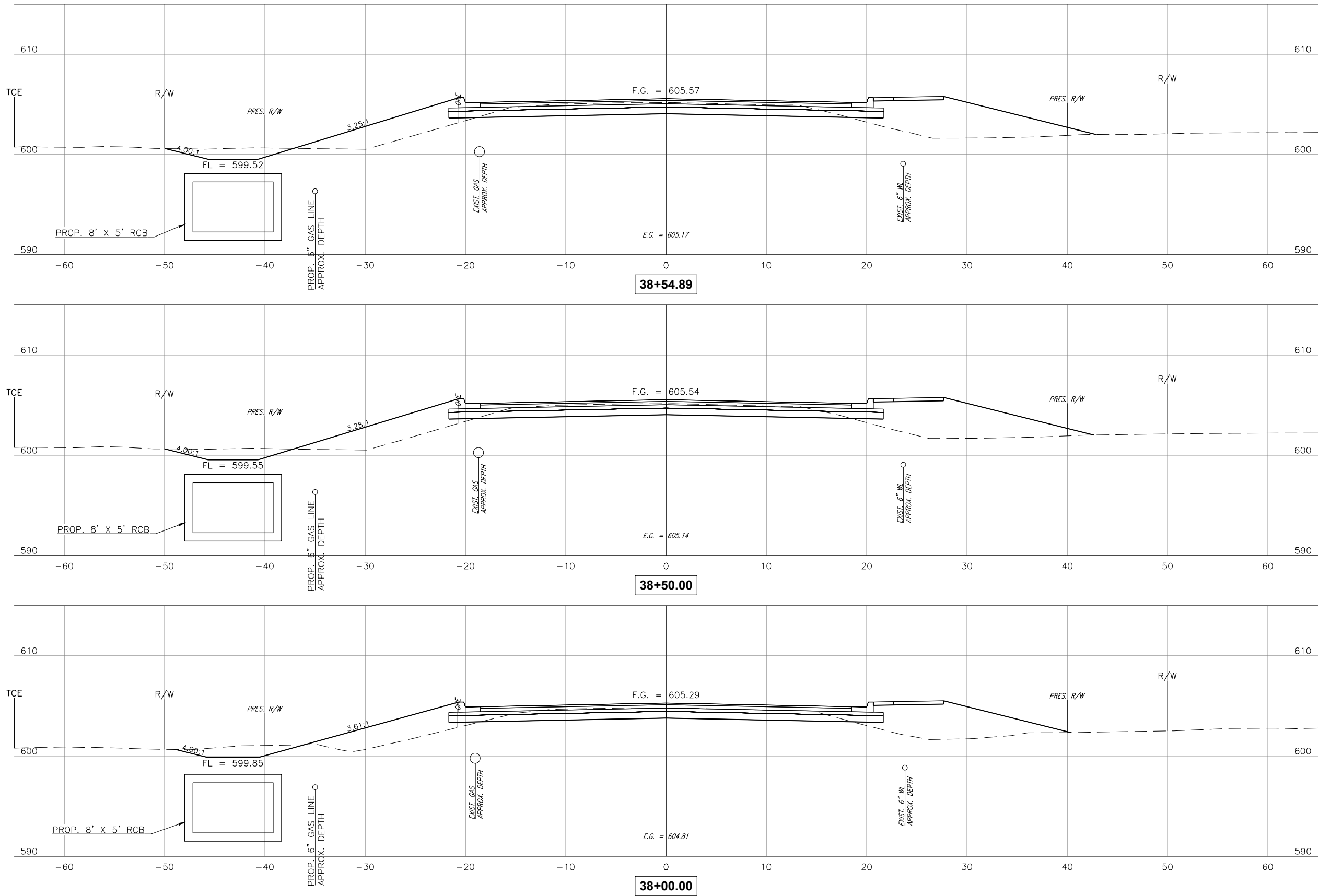
SUBMITTAL:		PRELIMINARY	REVISION HISTORY		
DATE:	11/30/2023		NO.	DESCRIPTION	DATE
PROJECT NO:	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:					
SCALE:	AS SHOWN				

131ST ST. - MEMORIAL TO MINGO

SHEET NAME

SHEET
XS 28

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
STATE OF OK CERTIFICATE OF AUTHORIZATION
CAB 32 EXPIRES: 2006-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR TRANSMISSION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:	PRELIMINARY	REVISION HISTORY	
		NO.	DESCRIPTION
DATE:	11/30/2023		DATE
PROJECT NO:	170231.0102		
DESIGNED BY:	J.L.C.		
DRAWN BY:	J.L.C.		
APPROVED BY:	S.N.H.		
SCALE:	AS SHOWN		

131ST ST. - MEMORIAL TO MINGO

SHEET NAME

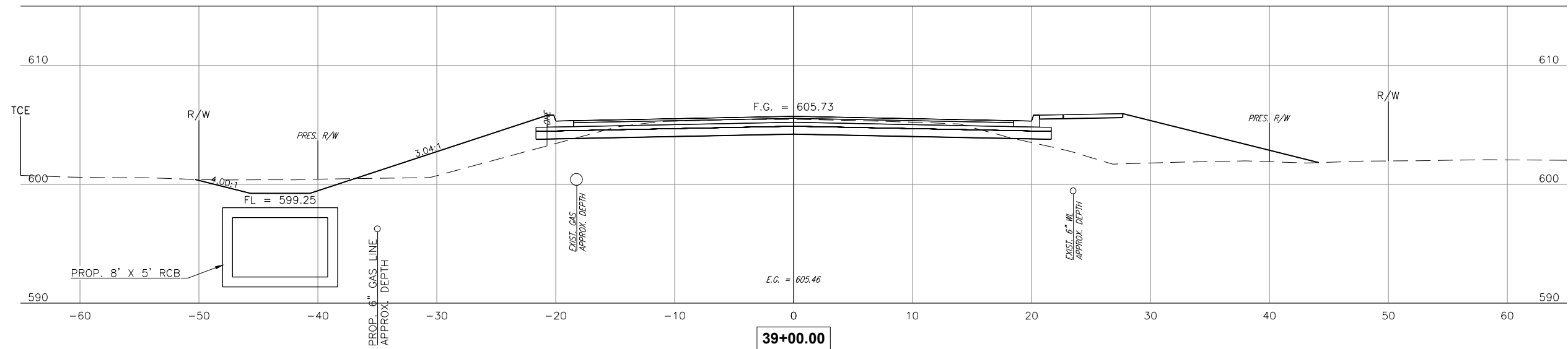
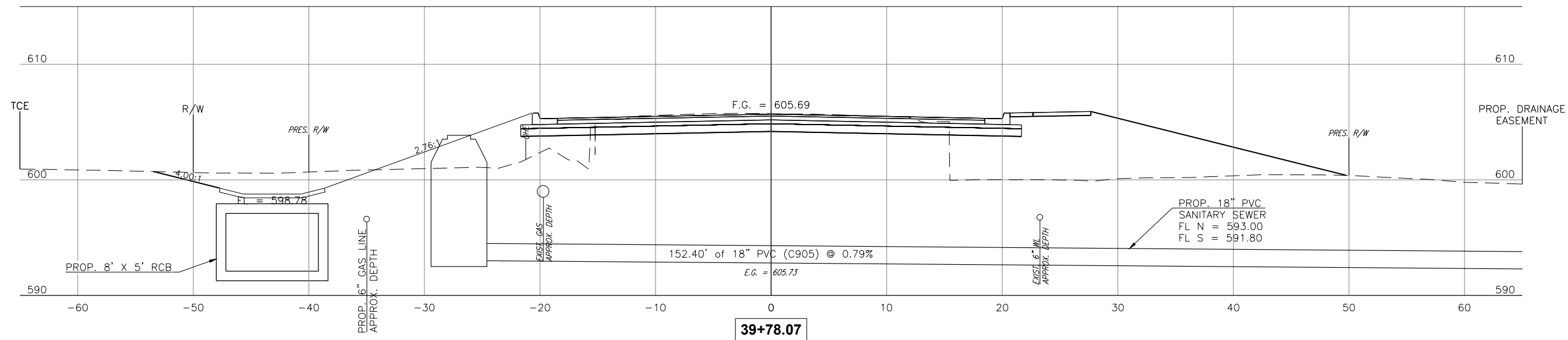
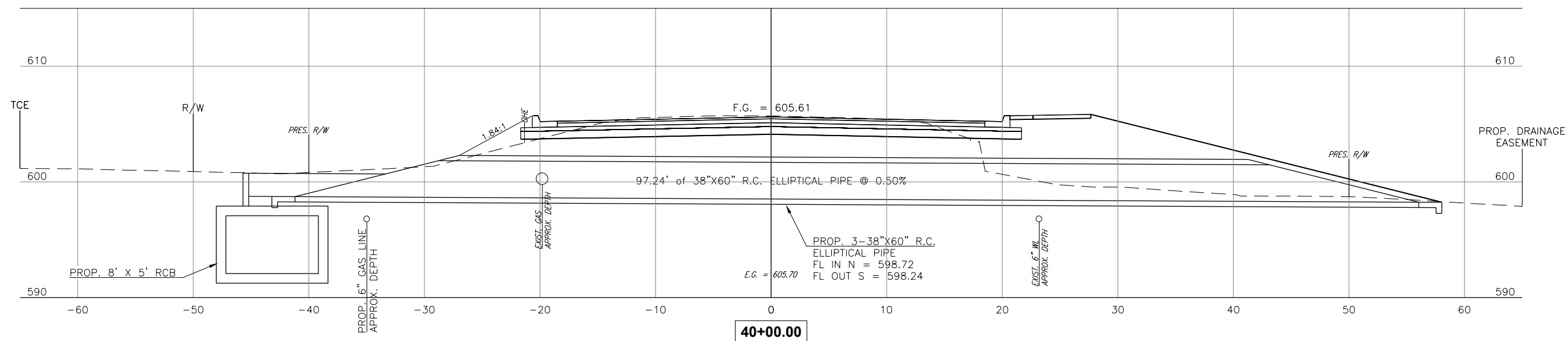
XS 29

SHEET

XS 29

BIXBY, OKLAHOMA

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



CEC CORPORATION
1300 S MAIN STREET
TULSA OKLAHOMA 74119
P: 918.663.9401
WWW.CONNECTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAR: 32 EXPIRES: 2020-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING



SUBMITTAL:		PRELIMINARY	REVISION HISTORY	
DATE:	11/30/2023		NO.	DESCRIPTION
PROJECT NO:	170231.0102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			

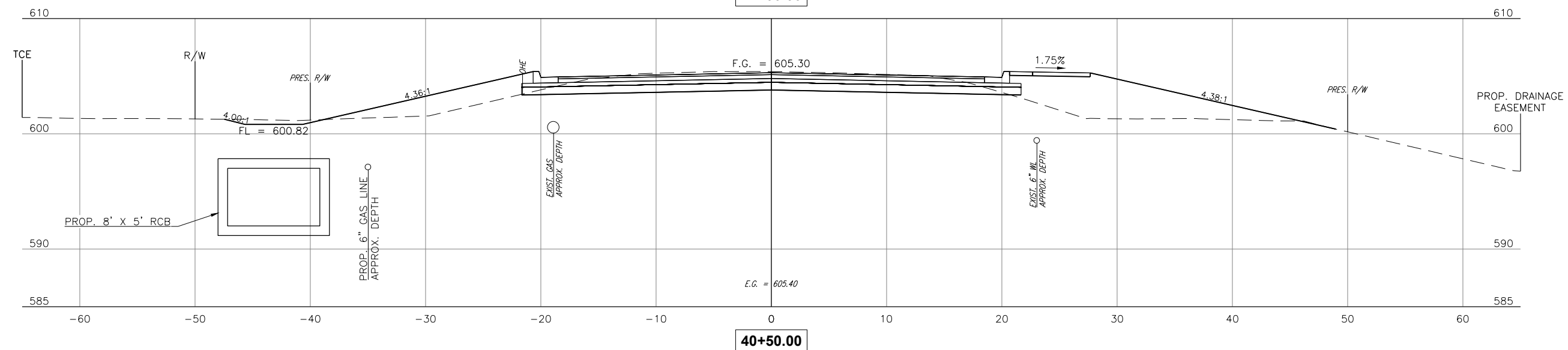
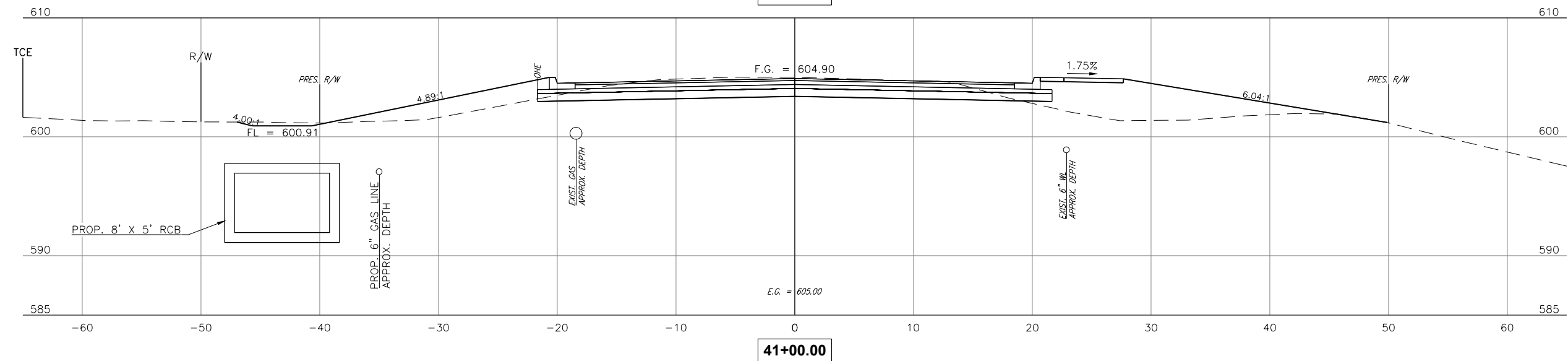
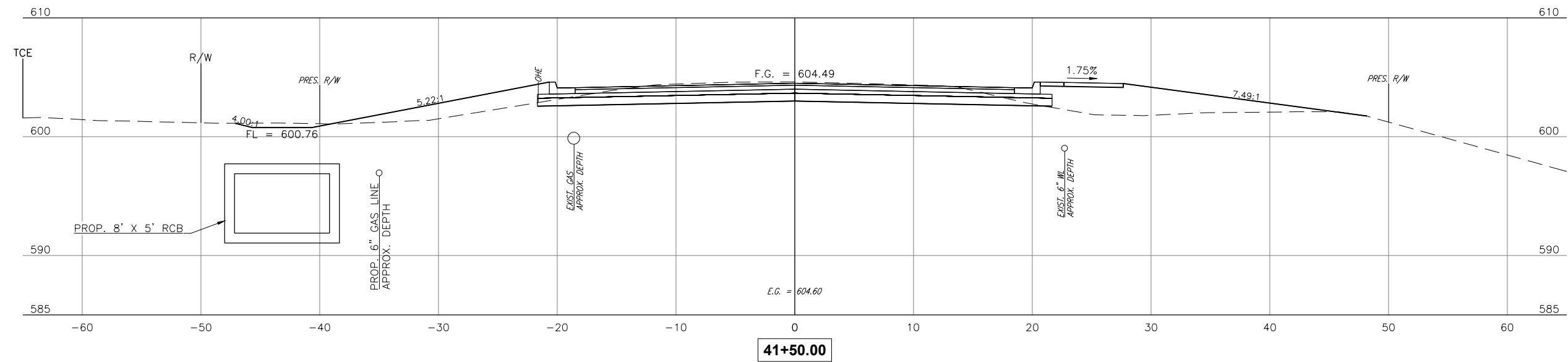
131ST ST. - MEMORIAL TO MINGO

SHEET NAME

XS 30

SHEET
XS 30

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



CCC CORPORATION
100 WEST 10TH AVE
TULSA, OKLAHOMA 74119
P. 918.663.9401
WWW.CONNECTCEE.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAN. 32 EXPIRES 5/2026-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



SUBMITTAL:		PRELIMINARY	REVISION HISTORY	
DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE
	170231.0102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:	S.N.H.			
SCALE:	AS SHOWN			

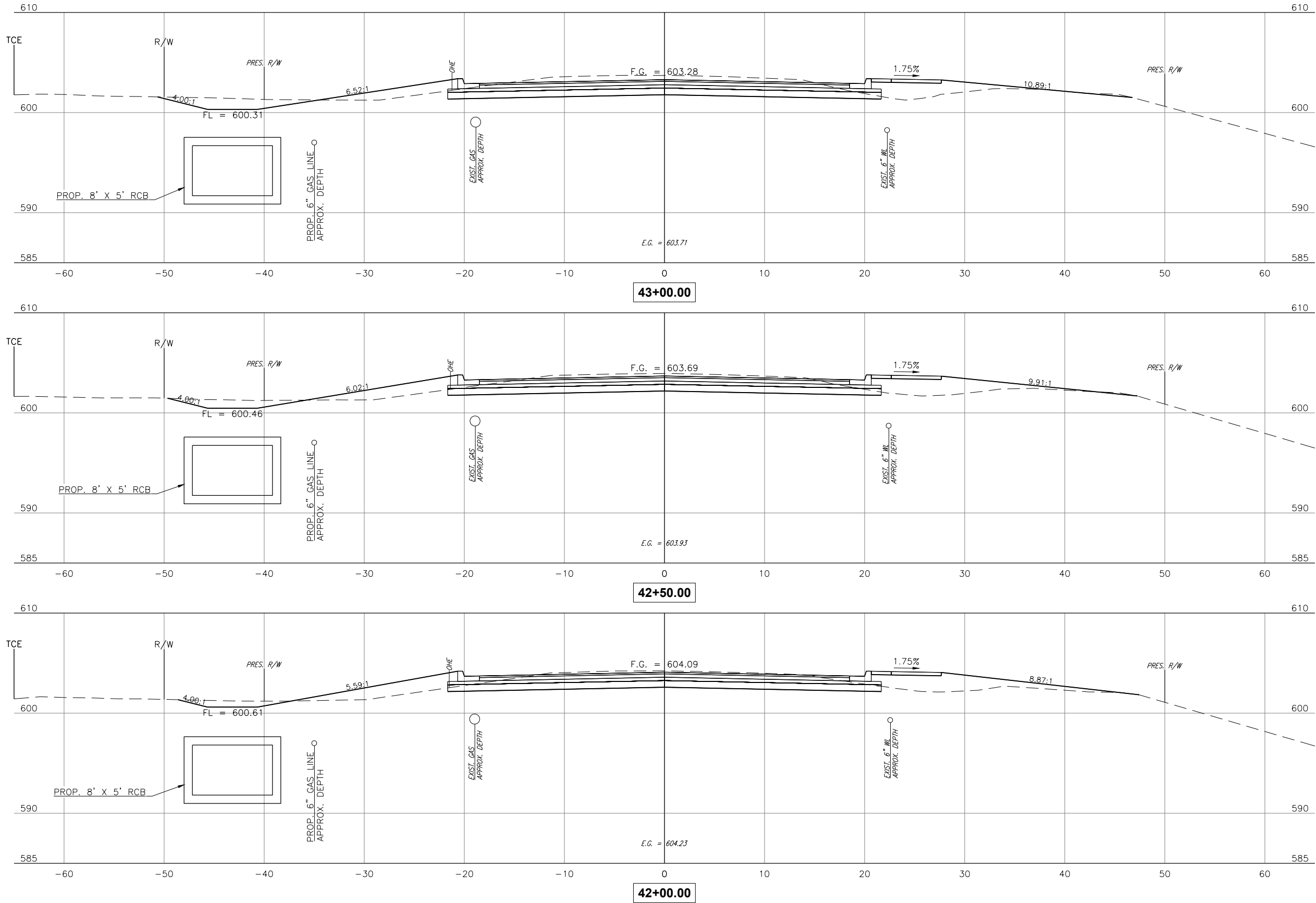
131ST ST. - MEMORIAL TO MINGO

SHEET NAME

XS 31

SHEET
XS 31

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
CAN 32 EXPIRES: 08/06/30
STATE OF OK CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING
MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO.	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE:	AS SHOWN				

131ST ST. - MEMORIAL TO MINGO

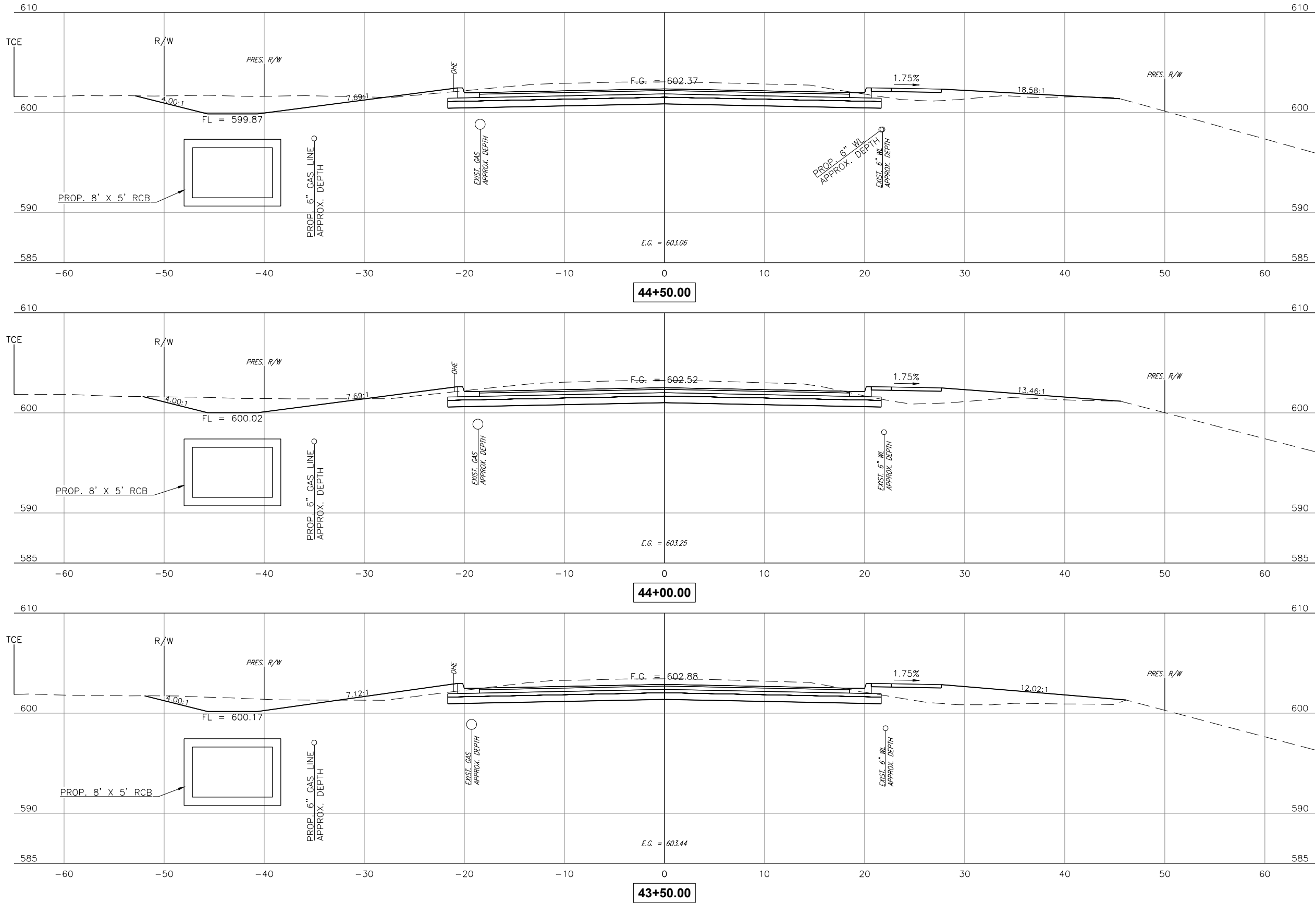
SHEET NAME
XS 32

SHEET
XS 32

BIXBY, OKLAHOMA

Page 110 of 215

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
CAN 32 EXPIRES: 08/06/30

STATE OF OK CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO.	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE: AS SHOWN					

131ST ST. - MEMORIAL TO MINGO

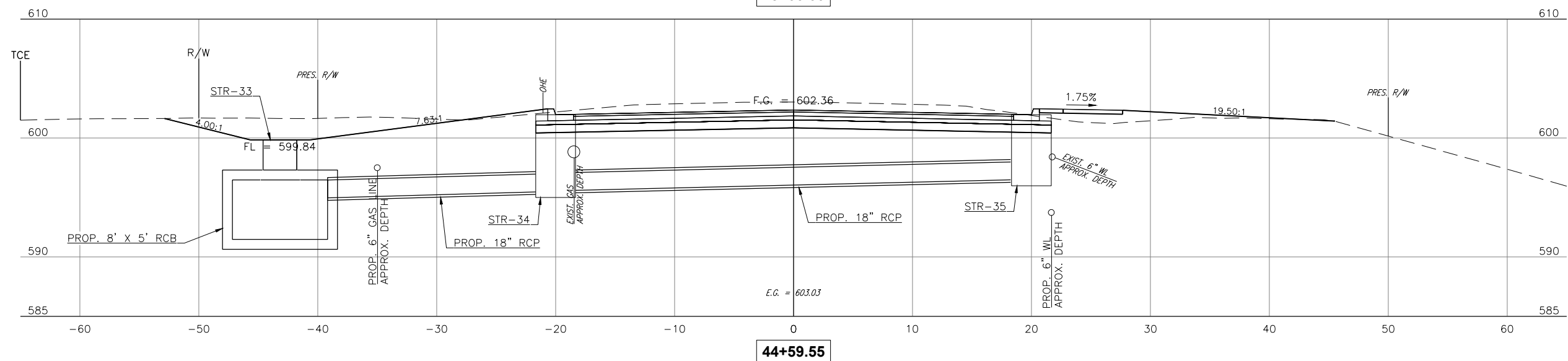
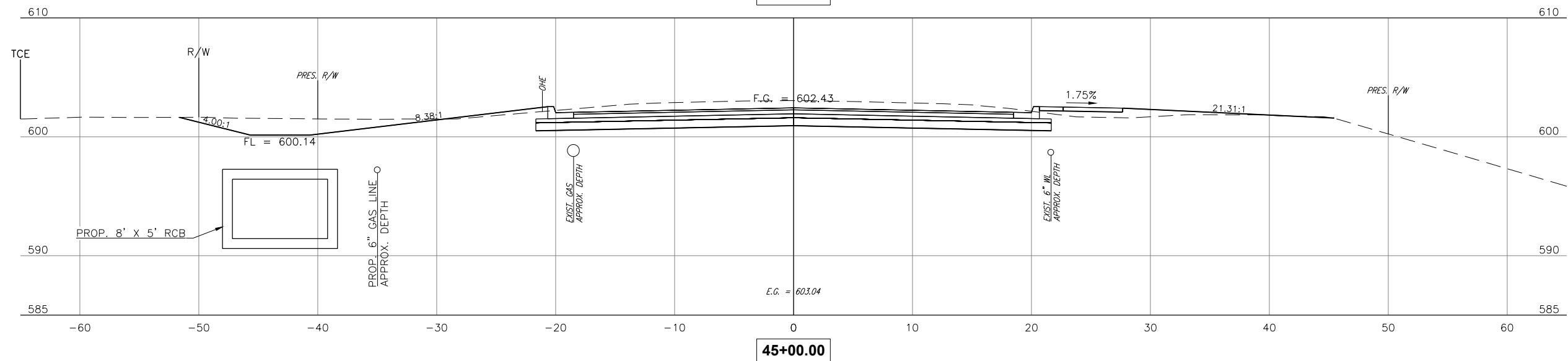
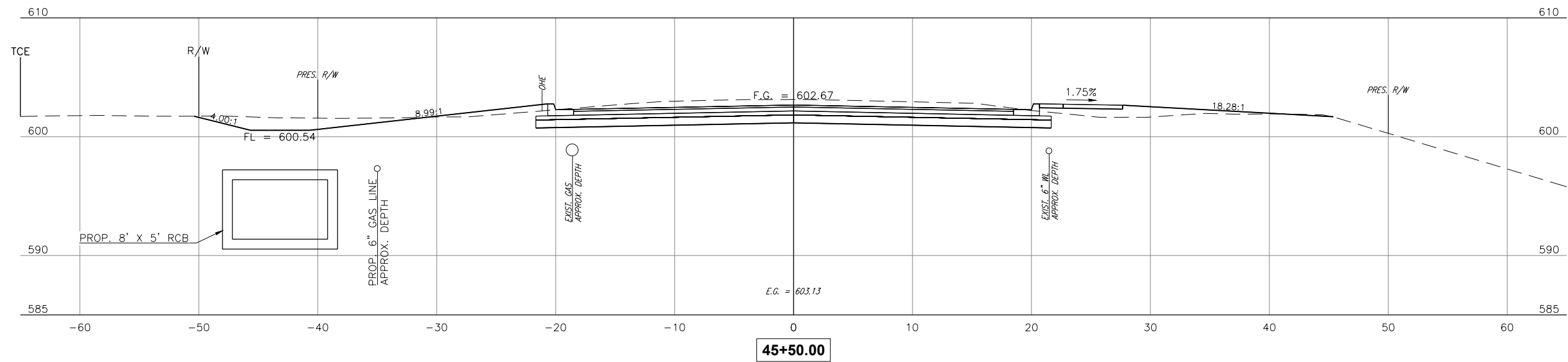
SHEET NAME
XS 33

SHEET
XS 33

BIXBY, OKLAHOMA

Page 111 of 215

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



CEC CORPORATION
1300 S MAIN STREET
TULSA OKLAHOMA 74119
P 918 483 0461
WWW.CONNECTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES 02/26/06-05-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



SUBMITTAL:		PRELIMINARY	REVISION HISTORY		
DATE:	PROJECT NO:	11/30/2023	NO.	DESCRIPTION	DATE
	DESIGNED BY:	170231.0102			
	DRAWN BY:	J.L.C.			
	APPROVED BY:	J.L.C.			
	SCALE:	AS SHOWN			

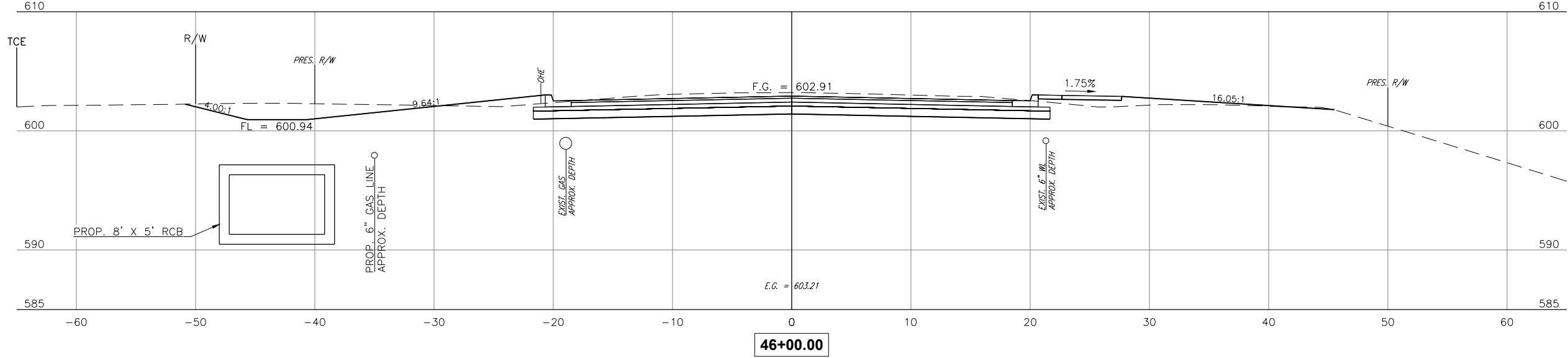
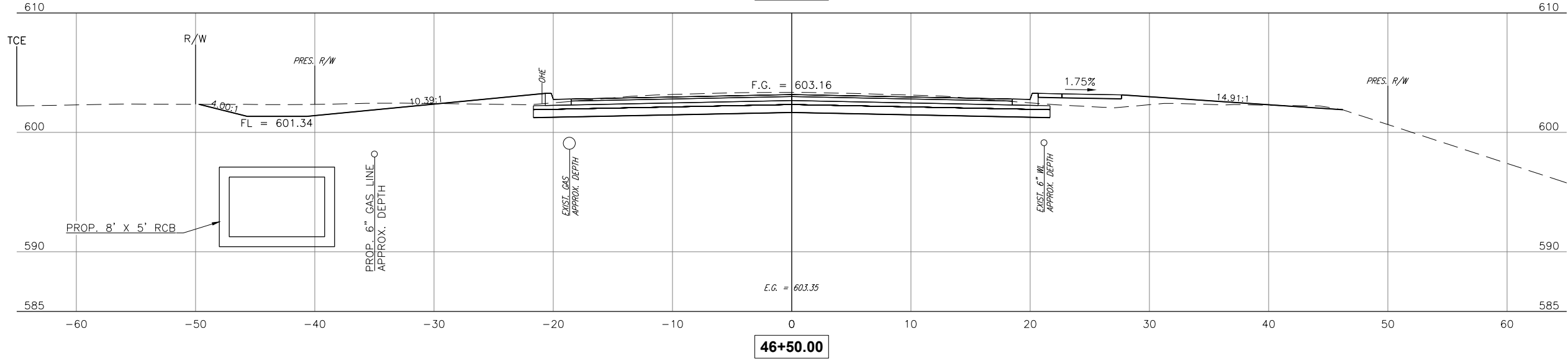
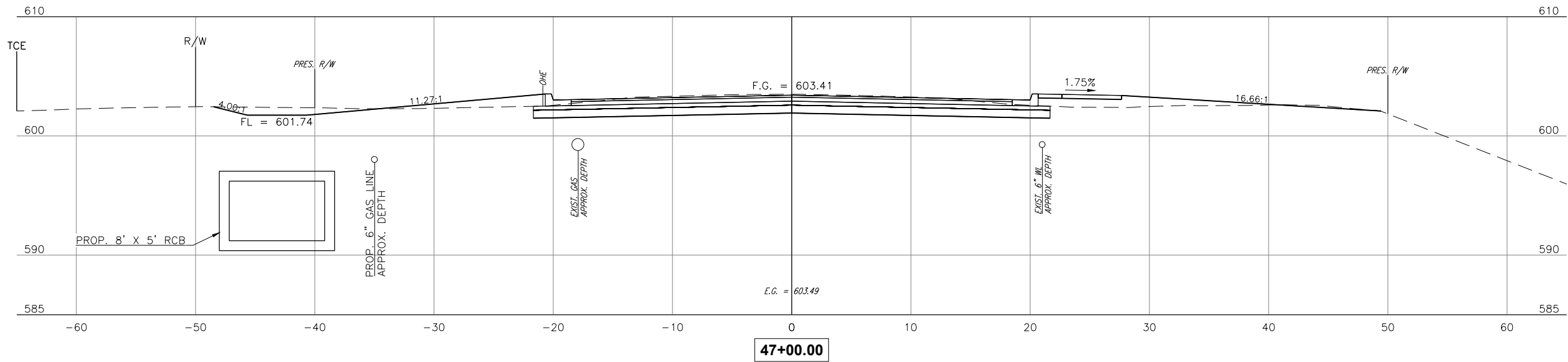
131ST ST. - MEMORIAL TO MINGO

SHEET NAME

XS 34

SHEET
XS 34

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES: 08/01/30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING
MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY
MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC. IT IS PROHIBITED.



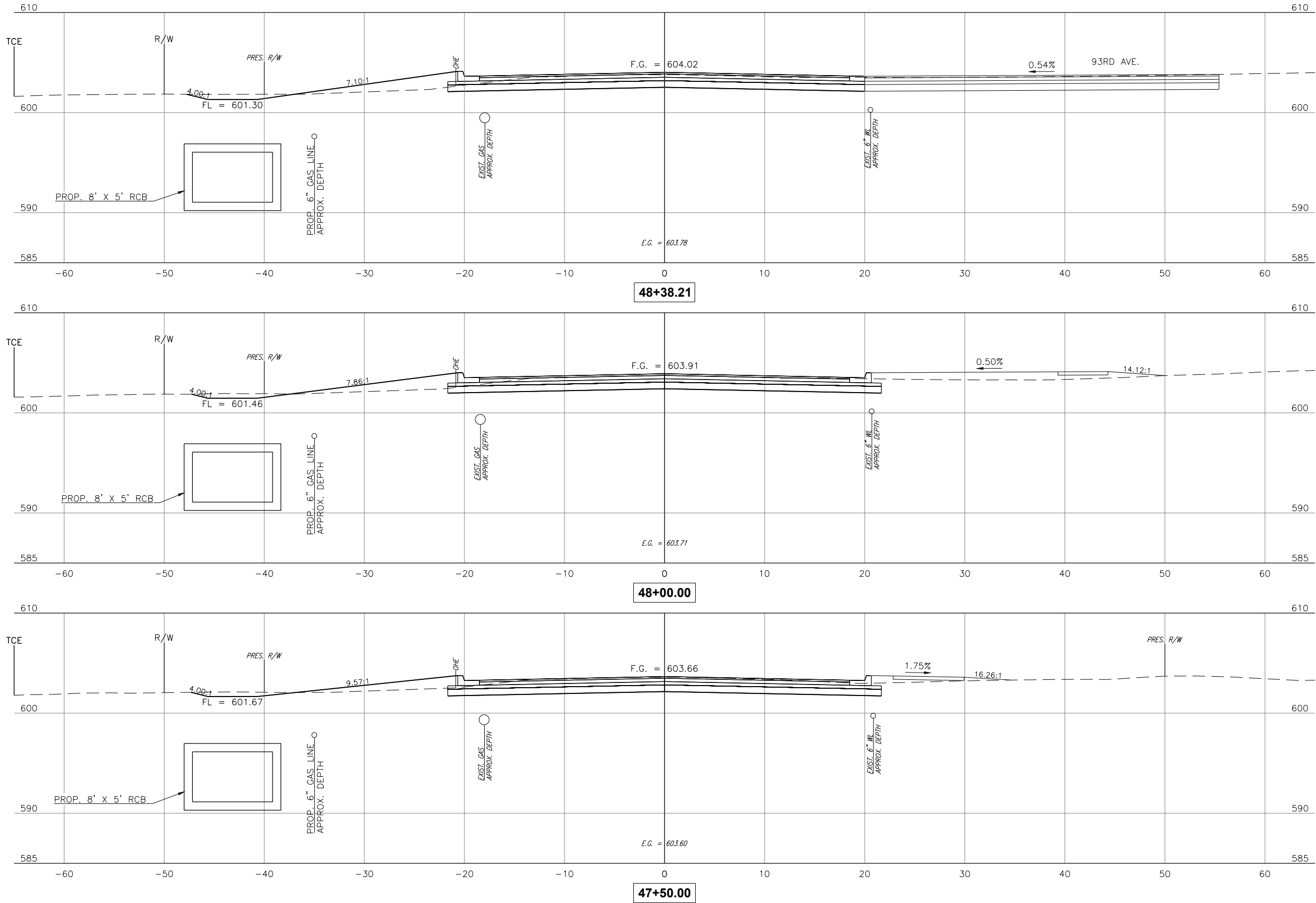
SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	11/30/2023	PROJECT NO.:	170231.0102	NO.	DESCRIPTION
DESIGNED BY:	J.L.C.	DRAWN BY:	J.L.C.		
APPROVED BY:	S.N.H.	SCALE:	AS SHOWN		

131ST ST. - MEMORIAL TO MINGO

SHEET NAME
XS 35

SHEET
XS 35

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CEN 32 EXPIRES: 08/06/30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR DISTRIBUTION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO.:	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE:	AS SHOWN				

131ST ST. - MEMORIAL TO MINGO

SHEET NAME

XS 36

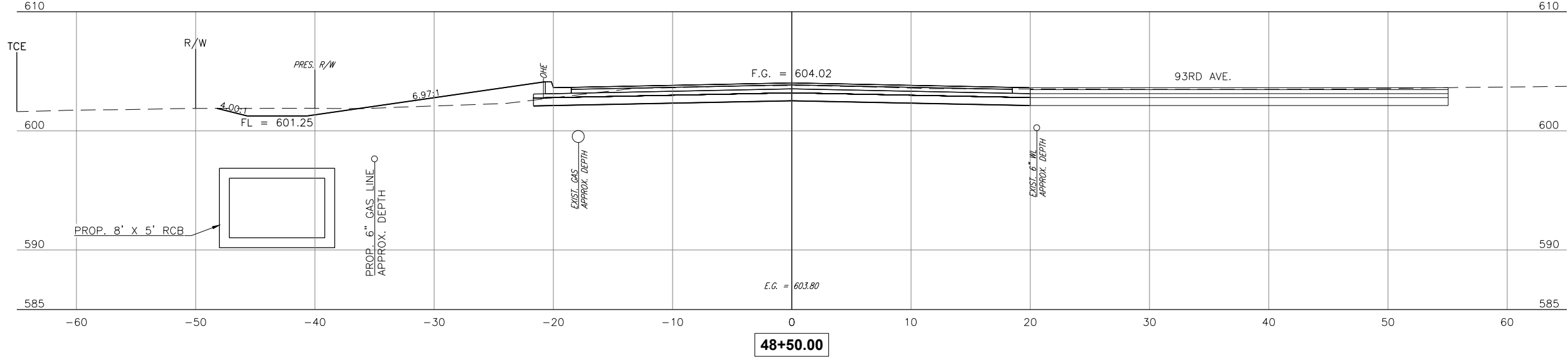
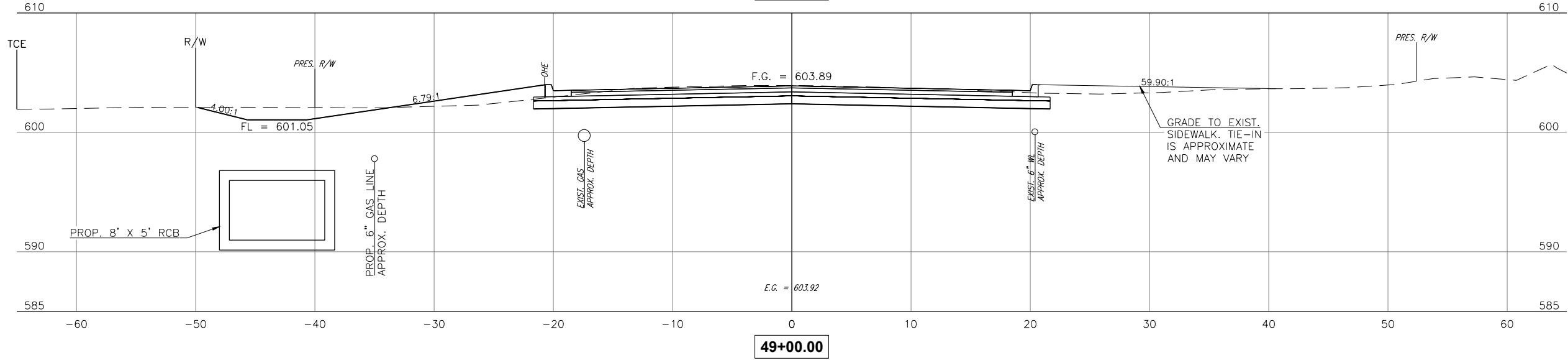
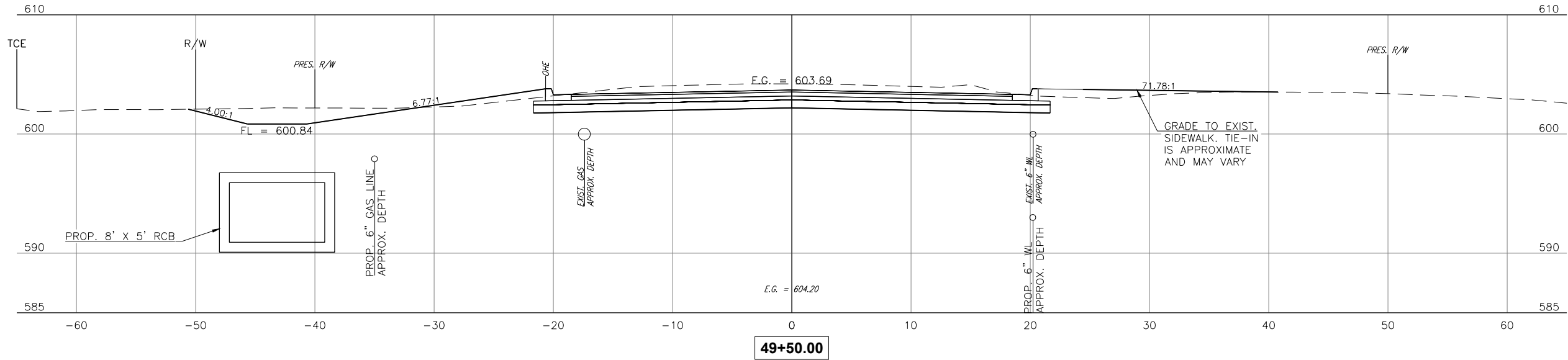
SHEET

XS 36

BIXBY, OKLAHOMA

Page 114 of 215

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
STATE OF OK CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REUSE OR REPRODUCTION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



SUBMITTAL:	PRELIMINARY	REVISION HISTORY			
		NO.	DESCRIPTION	DATE	
DATE:	11/30/2023				
PROJECT NO.:	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

131ST ST. - MEMORIAL TO MINGO

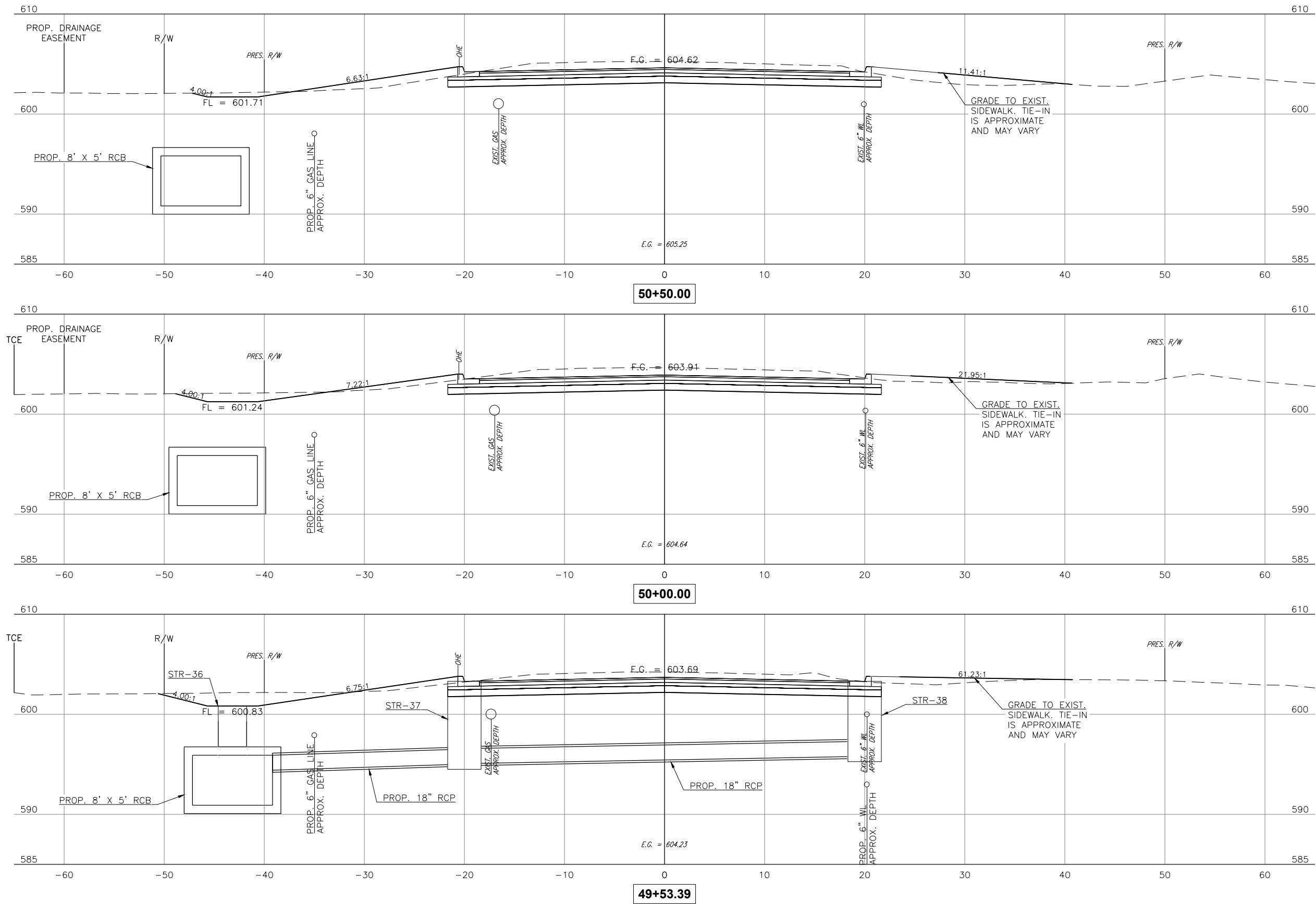
SHEET NAME

XS 37

SHEET

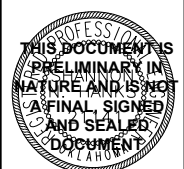
XS 37

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
CAN 32 EXPIRES: 08/06/30
STATE OF OK CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR DISTRIBUTION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE:	AS SHOWN				

131ST ST. - MEMORIAL TO MINGO

SHEET NAME

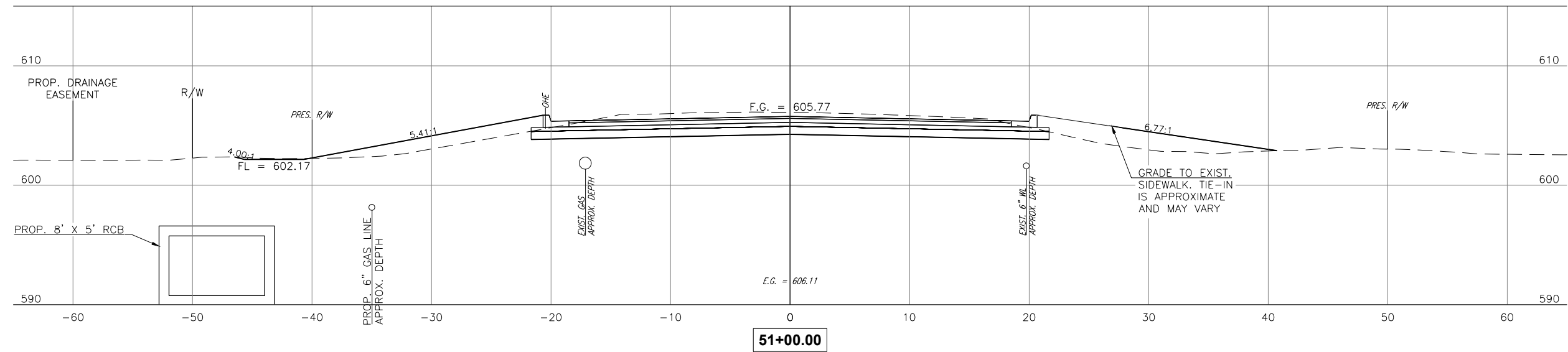
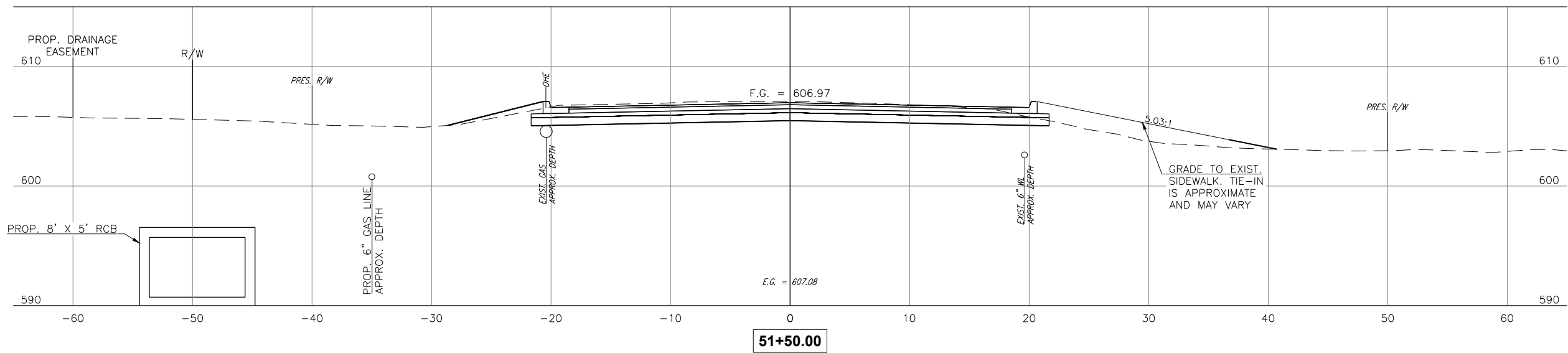
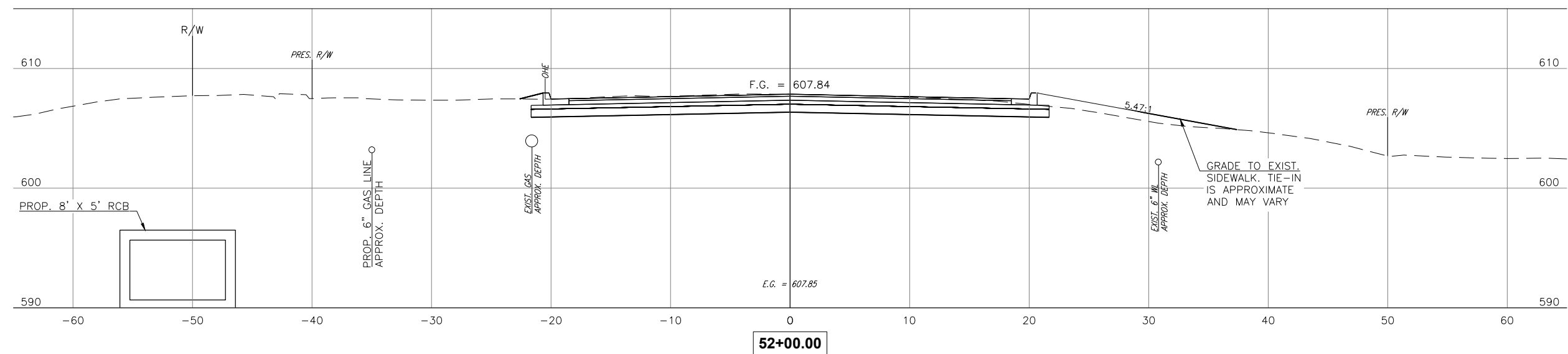
XS 38

SHEET

XS 38

BIXBY, OKLAHOMA

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



CEC CORPORATION
1300 S. MAIN STREET
TULSA, OKLAHOMA 74119
P: 918.683.9401
WWW.CONNECTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAP. 32 EXPIRES: 2028-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING



SUBMITTAL:		REVISION HISTORY		
PRELIMINARY		NO.	DESCRIPTION	DATE
DATE:	11/30/2023			
PROJECT NO:	170231.0102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			

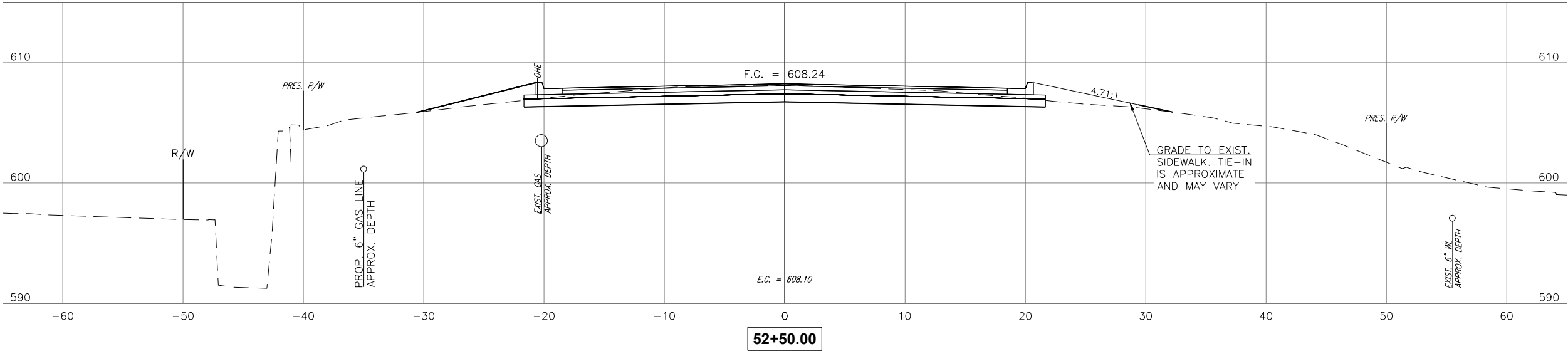
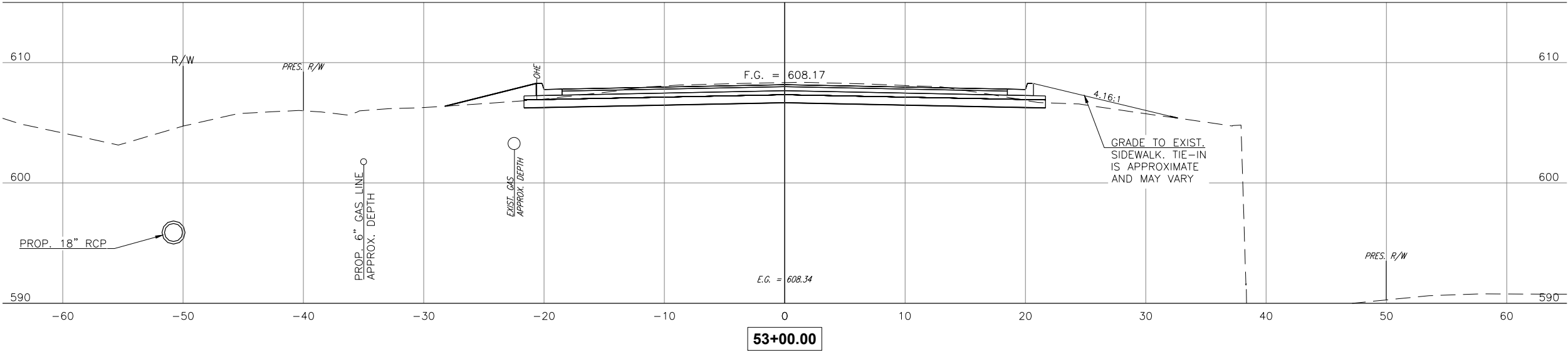
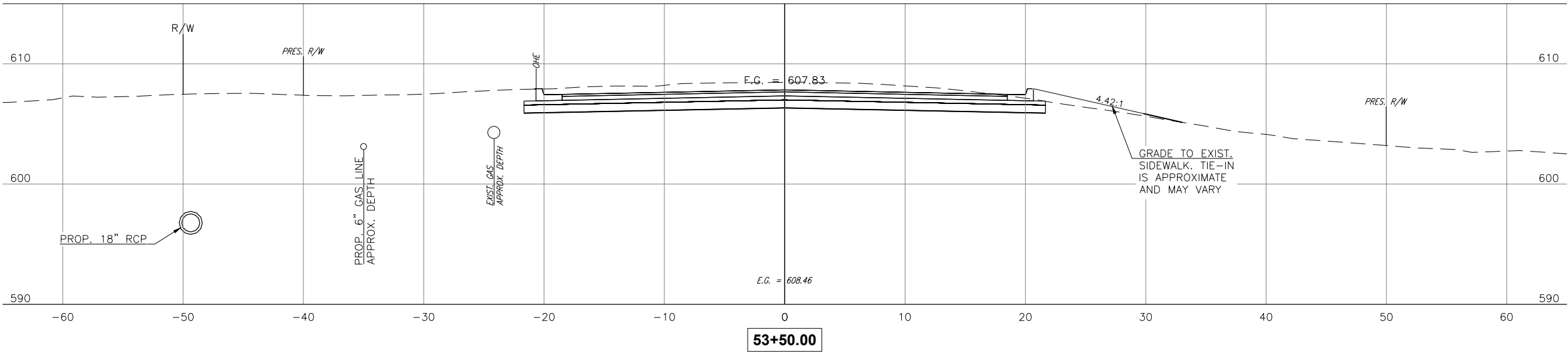
131ST ST. - MEMORIAL TO MINGO

SHEET NAME

XS 39

SHEET
XS 39

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
STATE OF OK CERTIFICATE OF AUTHORIZATION
CAB 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REUSE OR REPRODUCTION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



SUBMITTAL:	PRELIMINARY	REVISION HISTORY		
		NO.	DESCRIPTION	DATE
DATE:	11/30/2023			
PROJECT NO:	1702310102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:	S.N.H.			
SCALE:	AS SHOWN			

131ST ST. - MEMORIAL TO MINGO

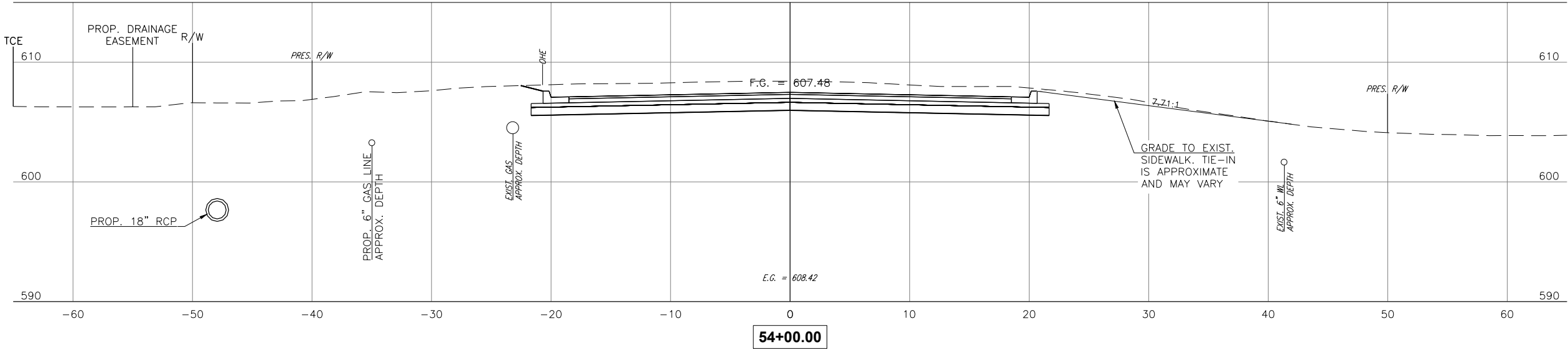
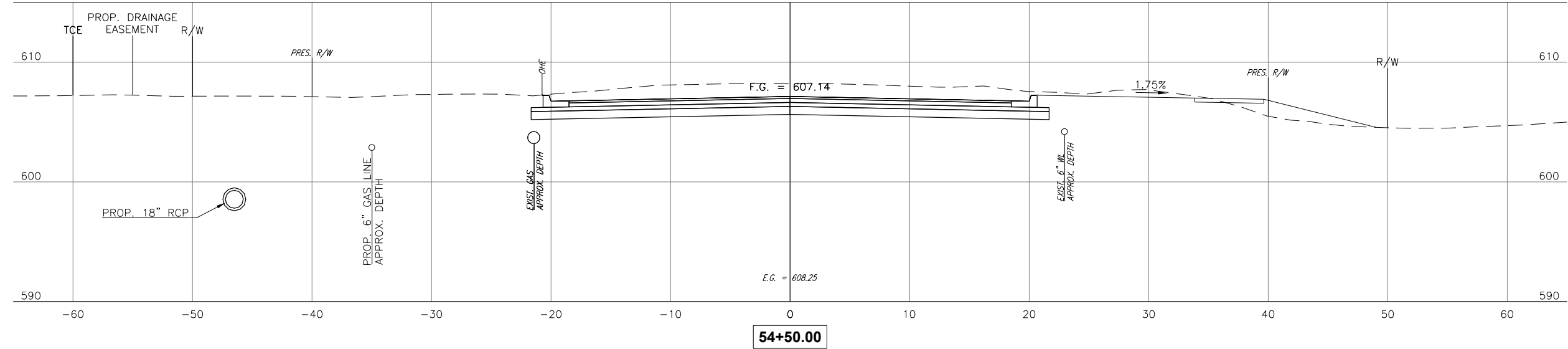
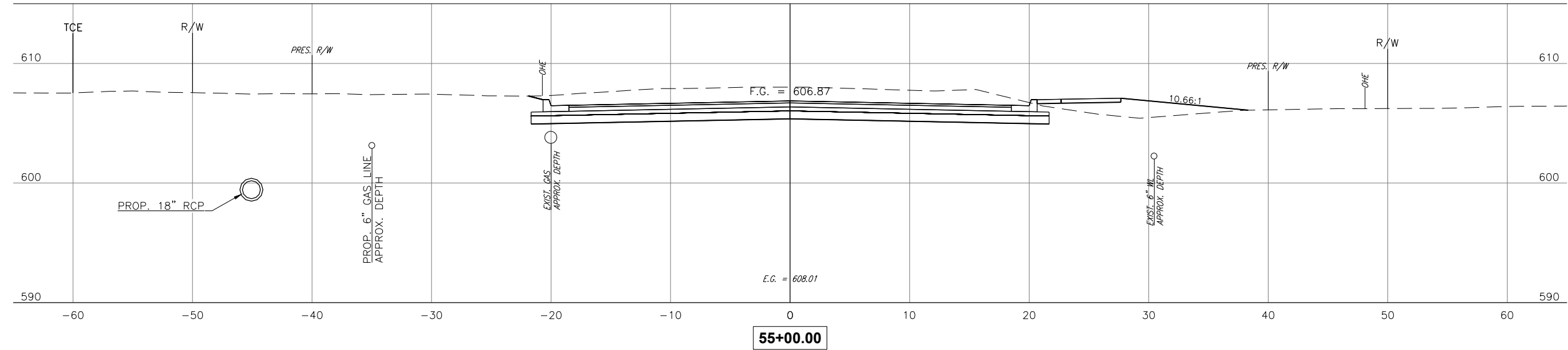
SHEET NAME

XS 40

SHEET

XS 40

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
CAN 32 EXPIRES: 2026-06-30

STATE OF OK CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR TRANSMISSION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE: AS SHOWN					

131ST ST. - MEMORIAL TO MINGO

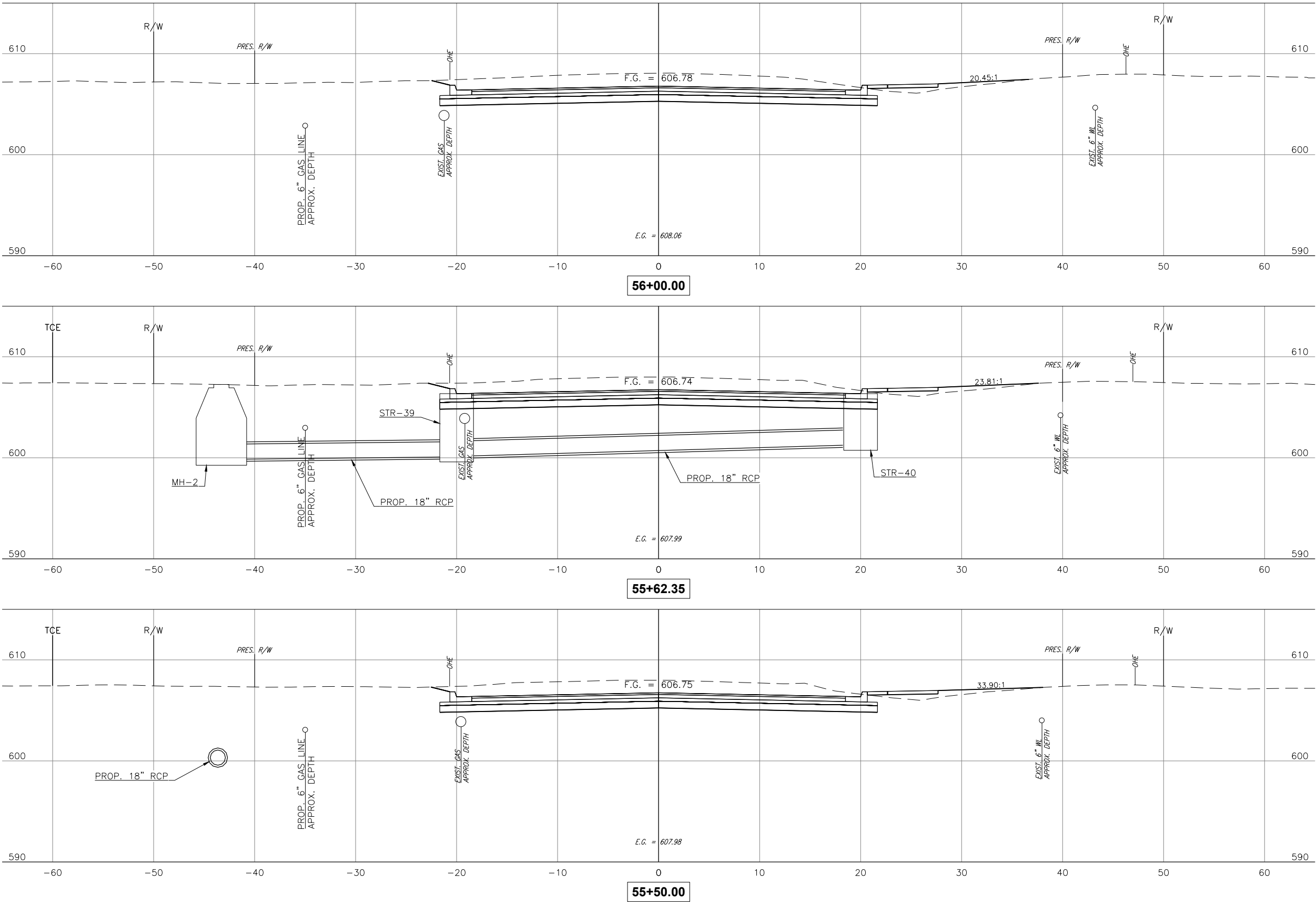
XS 41

XS 41

BIXBY, OKLAHOMA

Page 119 of 215

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNEXCEC.COM
CAN 32 EXPIRES: 2026-06-30
STATE OF OK CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REUSE OR REPRODUCTION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO.	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE: AS SHOWN					

131ST ST. - MEMORIAL TO MINGO

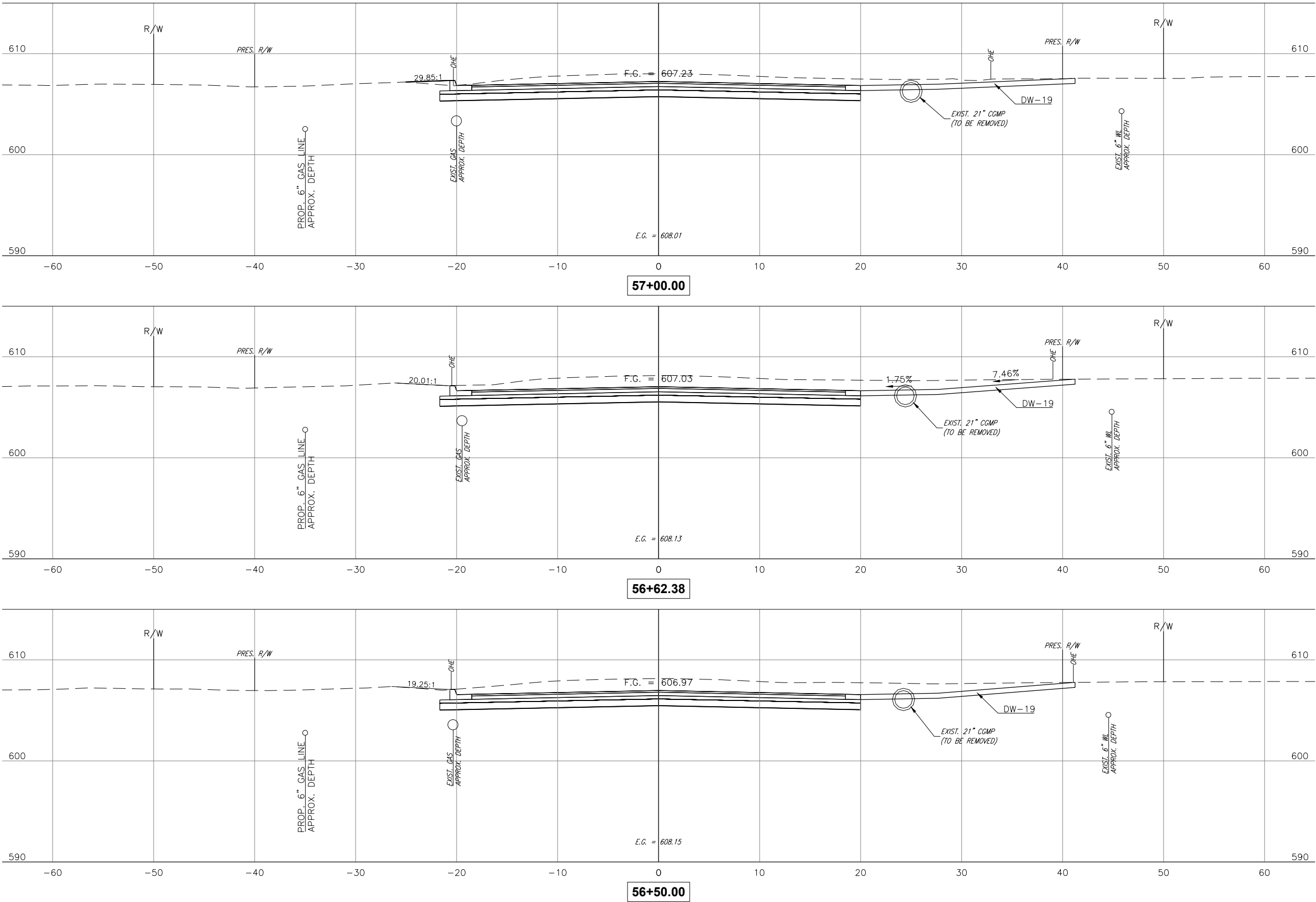
SHEET NAME
XS 42

SHEET
XS 42

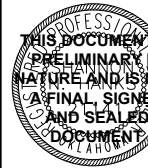
BIXBY, OKLAHOMA

Page 120 of 215

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
STATE OF OK CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES: 2026-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



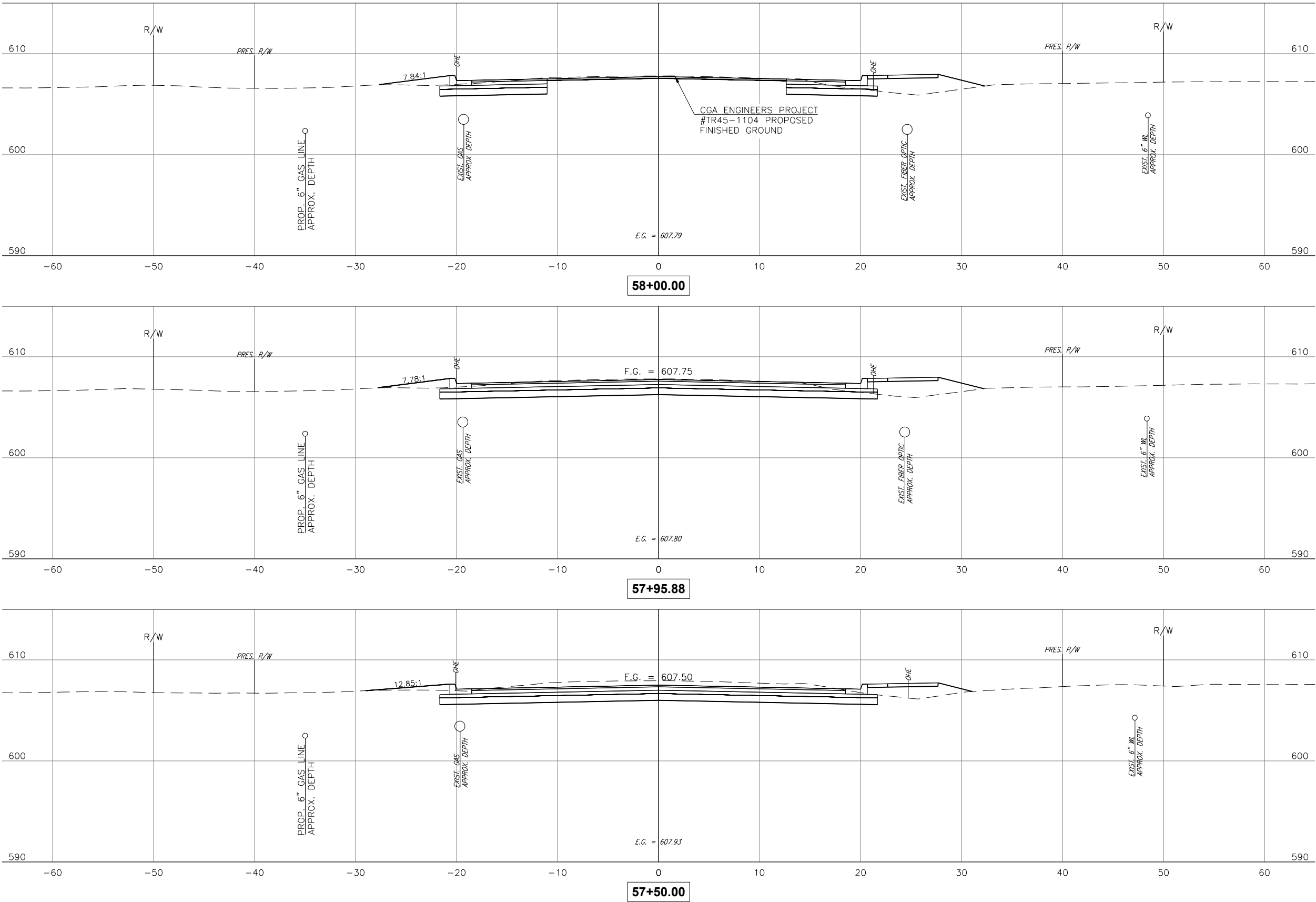
SUBMITTAL:	PRELIMINARY	REVISION HISTORY			
		NO.	DESCRIPTION	DATE	
DATE:	11/30/2023				
PROJECT NO:	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

131ST ST. - MEMORIAL TO MINGO

SHEET NAME
XS 43

SHEET
XS 43

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
CAN 32 EXPIRES: 2026-06-30
STATE OF OK CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REUSE OR REPRODUCTION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE:	AS SHOWN				

131ST ST. - MEMORIAL TO MINGO

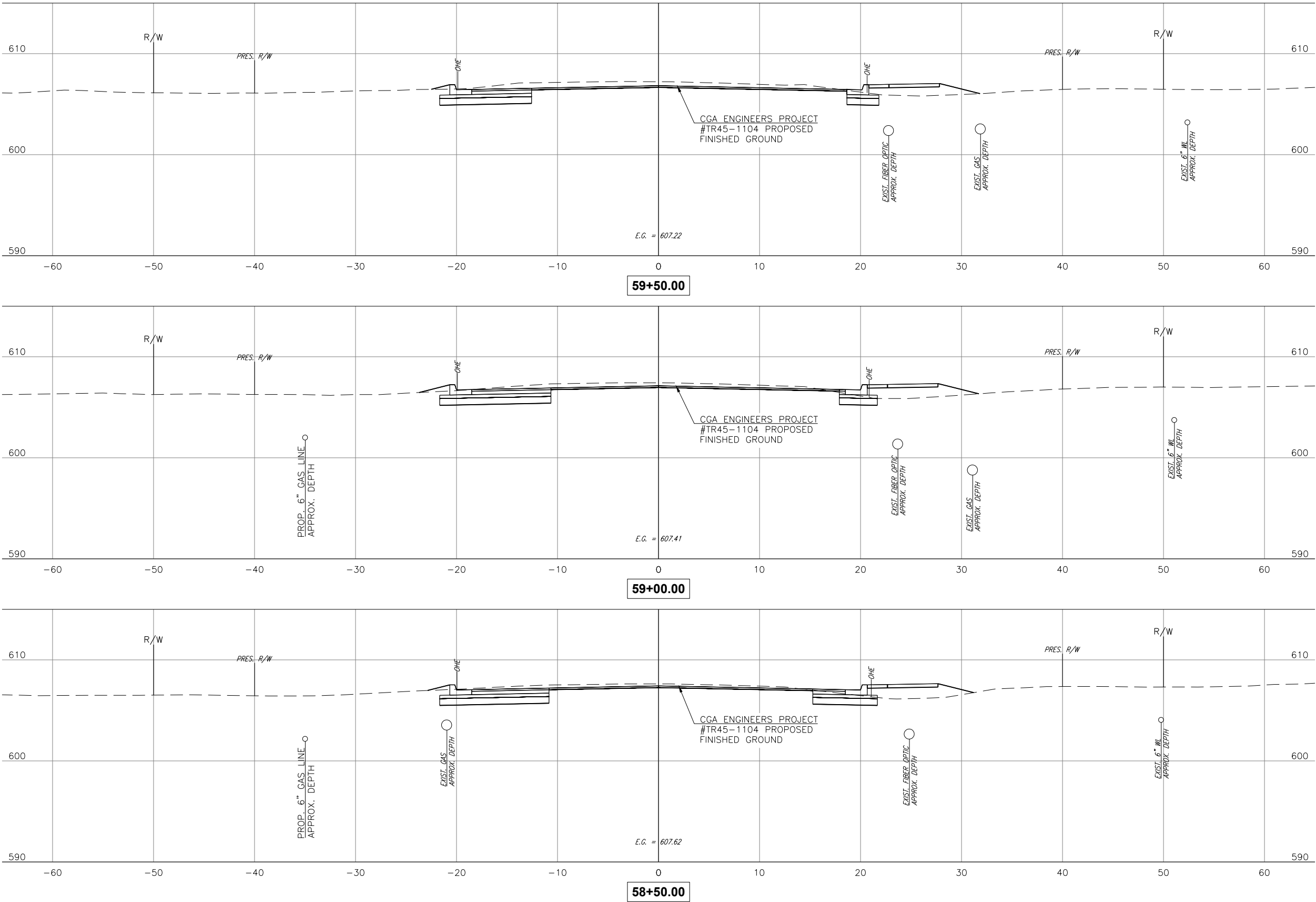
SHEET NAME
XS 44

SHEET
XS 44

BIXBY, OKLAHOMA

Page 122 of 215

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74119
WWW.CONNECTCEC.COM
STATE OF OK CERTIFICATE OF AUTHORIZATION
CAN 12 EXPIRES: 08/06/30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO.	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE:	AS SHOWN				

131ST ST. - MEMORIAL TO MINGO

SHEET NAME

XS 45

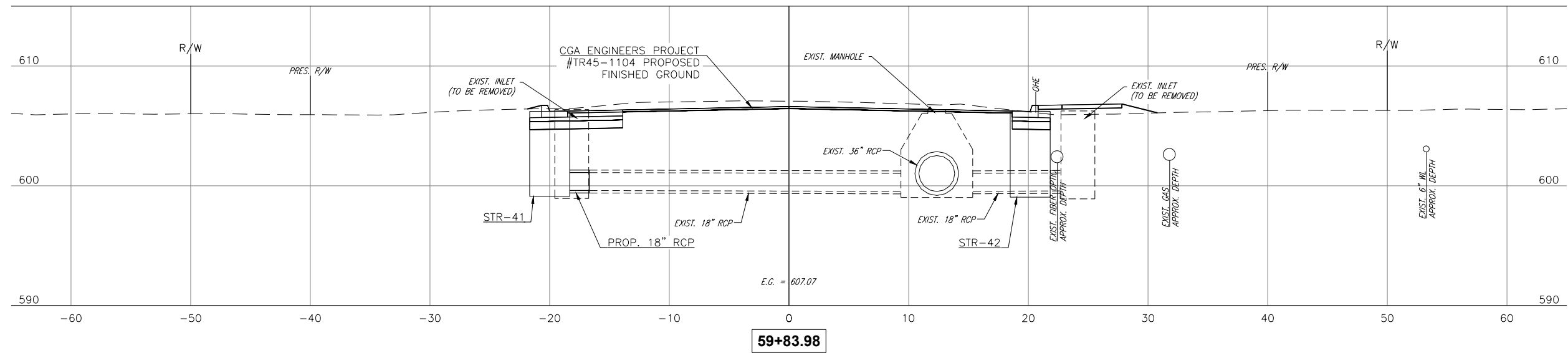
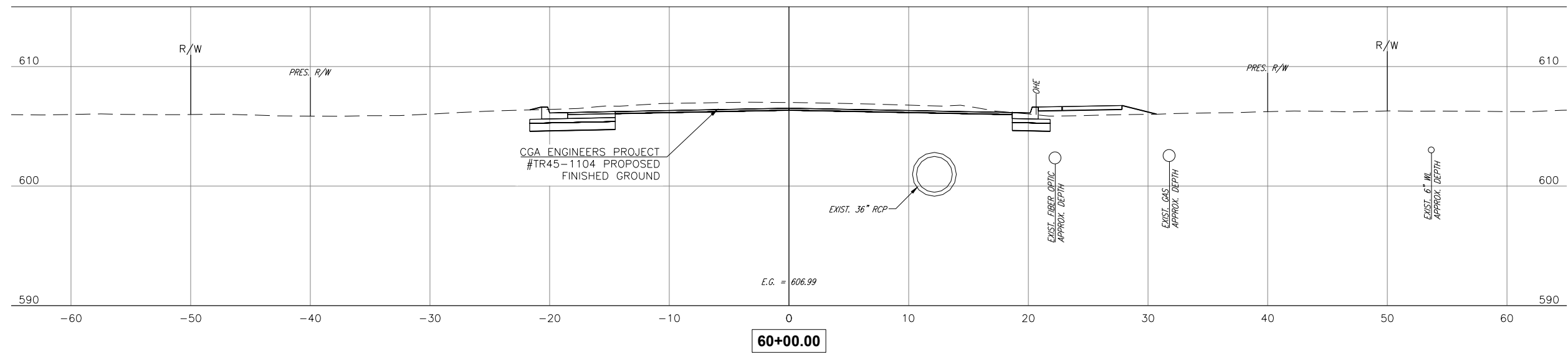
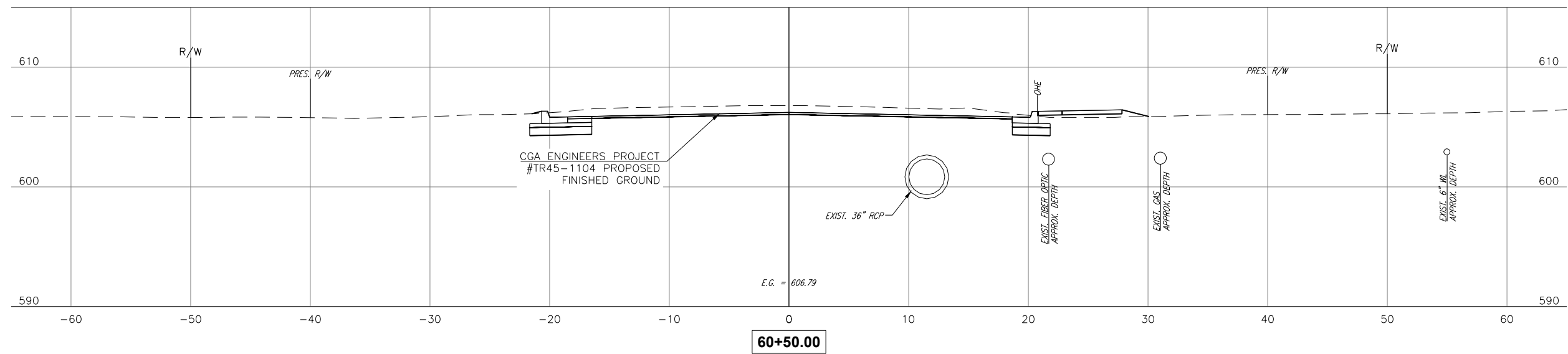
SHEET

XS 45

BIXBY, OKLAHOMA

Page 123 of 215

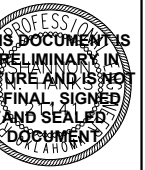
PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



TULSA, OKLAHOMA 74119
P: 918.063.9401
WWW.CONNECTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAP. 32 EXPIRES 2020-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



DATE:	11/30/2023	NO.	DESCRIPTION	DATE
PROJECT NO:	170231.0102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:	S.N.H.			
SCALE:	AS SHOWN			

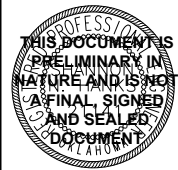
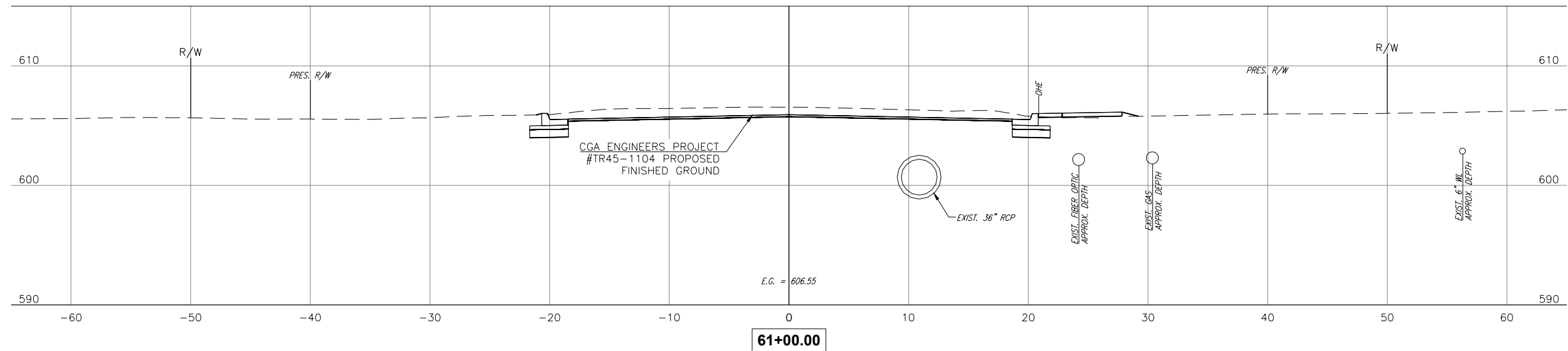
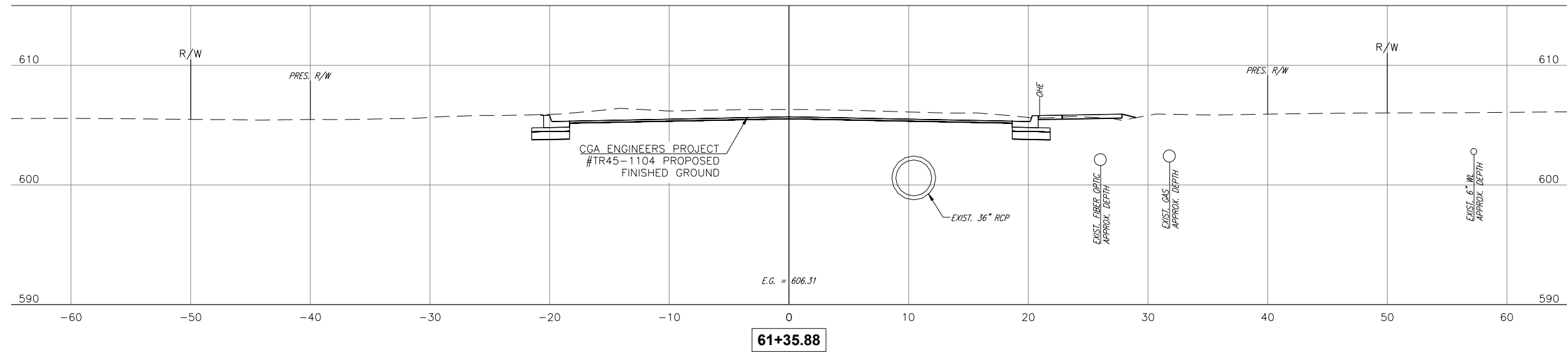
13131 31.- MEMORIAL TO MINGO

SHEET NAME

XS 46

SHEET
KS 46

PLOT DATE: July 31, 2024, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\DESIGN\CROSS SECTIONS.DWG



SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:		11/30/2023		NO.	DESCRIPTION
PROJECT NO:		170231.0102			
DESIGNED BY:		J.L.C.			
DRAWN BY:		J.L.C.			
APPROVED BY:		S.N.H.			
SCALE:		AS SHOWN			

131ST ST. - MEMORIAL TO MINGO

SHEET NAME
XS 47
SHEET
XS 47



CEC CORPORATION
1300 S. MAIN STREET
TULSA, OKLAHOMA 74119
P: 918.003.9401
WWW.CONNECTCEC.COM

CEC

SURVEY CONTROL DATA

1. HORIZONTAL DATUM IS TIED TO CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 WHICH IS ADJUSTED TO THE OKLAHOMA STATE PLANE NAD 83 (1993) COORDINATE SYSTEM, NORTH ZONE, PER MONUMENT #BA 11 DATA SHEET.
2. BEARINGS:
- THE BEARINGS SHOWN HEREIN OR HEREON ARE GRID BEARINGS DERIVED FROM THE USC & GS OKLAHOMA PLANE COORDINATE SYSTEM AND ARE NOT ASTRONOMICAL.
3. VERTICAL CONTROLS:
- A. LEVEL DATUM IS NGS, NAVD 88, PER CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 AND ADJUSTED FROM PRIMARY CONTROL UTILIZING DIFFERENTIAL LEVELING TECHNIQUES.
- B. ACCURACY - 3RD ORDER OR BETTER

TULSA BENCHMARK FROM CITY OF TULSA CONTROL DATA PREPARED BY AERIAL DATA SERVICE MONUMENTED JANUARY, 2002 STATION NO. BA 11 MON. TYPE 3" ALUMINUM CAP SET IN CONCRETE
N: 361550.5020
E: 2604311.8720
ELEV: 632.430
LAT: 35°58'26.01634"
LONG: 95°51'03.77782"

PRELIMINARY DRAINAGE PLANS FOR
GARDENVIEW ADDITION
PUBLIC WORKS DEPARTMENT
CITY OF BIXBY, OKLAHOMA

INDEX OF SHEETS

SHT. NO.	DESCRIPTION
1.	TITLE
2.	PAY ITEMS & NOTES
3.	TYPICAL SECTIONS
4.-5.	SUMMARY OF DRAINAGE STRUCTURES
6.	STORMWATER MANAGEMENT PLAN
7.	DRAINAGE AREA MAP
8.-15.	SURVEY DATA
16.-23.	EROSION CONTROL
24.-47.	DITCH PLAN & PROFILES
XS 1.-XS 37.	CROSS SECTIONS

ODOT STANDARDS

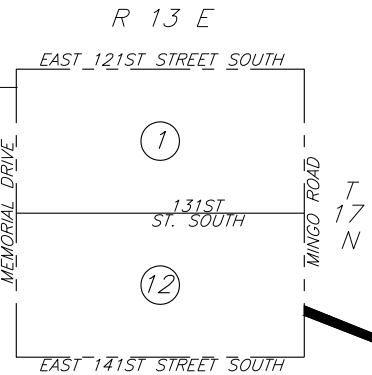
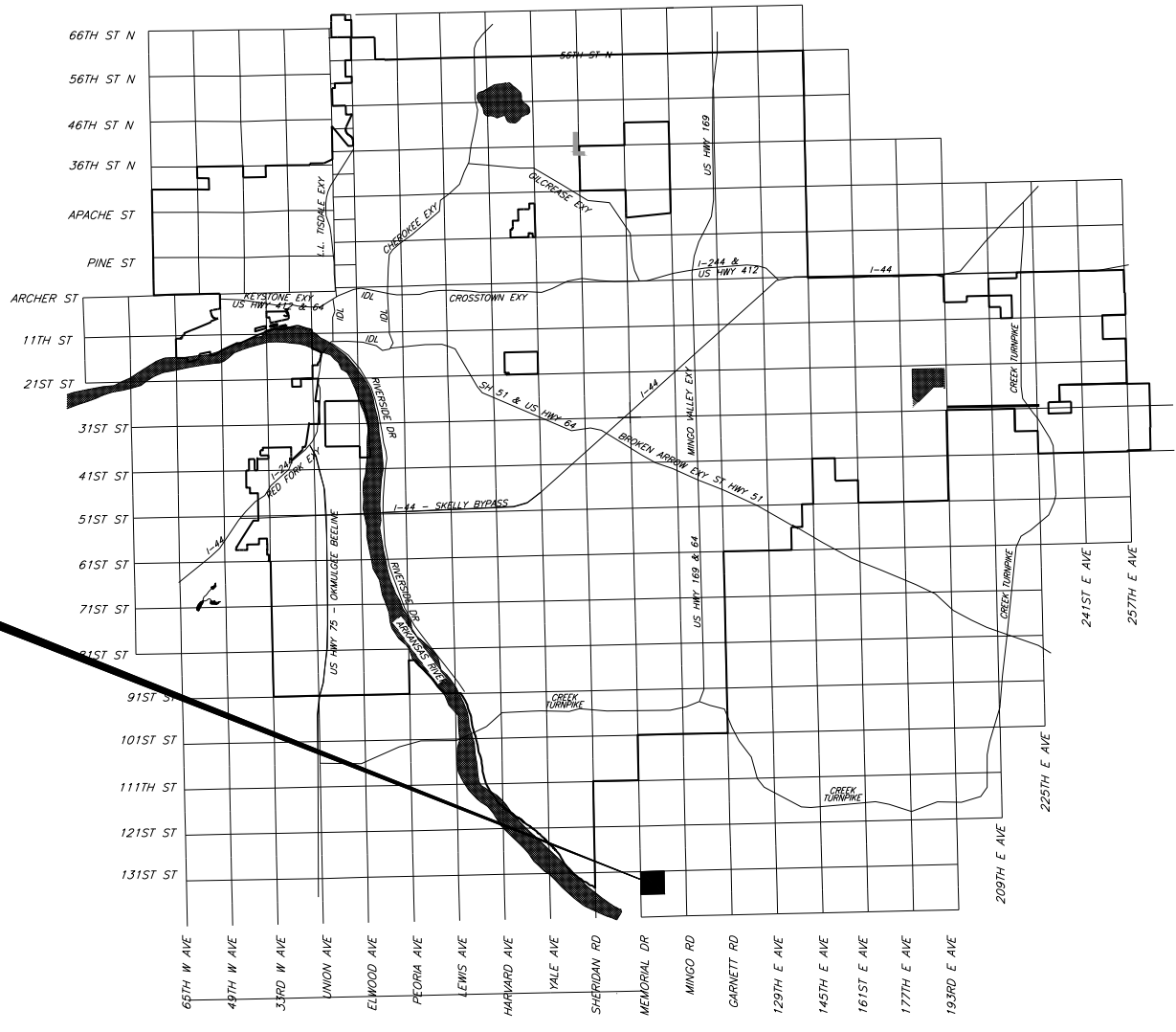
ROADWAY

IPD-0
TSD-0
SSS-2-1
SMD-4-2
NLB-4-2
SPI-5-2

LEGEND

- PROPOSED ROADS
SECTION LINES
QUARTER SECTION LINES
FENCES (EXISTING)
EXISTING GRADE
EXISTING ROADS
EXISTING INDEX CONTOURS
EXISTING INTERMEDIATE CONTOURS
BASE LINE
PROPOSED GRADE
COMMUNICATION LINES (EXISTING)
POWER LINES (EXISTING)
GAS LINE (EXISTING)
SANITARY SEWER LINES (EXISTING)
WATER LINES (EXISTING)
COMMUNICATION LINES (PROPOSED)
POWER LINES (PROPOSED)
GAS LINE (PROPOSED)
SANITARY SEWER LINES (PROPOSED)
WATER LINES (PROPOSED)
BUILDINGS (EXISTING)
DRAINAGE STRUCTURES (EXISTING)
DRAINAGE STRUCTURES (PROPOSED)
RIGHT-OF-WAY LINES (EXISTING)
RIGHT-OF-WAY LINES (PROPOSED)
RIGHT-OF-WAY FENCE
FLOWLINE (EXISTING)
FLOWLINE (PROPOSED)
TOE OF SLOPE (EXISTING)

ROADWAY
2019 OKLAHOMA STANDARD SPECIFICATIONS FOR HIGHWAY CONSTRUCTION-ENGLISH,
APPROVED BY THE U.S. DEPARTMENT OF TRANSPORTATION, FEDERAL HIGHWAY
ADMINISTRATION, DECEMBER 18, 2019, SHALL GOVERN.



CEC CORPORATION
1300 S. Main Street
Tulsa, Oklahoma 74137
T: (918) 663-9401
F: (918) 663-9404
WWW.CONNECTCEC.COM



THIS DOCUMENT
IS PRELIMINARY
IN NATURE AND IS
NOT A FINAL
AND SEALED
DOCUMENT

CITY ENGINEER DATE

ADVERTISEMENT DATE:

ENGINEER'S CERTIFICATION:

SHANNON N. HANKS, P.E. NO. 21141

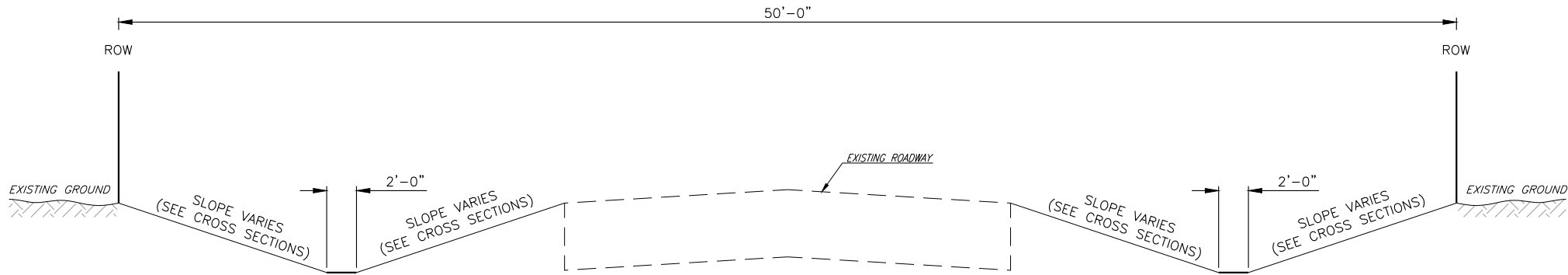
DATE

BASE BID					
ITEM NO.	SPEC. NO.	DESCRIPTION	PAY ITEM NOTES	UNIT	QUANTITY
1	201(A)	CLEARING AND GRUBBING	-	AC	3
2	202(A)	UNCLASSIFIED EXCAVATION	12, 14	CY	372
3	220	SWPPP DOCUMENTATION AND MANAGEMENT	-	LS	1
4	221(C)	TEMPORARY SEDIMENT FILTER	-	EA	52
5	221(E)	TEMPORARY SILT DIKE	-	LF	525
6	230(A)	SOLID SLAB SODDING	1, 2	SY	8,768
7	240(A)	REMOVING TREES 13" TO 18" IN DIAMETER	-	EA	1
8	303(A)	AGGREGATE BASE TYPE A	13	CY	372
9	310(B)	SUBGRADE, METHOD B	-	SY	645
10	325	SEPARATOR FABRIC	-	SY	1,599
11	402(A)	TRAFFIC BOUND SURFACE COURSE TYPE A	19	TON	161
12	411(H)	SUPERPAVE, TYPE S3 (PATCH) (PG 64-22 OK)	10, 11	TON	204
13	609(B)	1'-8" COMB. CURB & GUTTER (6" BARRIER)	8	LF	33
14	610(A)	4" CONCRETE SIDEWALK	8	SY	5
15	610(B)	6" CONCRETE DRIVEWAY	6, 8	SY	193
16	610(G)	BITUMINOUS DRIVEWAY	-	SY	16
17	611(A)	MANHOLE (4' DIA)	-	EA	1
18	611(A)	MANHOLE (5' DIA)	-	EA	3
19	611(A)	MANHOLE (6' DIA)	-	EA	3
20	611(B)	ADD'L DEPTH IN MANHOLE (5' DIA)	-	VF	4
21	611(B)	ADD'L DEPTH IN MANHOLE (6' DIA)	-	VF	3
22	611(G)	INLET (SMD TYPE 1)	-	EA	22
23	611(G)	INLET (SMD TYPE 2A)	-	EA	8
24	611(G)	INLET (SMD TYPE 2B)	-	EA	11
25	611(H)	ADD'L DEPTH IN INLET SMD TYPE 1	-	VF	31
26	611(H)	ADD'L DEPTH IN INLET SMD TYPE 2A	-	VF	7
27	611(H)	ADD'L DEPTH IN INLET SMD TYPE 2B	-	VF	17
28	611(L)	JUNCTION BOXES	-	CF	1,548
29	612(E)	VALVE BOXES ADJUST TO GRADE	-	EA	1
30	612(F)	METER BOXES ADJUST TO GRADE	-	EA	8
31	613(A)	18" R.C. PIPE CLASS III	3, 9	LF	820
32	613(A)	24" R.C. PIPE CLASS III	3, 9	LF	169
33	613(A)	30" R.C. PIPE CLASS III	3, 9	LF	615
34	613(A)	36" R.C. PIPE CLASS III	3, 9	LF	1,015
35	613(A)	42" R.C. PIPE CLASS III	3, 9	LF	342
36	613(A)	48" R.C. PIPE CLASS III	3, 9	LF	708
37	613(A)	54" R.C. PIPE CLASS III	3, 9	LF	252
38	613(A)	72" R.C. PIPE CLASS III	3, 9	LF	845
39	619(A)	REMOVAL OF STRUCTURES AND OBSTRUCTIONS	5, 7, 15, 17	EA	1
40	619(B)	REMOVAL OF CURB AND GUTTER	5, 16	LF	33
41	619(B)	REMOVAL OF DRIVEWAY	5, 16, 17	SY	784
42	619(B)	REMOVAL OF SIDEWALK	5, 16, 17	SY	5
43	619(B)	REMOVAL OF FENCE	16, 18	LF	340
44	624(E)	FENCE-STYLE CLF (5' HIGH, CLASS A)	-	LF	278
45	624(F)	GATES-STYLE CLF (5' HIGH X 6' LONG)	-	EA	2
46	629(D)	REMOVE AND RESET MAILBOX	18	EA	9
47	641	MOBILIZATION	-	LS	1
48	642	CONSTRUCTION STAKING	4	LS	1
49	880(J)	CONSTRUCTION TRAFFIC CONTROL	-	LS	1
50	SPECIAL	SMD TYPE 1 GRATE	-	EA	11

PAY ITEM NOTES (ROADWAY)

- THE PAY ITEM SOLID SLAB SODDING SHALL INCLUDE THE REPLACEMENT OF BACK FILL AND SOD AT EXISTING GRASS AREAS THAT MAY BE DAMAGED DURING CONSTRUCTION. CONTRACTOR SHALL REPLACE WITH LIKE SOD AT NO ADDITIONAL EXPENSE TO THE CITY OF BIXBY. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE REPAIR OR REPLACEMENT OF DAMAGE TO EXISTING THAT EXCEEDS THESE LIMITS.
2. THE COST FOR SOLID SLAB SODDING INCLUDE THE COST OF FERTILIZING AND WATERING. FERTILIZER SHALL BE 10-20-10 APPLIED AT A RATE OF 1.5 POUNDS PER 10 SQUARE YARDS OF SOD. FERTILIZER SHALL BE APPLIED PER SECTION 230.04(H). WATERING SHALL BE APPLIED AS NECESSARY UNTIL VEGETATION IS ESTABLISHED OR UNTIL THE WORK IS ACCEPTED AS COMPLETE.
3. PAY ITEM INCLUDES JOINT SEALANT, TRENCH EXCAVATION, BEDDING, AND BACK FILL
4. ALL STAKING AND SURVEYING NECESSARY TO COMPLETELY CONSTRUCT ALL ITEMS OF PROJECT SHALL BE PERFORMED BY A REGISTERED LICENSED SURVEYOR IN THE STATE OF OKLAHOMA. FINISHED GRADES TO BE APPROVED BY THE INSPECTOR. ALL RESPONSIBILITIES DESCRIBED IN PARAGRAPH "A" OF SECTION 642 OF THE 2019 ODOT STANDARD SPECIFICATIONS SHALL BE PERFORMED BY THE CONTRACTOR.
5. THE PAYMENT, INCLUDES BUT NOT LIMITED TO SAWING PAVEMENT, DEMOLITION, REMOVAL HAULING, DISPOSAL, MATERIALS AND LABOR TO REMOVE OR CONSTRUCT, BACK FILL AND COMPACTION, TO BE INCLUDED IN THESE ITEMS.
6. THIS ITEM SHALL INCLUDE THE COST OF ALL CURB AND GUTTER ASSOCIATED WITH THE DRIVEWAY RADII AND THROUGH THE DRIVEWAY OPENING.
7. SALVAGED GRATES AND FRAMES TO BECOME PROPERTY OF THE CITY OF BIXBY. PIPE REMOVED BECOME PROPERTY OF THE CONTRACTOR.
8. ALL SAW CUTTING, DOWELS, AND SEALING SHALL BE INCLUDED IN THE COST OF THE ITEM.
9. OMNI-FLEX GASKETS, OR APPROVED EQUAL, SHALL BE USED IN ALL REINFORCED CONCRETE PIPE JOINTS. COST TO BE INCLUDED IN THIS ITEM OF WORK.
10. PAY FACTOR FOR AVERAGE LOT DENSITY OF ASPHALT PAVING UNDER SPECIFICATION NO. 411 SHALL BE USED FOR THIS PROJECT. ASPHALT ESTIMATED AT 112 LBS. PER SQUARE YARD PER 1" THICK.
11. THE COST OF TACK COAT, EDGE JOINT MATERIAL, SCREENINGS FOR BLOTING AND ALL LABOR ASSOCIATED WITH THE PLACEMENT OF THIS ITEM SHALL BE INCLUDED IN THE UNIT BID FOR THIS ITEM. TACK COAT SHALL BE APPLIED AT A RATE OF 0.5 GALLONS PER SQUARE YARD PRIOR TO DILUTION.
12. THIS PAY ITEM INCLUDES THE COST OF PLACING SUITABLE BACK FILL FOR ALL ITEMS OF WORK.
13. QUANTITY INCLUDES 6" AGGREGATE BASE UNDER NEW CONCRETE AND BITUMINOUS DRIVEWAYS.
14. PAYMENT SHALL BE MADE PER PLAN QUANTITIES FOR ALL EXCAVATION REQUIRED. NO ADDITIONAL PAYMENT SHALL BE MADE UNLESS QUANTITIES ARE EXTENDED TO ACCOUNT FOR ADDITIONAL WORK ADDED TO THE SCOPE OF THE PROJECT.
15. INCLUDES REMOVAL OF ALL EXISTING ROADWAY DRAINAGE STRUCTURE, HEADWALLS (UNLESS OTHERWISE SPECIFIED), INLETS, AND OTHER STRUCTURES WITHIN THE RIGHT-OF-WAY.
16. TO BECOME THE PROPERTY OF AND BE DISPOSED OF BY THE CONTRACTOR IN A MANNER APPROVED BY THE ENGINEER.
17. MATERIALS REMOVED SHALL NOT BE MEASURED FOR PAYMENT UNDER SECTION 202.06 UNCLASSIFIED EXCAVATION.
18. THE CONTRACTOR SHALL REMOVE AND RESET MAILBOXES AS NECESSARY. MAILBOXES ARE TO BE MAINTAINED IN AN UPRIGHT POSITION AND ACCESSIBLE TO MAIL CARRIER'S CAR DURING CONSTRUCTION. ANY DAMAGE TO BOXES OR SUPPORTS SHALL BE REPAIRED BY THE CONTRACTOR ALL COST TO BE INCLUDED IN OTHER ITEMS OF WORK.
19. ESTIMATED AT 120 LBS. PER CU. FT.

[illegible]

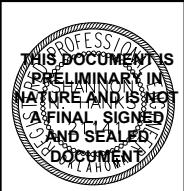


*** CONSTRUCT LEFT DITCH
STA. 70+61.54 TO STA. 71+07.84
STA. 71+31.91 TO STA. 71+56.78
STA. 71+89.34 TO STA. 72+11.60
STA. 72+16.44 TO STA. 72+65.24
STA. 73+72.25 TO STA. 74+11.57
STA. 74+27.45 TO STA. 74+69.59
STA. 80+57.66 TO STA. 82+00.98
STA. 82+26.31 TO STA. 82+58.63
STA. 82+77.69 TO STA. 83+15.32
STA. 83+25.12 TO STA. 83+68.16
STA. 83+82.10 TO STA. 84+17.84
STA. 84+35.28 TO STA. 84+76.60
STA. 84+88.55 TO STA. 85+68.81
STA. 85+93.92 TO STA. 86+76.61
STA. 87+12.23 TO STA. 87+72.74
STA. 88+13.69 TO STA. 89+01.68
STA. 92+17.98 TO STA. 93+23.97
STA. 93+41.93 TO STA. 94+27.67
STA. 94+44.55 TO STA. 94+58.31
STA. 94+80.76 TO STA. 95+84.00
STA. 95+93.60 TO STA. 96+83.93
STA. 97+00.63 TO STA. 97+81.00
STA. 98+04.56 TO STA. 98+95.60
STA. 99+16.10 TO STA. 99+84.83
STA. 110+48.86 TO STA. 110+79.75
STA. 112+18.40 TO STA. 113+32.67
STA. 114+04.08 TO STA. 114+30.32
STA. 115+48.28 TO STA. 115+92.52
STA. 116+16.64 TO STA. 116+94.90
STA. 120+75.07 TO STA. 122+13.88

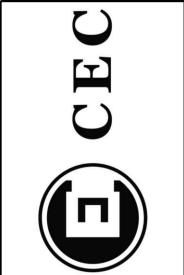
**TYPICAL SECTION 5
GARDENVIEW DRAINAGE DITCHES**

*** CONSTRUCT RIGHT DITCH
STA. 71+51.94 TO STA. 72+36.45
STA. 72+46.97 TO STA. 73+18.61
STA. 73+36.04 TO STA. 74+68.72
STA. 80+32.23 TO STA. 81+33.29
STA. 81+69.78 TO STA. 83+04.42
STA. 84+08.12 TO STA. 84+52.64
STA. 84+87.23 TO STA. 86+03.59
STA. 86+32.87 TO STA. 87+85.19
STA. 87+97.03 TO STA. 88+76.31
STA. 90+07.70 TO STA. 90+89.55
STA. 92+04.81 TO STA. 92+97.63
STA. 93+18.43 TO STA. 93+97.87
STA. 94+12.88 TO STA. 95+01.22
STA. 95+11.33 TO STA. 95+92.63
STA. 96+04.79 TO STA. 96+85.99
STA. 97+31.94 TO STA. 98+09.27
STA. 98+31.89 TO STA. 99+49.59
STA. 110+31.57 TO STA. 111+03.19
STA. 112+17.01 TO STA. 112+93.54
STA. 113+93.96 TO STA. 116+28.77
STA. 121+18.48 TO STA. 121+84.26
STA. 122+13.82 TO STA. 122+25.75

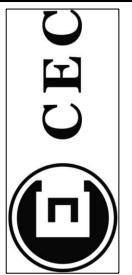
SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	11/30/2023	PROJECT NO.:	170231.0102	NO.	DESCRIPTION
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				



CEC CORPORATION
TULSA, OKLAHOMA 74137
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC CORPORATION.
IT IS TO BE USED ONLY FOR THE PROJECT AND LOCATION
SPECIFICALLY IDENTIFIED ON THE DRAWING.
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.



SUMMARY OF DRAINAGE STRUCTURES																																	
STRUCTURE NUMBER	ALIGNMENT	EXISTING/ PROPOSED	STATION	OFFSET	NORTHING	EASTING	DESCRIPTION	DESIGN	INLET TOP OF GRATE	INVERT ELEVATION	INVERT ELEVATION DOWNSTREAM	INNER STR HEIGHT	4' DIA. MANHOLE	5' DIA. MANHOLE	6' DIA. MANHOLE	SMD TYPE 1 INLET	SMD TYPE 2A INLET	SMD TYPE 2B INLET	5' DIA. MANHOLE ADD'L DEPTH	6' DIA. MANHOLE ADD'L DEPTH	SMD TYPE 1 ADD'L DEPTH	SMD TYPE 2A ADD'L DEPTH	SMD TYPE 2B ADD'L DEPTH	SMD TYPE 1 GRATE	18" ROUND RCP	24" ROUND RCP	30" ROUND RCP	36" ROUND RCP	42" ROUND RCP	48" ROUND RCP	54" ROUND RCP	72" ROUND RCP	JUNCTION BOXES
									(FT)	(FT)	(FT)	(FT)	(EA)	(EA)	(EA)	(EA)	(EA)	(EA)	(VF)	(VF)	(VF)	(VF)	(VF)	(EA)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)
STR-39	131st PI	Proposed	70+29.31	22.8	360776.29	2594169.08	CONSTRUCT INLET, STUB 38.3 LF 18" RCP INTO MH-3	SMD TYPE 1	605.55	602.91	602.53	2.64	-	-	-	1	-	-	-	-	0.08	-	-	-	38	-	-	-	-	-	-	-	-
STR-38	131st PI	Proposed	70+41.05	16.4	360815.74	2594180.08	CONSTRUCT INLET, STUB 54.8 LF 36" RCP INTO STR-40	SMD TYPE 2B	605.40	601.20	601.08	4.20	-	-	-	-	-	1	-	-	-	-	0.01	-	-	-	-	55	-	-	-	-	-
STR-37	131st PI	Proposed	70+84.07	16.7	360816.82	2594223.09	CONSTRUCT INLET, STUB 39.4 LF 36" RCP INTO STR-38	SMD TYPE 2B	605.39	601.29	601.20	4.10	-	-	-	-	-	1	-	-	-	-	-	-	-	-	39	-	-	-	-	-	-
STR-35	131st PI	Proposed	71+51.20	17.1	360818.49	2594290.19	CONSTRUCT INLET, STUB 63.5 LF 36" RCP INTO STR-37	SMD TYPE 2B	605.44	601.44	601.29	4.00	-	-	-	-	-	1	-	-	-	-	-	-	-	-	63	-	-	-	-	-	-
STR-73	131st PI	Proposed	72+00.47	17.4	360819.72	2594339.45	CONSTRUCT INLET, STUB 46.1 LF 30" RCP INTO STR-35	SMD TYPE 2A	605.42	602.05	601.94	3.37	-	-	-	-	1	-	-	-	-	-	-	-	-	-	46	-	-	-	-	-	-
STR-36	131st PI	Proposed	72+00.68	17.4	360784.92	2594340.32	CONSTRUCT INLET, STUB 31.7 LF 30" RCP INTO STR-73	SMD TYPE 2A	605.32	602.10	602.05	3.22	-	-	-	-	1	-	-	-	-	-	-	-	-	32	-	-	-	-	-	-	-
STR-33	131st PI	Proposed	72+39.83	17.7	360820.70	2594378.80	CONSTRUCT INLET, STUB 36.7 LF 18" RCP INTO STR-73	SMD TYPE 1	605.00	603.14	603.05	1.86	-	-	-	1	-	-	-	-	-	-	-	-	37	-	-	-	-	-	-	-	-
STR-34	131st PI	Proposed	72+98.06	16.8	360787.35	2594437.67	CONSTRUCT INLET, STUB 94.7 LF 24" RCP INTO STR-36	SMD TYPE 1	605.00	602.70	602.60	2.30	-	-	-	1	-	-	-	-	-	-	-	-	95	-	-	-	-	-	-	-	-
STR-32	131st PI	Proposed	73+74.69	16.3	360789.25	2594514.27	CONSTRUCT INLET, STUB 74.0 LF 24" RCP INTO STR-34	SMD TYPE 1	605.05	602.80	602.70	2.25	-	-	-	1	-	-	-	-	-	-	-	-	74	-	-	-	-	-	-	-	-
STR-31	131st PI	Proposed	73+82.98	18.5	360824.26	2594521.91	CONSTRUCT INLET, STUB 140.5 LF 18" RCP INTO STR-33	SMD TYPE 1	605.25	603.44	603.14	1.81	-	-	-	1	-	-	-	-	-	-	-	-	141	-	-	-	-	-	-	-	-
STR-30	131st PI	Proposed	74+44.17	18.9	360825.79	2594583.08	CONSTRUCT INLET, STUB 58.5 LF 18" RCP INTO STR-31	SMD TYPE 1	605.71	603.58	603.44	2.13	-	-	-	1	-	-	-	-	-	-	-	-	59	-	-	-	-	-	-	-	-
STR-45	132nd St	Proposed	80+75.57	15.4	360431.79	2594221.34	CONSTRUCT INLET, STUB 58.1 LF 18" RCP INTO MH-7	SMD TYPE 1	605.48	602.44	602.09	3.04	-	-	-	1	-	-	-	-	0.48	-	-	-	58	-	-	-	-	-	-	-	-
STR-44	132nd St	Proposed	81+46.83	19.3	360468.59	2594291.54	CONSTRUCT INLET, STUB 90.5 LF 48" RCP INTO STR-74	JUNCTION BOX W/ SMD GRATE	605.00	599.10	598.96	5.90	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	91	-	-	85	-
STR-46	132nd St	Proposed	82+40.34	16.2	360435.89	2594386.05	CONSTRUCT INLET, STUB 30.9 LF 18" RCP INTO STR-74	SMD TYPE 1	605.49	601.73	601.42	3.76	-	-	-	1	-	-	-	-	1.20	-	-	-	31	-	-	-	-	-	-	-	-
STR-74	132nd St	Proposed	82+40.34	18.8	360470.91	2594385.02	CONSTRUCT INLET, STUB 56.9 LF 48" RCP INTO STR-75	JUNCTION BOX W/ SMD GRATE	605.46	598.96	598.87	6.50	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	57	-	-	92	-
STR-75	132nd St	Proposed	83+00.25	18.6	360472.41	2594444.91	CONSTRUCT INLET, STUB 43.4 LF 48" RCP INTO STR-47	JUNCTION BOX W/ SMD GRATE	605.28	598.87	598.80	6.41	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	43	-	-	92	-
STR-47	132nd St	Proposed	83+46.64	18.4	360473.56	2594491.29	CONSTRUCT INLET, STUB 106.5 LF 48" RCP INTO STR-48	JUNCTION BOX W/ SMD GRATE	605.00	598.80	598.63	6.20	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	106	-	-	90	-
STR-49	132nd St	Proposed	84+46.31	17.1	360441.02	2594591.96	CONSTRUCT INLET, STUB 32.3 LF 18" RCP INTO STR-48	SMD TYPE 1	605.77	601.45	601.13	4.32	-	-	-	1	-	-	-	-	1.76	-	-	-	32	-	-	-	-	-	-	-	-
STR-48	132nd St	Proposed	84+56.12	17.9	360476.29	2594600.73	CONSTRUCT INLET, STUB 78.0 LF 48" RCP INTO STR-50	JUNCTION BOX W/ SMD GRATE	605.00	598.63	598.51	6.37	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	78	-	-	90	-
STR-50	132nd St	Proposed	85+37.12	17.5	360478.31	2594681.71	CONSTRUCT INLET, STUB 113.4 LF 48" RCP INTO STR-52	JUNCTION BOX W/ SMD GRATE	605.00	598.51	598.34	6.49	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	113	-	-	92	-
STR-51	132nd St	Proposed	85+37.12	17.5	360443.29	2594682.74	CONSTRUCT INLET, STUB 30.9 LF 18" RCP INTO STR-50	SMD TYPE 1	605.29	601.32	601.01	3.97	-	-	-	1	-	-	-	-	1.41	-	-	-	31	-	-	-	-	-	-	-	-
STR-52	132nd St	Proposed	86+53.56	17.0	360481.21	2594798.12	CONSTRUCT INLET, STUB 94.1 LF 48" RCP INTO STR-54	JUNCTION BOX W/ SMD GRATE	605.00	598.34	598.19	6.66	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	94	-	-	94	-
STR-53	132nd St	Proposed	86+53.56	18.1	360446.19	2594799.15	CONSTRUCT INLET, STUB 30.9 LF 18" RCP INTO STR-52	SMD TYPE 1	605.34	601.15	600.84	4.19	-	-	-	1	-	-	-	-	1.63	-	-	-	31	-	-	-	-	-	-	-	-
STR-54	132nd St	Proposed	87+50.70	16.5	360483.63	2594895.23	CONSTRUCT INLET, STUB 101.5 LF 54" RCP INTO STR-76	JUNCTION BOX W/ SMD GRATE	605.00	597.69	597.53	7.31	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-	102	-	109	-
STR-55	132nd St	Proposed	87+50.43	18.5	360448.60	2594895.99	CONSTRUCT INLET, STUB 30.6 LF 18" RCP INTO STR-54	SMD TYPE 1	605.30	601.00	600.69	4.30	-	-	-	1	-	-	-	-	1.74	-	-	-	31	-	-	-	-	-	-	-	-
STR-76	132nd St	Proposed	88+55.20	16.0	360486.23	2594999.70	CONSTRUCT INLET, STUB 150.5 LF 54" RCP INTO JB-8	JUNCTION BOX W/ SMD GRATE	605.42	597.53	597.30	7.89	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-	150	-	114	-
STR-56	132nd St	Proposed	88+55.20	19.0	360451.21	2595000.73	CONSTRUCT INLET, STUB 30.6 LF 18" RCP INTO STR-76	SMD TYPE 1	605.25	600.84	600.53	4.41	-	-	-	1	-	-	-	-	1.85	-	-	-	31	-	-	-	-	-	-	-	-
STR-71	133rd Ave	Proposed	90+33.14	18.0	360099.92	2594171.85	CONSTRUCT INLET, STUB 211.5 LF 30" RCP INTO STR-60	SMD TYPE 2A	606.92	602.96	602.38	3.96	-	-	-	-	1	-	-	-	-	0.31	-	-	-	-	211	-	-	-	-	-	-
STR-60	133rd Ave	Proposed	92+47.24	16.7	360105.25	2594385.89	CONSTRUCT INLET, STUB 31.1 LF 30" RCP INTO STR-59	SMD TYPE 2A	608.03	602.38	602.29	5.65	-	-	-	-	1	-	-	-	-	2.00	-	-	-	-	31	-	-	-	-	-	-
STR-59	133rd Ave	Proposed	92+47.24	17.6	360139.47	2594385.24	CONSTRUCT INLET, STUB 120.4 LF 30" RCP INTO STR-61	SMD TYPE 2A	607.66	602.29	601.96	5.37	-	-	-	-	1	-	-	-	-	1.72	-	-	-	-	120	-	-	-	-	-	-
STR-61	133rd Ave	Proposed	93+70.24	18.3	360142.54	2594508.20	CONSTRUCT INLET, STUB 67.4 LF 30" RCP INTO MH-11	SMD TYPE 2A	607.84	601.96	601.77	5.88	-	-	-	-	1	-	-	-	-	2.23	-	-	-	-	67	-	-	-	-	-	-



CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
CAN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR TRANSMISSION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	11/30/2023	PROJECT NO.:	170231.0102	NO.	DESCRIPTION
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

GARDENVIEW ADDITION DRAINAGE

SHEET NAME
SUMMARY OF
DRAINAGE
STRUCTURES
(1 OF 2)

SHEET
4

BIXBY, OKLAHOMA

Page 129 of 215

SUMMARY OF DRAINAGE STRUCTURES																																									
STRUCTURE NUMBER	ALIGNMENT	EXISTING/ PROPOSED	STATION	OFFSET	NORTHING	EASTING	DESCRIPTION	DESIGN	INLET TOP OF GRATE	INVERT ELEVATION	INVERT ELEVATION DOWNSTREAM	INNER STR HEIGHT	4' DIA. MANHOLE	5' DIA. MANHOLE	6' DIA. MANHOLE	SMD TYPE 1 INLET	SMD TYPE 2A INLET	SMD TYPE 2B INLET	5' DIA. MANHOLE ADD'L DEPTH	6' DIA. MANHOLE ADD'L DEPTH	SMD TYPE 1 ADD'L DEPTH	SMD TYPE 2A ADD'L DEPTH	SMD TYPE 2B ADD'L DEPTH	SMD TYPE 1 GRATE	18" ROUND RCP	24" ROUND RCP	30" ROUND RCP	36" ROUND RCP	42" ROUND RCP	48" ROUND RCP	54" ROUND RCP	72" ROUND RCP	JUNCTION BOXES								
									MH TOP OF RIM				(FT)	(FT)	(EA)	(EA)	(EA)	(EA)	(EA)	(EA)	(VF)	(VF)	(VF)	(VF)	(VF)	(EA)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	CF
									(FT)				(FT)	(FT)	(FT)	(EA)	(EA)	(EA)	(EA)	(EA)	(VF)	(VF)	(VF)	(VF)	(VF)	(EA)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)	(LF)
STR-62	133rd Ave	Proposed	93+70.24	15.9	360108.31	2594508.85	CONSTRUCT INLET, STUB 31.4 LF 18" RCP INTO STR-61	SMD TYPE 1	607.91	603.28	602.96	4.63	-	-	-	1	-	-	-	-	2.07	-	-	-	31	-	-	-	-	-	-	-	-	-							
STR-63	133rd Ave	Proposed	94+41.46	15.5	360110.09	2594580.05	CONSTRUCT INLET, STUB 30.5 LF 18" RCP INTO MH-11	SMD TYPE 1	607.56	603.08	602.77	4.48	-	-	-	1	-	-	-	-	1.92	-	-	-	30	-	-	-	-	-	-	-	-	-							
MH-11	133rd Ave	Proposed	94+41.46	18.7	360144.31	2594579.40	CONSTRUCT MANHOLE, STUB 107.1 LF 36" RCP INTO STR-77	5' MANHOLE	608.23	601.27	600.97	6.96	-	1	-	-	-	-	0.96	-	-	-	-	-	-	-	-	107	-	-	-	-	-	-							
STR-77	133rd Ave	Proposed	95+52.86	19.4	360147.09	2594690.78	CONSTRUCT INLET, STUB 80.9 LF 36" RCP INTO STR-64	SMD TYPE 2B	607.61	600.97	600.74	6.64	-	-	-	-	-	1	-	-	-	-	2.45	-	-	-	-	81	-	-	-	-	-	-							
STR-65	133rd Ave	Proposed	95+52.86	14.8	360112.86	2594691.42	CONSTRUCT INLET, STUB 31.2 LF 18" RCP INTO STR-77	SMD TYPE 1	607.66	602.78	602.47	4.88	-	-	-	1	-	-	-	-	2.32	-	-	-	31	-	-	-	-	-	-	-	-	-							
STR-64	133rd Ave	Proposed	96+37.39	19.9	360149.19	2594775.28	CONSTRUCT INLET, STUB 121.4 LF 36" RCP INTO STR-67	SMD TYPE 2B	607.35	600.74	600.41	6.61	-	-	-	-	-	1	-	-	-	-	2.42	-	-	-	-	121	-	-	-	-	-	-							
STR-66	133rd Ave	Proposed	96+37.39	14.3	360114.97	2594775.93	CONSTRUCT INLET, STUB 31.2 LF 18" RCP INTO STR-64	SMD TYPE 1	607.48	602.55	602.24	4.93	-	-	-	1	-	-	-	-	2.37	-	-	-	31	-	-	-	-	-	-	-	-	-							
STR-67	133rd Ave	Proposed	97+62.50	20.7	360152.31	2594900.35	CONSTRUCT INLET, STUB 89.6 LF 36" RCP INTO STR-78	SMD TYPE 2B	606.98	600.41	600.15	6.57	-	-	-	-	-	1	-	-	-	-	2.38	-	-	-	-	90	-	-	-	-	-	-							
STR-80	133rd Ave	Proposed	97+62.70	13.6	360118.09	2594901.20	CONSTRUCT INLET, STUB 31.2 LF 18" RCP INTO STR-67	SMD TYPE 1	607.45	602.22	601.91	5.23	-	-	-	1	-	-	-	-	2.67	-	-	-	31	-	-	-	-	-	-	-	-	-							
STR-78	133rd Ave	Proposed	98+55.75	21.2	360154.63	2594993.57	CONSTRUCT INLET, STUB 93.6 LF 36" RCP INTO STR-79	SMD TYPE 2B	606.45	600.15	599.88	6.30	-	-	-	-	-	1	-	-	-	-	2.11	-	-	-	-	94	-	-	-	-	-	-							
STR-81	133rd Ave	Proposed	98+55.96	13.0	360120.41	2594994.43	CONSTRUCT INLET, STUB 31.2 LF 18" RCP INTO STR-78	SMD TYPE 1	607.58	601.96	601.65	5.62	-	-	-	1	-	-	-	-	3.06	-	-	-	31	-	-	-	-	-	-	-	-	-							
STR-79	133rd Ave	Proposed	99+52.99	21.8	360157.05	2595090.78	CONSTRUCT INLET, STUB 69.1 LF 36" RCP INTO MH-14	SMD TYPE 2B	607.09	599.88	599.69	7.21	-	-	-	-	-	1	-	-	-	-	3.02	-	-	-	-	69	-	-	-	-	-	-							
STR-57	83rd Ave	Proposed	110+66.50	13.1	360183.76	2594136.72	CONSTRUCT INLET, STUB 26.2 LF 30" RCP INTO STR-58	SMD TYPE 2A	606.30	603.25	603.17	3.05	-	-	-	-	1	-	-	-	-	-	-	-	-	-	26	-	-	-	-	-	-								
STR-58	83rd Ave	Proposed	110+66.50	16.3	360184.26	2594166.04	CONSTRUCT INLET, STUB 81.7 LF 30" RCP INTO STR-71	SMD TYPE 2A	606.38	603.17	602.96	3.21	-	-	-	-	1	-	-	-	-	-	-	-	-	-	82	-	-	-	-	-	-								
STR-43	83rd Ave	Proposed	113+12.34	15.0	360429.53	2594130.60	CONSTRUCT INLET, STUB 26.1 LF 18" RCP INTO MH-7	SMD TYPE 1	606.49	602.35	602.09	4.14	-	-	-	1	-	-	-	-	1.58	-	-	-	26	-	-	-	-	-	-	-	-	-							
MH-7	83rd Ave	Proposed	113+12.57	14.3	360430.26	2594159.91	CONSTRUCT MANHOLE, STUB 30.1 LF 18" RCP INTO MH-6	4' MANHOLE	606.77	602.09	601.79	4.68	1	-	-	-	-	-	-	-	-	-	-	30	-	-	-	-	-	-	-	-	-								
MH-6	83rd Ave	Proposed	113+47.63	16.4	360465.34	2594161.43	CONSTRUCT MANHOLE, STUB 125.7 LF 48" RCP INTO STR-44	6' MANHOLE	606.60	599.29	599.10	7.31	-	-	1	-	-	-	-	1.31	-	-	-	-	-	-	-	-	-	126	-	-	-	-							
STR-42	83rd Ave	Proposed	114+15.21	15.8	360532.37	2594128.03	CONSTRUCT INLET, STUB 27.5 LF 18" RCP INTO MH-5	SMD TYPE 1	606.51	602.20	601.92	4.31	-	-	-	1	-	-	-	-	1.75	-	-	-	27	-	-	-	-	-	-	-	-	-							
MH-5	83rd Ave	Proposed	114+15.22	15.9	360532.92	2594159.75	CONSTRUCT MANHOLE, STUB 61.6 LF 42" RCP INTO MH-6	6' MANHOLE	606.57	599.92	599.79	6.65	-	-	1	-	-	-	-	0.65	-	-	-	-	-	-	-	62	-	-	-	-	-	-							
STR-70	83rd Ave	Proposed	115+10.11	15.1	360627.78	2594157.38	CONSTRUCT INLET, STUB 89.3 LF 42" RCP INTO MH-5	JUNCTION BOX W/ SMD GRATE	605.71	600.11	599.92	5.60	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	89	-	-	-	-	-	115							
MH-4	83rd Ave	Proposed	115+10.11	16.6	360627.24	2594125.67	CONSTRUCT MANHOLE, STUB 26.1 LF 42" RCP INTO STR-70	6' MANHOLE	607.21	600.20	600.13	7.01	-	-	1	-	-	-	-	1.01	-	-	-	-	-	-	-	26	-	-	-	-	-	-							
STR-41	83rd Ave	Proposed	115+73.64	17.1	360690.75	2594124.09	CONSTRUCT INLET, STUB 58.7 LF 36" RCP INTO MH-4	SMD TYPE 2B	605.84	600.84	600.70	5.00	-	-	-	-	-	1	-	-	-	-	0.81	-	-	-	-	59	-	-	-	-	-	-							
MH-3	83rd Ave	Proposed	116+58.06	12.8	360775.24	2594126.98	CONSTRUCT MANHOLE, STUB 80.2 LF 36" RCP INTO STR-41	5' MANHOLE	605.88	601.03	600.84	4.85	-	1	-	-	-	-	-	-	-	-	-	-	-	-	80	-	-	-	-	-	-								
STR-40	83rd Ave	Proposed	116+79.20	14.3	360796.35	2594125.13	CONSTRUCT INLET, STUB 16.9 LF 36" RCP INTO MH-3	SMD TYPE 2B	605.73	601.08	601.03	4.65	-	-	-	-	-	1	-	-	-	-	0.46	-	-	-	-	17	-	-	-	-	-	-							
MH-14	85th Ave	Proposed	120+73.36	19.5	360165.82	2595163.67	CONSTRUCT MANHOLE, STUB 64.1 LF 36" RCP INTO STR-68	5' MANHOLE	608.29	599.69	599.51	8.60	-	1	-	-	-	-	2.60	-	-	-	-	-	-	-	64	-	-	-	-	-	-								
STR-69	85th Ave	Proposed	122+21.58	17.9	360314.00	2595159.98	CONSTRUCT INLET, STUB 165.1 LF 42" RCP INTO JB-8	JUNCTION BOX W/ SMD GRATE	607.00	598.79	598.30	8.21	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	165	-	-	-	-	-	148							
STR-72	85th Ave	Proposed	121+41.76	16.4	360233.73	2595126.81	CONSTRUCT INLET, STUB 32.1 LF 18" RCP INTO STR-68	SMD TYPE 1	606.40	601.33	601.01	5.07	-	-	-	1	-	-	-	-	2.51	-	-	-	32	-	-	-	-	-	-	-	-	-							
STR-68	85th Ave	Proposed	121+41.76	18.8	360234.21	2595161.96	CONSTRUCT INLET, STUB 75.7 LF 36" RCP INTO STR-69	SMD TYPE 2B	606.51	599.51	599.29	7.00	-	-	-	-	-	1	-	-	-	-	2.81	-	-	-	-	76	-	-	-	-	-	-							
JB-8	85th Ave	Proposed	123+92.17	16.0	360484.55	2595155.73	CONSTRUCT JUNCTION BOX, STUB 423.3 LF 72" RCP INTO JB-9	JUNCTION BOX	606.80	595.80	595.15	11.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	423	275								
JB-9	85th Ave	Proposed	128+20.20	16.6	360912.56	2595150.43	CONSTRUCT JUNCTION BOX, STUB 422.3 LF 72" RCP INTO JB-3	JUNCTION BOX	604.56	595.15	594.50	9.41	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	422	152								
TOTALS													1	3	3	22	8	11	3.56	2.97	30.40	6.26	16.47	11	820	169	615	1015	342	708	252	845	1548								



CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAP 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING IS TO BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT

PROFESSIONAL SEAL

SUBMITTAL:

DATE: 11/30/2023

PROJECT NO: 170231.0102

DESIGNED BY: J.L.C.

DRAWN BY: J.L.C.

APPROVED BY: S.N.H.

SCALE: AS SHOWN

GARDENVIEW ADDITION DRAINAGE

SHEET NAME
SUMMARY OF DRAINAGE STRUCTURES
(2 OF 2)
SHEET
5

BIXBY, OKLAHOMA

925

Page 130 of 215

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\STORMWATER MANAGEMENT PLAN.DWG

STORM WATER MANAGEMENT PLAN

SITE DESCRIPTION

PROJECT LIMITS: 131ST PL. FROM 83RD AVE. TO DEAD END, 132ND ST. FROM 83RD AVE. TO 85TH AVE.
133RD ST. FROM 83RD AVE. TO 85TH AVE., 83RD AVE. FROM 133RD ST. TO 131ST PL., 85TH AVE. FROM 133RD
ST. TO 131ST ST. BIXBY, OKLAHOMA

PROJECT DESCRIPTION: DRAINAGE IMPROVEMENTS

- SUGGESTED SEQUENCE OF EROSION CONTROL ACTIVITIES:
1. VEGETATIVE STRIPPING
 2. UNDERCUT & STOCKPILE EXISTING TOPSOIL. PRESERVE AS MUCH NATIVE VEGETATION AS POSSIBLE
 3. INSTALL SEDIMENT CONTROLS
 4. INSTALL DRAINAGE IMPROVEMENTS
 5. SPREAD TOPSOIL
 6. INSTALL SOLID SLAB SOD

SOIL TYPE: VERY FINE SANDY LOAM

TOTAL AREA OF THE CONSTRUCTION SITE: 4.86 ACRES

ESTIMATED AREA TO BE DISTURBED: 2.84 ACRES

OFFSITE AREA TO BE DISTURBED:
(FOR CONTRACTOR USE)

TOTAL IMPERVIOUS AREA PRE-CONSTRUCTION: 2.19 ACRES

TOTAL IMPERVIOUS AREA POST-CONSTRUCTION: 2.19 ACRES

POST-CONSTRUCTION RUNOFF COEFFICIENT OF THE SITE: 0.55

LATITUDE & LONGITUDE OF CENTER OF PROJECT: 35°58'17.30" N, 95°53'01.43" W

PROJECT WILL DISCHARGE TO:

NAME OF RECEIVING WATERS: FRY DITCH CREEK

SENSITIVE WATERS OR WATERSHEDS: YES ☒ NO ☐

303(d) IMPAIRED WATERS: YES ☐ NO ☒

IF YES, LIST IMPAIRMENT:

LOCATED IN A TMDL: YES ☐ NO ☒

LAKE THUNDERBIRD TMDL: YES ☐ NO ☒

MS4 ENTITY YES ☐ NO ☒

IF YES, LOCATION:

NOTE:
THIS SHEET SHOULD BE USED IN CONJUNCTION WITH A DRAINAGE MAP THAT ILLUSTRATES THE DRAINAGE PATTERNS/PATHWAYS AND RECEIVING WATERS FOR THIS PROJECT. THIS SHEET SHOULD ALSO BE USED WITH THE EROSION CONTROL SUMMARIES, PAY ITEMS, & NOTES.

EROSION AND SEDIMENT CONTROLS

SOIL STABILIZATION PRACTICES:

- TEMPORARY SEEDING
- ☒ PERMANENT SODDING, SPRIGGING OR SEEDING
- VEGETATIVE MULCHING
- SOIL RETENTION BLANKET
- ☒ PRESERVATION OF EXISTING VEGETATION
- HYDROMULCH / HYDROSEED

NOTE: TEMPORARY EROSION CONTROL METHODS MUST BE USED ON ALL DISTURBED AREAS WHERE CONSTRUCTION ACTIVITIES HAVE CEASED FOR OVER 14 DAYS. METHODS USED WILL BE AS SHOWN ON PLANS, OR AS DIRECTED BY THE ENGINEER.

STRUCTURAL PRACTICES:

- STABILIZED CONSTRUCTION EXIT
- ☒ TEMPORARY SILT FENCE
- ☒ TEMPORARY SILT DIKES
- TEMPORARY FIBER LOG
- DIVERSION, INTERCEPTOR OR PERIMETER DIKES
- DIVERSION, INTERCEPTOR OR PERIMETER SWALES
- ROCK FILTER DAMS
- TEMPORARY SLOPE DRAIN
- PAVED DITCH W/ DITCH LINER PROTECTION
- TEMPORARY DIVERSION CHANNELS
- TEMPORARY SEDIMENT BASINS
- TEMPORARY SEDIMENT TRAPS
- ☒ TEMPORARY SEDIMENT FILTERS
- ☒ TEMPORARY SEDIMENT REMOVAL
- RIP RAP
- ☒ INLET SEDIMENT FILTER
- TEMPORARY BRUSH SEDIMENT BARRIERS
- SANDBAG BERMS
- TEMPORARY STREAM CROSSINGS
- FLEXAMAT / ARTICULATED CONCRETE BLOCK
- COMPOST FILTER SOCKS
- EROSION CONTROL MATS AND BLANKETS

OFFSITE VEHICLE TRACKING:

- ☒ HAUL ROADS DAMPENED FOR DUST CONTROL
- ☒ LOADED HAUL TRUCKS TO BE COVERED WITH TARPAULIN
- EXCESS DIRT ON ROAD REMOVED DAILY

NOTES:

THE CONTRACTOR SHALL ALSO BE RESPONSIBLE FOR THE FOLLOWING:

MAINTENANCE AND INSPECTION:

ALL EROSION AND SEDIMENT CONTROLS WILL BE MAINTAINED IN GOOD WORKING ORDER FROM THE BEGINNING OF CONSTRUCTION UNTIL AN ACCEPTABLE VEGETATIVE COVER IS ESTABLISHED. INSPECTION BY THE CONTRACTOR AND ANY NECESSARY REPAIRS SHALL BE PERFORMED ONCE EVERY 7 CALENDAR DAYS AND WITHIN 24 HOURS AFTER ANY STORM EVENT GREATER THAN 0.5 INCH AS RECORDED BY A NON-FREEZING RAIN GAUGE TO BE LOCATED ON SITE. POTENTIALLY ERODIBLE AREAS, DRAINAGEWAYS, MATERIAL STORAGE, STRUCTURAL DEVICES, CONSTRUCTION ENTRANCES AND EXITS ALONG WITH EROSION AND SEDIMENT CONTROL LOCATIONS ARE EXAMPLES OF SITES THAT NEED TO BE INSPECTED.

WASTE MATERIALS:

PROPER MANAGEMENT AND DISPOSAL OF CONSTRUCTION WASTE MATERIAL IS REQUIRED BY THE CONTRACTOR. MATERIALS INCLUDE STOCKPILES, SURPLUS, DEBRIS AND ALL OTHER BY-PRODUCTS FROM THE CONSTRUCTION PROCESS. PRACTICES INCLUDE DISPOSAL, PROPER MATERIALS HANDLING, SPILL PREVENTION AND CLEANUP MEASURES. CONTROLS AND PRACTICES SHALL MEET THE REQUIREMENTS OF ALL FEDERAL, STATE AND LOCAL AGENCIES.

HAZARDOUS MATERIALS:

PROPER MANAGEMENT AND DISPOSAL OF HAZARDOUS WASTE MATERIALS IS REQUIRED. THE CONTRACTOR IS RESPONSIBLE FOR FOLLOWING MANUFACTURER'S RECOMMENDATIONS, STATE AND FEDERAL REGULATIONS TO ENSURE CORRECT HANDLING, DISPOSAL, SPILL PREVENTION AND CLEANUP MEASURES. EXAMPLES INCLUDE BUT ARE NOT LIMITED TO: PAINTS, ACIDS, CLEANING SOLVENTS, CHEMICAL ADDITIVES, CONCRETE CURING COMPOUNDS AND CONTAMINATED SOILS.

GENERAL NOTES:

A STORM WATER POLLUTION PREVENTION PLAN (SWPPP) IS REQUIRED TO COMPLY WITH THE OKLAHOMA POLLUTION DISCHARGE ELIMINATION SYSTEM (OPDES) REGULATIONS. THIS PLAN IS INITIATED DURING THE DESIGN PHASE, CONFIRMED IN THE PRE-WORK MEETINGS AND AVAILABLE ON THE JOB SITE ALONG WITH COPIES OF THE NOTICE OF INTENT (NOI) FORM AND PERMIT CERTIFICATE THAT HAVE BEEN FILED WITH THE OKLAHOMA DEPARTMENT OF ENVIRONMENTAL QUALITY (ODEQ). THE PLAN MUST BE KEPT CURRENT WITH UP-TO-DATE AMENDMENTS DURING THE PROGRESSION OF THE PROJECT. ALL CONTRACTOR OFF-SITE OPERATIONS ASSOCIATED WITH THE PROJECT MUST BE DOCUMENTED IN THE SWPPP, I.E., BORROW PITS, WORK ROADS, DISPOSAL SITES, ASPHALT/CONCRETE PLANTS, ETC. THE BASIC GOAL OF STORM WATER MANAGEMENT IS TO IMPROVE WATER QUALITY BY REDUCING POLLUTANTS IN STORM WATER DISCHARGES. RUNOFF FROM CONSTRUCTION SITES HAS A POTENTIAL FOR POLLUTION DUE TO EXPOSED SOILS AND THE PRESENCE OF HAZARDOUS MATERIALS USED IN THE CONSTRUCTION PROCESS. THE PREVENTION OF SOIL EROSION, CONTAINMENT OF HAZARDOUS MATERIALS AND/OR THE INTERCEPTION OF THESE POLLUTANTS BEFORE LEAVING THE CONSTRUCTION SITE ARE THE BEST PRACTICES FOR CONTROLLING STORM WATER POLLUTION.

THE FOLLOWING SECTIONS OF THE 2019 ODOT STANDARD SPECIFICATIONS SHOULD BE NOTED:

- 103.05 BONDING REQUIREMENTS
- 104.10 FINAL CLEANING UP
- 104.12 CONTRACTOR'S RESPONSIBILITY FOR WORK
- 104.13 ENVIRONMENTAL PROTECTION
- 106.08 STORAGE AND HANDLING OF MATERIAL
- 107.01 LAWS, RULES AND REGULATIONS TO BE OBSERVED
- 107.20 STORM WATER MANAGEMENT
 - 220 MANAGEMENT OF EROSION, SEDIMENTATION AND STORM WATER POLLUTION PREVENTION
 - 221 TEMPORARY SEDIMENT CONTROL

IN ADDITION:

"ODEQ GENERAL PERMIT (OKR10) FOR STORM WATER DISCHARGES FROM CONSTRUCTION ACTIVITIES WITHIN THE STATE OF OKLAHOMA." ODEQ, WATER QUALITY DIVISION, OCTOBER 18, 2022.

ADDITIONAL PERMITS REQUIRED FROM OKLAHOMA WATER RESOURCES BOARD AND/OR MUNICIPALITY FOR USE OF SURFACE, GROUND OR CITY WATER SOURCES FOR ACTIVITIES SUCH AS WATERING

CEC



CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXCEC.COM
STATE OF OK CERTIFICATE OF AUTHORIZATION
CAN 12 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
NO PART OF THIS DOCUMENT MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.



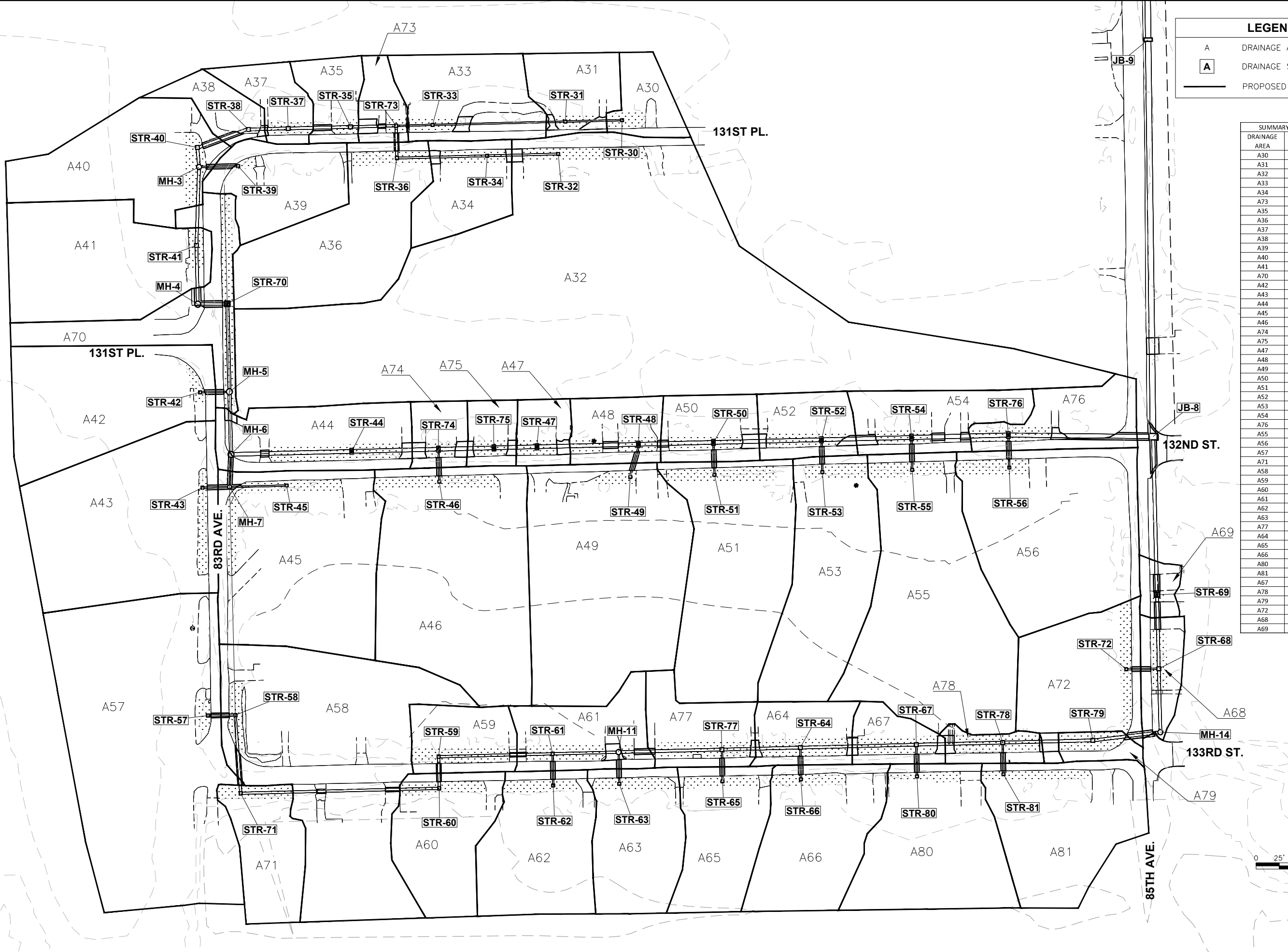
SUBMITTAL:	PRELIMINARY	REVISION HISTORY			
		NO.	DESCRIPTION	DATE	
DATE:	11/30/2023				
PROJECT NO:	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

GARDENVIEW ADDITION DRAINAGE

SHEET NAME
STORMWATER
MANAGEMENT PLAN

SHEET
6

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY -- 131ST ST -- MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\GARDENVIEW DRAINAGE AREA MAP.DWG



LEGEND

A

DRAINAGE AREA

A

DRAINAGE STRUCTURE

PROPOSED DRAINAGE AREA

SUMMARY OF DRAINAGE AREAS		
DRAINAGE AREA	RECEIVING STRUCTURE	Q100 (CFS)
A30	STR-30	0.78
A31	STR-31	1.02
A32	STR-32	10.01
A33	STR-33	1.98
A34	STR-34	1.1
A73	STR-73	0.85
A35	STR-35	1.06
A36	STR-36	1.85
A37	STR-37	0.76
A38	STR-38	0.68
A39	STR-39	1.57
A40	STR-40	4.64
A41	STR-41	5.2
A70	STR-70	2.14
A42	STR-42	4.85
A43	STR-43	7.03
A44	STR-44	2.46
A45	STR-45	3.15
A46	STR-46	3.89
A74	STR-74	0.72
A75	STR-75	0.66
A47	STR-47	0.54
A48	STR-48	1.14
A49	STR-49	3.87
A50	STR-50	1.24
A51	STR-51	2.48
A52	STR-52	1.08
A53	STR-53	1.84
A54	STR-54	1.52
A76	STR-76	1.37
A55	STR-55	3.58
A56	STR-56	4.1
A57	STR-57	12.46
A71	STR-71	1.16
A58	STR-58	5.02
A59	STR-59	1.13
A60	STR-60	1.47
A61	STR-61	1.79
A62	STR-62	1.7
A63	STR-63	1.39
A77	STR-77	1.38
A64	STR-64	1.04
A65	STR-65	1.41
A66	STR-66	1.81
A80	STR-80	2.04
A81	STR-81	2.26
A67	STR-67	0.9
A78	STR-78	0.54
A79	STR-79	0.51
A72	STR-72	1.87
A68	STR-68	0.92
A69	STR-69	0.59

CEC

ENGINEERING

STATE OF OKLAHOMA
TULSA, OKLAHOMA 74117
WWW.CONNEXTEC.COM
CAR 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREON.
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.

PROFESSIONAL SEAL

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT.

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	11/30/2023	NO.	DESCRIPTION	NO.	DESCRIPTION
PROJECT NO.:	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

GARDENVIEW ADDITION DRAINAGE

SHEET NAME

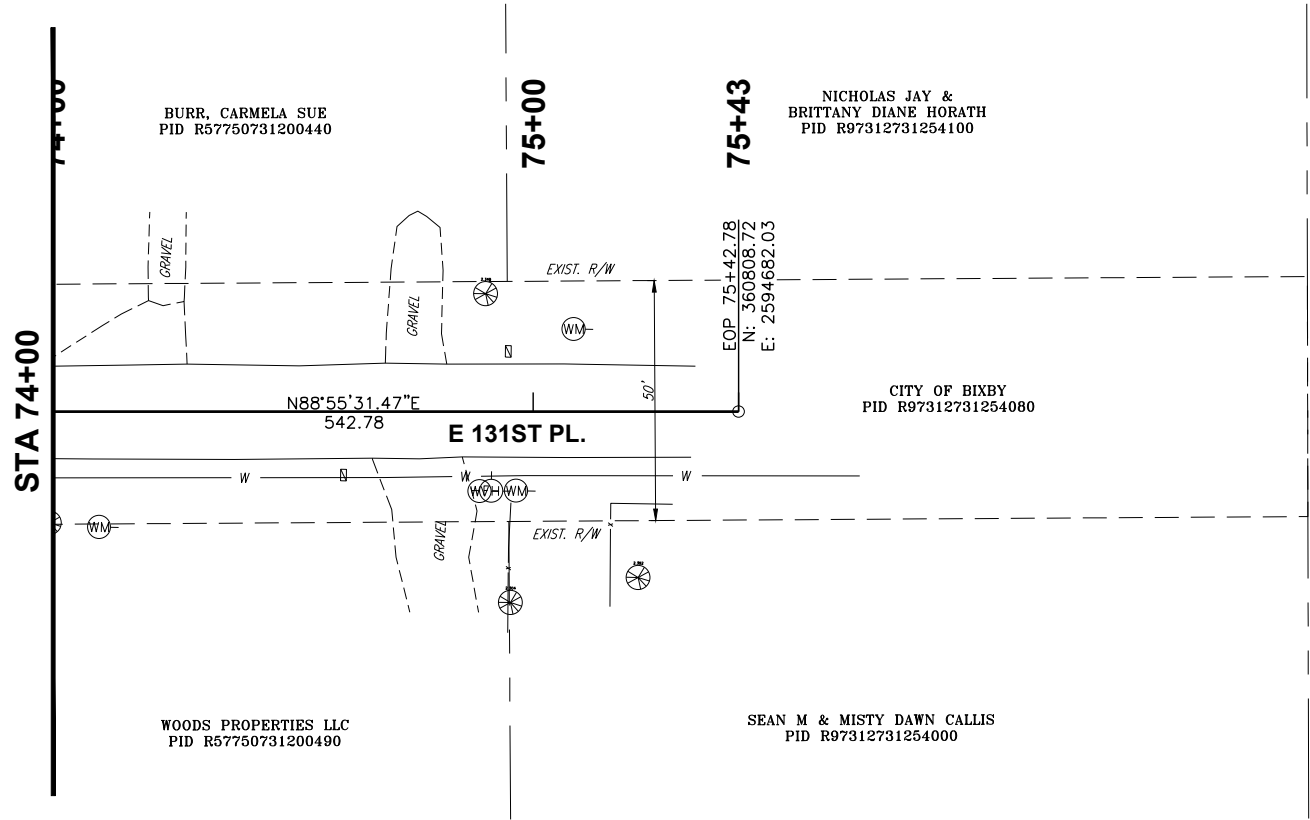
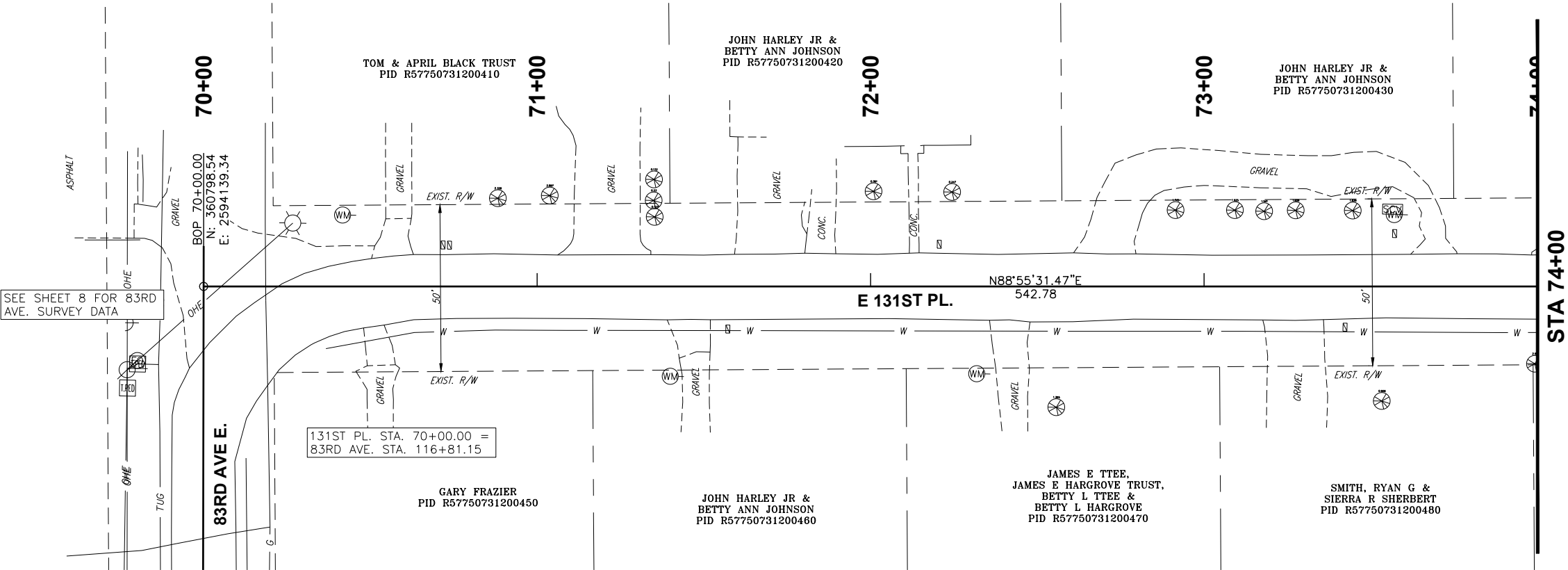
DRAINAGE AREA MAP

SHEET

7

BIXBY, OKLAHOMA

Page 132 of 215



SURVEY CONTROL DATA

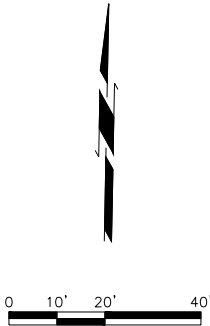
- HORIZONTAL DATUM IS TIED TO CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 WHICH IS ADJUSTED TO THE OKLAHOMA STATE PLANE NAD 83 (1993) COORDINATE SYSTEM, NORTH ZONE, PER MONUMENT #BA 11 DATA SHEET.
- BEARINGS:

THE BEARINGS SHOWN HEREIN OR HEREON ARE GRID BEARINGS DERIVED FROM THE USC & GS OKLAHOMA PLANE COORDINATE SYSTEM AND ARE NOT ASTRONOMICAL.
- VERTICAL CONTROLS:

A. LEVEL DATUM IS NGS, NAVD 88, PER CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 AND ADJUSTED FROM PRIMARY CONTROL UTILIZING DIFFERENTIAL LEVELING TECHNIQUES.

B. ACCURACY - 3RD ORDER OR BETTER

TULSA BENCHMARK FROM CITY OF TULSA CONTROL DATA PREPARED BY AERIAL DATA SERVICE MONUMENTED JANUARY, 2002 STATION NO. BA 11 MON. TYPE 3" ALUMINUM CAP SET IN CONCRETE
N: 361550.5020
E: 2604311.8720
ELEV: 632.430
LAT: 35°58'26.01634"
LONG: 95°51'03.77782"



CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXCEC.COM
STATE OF OK CERTIFICATE OF AUTHORIZATION
CEN 32 EXPIRES: 2024-06-30
COPYRIGHT ©2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED.

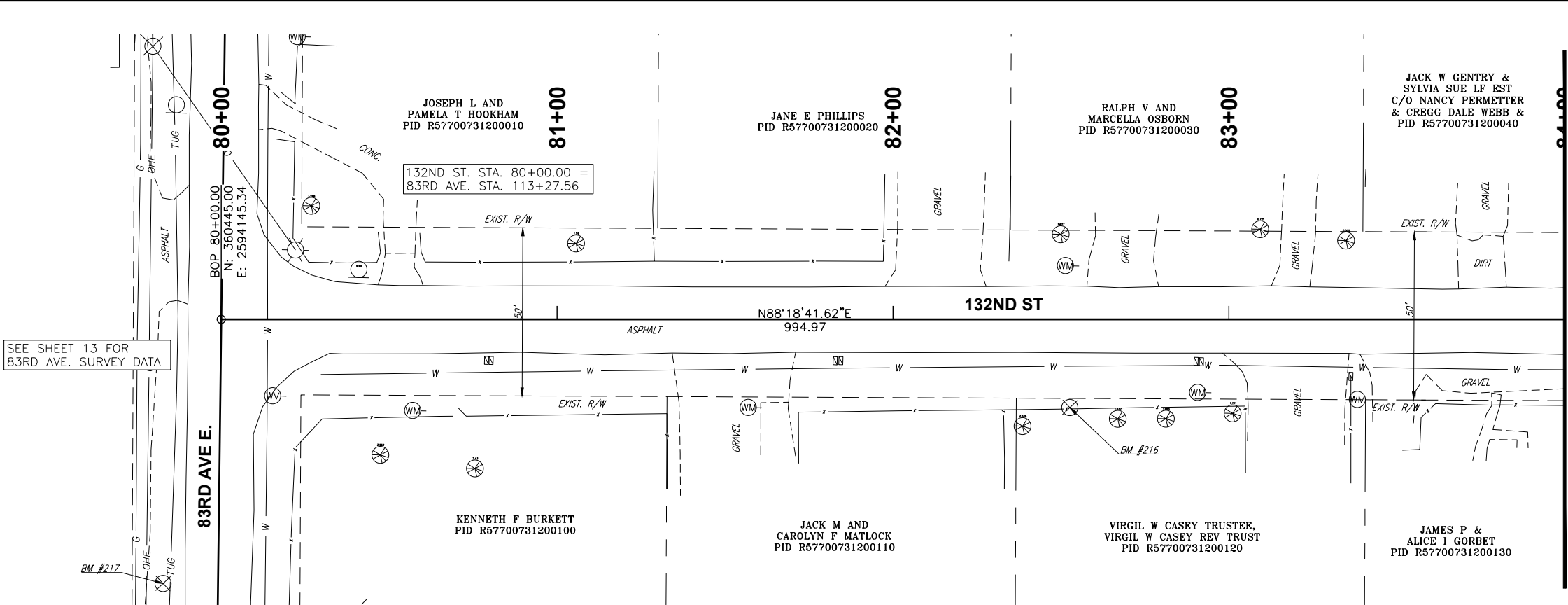


SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	11/30/2023	NO.	DESCRIPTION	NO.	DATE
PROJECT NO.	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

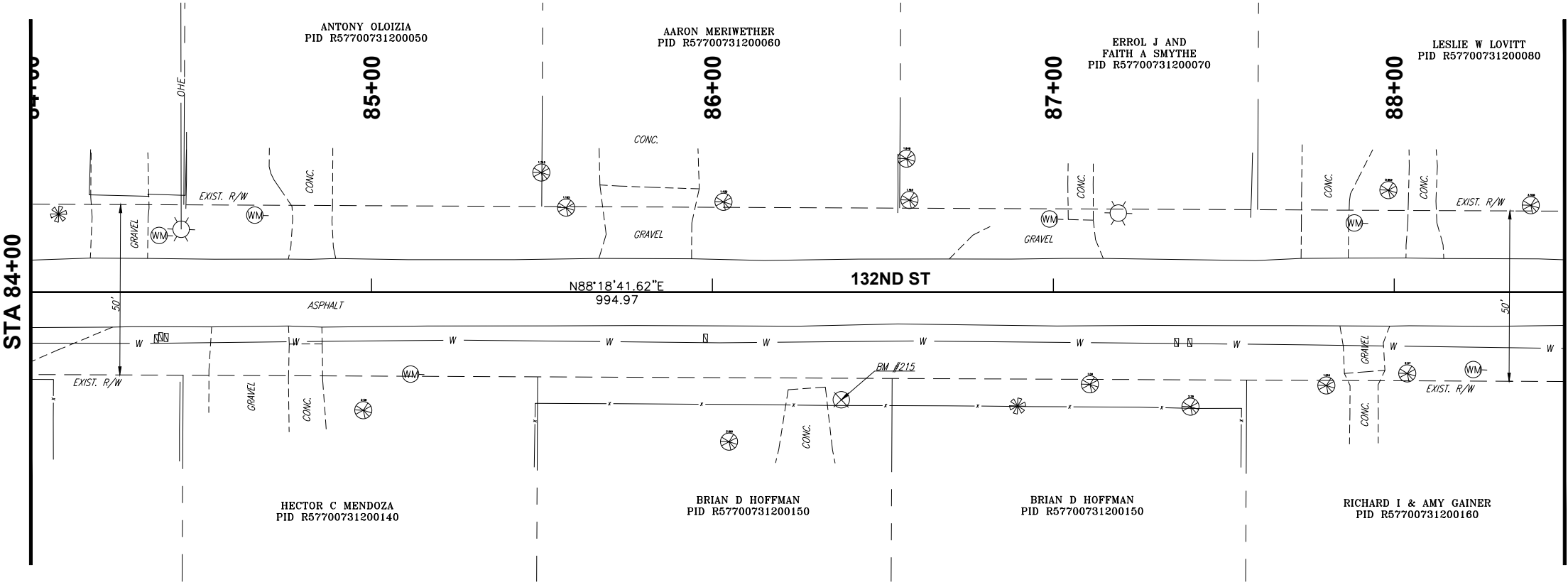
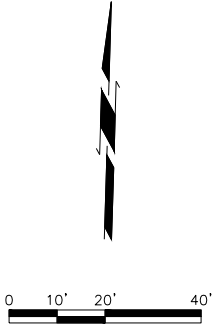
GARDENVIEW ADDITION DRAINAGE	
BIXBY, OKLAHOMA	

SHEET NAME
131ST PL SURVEY
DATA (1 OF 1)

SHEET
8



BENCHMARK TABLE				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
215	360432.2	2594783.8	606.09	SET 5/8IN IP W/ PINK FLAG
216	360426.2	2594398.7	606.44	SET CUT X IN CONCRETE FOOTER N-GATE POST
217	360365.9	2594130.3	607.03	SET 5/8IN IP W/ PINK FLAG



SURVEY CONTROL DATA

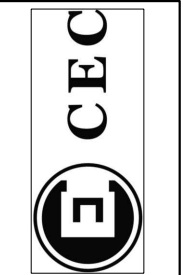
- HORIZONTAL DATUM IS TIED TO CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 WHICH IS ADJUSTED TO THE OKLAHOMA STATE PLANE NAD 83 (1993) COORDINATE SYSTEM, NORTH ZONE, PER MONUMENT #BA 11 DATA SHEET.
- BEARINGS:

THE BEARINGS SHOWN HEREIN OR HEREON ARE GRID BEARINGS DERIVED FROM THE USC & GS OKLAHOMA PLANE COORDINATE SYSTEM AND ARE NOT ASTRONOMICAL.
- VERTICAL CONTROLS:

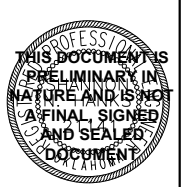
A. LEVEL DATUM IS NGS, NAVD 88, PER CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 AND ADJUSTED FROM PRIMARY CONTROL UTILIZING DIFFERENTIAL LEVELING TECHNIQUES.

B. ACCURACY - 3RD ORDER OR BETTER

TULSA BENCHMARK FROM CITY OF TULSA CONTROL DATA PREPARED BY AERIAL DATA SERVICE MONUMENTED JANUARY, 2002 STATION NO. BA 11 MON. TYPE 3" ALUMINUM CAP SET IN CONCRETE
N: 361550.5020
E: 2604311.8720
ELEV: 632.430
LAT: 35°58'26.01634"
LONG: 95°51'03.77782"



CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXIS.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAB 32 EXPIRES: 2024-06-30
COPYRIGHT ©2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



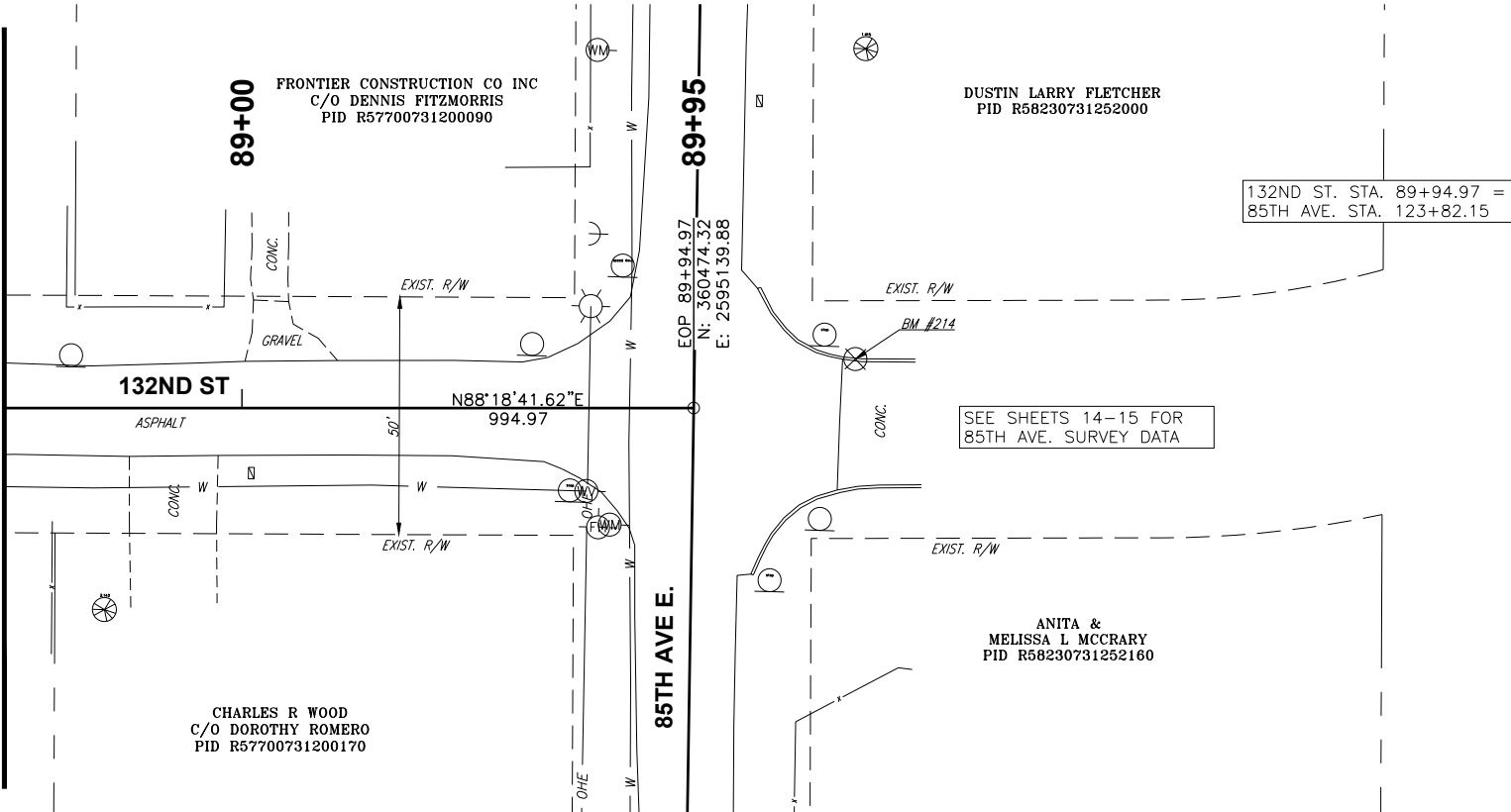
REVISION HISTORY		PRELIMINARY	
NO.	DESCRIPTION	DATE	DATE
1		11/30/2023	
2		17/02/31/01/02	
3		J.L.C.	
4		J.L.C.	
5		S.N.H.	
6		AS SHOWN	

GARDENVIEW ADDITION DRAINAGE	
DATE:	11/30/2023
PROJECT NO.:	170231.0102
DESIGNED BY:	J.L.C.
DRAWN BY:	J.L.C.
APPROVED BY:	S.N.H.
SCALE:	AS SHOWN

SHEET NAME
132ND ST SURVEY
DATA (1 OF 2)

SHEET
9

STA 88+50
SEE SHEET 9



BENCHMARK TABLE				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
214	360485.6	2595173.6	606.56	SET CUT X TOC NE COR- 85TH AND 132ND

SURVEY CONTROL DATA

- HORIZONTAL DATUM IS TIED TO CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 WHICH IS ADJUSTED TO THE OKLAHOMA STATE PLANE NAD 83 (1993) COORDINATE SYSTEM, NORTH ZONE, PER MONUMENT #BA 11 DATA SHEET.
- BEARINGS:

THE BEARINGS SHOWN HEREIN OR HEREON ARE GRID BEARINGS DERIVED FROM THE USC & GS OKLAHOMA PLANE COORDINATE SYSTEM AND ARE NOT ASTRONOMICAL.
- VERTICAL CONTROLS:

A. LEVEL DATUM IS NGS, NAVD 88, PER CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 AND ADJUSTED FROM PRIMARY CONTROL UTILIZING DIFFERENTIAL LEVELING TECHNIQUES.

B. ACCURACY -- 3RD ORDER OR BETTER

TULSA BENCHMARK FROM CITY OF TULSA CONTROL DATA PREPARED BY AERIAL DATA SERVICE MONUMENTED JANUARY, 2002 STATION NO. BA 11 MON. TYPE 3" ALUMINUM CAP SET IN CONCRETE
N: 361550.5020
E: 2604311.8720
ELEV: 632.430
LAT: 35°58'26.01634"
LONG: 95°51'03.77782"



CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES: 2024-06-30
COPYRIGHT ©2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFIC FOR WHICH IT WAS DRAWN.
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.

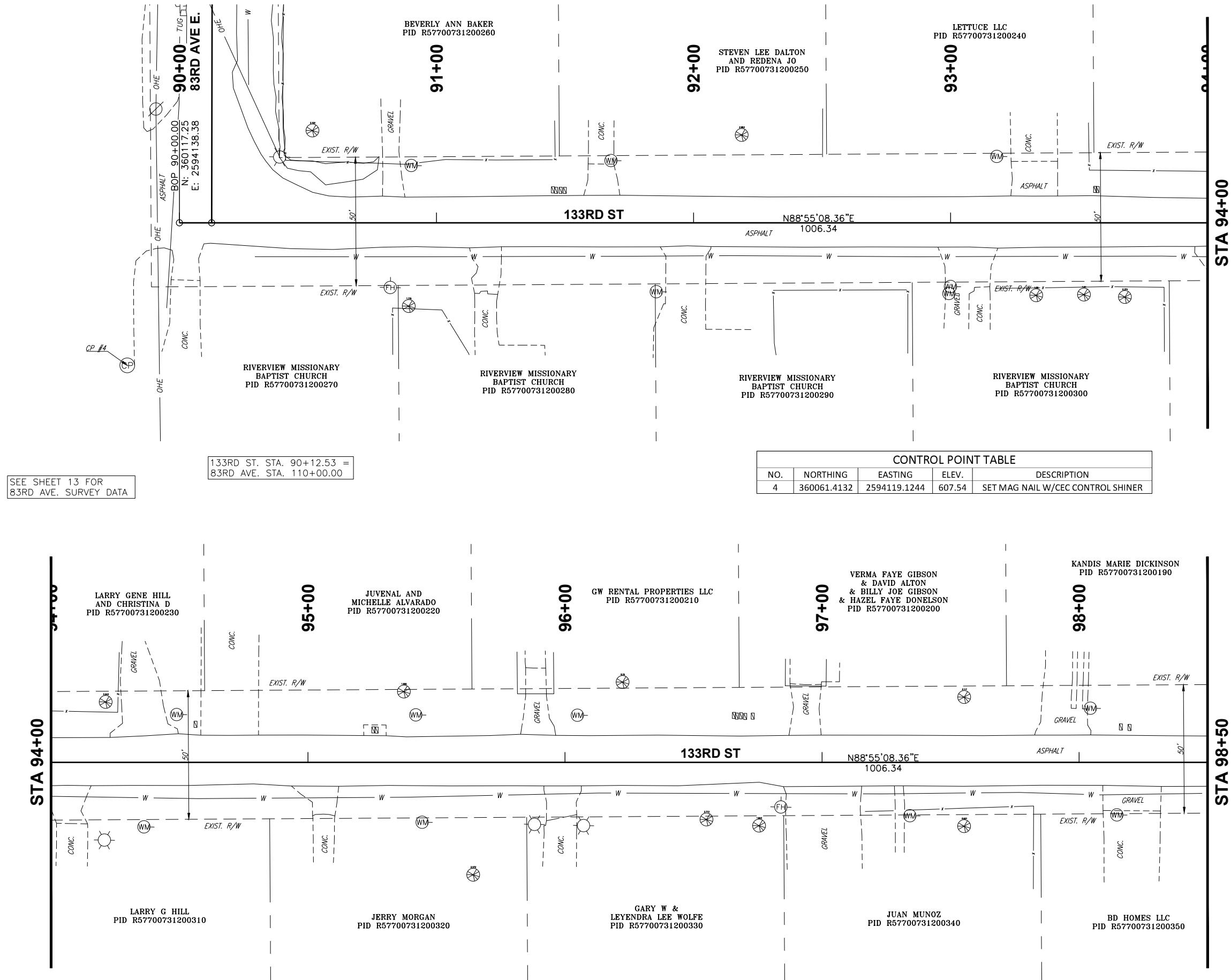


SUBMITTAL:	PRELIMINARY	REVISION HISTORY			
		NO.	DESCRIPTION	DATE	
DATE:	11/30/2023				
PROJECT NO:	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

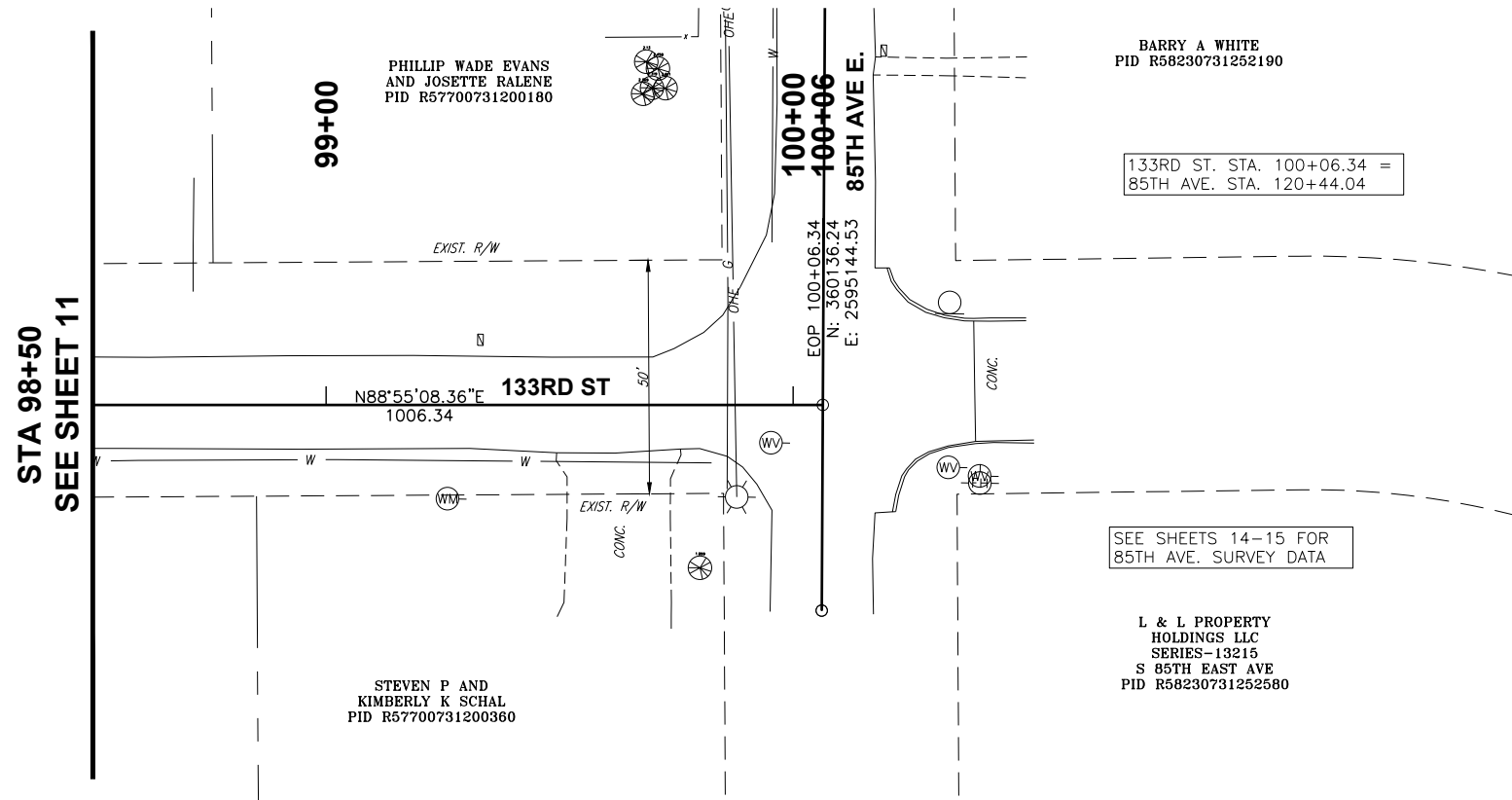
GARDENVIEW ADDITION DRAINAGE	
BIXBY, OKLAHOMA	

SHEET NAME
132ND ST SURVEY
DATA (2 OF 2)

SHEET
10



Page 136 of 215



SURVEY CONTROL DATA

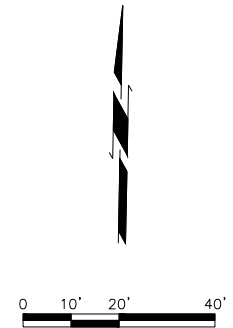
1. HORIZONTAL DATUM IS TIED TO CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 WHICH IS ADJUSTED TO THE OKLAHOMA STATE PLANE NAD 83 (1993) COORDINATE SYSTEM, NORTH ZONE, PER MONUMENT #BA 11 DATA SHEET.
2. BEARINGS:

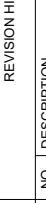
THE BEARINGS SHOWN HEREIN OR HEREON ARE GRID BEARINGS DERIVED FROM THE USC & GS OKLAHOMA PLANE COORDINATE SYSTEM AND ARE NOT ASTRONOMICAL.
3. VERTICAL CONTROLS:

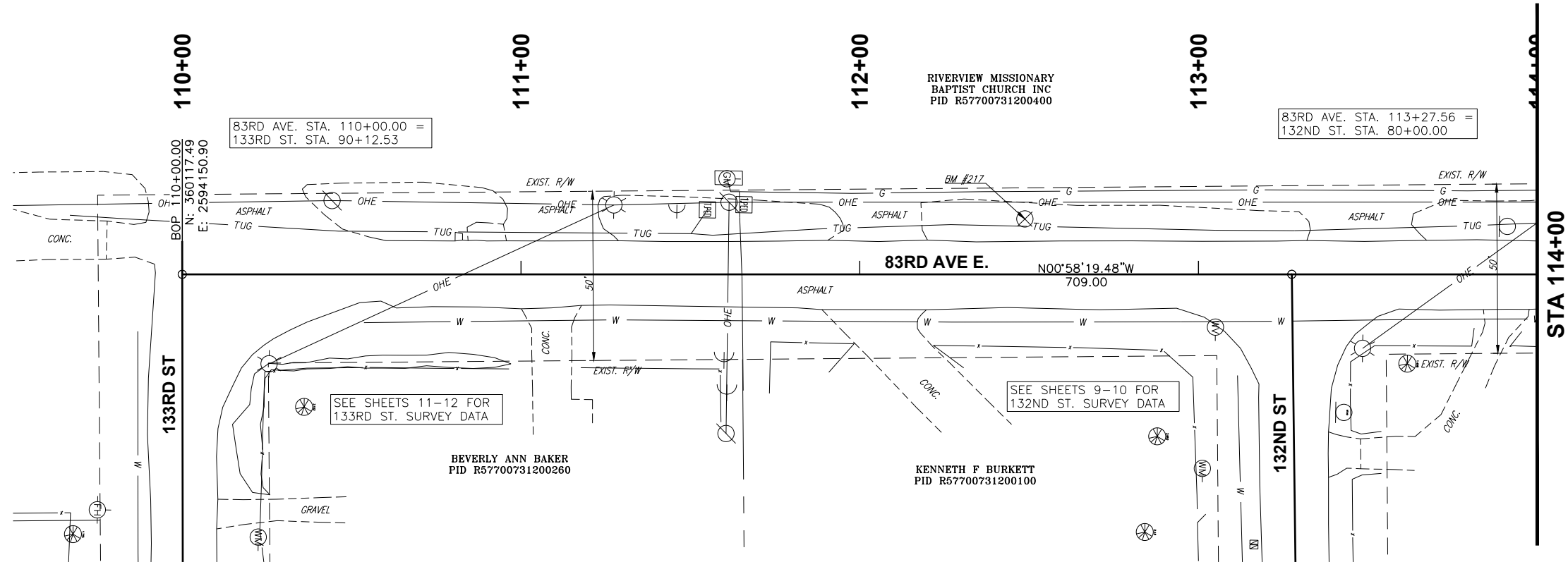
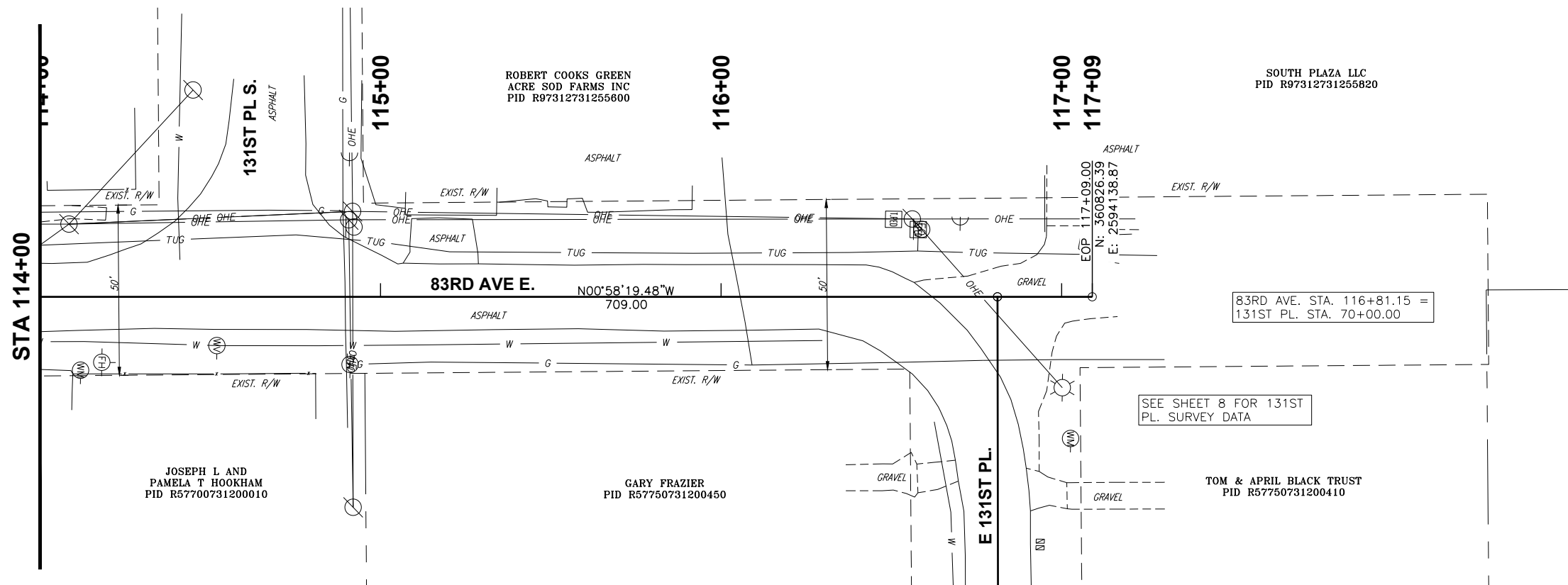
A. LEVEL DATUM IS NGS, NAVD 88, PER CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 AND ADJUSTED FROM PRIMARY CONTROL UTILIZING DIFFERENTIAL LEVELING TECHNIQUES.

B. ACCURACY - 3RD ORDER OR BETTER

TULSA BENCHMARK FROM CITY OF TULSA CONTROL DATA
PREPARED BY AERIAL DATA SERVICE MONUMENTED JANUARY,
2002 STATION NO. BA 11 MON. TYPE 3" ALUMINUM CAP SET
IN CONCRETE
N: 361550.5020
E: 2604311.8720
ELEV: 632.430
LAT: 35°58'26.01634"
LONG: 95°51'03.77782"



GARDENVIEW ADDITION DRAINAGE		SHEET NAME 133RD ST SURVEY DATA (2 OF 2)		SHEET 12													
BIXBY, OKLAHOMA		PRELIMINARY		REVISION HISTORY <table border="1"> <thead> <tr> <th>DATE:</th> <th>PROJECT NO:</th> <th>DESIGNED BY:</th> <th>DRAWN BY:</th> <th>APPROVED BY:</th> <th>SCALE:</th> </tr> </thead> <tbody> <tr> <td>11/30/2023</td> <td>170231.0102</td> <td>J.L.C.</td> <td>J.L.C.</td> <td>S.N.H.</td> <td>AS SHOWN</td> </tr> </tbody> </table>		DATE:	PROJECT NO:	DESIGNED BY:	DRAWN BY:	APPROVED BY:	SCALE:	11/30/2023	170231.0102	J.L.C.	J.L.C.	S.N.H.	AS SHOWN
DATE:	PROJECT NO:	DESIGNED BY:	DRAWN BY:	APPROVED BY:	SCALE:												
11/30/2023	170231.0102	J.L.C.	J.L.C.	S.N.H.	AS SHOWN												
THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT.																	
		CEC CORPORATION 1300 S. MAIN STREET TULSA, OKLAHOMA 74107 WWW.CONNECTCEC.COM STATE OF OK CERTIFICATE OF AUTHORIZATION LICENSE NO. 24466-30 CLASS 32 EXPIRES 12/31/2024 CANNOT BE REPRODUCED OR COPIED THIS DRAWING IS PROPERTY OF CEC. ANY REPRODUCTION OR COPIING OF THIS DRAWING WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED.															



BENCHMARK TABLE				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
217	360365.9	2594130.3	607.03	SET 5/8IN IP W/ PINK FLAG

SURVEY CONTROL DATA

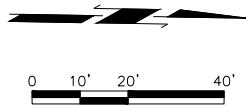
1. HORIZONTAL DATUM IS TIED TO CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 WHICH IS ADJUSTED TO THE OKLAHOMA STATE PLANE NAD 83 (1993) COORDINATE SYSTEM, NORTH ZONE, PER MONUMENT #BA 11 DATA SHEET.
2. BEARINGS:

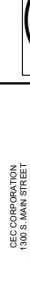
THE BEARINGS SHOWN HEREIN OR HEREON ARE GRID BEARINGS DERIVED FROM THE USC & GS OKLAHOMA PLANE COORDINATE SYSTEM AND ARE NOT ASTRONOMICAL.
3. VERTICAL CONTROLS:

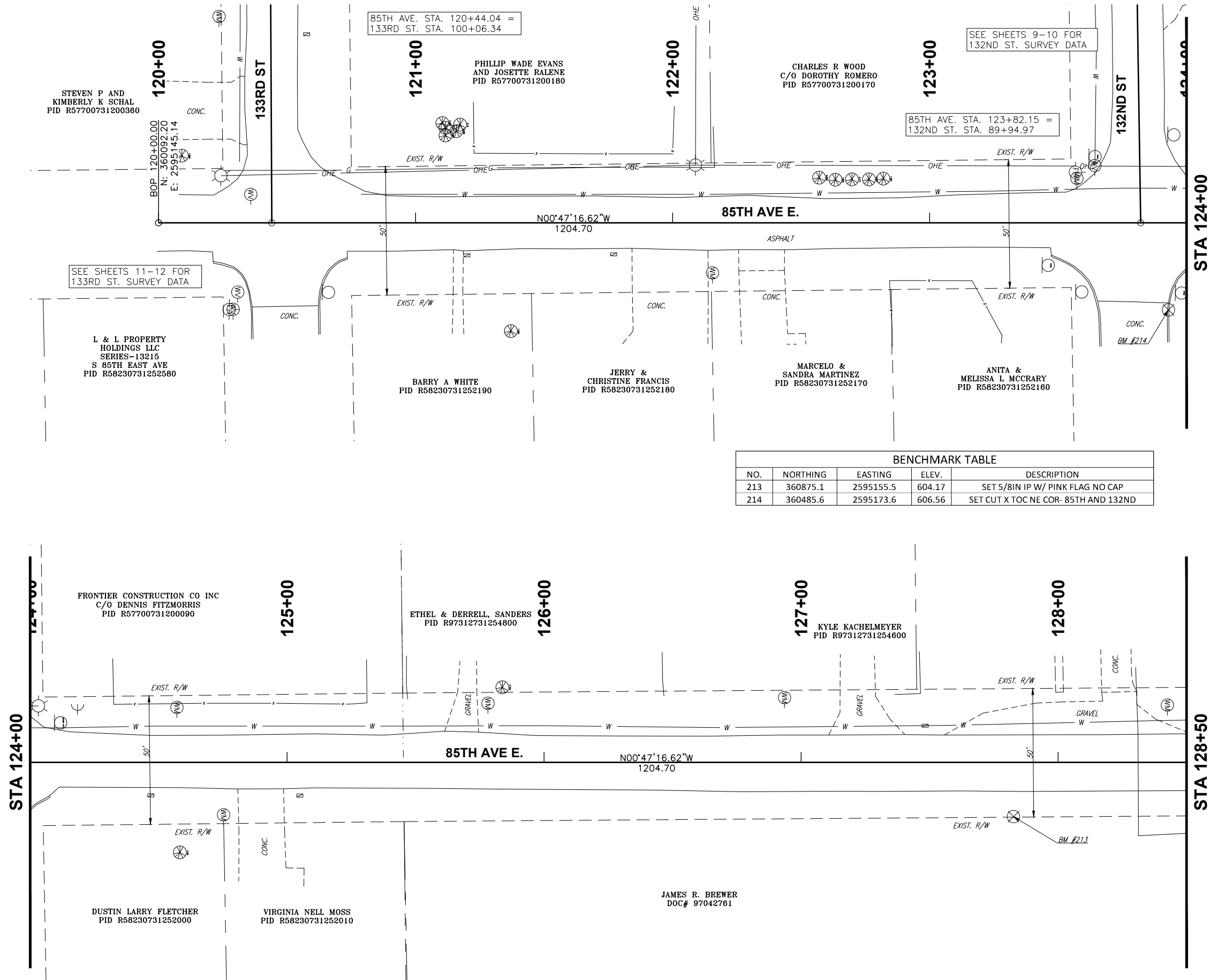
A. LEVEL DATUM IS NGS, NAVD 88, PER CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 AND ADJUSTED FROM PRIMARY CONTROL UTILIZING DIFFERENTIAL LEVELING TECHNIQUES.

B. ACCURACY - 3RD ORDER OR BETTER

TULSA BENCHMARK FROM CITY OF TULSA CONTROL DATA
PREPARED BY AERIAL DATA SERVICE MONUMENTED JANUARY,
2002 STATION NO. BA 11 MON. TYPE 3" ALUMINUM CAP SET
IN CONCRETE
N: 361550.5020
E: 2604311.8720
ELEV: 632.430
LAT: 35°58'26.01634"
LONG: 95°51'03.77782"



SHEET NAME 83RD AVE SURVEY DATA (1 OF 1)	GARDENVIEW ADDITION DRAINAGE	REVISION HISTORY				PRELIMINARY DATE: 11/30/2023 PROJECT NO: 170231.0102 DESIGNED BY: J.L.C. DRAWN BY: J.L.C. APPROVED BY: S.N.H. SCALE: AS SHOWN	SUBMITTAL:	NO. DESCRIPTION	DATE			CEC CORPORATION TULSA, OKLAHOMA 74137 WWW.CONNEXCEC.COM STATE OF OK CERTIFICATE OF AUTHORIZATION LICENSE NO. 170231.0102 CAP. 32 EXPIRES: 2024-06-30 COPYRIGHT ©2007 CEC. ALL RIGHTS RESERVED. NO REPRODUCTION OR TRANSMISSION OF THIS DRAWING WITHOUT WRITTEN PERMISSION OF CEC IS PROHIBITED.



SURVEY CONTROL DATA

1. HORIZONTAL DATUM IS TIED TO CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 WHICH IS ADJUSTED TO THE OKLAHOMA STATE PLANE NAD 83 (1993) COORDINATE SYSTEM, NORTH ZONE, PER MONUMENT #BA 11 DATA SHEET.
2. BEARINGS:

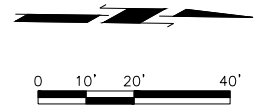
THE BEARINGS SHOWN HEREIN OR HEREON ARE GRID BEARINGS DERIVED FROM THE USC & GS OKLAHOMA PLANE COORDINATE SYSTEM AND ARE NOT ASTRONOMICAL.
3. VERTICAL CONTROLS:

A. LEVEL DATUM IS NGS, NAVD 88, PER CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 AND ADJUSTED FROM PRIMARY CONTROL UTILIZING DIFFERENTIAL LEVELING TECHNIQUES.

B. ACCURACY - 3RD ORDER OR BETTER

TULSA BENCHMARK FROM CITY OF TULSA CONTROL DATA
PREPARED BY AERIAL DATA SERVICE MONUMENTED JANUARY,
2002 STATION NO. BA 11 MON. TYPE 3" ALUMINUM CAP SET
IN CONCRETE
N: 361550.5020
E: 2604311.8720
ELEV: 632.430
LAT: 35°58'26.01634"
LONG: 95°51'03.77782"

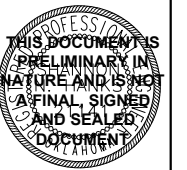
BENCHMARK TABLE				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
213	360875.1	2595155.5	604.17	SET 5/8IN IP W/ PINK FLAG NO CAP
214	360485.6	2595173.6	606.56	SET CUT X TOC NE COR- 85TH AND 132ND



CEC CORPORATION
1300 S. MAIN STREET
TULSA, OKLAHOMA 74137
WWW.CONNECTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAP. 32. EXPIRES: 2024-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

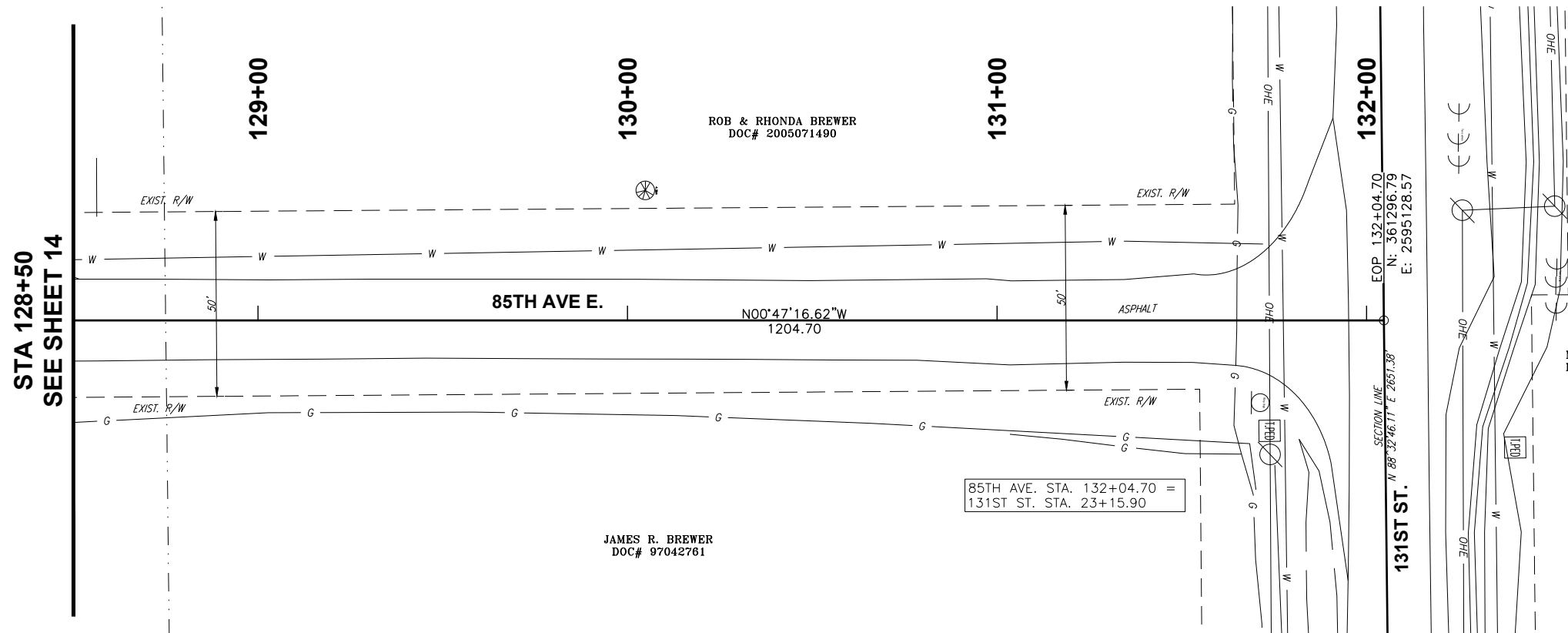


SUBMITTAL:		PRELIMINARY	REVISION HISTORY	
DATE:	11/30/2023		NO.	DESCRIPTION
PROJECT NO:	170231.0102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:	S.N.H.			
SCALE:	AS SHOWN			

ORDER NEW ADDITION DIVISION

HEET NAME
TH AVE
VEY DATA
1 OF 2)

SHEET
14



MPR FAMILY, LLC,
DOC# 2007095260

SURVEY CONTROL DATA

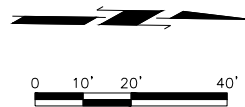
1. HORIZONTAL DATUM IS TIED TO CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 WHICH IS ADJUSTED TO THE OKLAHOMA STATE PLANE NAD 83 (1993) COORDINATE SYSTEM, NORTH ZONE, PER MONUMENT #BA 11 DATA SHEET.
2. BEARINGS:

THE BEARINGS SHOWN HEREIN OR HEREON ARE GRID BEARINGS DERIVED FROM THE USC & GS OKLAHOMA PLANE COORDINATE SYSTEM AND ARE NOT ASTRONOMICAL.
3. VERTICAL CONTROLS:

A. LEVEL DATUM IS NGS, NAVD 88, PER CITY OF TULSA SURVEY CONTROL MONUMENT # BA 11 AND ADJUSTED FROM PRIMARY CONTROL UTILIZING DIFFERENTIAL LEVELING TECHNIQUES.

B. ACCURACY - 3RD ORDER OR BETTER

TULSA BENCHMARK FROM CITY OF TULSA CONTROL DATA
PREPARED BY AERIAL DATA SERVICE MONUMENTED JANUARY,
2002 STATION NO. BA 11 MON. TYPE 3" ALUMINUM CAP SET
IN CONCRETE
N: 361550.5020
E: 2604311.8720
ELEV: 632.430
LAT: 35°58'26.01634"
LONG: 95°51'03.77782"



SUBMITTAL:	PRELIMINARY	REVISION HISTORY		
		NO.	DESCRIPTION	DATE
DATE:	11/30/2023			
PROJECT NO:	17/023.0102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:	S.N.H.			
SCALE:	AS SHOWN			

GARDENVIEW ADDITION DRAINAGE

SHEET NAME
85TH AVE
SURVEY DATA
(2 OF 2)

SHEET

15

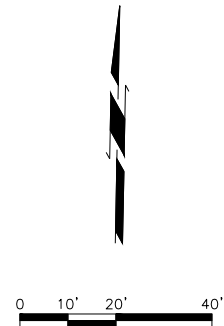
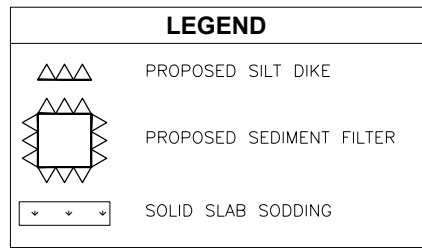
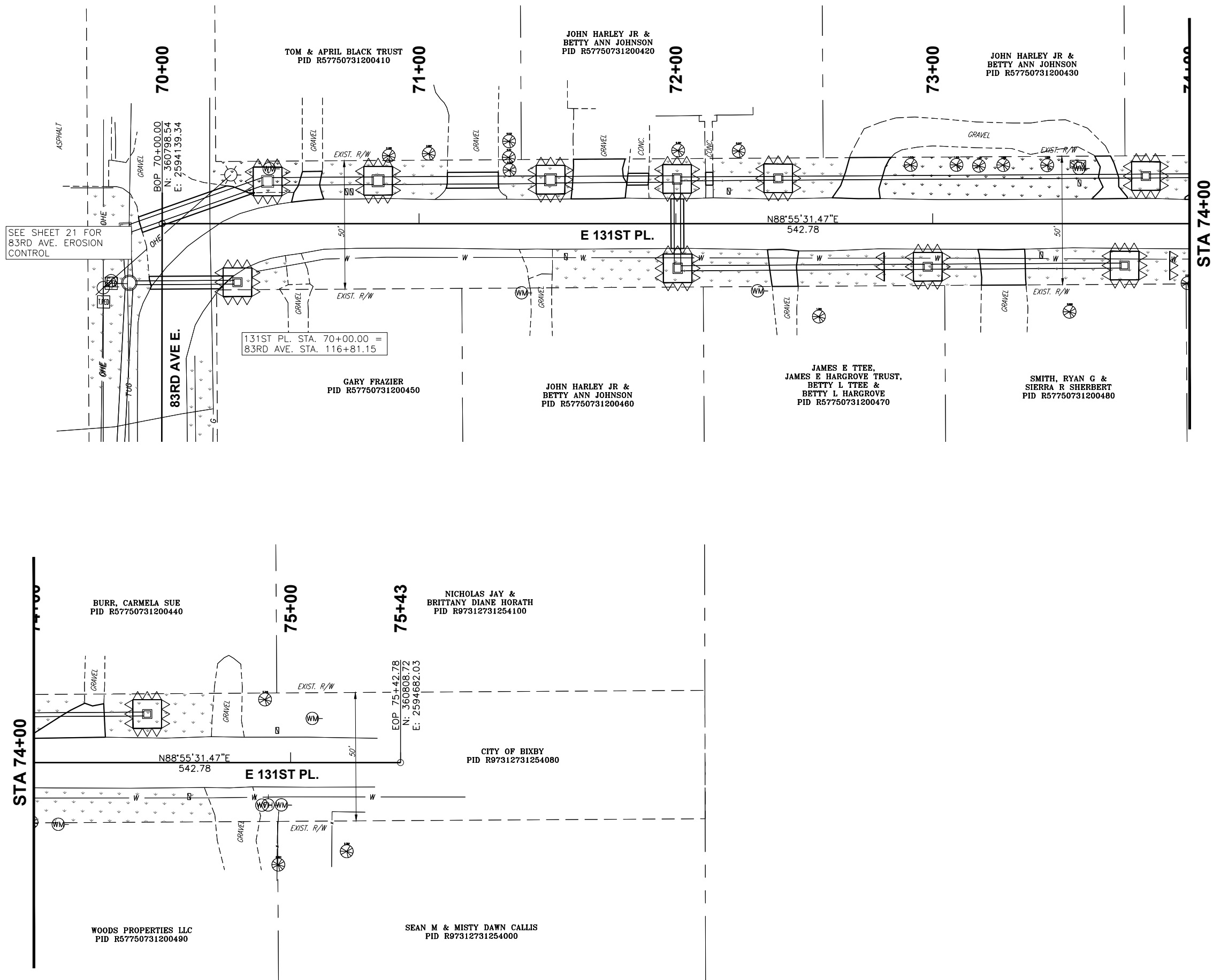


CEC CORPORATION
1300 S. MAIN STREET
TULSA, OKLAHOMA 74137
P: 918.063.9401
WWW.CONNECTCEC.COM

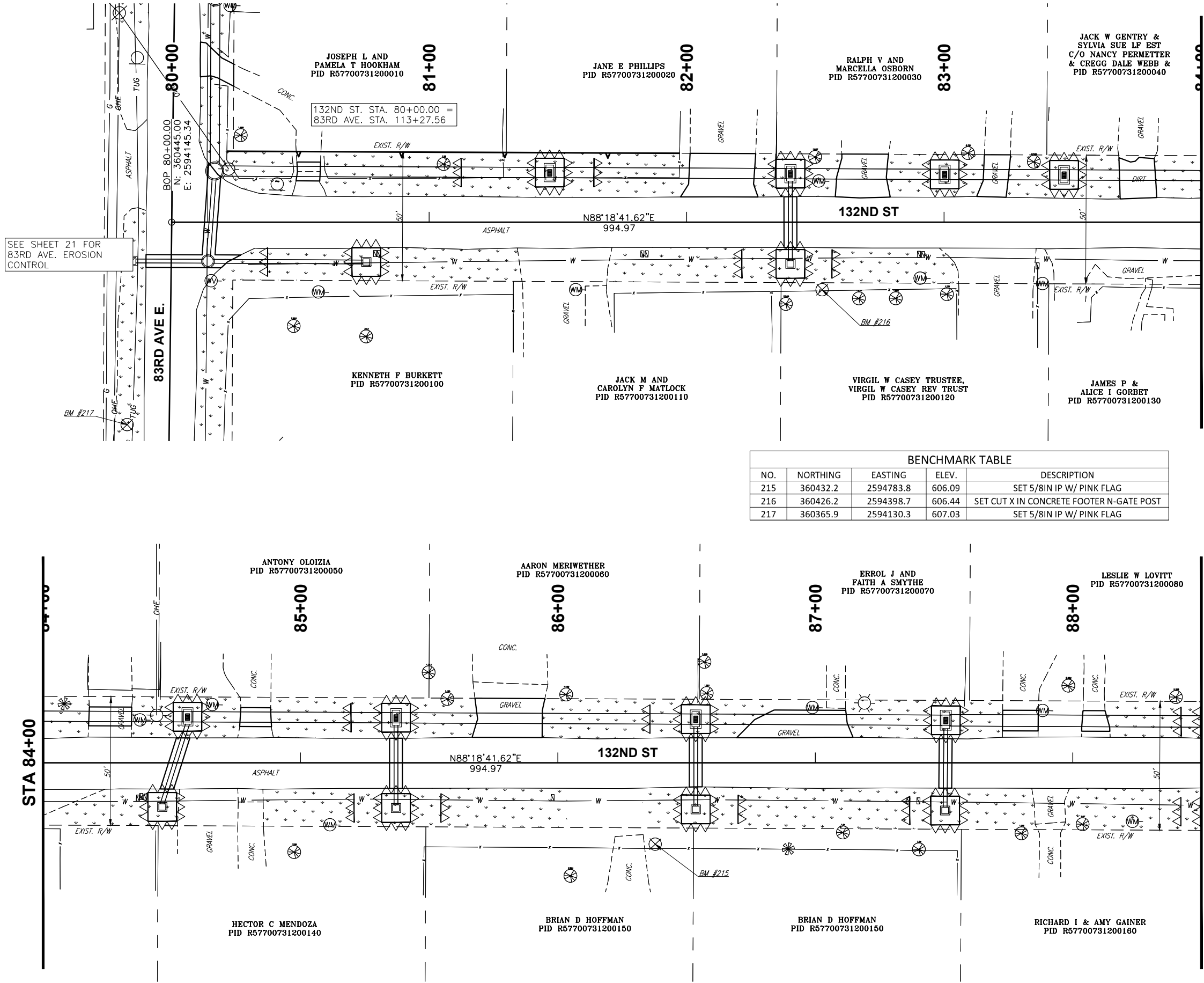
STATE OF OK CERTIFICATE OF AUTHORIZATION
CAP: 32 EXPIRES: 2024-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF





SHEET NAME 131ST PL EROSION CONTROL (1 OF 1)		SHEET 16	
GARDENVIEW ADDITION DRAINAGE		BIXBY, OKLAHOMA	
SUBMITTAL:		PRELIMINARY	
DATE:		11/30/2023	
PROJECT NO:		170231 0102	
DESIGNED BY:		J.L.C.	
DRAWN BY:		J.L.C.	
APPROVED BY:		S.N.H.	
SCALE:		AS SHOWN	
THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL SIGNED AND SEALED DOCUMENT			
CEC CORPORATION 1309 S. MAIN STREET TULSA, OK 74106-3421 WWW.CEC-OK.COM STATE OF OK CERTIFICATE OF AUTHORIZATION JESSE L. C. (JESSE L. C.) CEC 32 EXPIRES: 2024-04-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. NO PART OF THIS DOCUMENT MAY BE REPRODUCED OR MODIFICATION OR USE OF THIS DRAWING WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC © INCORPORATED CEC			



BENCHMARK TABLE				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
215	360432.2	2594783.8	606.09	SET 5/8IN IP W/ PINK FLAG
216	360426.2	2594398.7	606.44	SET CUT X IN CONCRETE FOOTER N-GATE POST
217	360365.9	2594130.3	607.03	SET 5/8IN IP W/ PINK FLAG

LEGEND

PROPOSED SILT DIKE

PROPOSED SEDIMENT FILTER

SOLID SLAB SODDING

CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXIONCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAR 32 EXPIRES: 06/06/30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED.

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

REVISION HISTORY		PRELIMINARY	
NO.	DESCRIPTION	DATE	DATE

GARDENVIEW ADDITION DRAINAGE

SHEET NAME
132ND ST EROSION CONTROL (1 OF 2)

SHEET
17

DATE: 11/30/2023

PROJECT NO: 170231.0102

DESIGNED BY: J.L.C.

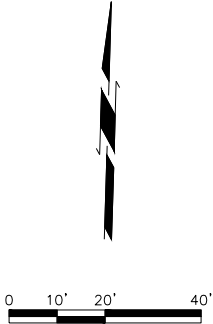
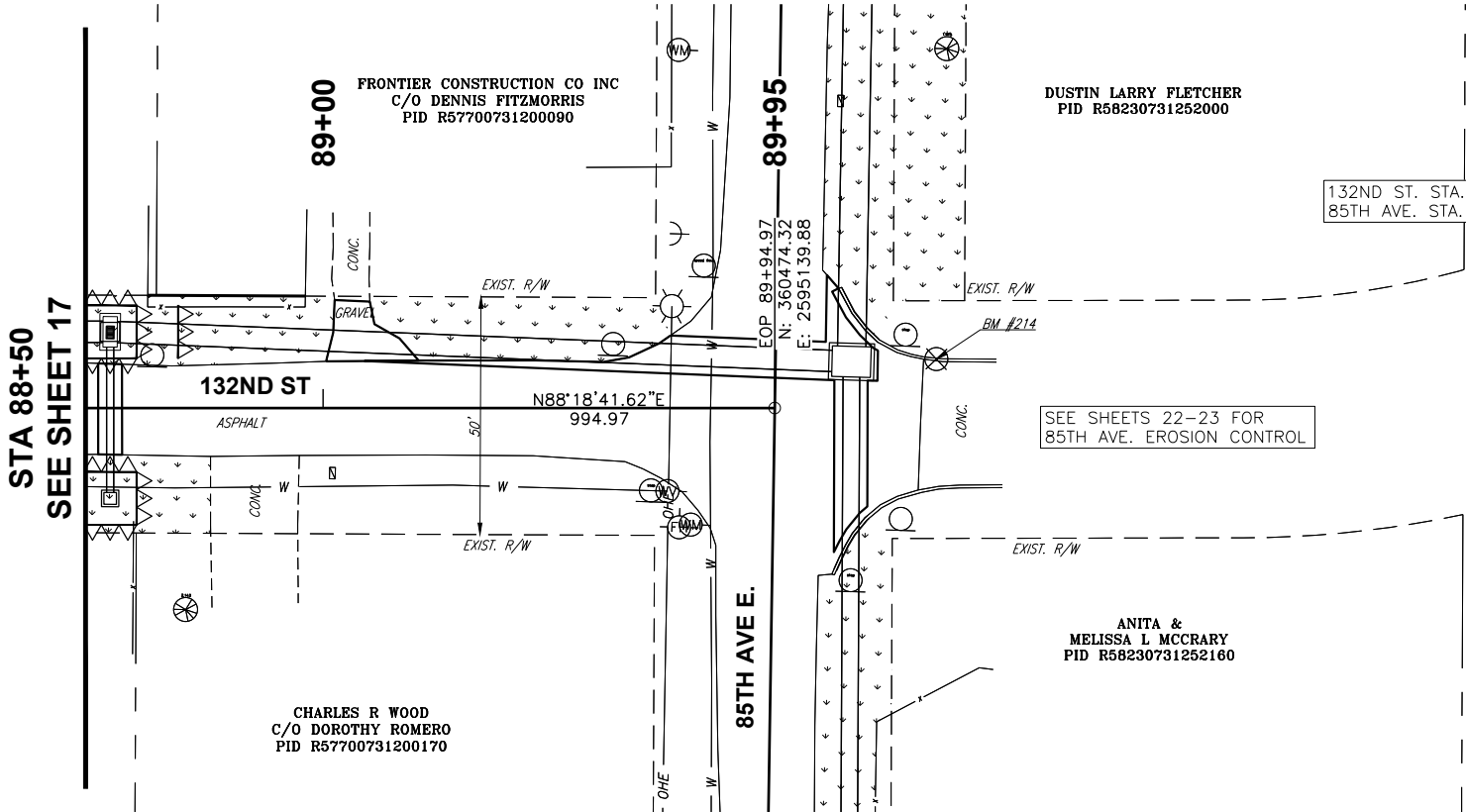
DRAWN BY: J.L.C.

APPROVED BY: S.N.H.

SCALE: AS SHOWN

BIXBY, OKLAHOMA

Page 142 of 215



GARDENVIEW ADDITION DRAINAGE

132ND ST EROSION CONTROL (2 OF 2)

SHEET 18

SHEET NAME

132ND ST EROSION CONTROL (2 OF 2)

SHEET

18

NO.

DESCRIPTION

DATE

PRELIMINARY

11/30/2023

170231.0102

J.L.C.

J.L.C.

S.N.H.

AS SHOWN

REVISION HISTORY

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT

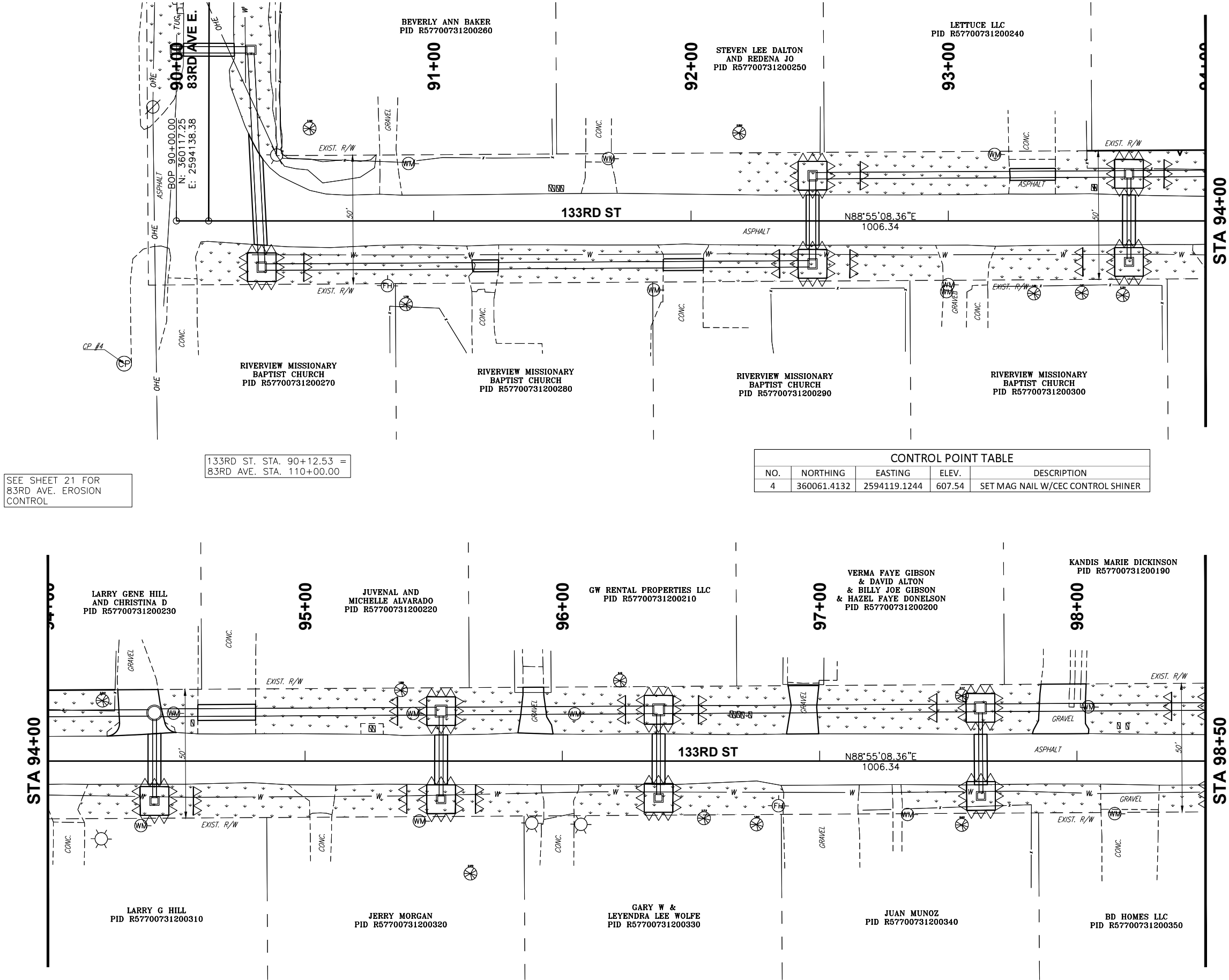
STATE OF OKLAHOMA
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
CAN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED ON THE DRAWING. ANY REUSE OR MODIFICATION OF THIS DRAWING WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED.

CEC

CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
CAN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED ON THE DRAWING. ANY REUSE OR MODIFICATION OF THIS DRAWING WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED.

Page 143 of 215

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY -- 131ST ST -- MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\133RD ST EROSION CONTROL.DWG



SEE SHEET 21 FOR
83RD AVE. EROSION
CONTROL

133RD ST. STA. 90+12.53 =
83RD AVE. STA. 110+00.00

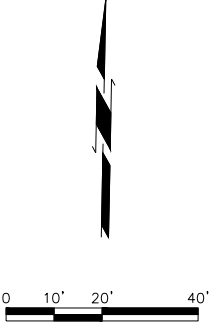
CONTROL POINT TABLE				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
4	360061.4132	2594119.1244	607.54	SET MAG NAIL W/CEC CONTROL SHINER

LEGEND

PROPOSED SILT DIKE

PROPOSED SEDIMENT FILTER

SOLID SLAB SODDING



STA 98+50
SEE SHEET 20

CEC

CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAR 32 EXPIRES: 06/30/2024
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED.

PROFESSIONAL SEAL

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

REVISION HISTORY		SUBMITTAL		PRELIMINARY	
NO.	DESCRIPTION	DATE	DATE	NO.	DESCRIPTION

GARDENVIEW ADDITION DRAINAGE

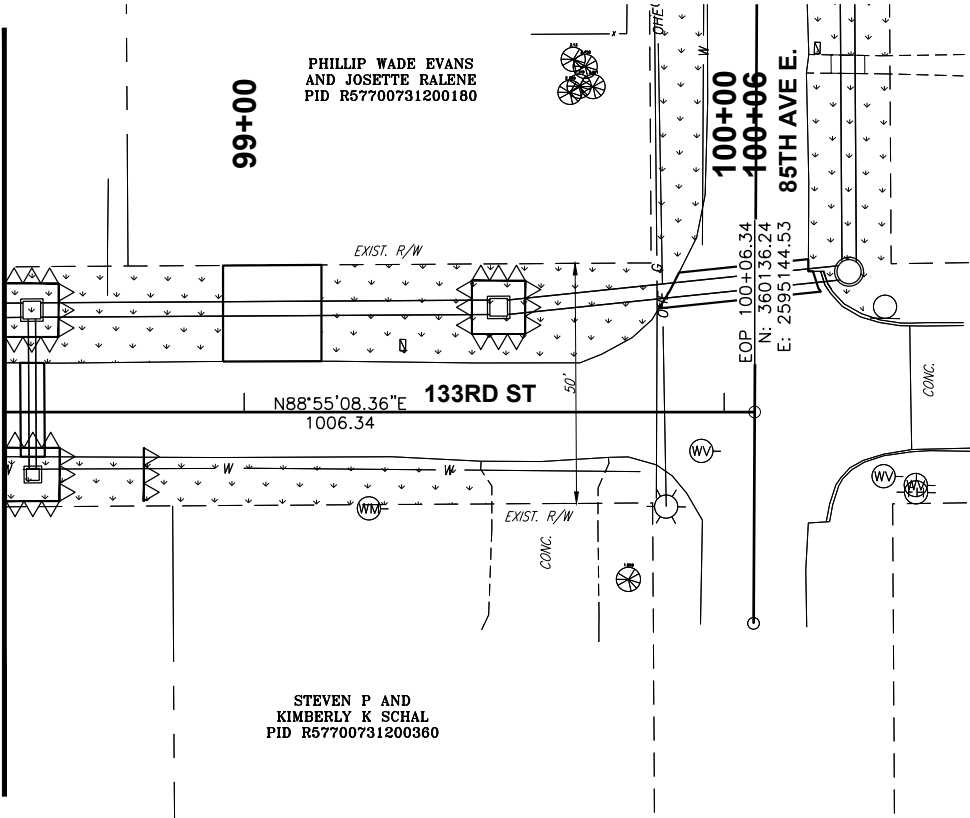
SHEET NAME
133RD ST EROSION
CONTROL (1 OF 2)

SHEET
19

BIXBY, OKLAHOMA

Page 144 of 215

STA 98+50
SEE SHEET 19



BARRY A WHITE
PID R58230731252190

133RD ST. STA. 100+06.34 =
85TH AVE. STA. 120+44.04

SEE SHEETS 22-23 FOR
85TH AVE. EROSION CONTROL

L & L PROPERTY
HOLDINGS LLC
SERIES-13215
S 85TH EAST AVE
PID R58230731252580

STEVEN P AND
KIMBERLY K SCHAL
PID R57700731200360

PHILLIP WADE EVANS
AND JOSETTE RALENE
PID R57700731200180

LEGEND

- PROPOSED SILT DIKE
- PROPOSED SEDIMENT FILTER
- SOLID SLAB SODDING

0 10' 20' 40'

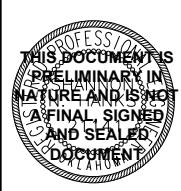


GARDENVIEW ADDITION DRAINAGE

SHEET NAME
133RD ST EROSION
CONTROL (2 OF 2)

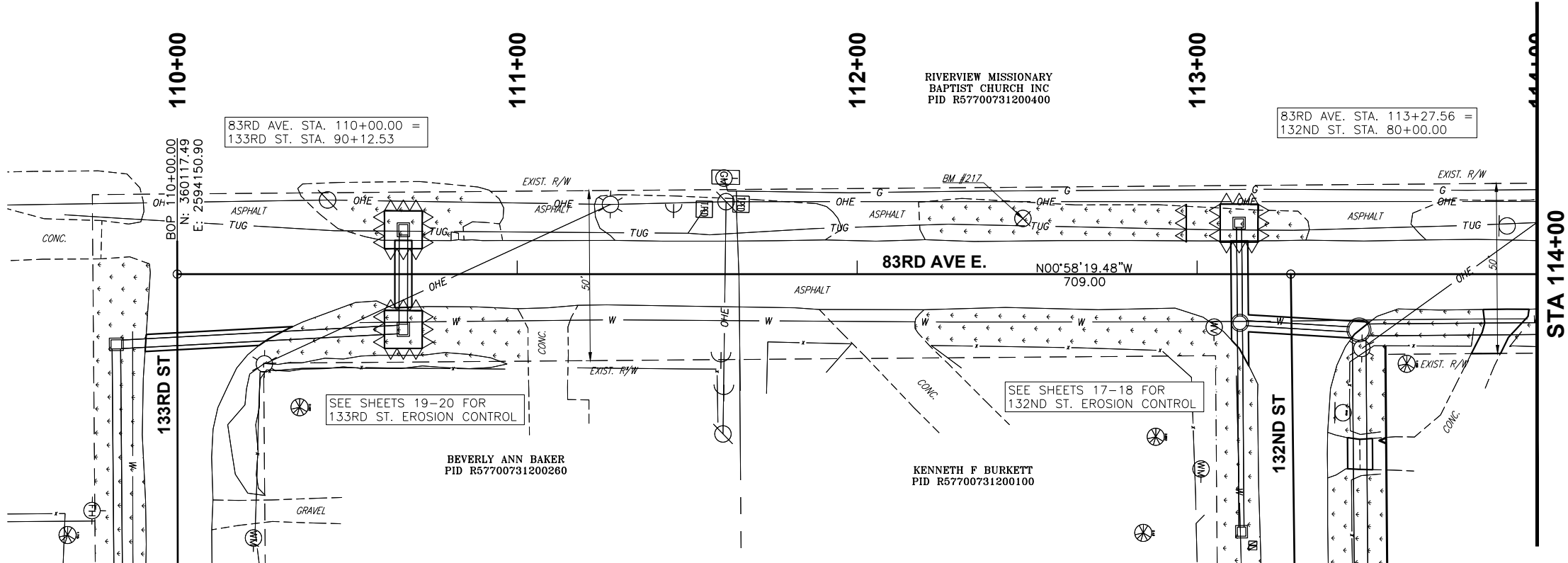
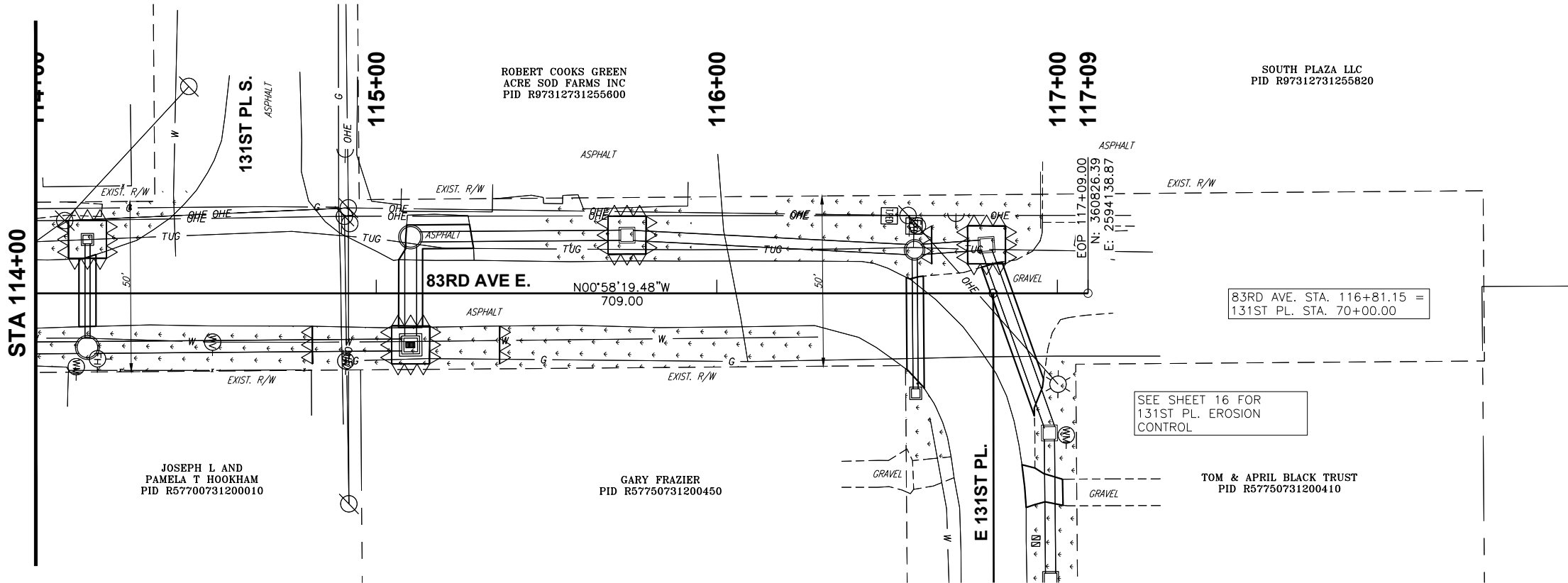
SHEET
20

SUBMITTAL:	PRELIMINARY		REVISION HISTORY	
	DATE:	PROJECT NO.	NO.	DESCRIPTION
	11/30/2023	170231.0102		
	DESIGNED BY:	J.L.C.		
	DRAWN BY:	J.L.C.		
	APPROVED BY:	S.N.H.		
	SCALE:	AS SHOWN		



CEC CORPORATION
2000 W. 10TH ST., SUITE 100
TULSA, OKLAHOMA 74107
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAR 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC CORPORATION.
NO PART OF THIS DRAWING MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY -- 131ST ST -- MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\83RD AVE EROSION CONTROL.DWG



BENCHMARK TABLE				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
217	360365.9	2594130.3	607.03	SET 5/8IN IP W/ PINK FLAG

LEGEND

PROPOSED SILT DIKE

PROPOSED SEDIMENT FILTER

SOLID SLAB SODDING

CEC

CEC CORPORATION

TULSA, OKLAHOMA 74117

WWW.CONNEXCEC.COM

CAR 32 EXPIRES: 06/06/30

STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.

THIS DRAWING IS THE PROPERTY OF CEC. ANY REUSE OR REPRODUCTION OF THIS DRAWING WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED.

GARDENVIEW ADDITION DRAINAGE

SHEET NAME

83RD AVE EROSION CONTROL (1 OF 1)

SHEET

21

REVISION HISTORY

NO.	DESCRIPTION	DATE

SUBMITTAL:

PRELIMINARY

DATE: 11/30/2023

PROJECT NO. 170231.0102

DESIGNED BY: J.L.C.

DRAWN BY: J.L.C.

APPROVED BY: S.N.H.

SCALE: AS SHOWN

SHEET NAME

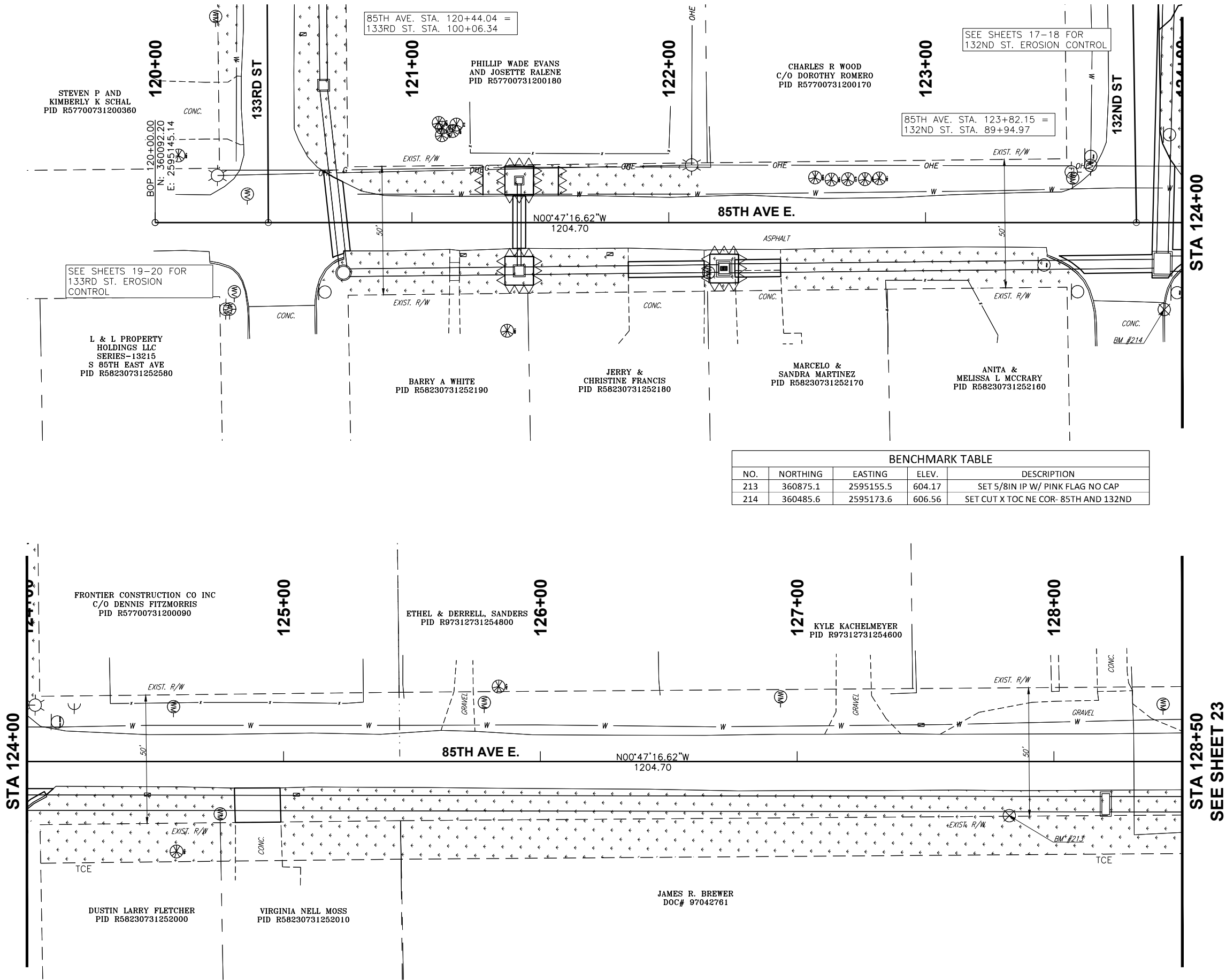
83RD AVE EROSION CONTROL (1 OF 1)

SHEET

21

BIXBY, OKLAHOMA

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY -- 131ST ST -- MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\85TH AVE EROSION CONTROL.DWG



LEGEND

PROPOSED SILT DIKE

PROPOSED SEDIMENT FILTER

SOLID SLAB SODDING

BENCHMARK TABLE				
NO.	NORTHING	EASTING	ELEV.	DESCRIPTION
213	360875.1	2595155.5	604.17	SET 5/8IN IP W/ PINK FLAG NO CAP
214	360485.6	2595173.6	606.56	SET CUT X TOC NE COR- 85TH AND 132ND

CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAB 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.

PROFESSIONAL SEAL

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT

REVISION HISTORY		PRELIMINARY	
NO.	DESCRIPTION	DATE	DATE
1	11/30/2023		
2	17/02/31/01/02		
3	J.L.C.		
4	J.L.C.		
5	S.N.H.		
6	AS SHOWN		

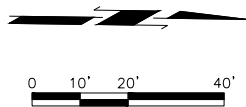
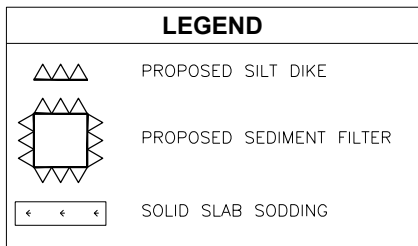
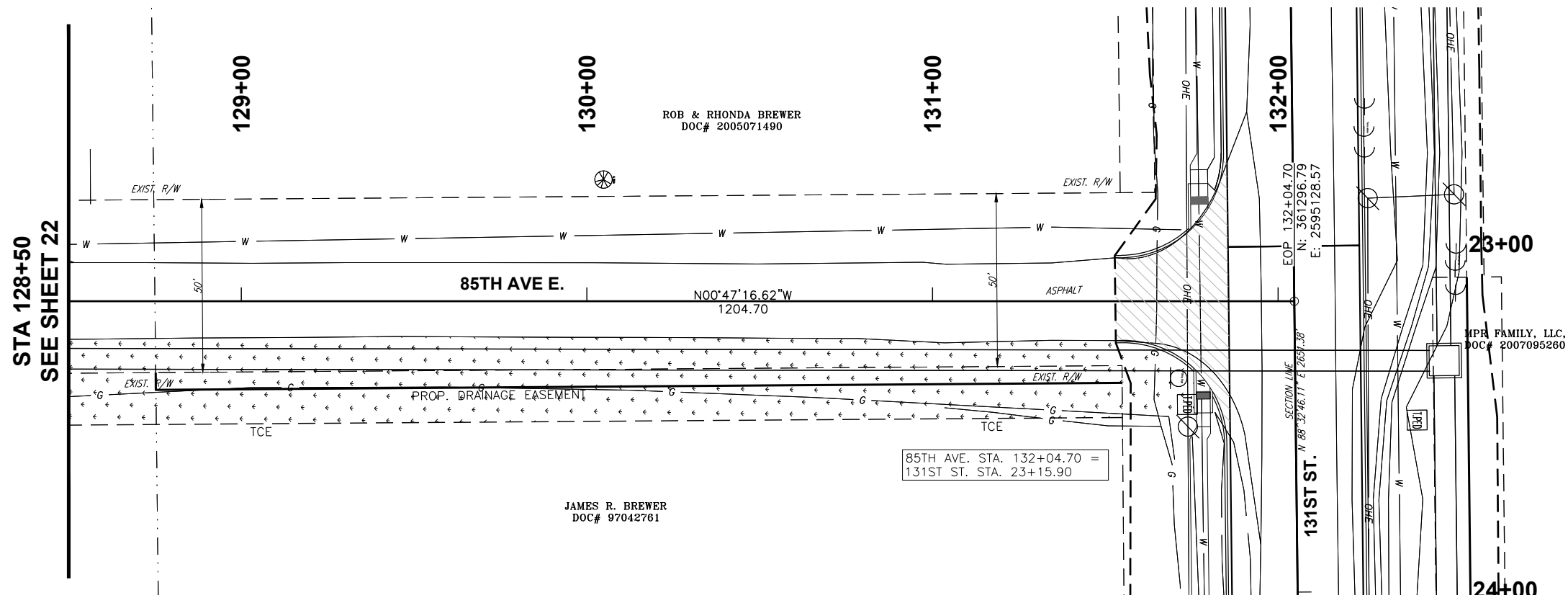
GARDENVIEW ADDITION DRAINAGE

SHEET NAME
85TH AVE EROSION CONTROL (1 OF 2)

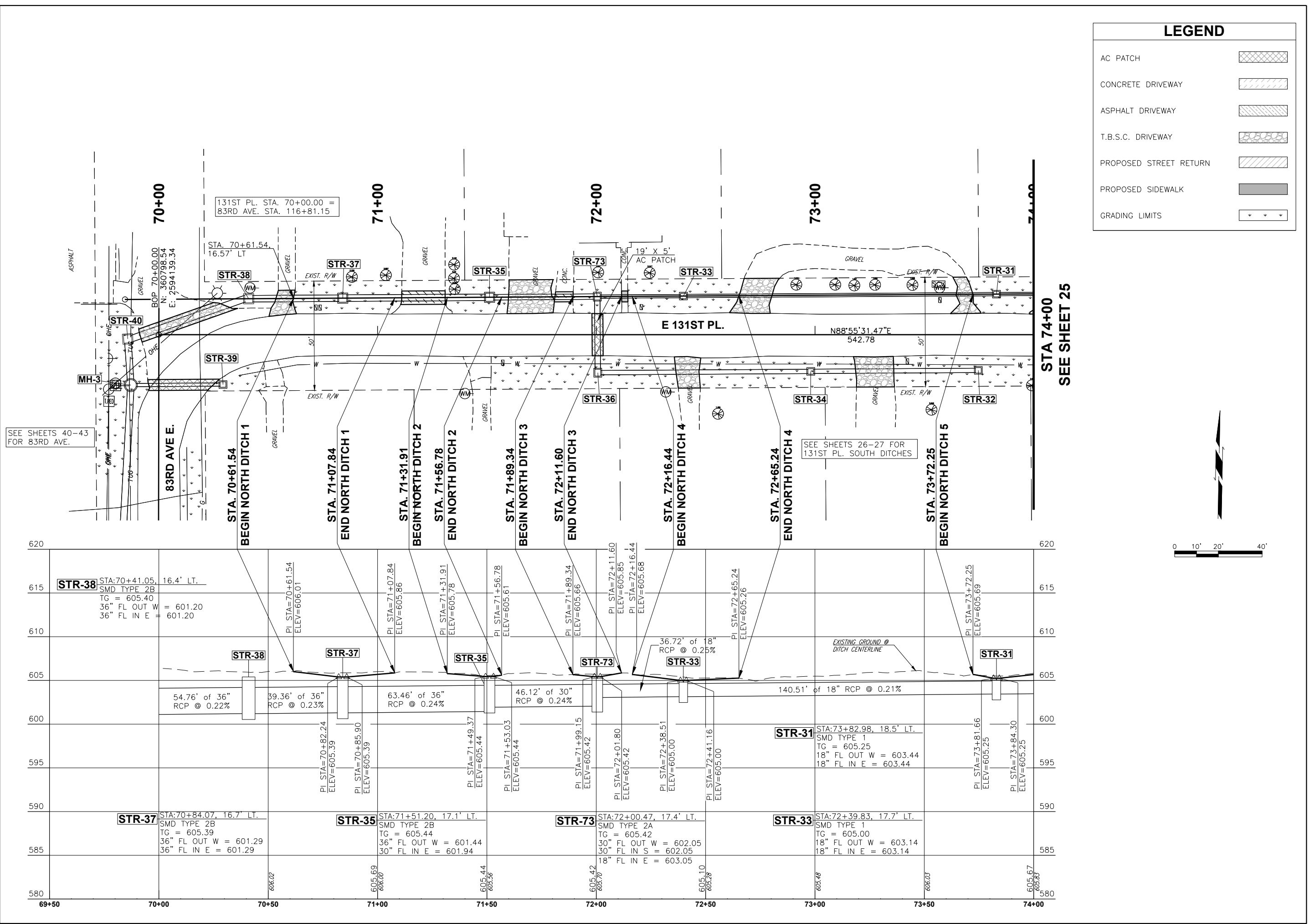
SHEET
22

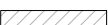
BIXBY, OKLAHOMA

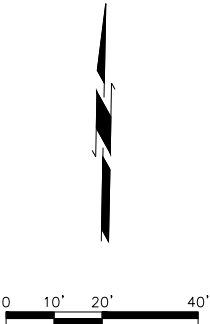
Page 147 of 215



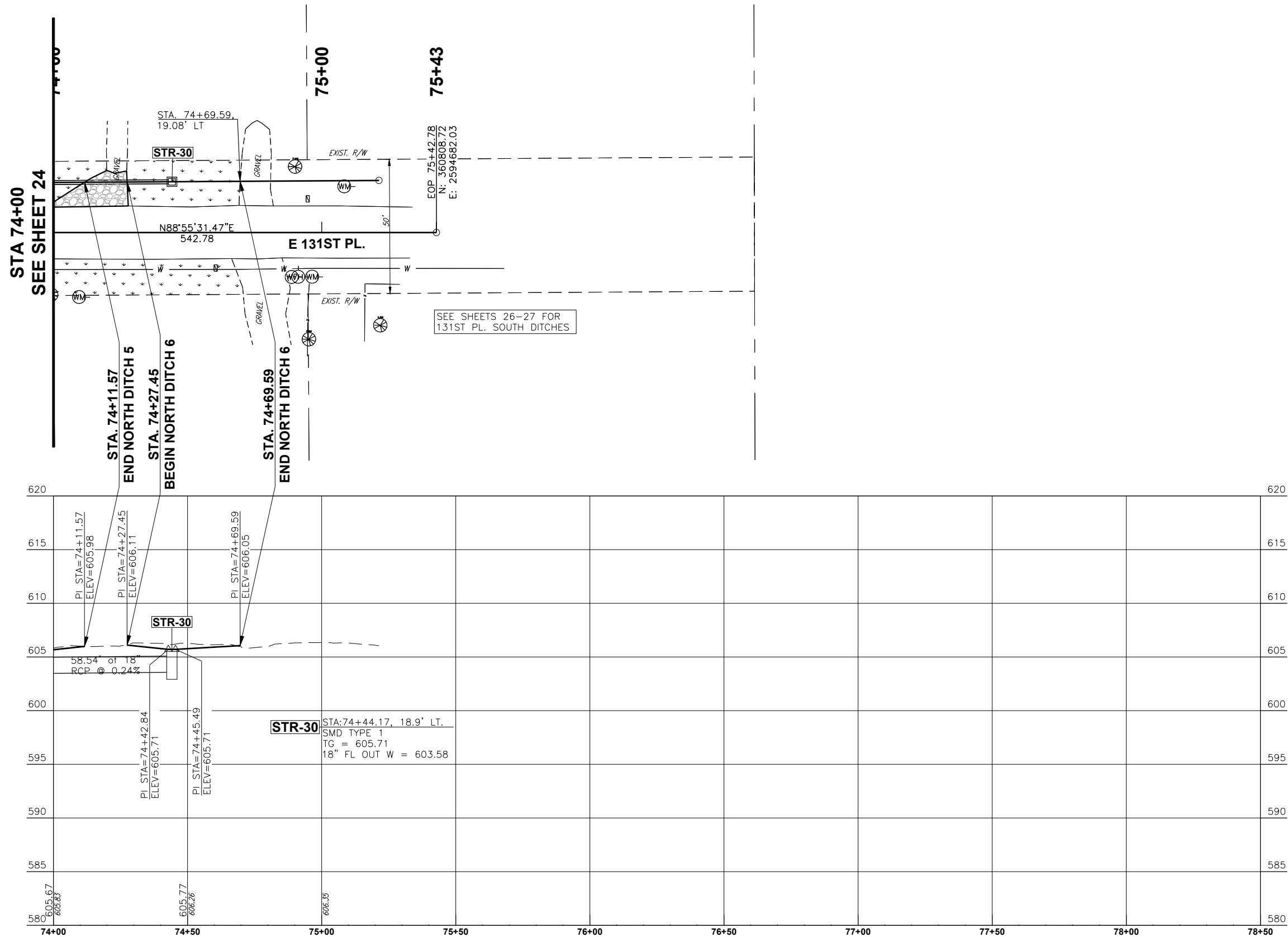
SHEET 23	85TH AVE EROSION CONTROL (2 OF 2)	GARDENVIEW ADDITION DRAINAGE	BIXBY, OKLAHOMA	REVISION HISTORY						THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT	
				SUBMITTAL:	PRELIMINARY	NO.	DESCRIPTION	DATE			
				DATE:	11/30/2023						
				PROJECT NO:	170231 0102						
				DESIGNED BY:	J.L.C.						
DRAWN BY:	J.L.C.										
APPROVED BY:	S.N.H.										
SCALE:	AS SHOWN										



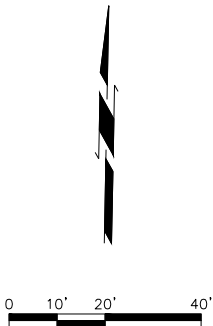
LEGEND	
AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	



		CEC CORPORATION 1000 N. UNIVERSITY AVENUE TULSA, OKLAHOMA 74127 WWW.CECENGINEERING.COM STATE OF OK CERTIFICATE OF AUTHORIZATION - CAR 32 EXPIRES 2024-09-30 - COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. MODIFICATION OR USE OF THIS DRAWING WITHOUT CEC'S WRITTEN PERMISSION OR WITHOUT CEC IS PROHIBITED.	
		THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL SIGNED AND SEALED DOCUMENT	
SHEET NAME GARDENVIEW ADDITION DRAINAGE 131ST PL NORTH DITCH PLAN & PROFILE (1 OF 2)		BIXBY, OKLAHOMA	
SHEET 24		Page 140 of 140	
SUBMITTAL: PRELIMINARY		REVISION HISTORY	
DATE: 11/30/2023	PROJECT NO: 170231.0102	NO.	DESCRIPTION DATE
DESIGNED BY: J.L.C.	DRAWN BY: J.L.C.		
APPROVED BY: S.N.H.	SCALE: AS SHOWN		



LEGEND	
AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	



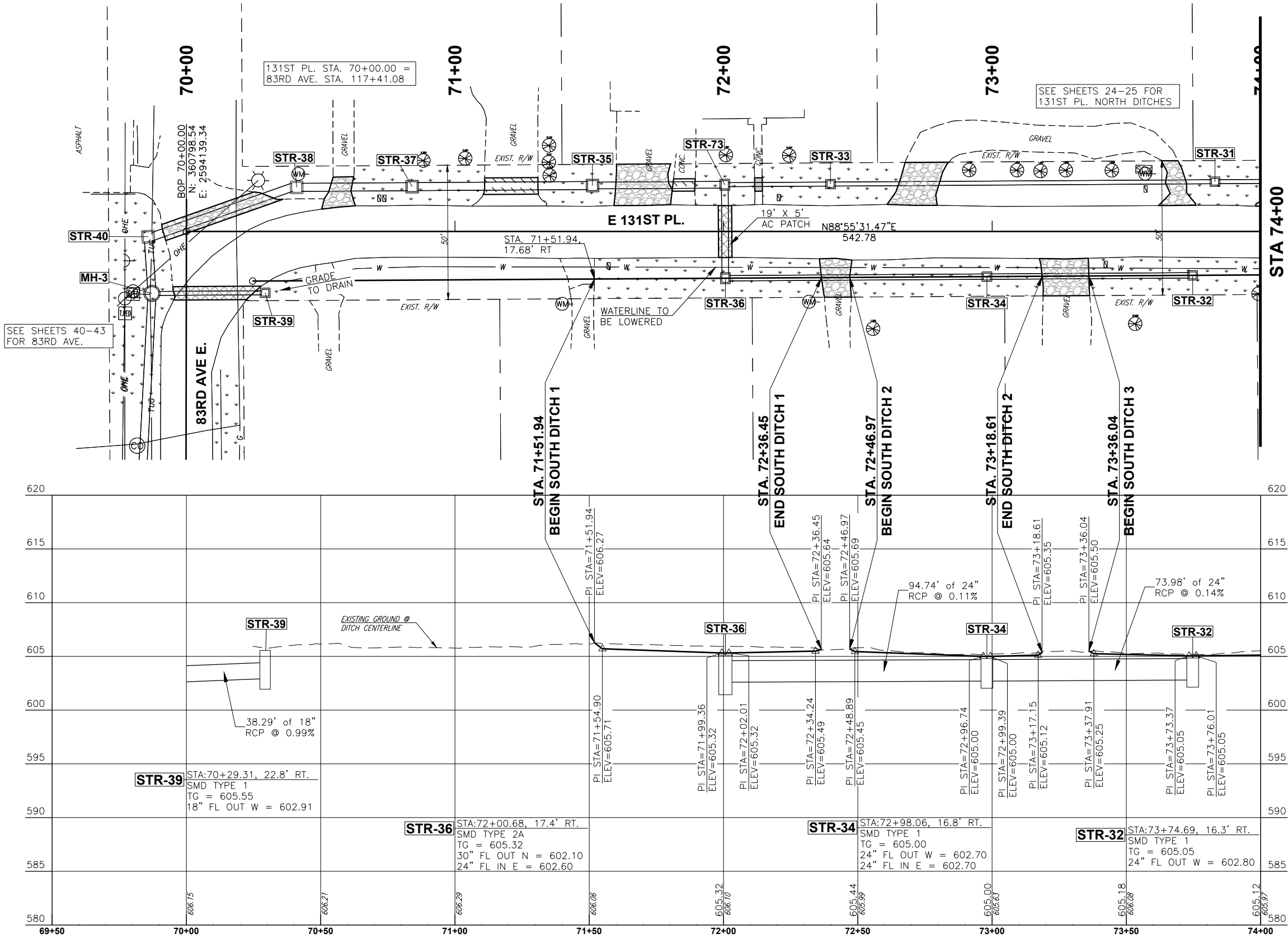
THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

PRELIMINARY		REVISION HISTORY	
NO.	DESCRIPTION	DATE	
11/30/2023			
PROJECT NO:	170231.0102		
DESIGNED BY:	J.L.C.		
DRAWN BY:	J.L.C.		
APPROVED BY:	S.N.H.		
SCALE:	AS SHOWN		

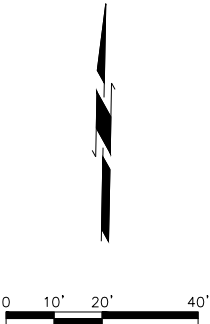
GARDENVIEW ADDITION DRAINAGE

SHEET NAME
131ST PL NORTH
DITCH PLAN &
PROFILE (2 OF 2)

SHEET
25



LEGEND	
AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	



CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
CAN 32 EXPIRES: 2024-06-30
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND LOCATION SPECIFICALLY IDENTIFIED ON THE DRAWING. ANY REUSE OR MODIFICATION OF THIS DRAWING WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED.

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT.

REVISION HISTORY	
NO.	DESCRIPTION

SUBMITTAL:	PRELIMINARY
DATE:	11/30/2023
PROJECT NO:	170231.0102
DESIGNED BY:	J.L.C.
DRAWN BY:	J.L.C.
APPROVED BY:	S.N.H.
SCALE:	AS SHOWN

GARDENVIEW ADDITION DRAINAGE

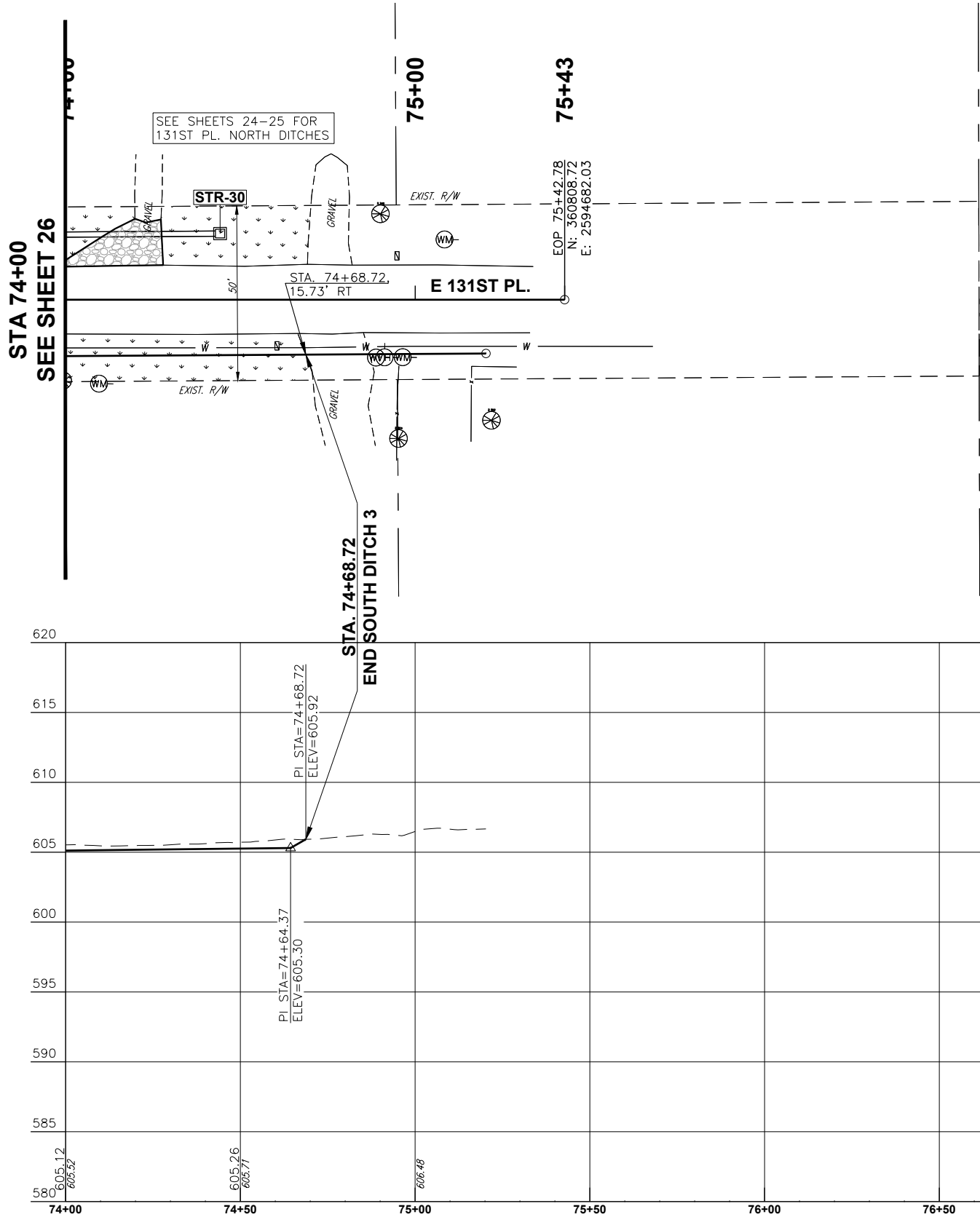
SHEET NAME
131ST PL SOUTH DITCH PLAN & PROFILE (1 OF 2)

SHEET

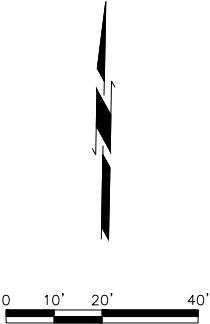
26

BIXBY, OKLAHOMA

Page 151 of 215



LEGEND	
AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	



CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CEN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED ON THE DRAWING.
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO.	NO.	DESCRIPTION	NO.	DATE
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE:	AS SHOWN				

GARDENVIEW ADDITION DRAINAGE

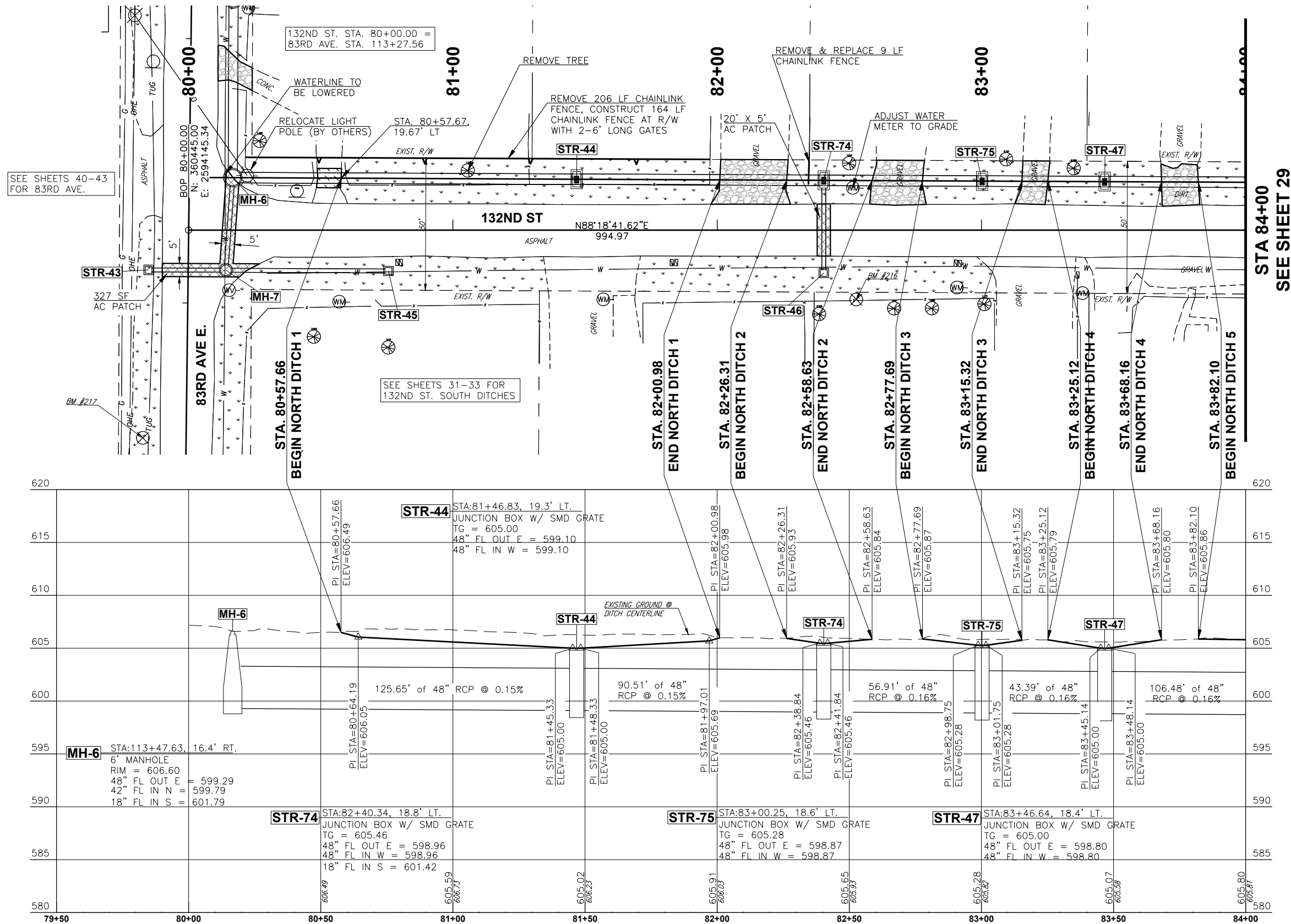
SHEET NAME
131ST PL SOUTH
DITCH PLAN &
PROFILE (2 OF 2)

BIXBY, OKLAHOMA

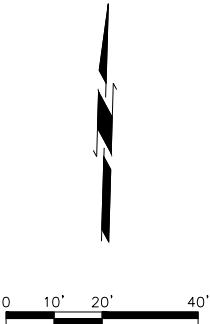
SHEET

27

Page 152 of 215



LEGEND	
AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	



CEC CORPORATION

TULSA, OKLAHOMA 74137

WWW.CONNEXCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION

CAB 32 EXPIRES: 2024-06-30

COPYRIGHT © 2007 CEC. ALL RIGHTS RESERVED.

NO PART OF THIS DOCUMENT MAY BE REPRODUCED OR

MODIFICATION OR USE OF THIS DRAWING

WITHOUT EXPRESS WRITTEN PERMISSION OF

CEC IS PROHIBITED

CEC

ENGINEERING

THIS DOCUMENT IS

PRELIMINARY IN

NATURE AND IS NOT

A FINAL, SIGNED

AND SEALED

DOCUMENT

PROFESSIONAL

ENGINEER

STATE OF OKLAHOMA

EXPIRATION DATE: 12/31/2024

GARDENVIEW ADDITION DRAINAGE BIXBY, OKLAHOMA	SUBMITTAL:	PRELIMINARY	REVISION HISTORY		
	DATE:	11/30/2023	NO.	DESCRIPTION	DATE
	PROJECT NO:	170231.0102			
	DESIGNED BY:	J.L.C.			
	DRAWN BY:	J.L.C.			
	APPROVED BY:	S.N.H.			
	SCALE:	AS SHOWN			

SHEET NAME

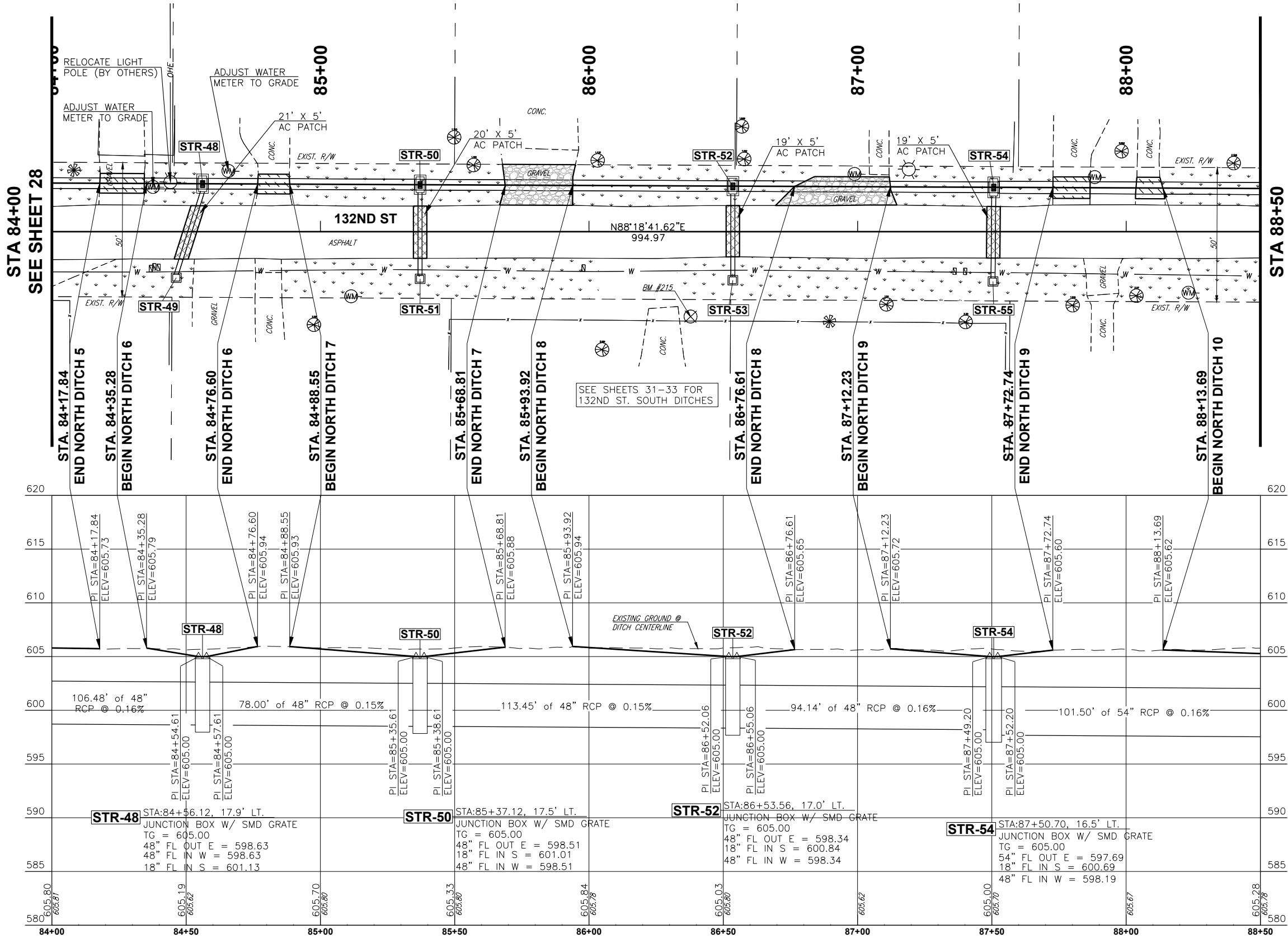
132ND ST NORTH

DITCH PLAN &

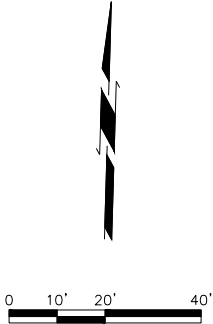
PROFILE (1 OF 3)

SHEET

28



LEGEND	
AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	



CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXIONCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAP 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED ON THE DRAWING. WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

REVISION HISTORY	
NO.	DESCRIPTION

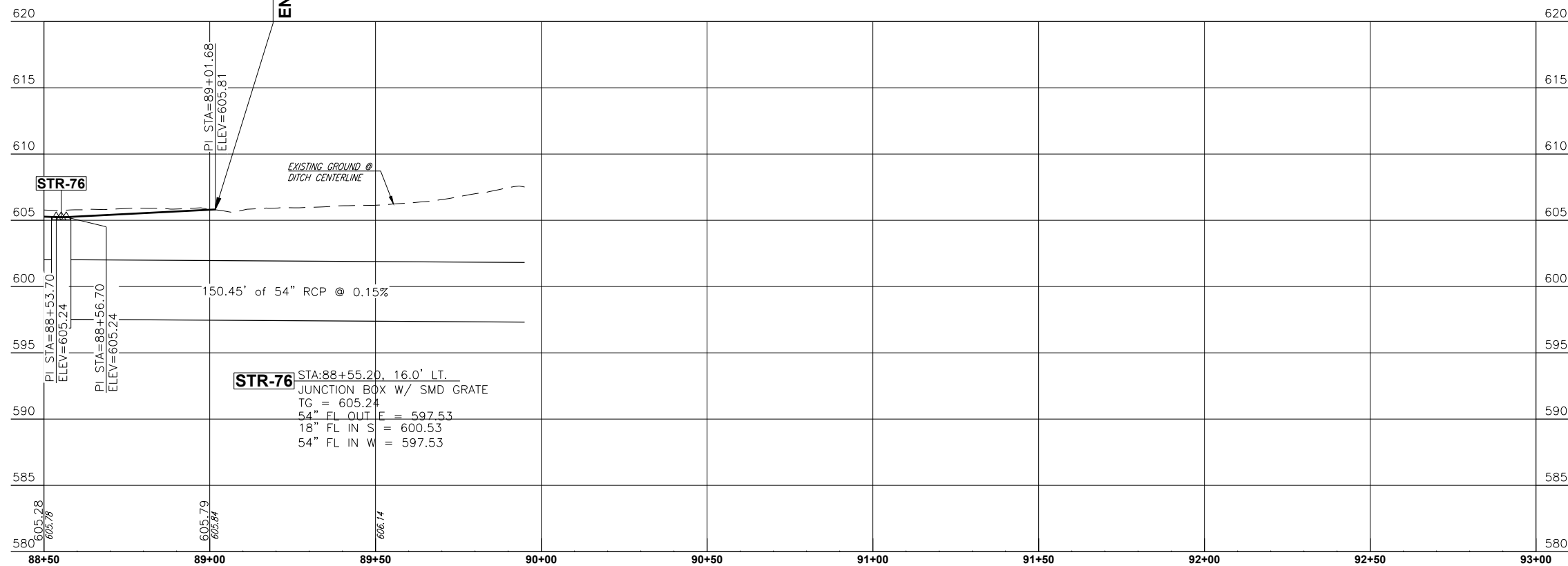
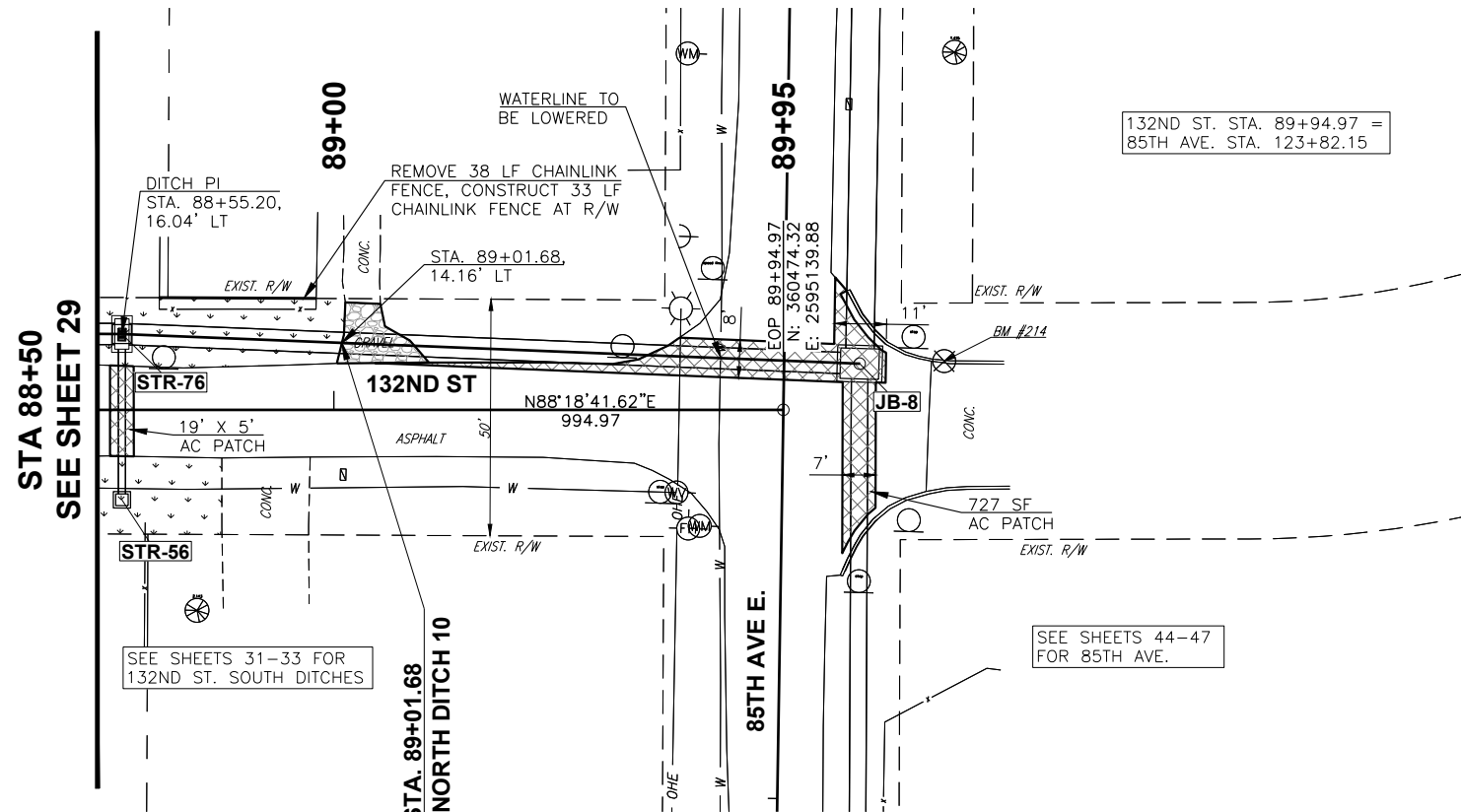
SUBMITTAL:	PRELIMINARY	DATE:	11/30/2023
		PROJECT NO: <td>170231.0102</td>	170231.0102
		DESIGNED BY: <td>J.L.C.</td>	J.L.C.
		DRAWN BY: <td>J.L.C.</td>	J.L.C.
		APPROVED BY: <td>S.N.H.</td>	S.N.H.
		SCALE: <td>AS SHOWN</td>	AS SHOWN

GARDENVIEW ADDITION DRAINAGE

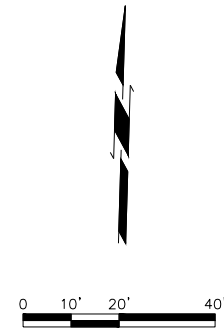
SHEET NAME
132ND ST NORTH
DITCH PLAN &
PROFILE (2 OF 3)

SHEET
29

BIXBY, OKLAHOMA



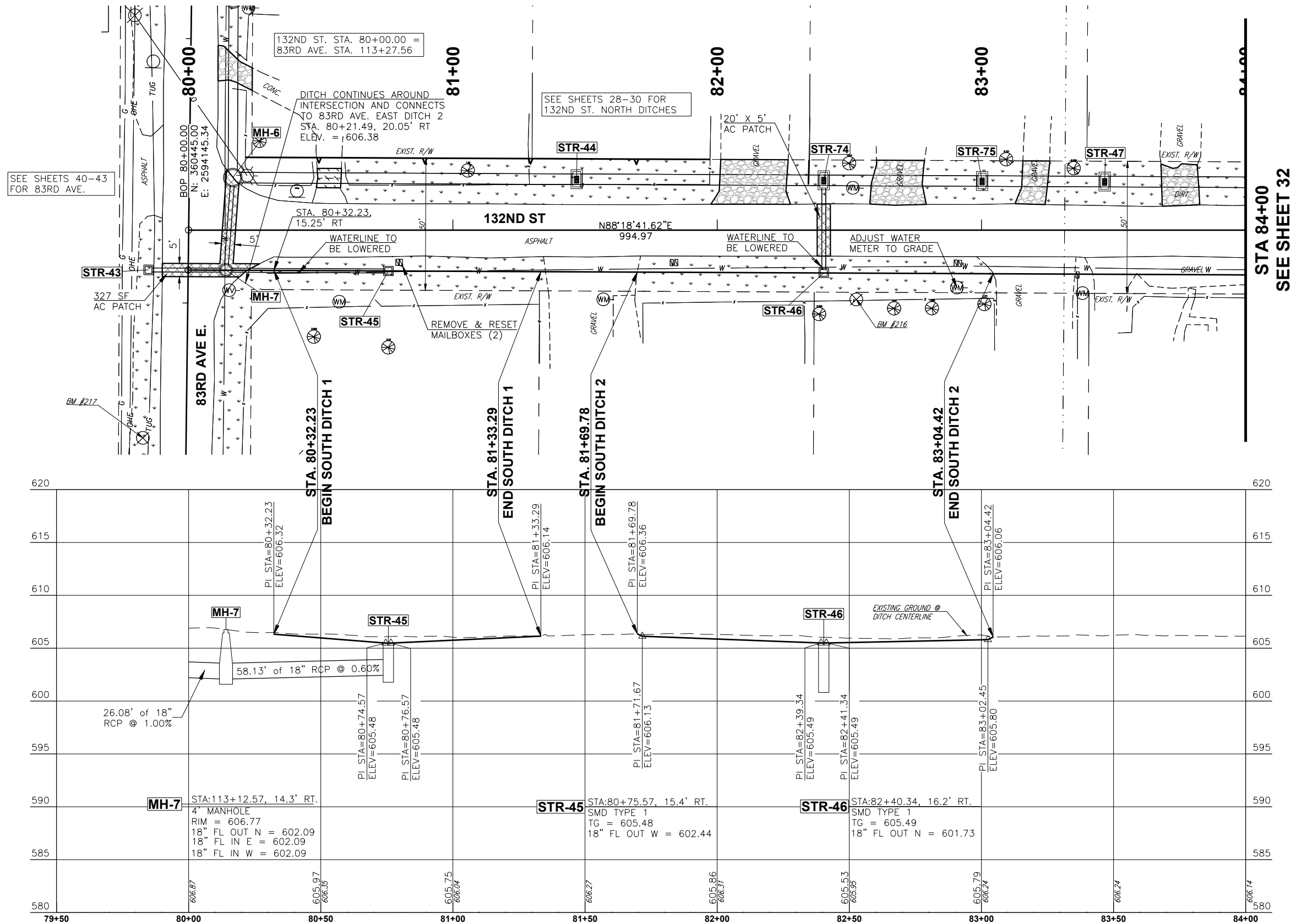
LEGEND	
AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	



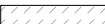
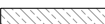
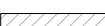
THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

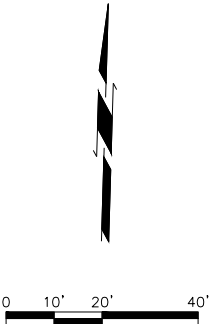
SUBMITTAL:		PRELIMINARY	REVISION HISTORY	
DATE:	11/30/2023		NO.	DESCRIPTION
PROJECT NO:	170231.0102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:	S.N.H.			
SCALE:	AS SHOWN			
				DATE

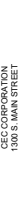
GARDENVIEW ADDITION DRAINAGE	BIXBY, OKLAHOMA
	SHEET NAME 132ND ST NORTH DITCH PLAN & PROFILE (3 OF 3)

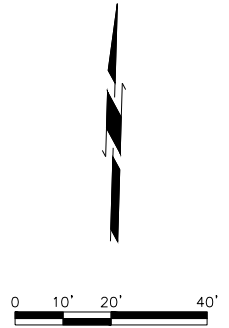


LEGEND

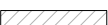
AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	

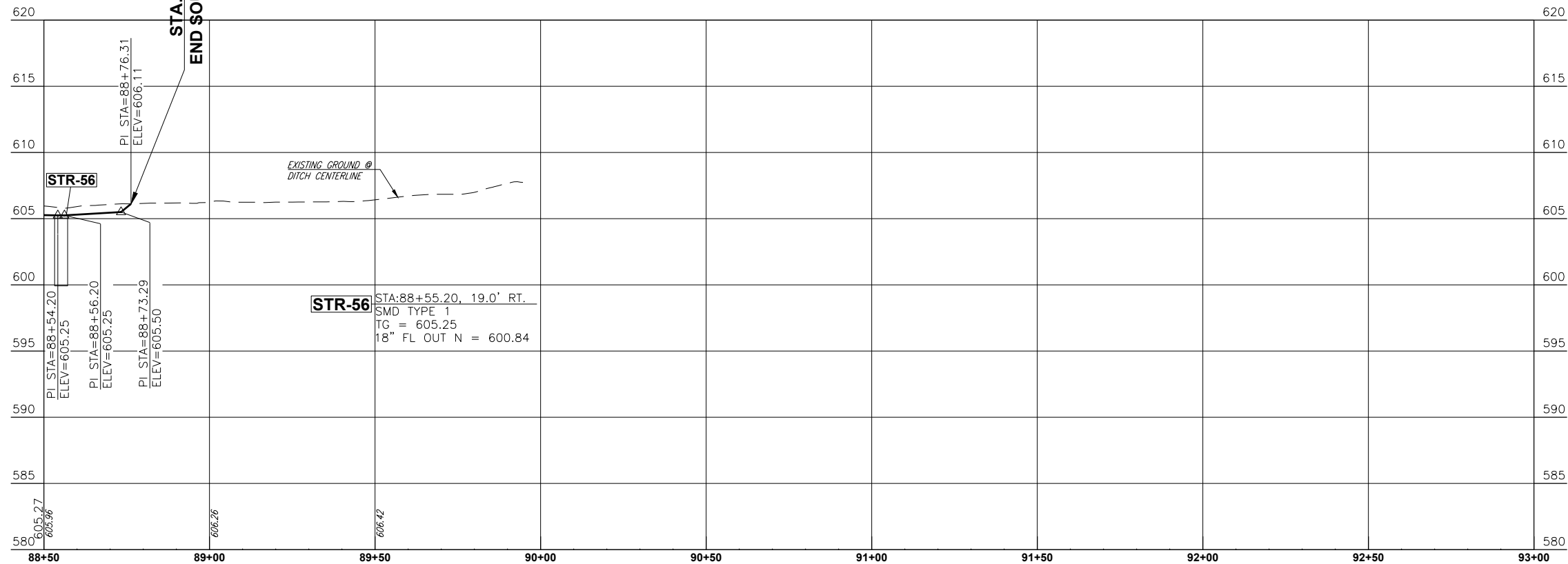


SHEET 31	GARDENVIEW ADDITION DRAINAGE BIXBY, OKLAHOMA	REVISION HISTORY			
		SUBMITTAL:	PRELIMINARY	NO.	DESCRIPTION
		DATE:	11/30/2023		DATE
		PROJECT NO:	170231 0102		
		DESIGNED BY:	J.L.C.		
SHEET NAME 132ND ST SOUTH DITCH PLAN & PROFILE (1 OF 3)	BIXBY, OKLAHOMA	DRAWN BY:	J.L.C.		
		APPROVED BY:	S.N.H.		
		SCALE:	AS SHOWN		
					
		THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT			
					
CEC CORPORATION TULSA, OKLAHOMA 74107 WWW.CONNEXCEC.COM STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION CAP 32 EXPIRES: 2024-06-30 COPYRIGHT © 2007 CEC. ALL RIGHTS RESERVED. NO PART OF THIS DOCUMENT MAY BE REPRODUCED OR MODIFICATION OR USE OF THIS DRAWING WITHOUT EXPRESS WRITTEN PERMISSION OF CEC IS PROHIBITED					

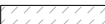
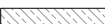
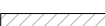


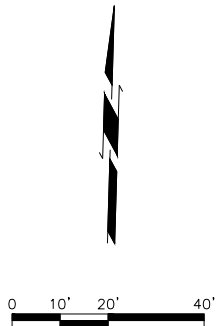
LEGEND

AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	

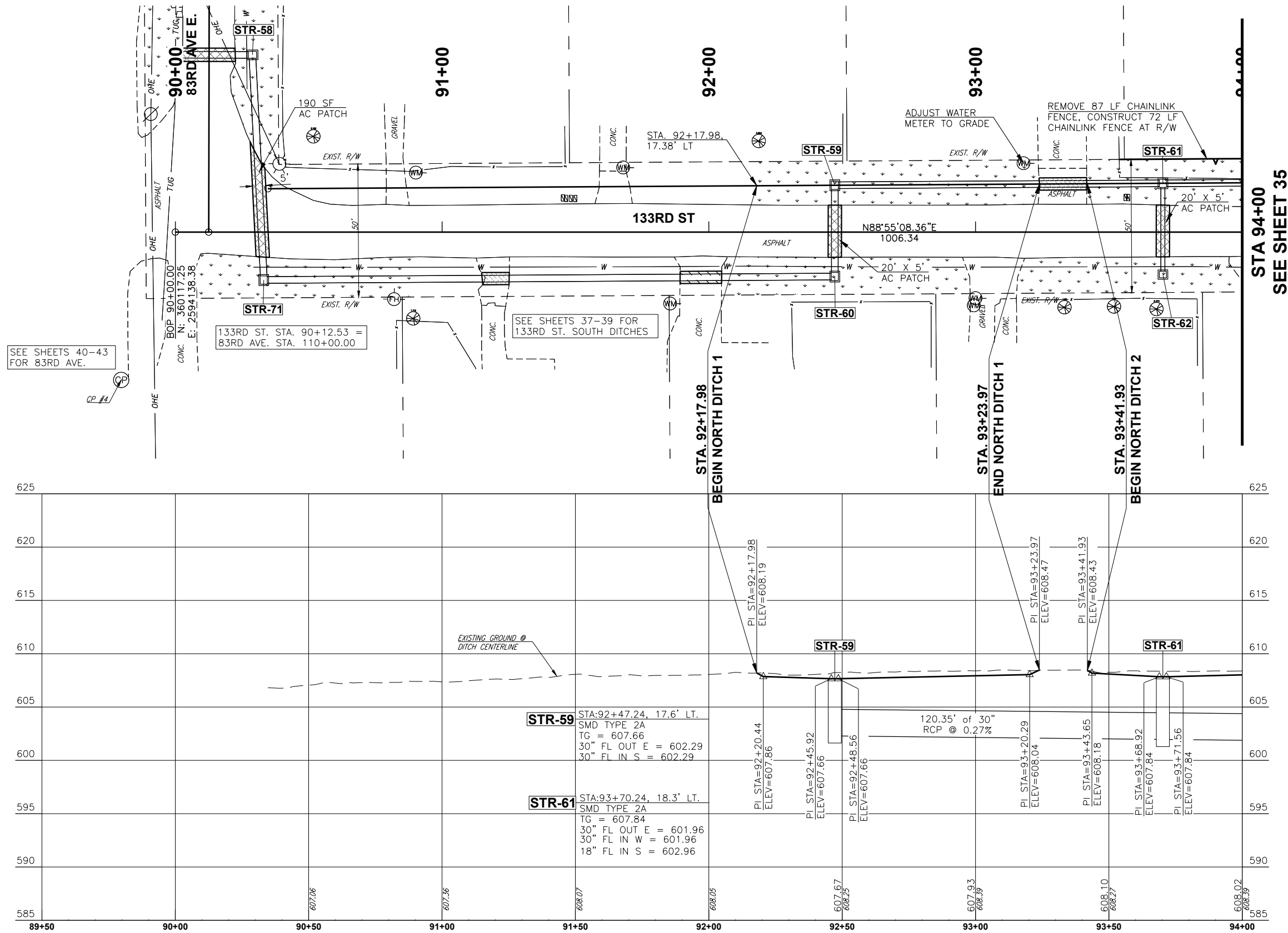


LEGEND

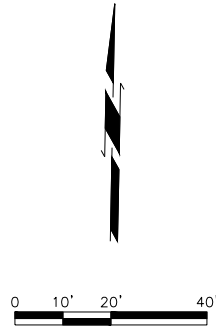
AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	

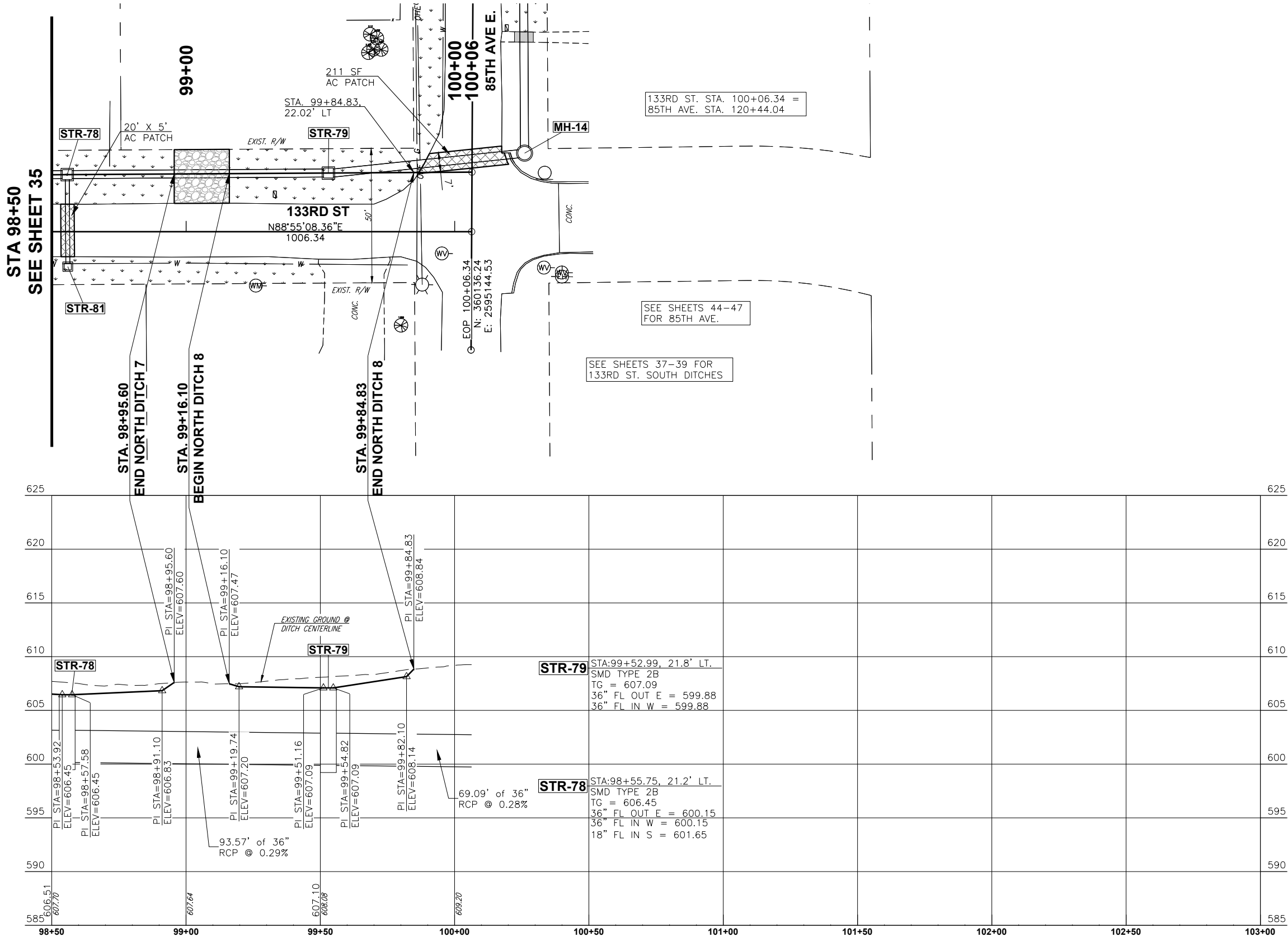


SHEET NAME 132ND ST SOUTH DITCH PLAN & PROFILE (3 OF 3)	SHEET 33	GARDENVIEW ADDITION DRAINAGE BIXBY, OKLAHOMA	SUBMITTAL: PRELIMINARY	REVISION HISTORY	
			DATE: 11/30/2023 PROJECT NO: 170231.0.102 DESIGNED BY: J.L.C. DRAWN BY: J.L.C. APPROVED BY: S.N.H. SCALE: AS SHOWN	NO. DESCRIPTION DATE	

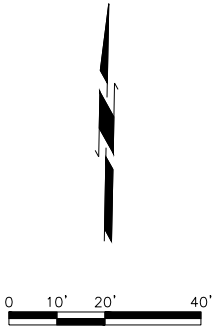


LEGEND	
AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	

[illegible]



LEGEND	
AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAB 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED ON THE DRAWING.
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.

PROFESSIONAL SEAL

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT

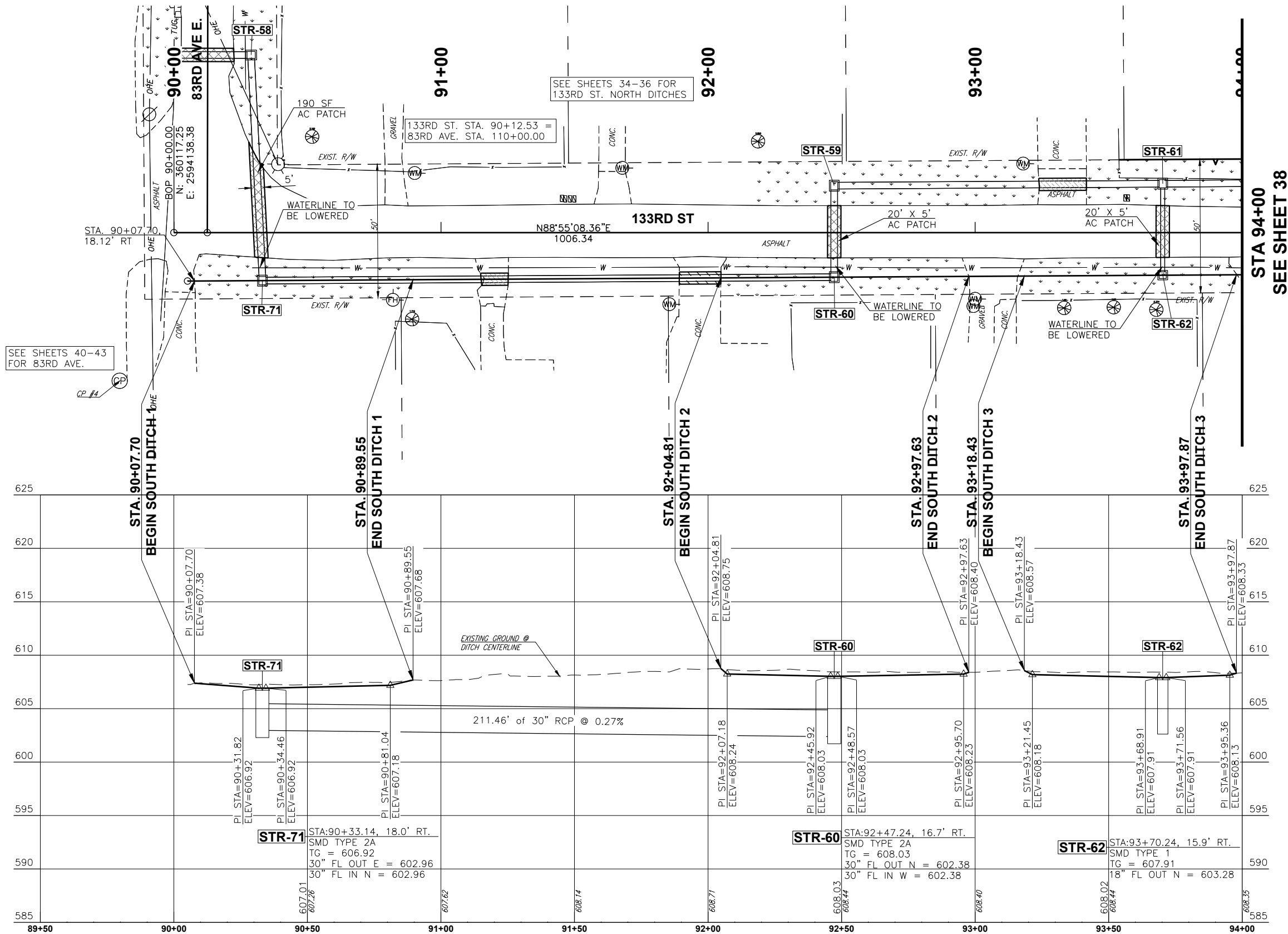
REVISION HISTORY		SUBMITTAL		PRELIMINARY	
NO.	DESCRIPTION	DATE	DATE	NO.	DESCRIPTION
1		11/30/2023			
2		17/0231.01.02			
3		J.L.C.			
4		J.L.C.			
5		S.N.H.			
6		AS SHOWN			

GARDENVIEW ADDITION DRAINAGE

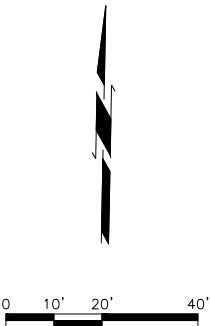
SHEET NAME
133RD ST NORTH
DITCH PLAN &
PROFILE (3 OF 3)

SHEET
36

BIXBY, OKLAHOMA



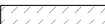
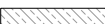
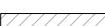
LEGEND	
AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	

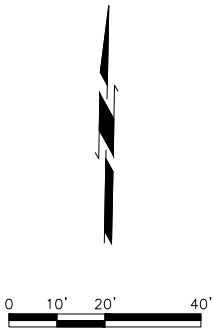


SHEET 37		GARDENVIEW ADDITION DRAINAGE		BIXBY, OKLAHOMA		SUBMITTAL:		PRELIMINARY		REVISION HISTORY		THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL SIGNED AND SEALED DOCUMENT 		 CEC CORPORATION TULSA, OKLAHOMA 74137 WWW.CONNECTCEC.COM STATE OF OK CERTIFICATE OF AUTHORIZATION J.L. CLINE EIT 10000 EXP. DATE 12-31-2024 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. NO REUSE OR MODIFICATION OR USE OF THIS DRAWING WITHOUT WRITTEN PERMISSION FROM CEC IS PROHIBITED.	
						DATE:	11/30/2023	NO.	DESCRIPTION	DATE					
		PROJECT NO:		170231.0102											
		DESIGNED BY:		J.L.C.											
		DRAWN BY:		J.L.C.											
		APPROVED BY:		S.N.H.											
		SCALE:		AS SHOWN											



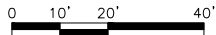
LEGEND

AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	

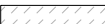
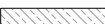
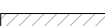


SUBMITTAL:	PRELIMINARY	REVISION HISTORY		
		NO.	DESCRIPTION	DATE
DATE:	11/30/2023			
PROJECT NO:	170231.0102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:	S.N.H.			
SCALE:	AS SHOWN			

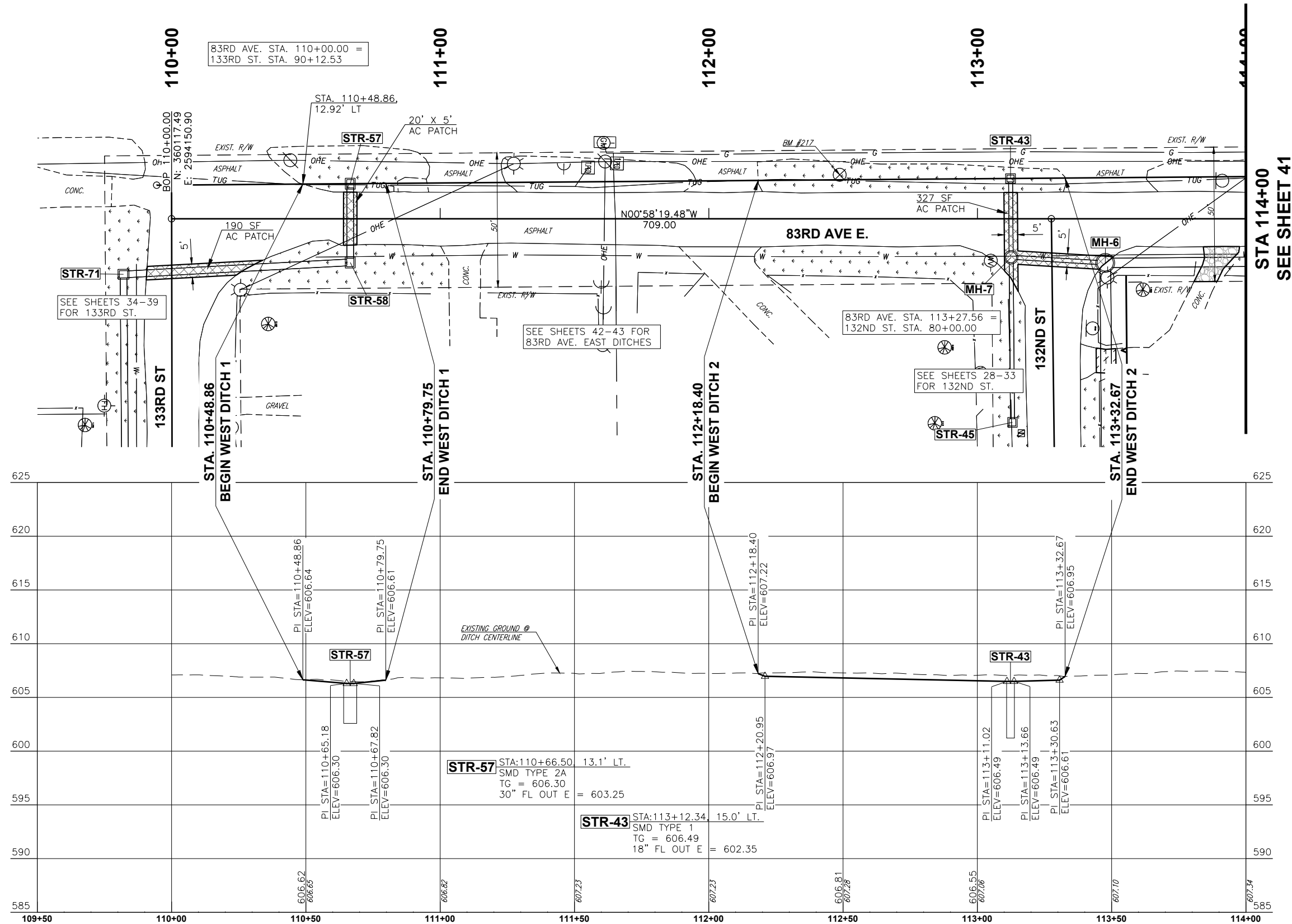
GARDENVIEW ADDITION DRAINAGE	BIXBY, OKLAHOMA
	SHEET NAME 133RD ST SOUTH DITCH PLAN & PROFILE (2 OF 3)



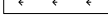
LEGEND

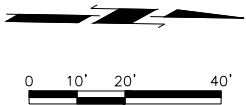
AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	

CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.	
CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EXPIRES 2024-06-30 COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED. REPRODUCTION OR USE OF THIS DRAWING WITHOUT EXPLICIT PERMISSION OF CEC IS PROHIBITED.		CEC CORPORATION TULSA, OKLAHOMA 74117 WWW.CECCORP.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CAB 32 EX			

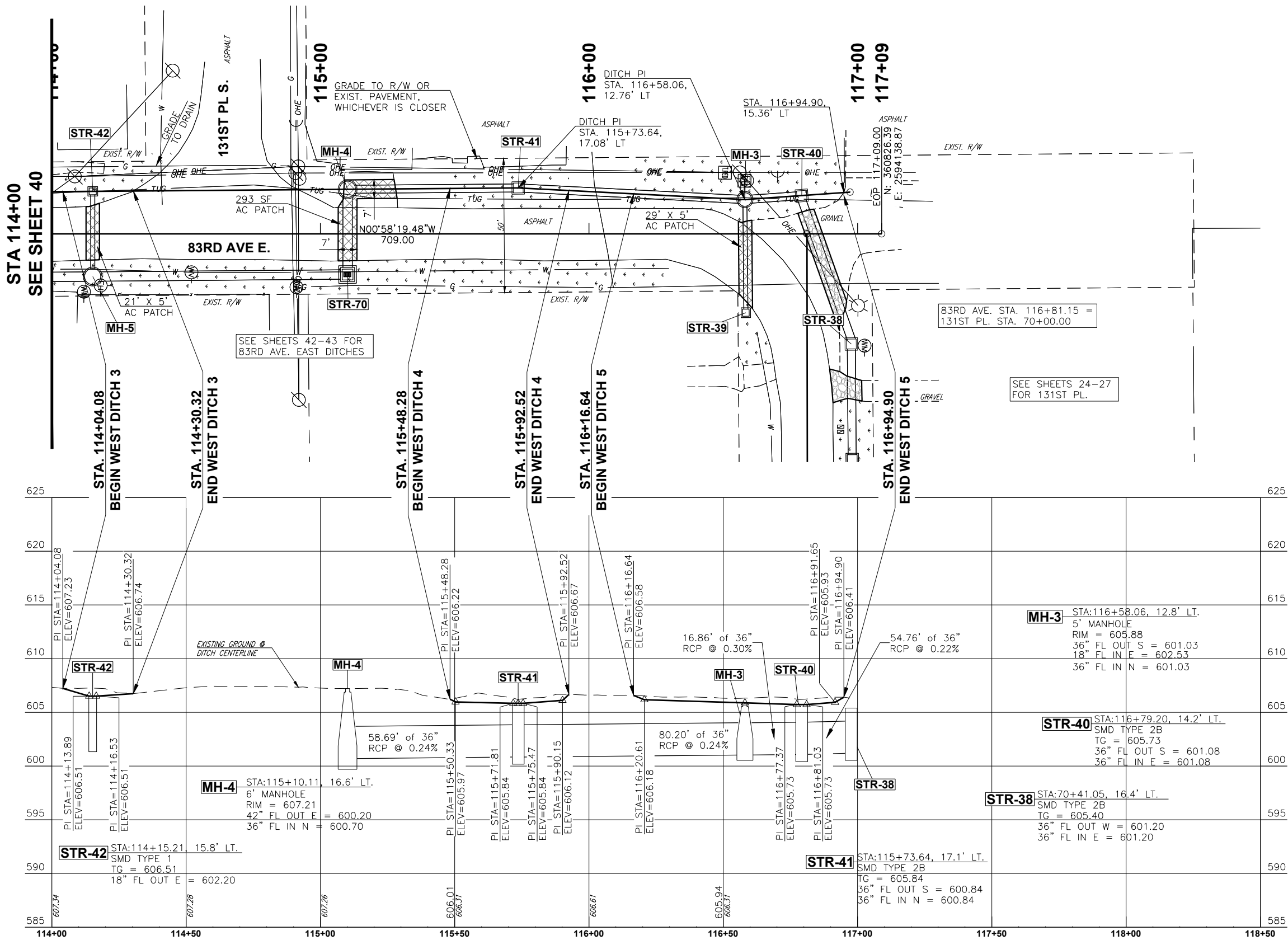


LEGEND

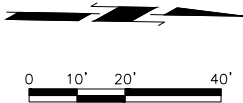
AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	



SHEET NAME 83RD AVE WEST DITCH PLAN & PROFILE (1 OF 2)	GARDENVIEW ADDITION DRAINAGE	BIXBY, OKLAHOMA	REVISION HISTORY				DATE
			SUBMITTAL:	PRELIMINARY	NO.	DESCRIPTION	
SHEET 40			DATE:	11/30/2023			
			PROJECT NO:	170231 0102			
			DESIGNED BY:	J.L.C.			
			DRAWN BY:	J.L.C.			
			APPROVED BY:	S.N.H.			
			SCALE:	AS SHOWN			
CEC CORPORATION TULSA, OKLAHOMA 74107 WWW.CONNECTCEC.COM STATE OF OK CERTIFICATE OF AUTHORIZATION CEN 32 EXPIRES: 2024-06-30 COPYRIGHT © 2007 CEC. ALL RIGHTS RESERVED. NO PART OF THIS DOCUMENT MAY BE REPRODUCED OR MODIFICATION OR USE OF THIS DRAWING WITHOUT EXPRESS WRITTEN PERMISSION OF CEC IS PROHIBITED.							



LEGEND	
AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	



CEC

CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXTECH.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
C.A.B. 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING
MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.

PROFESSIONAL ENGINEER
PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT

REVISION HISTORY		
NO.	DESCRIPTION	DATE

GARDENVIEW ADDITION DRAINAGE

SHEET NAME
83RD AVE WEST DITCH PLAN & PROFILE (2 OF 2)

SHEET
41

SUBMITTAL: PRELIMINARY

DATE: 11/30/2023

PROJECT NO: 170231.0102

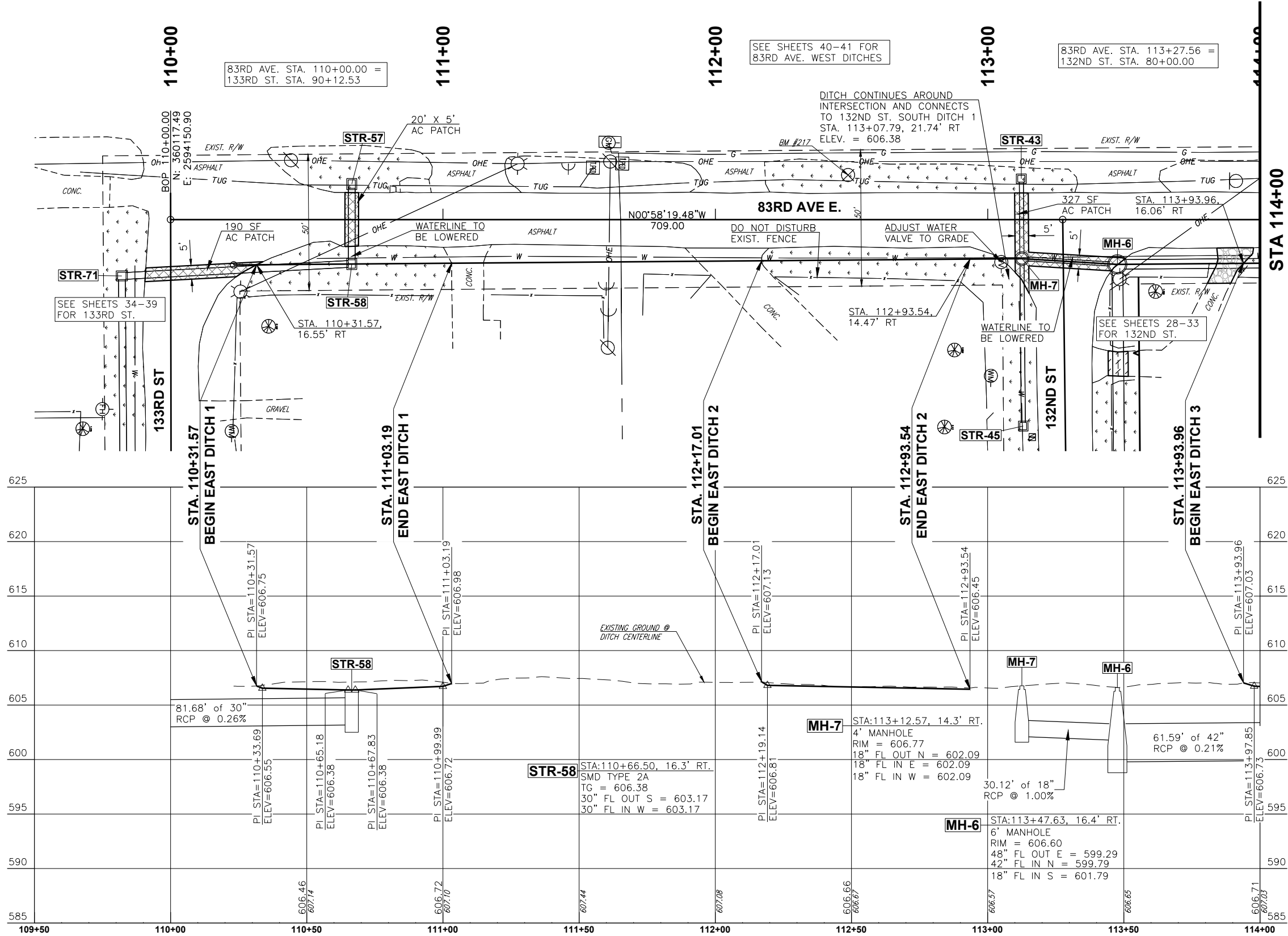
DESIGNED BY: J.L.C.

DRAWN BY: J.L.C.

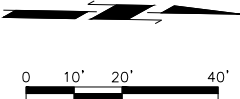
APPROVED BY: S.N.H.

SCALE: AS SHOWN

BIXBY, OKLAHOMA



LEGEND	
AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	



CFC

SEE SHEETS 34-39 FOR 133RD ST.

SEE SHEETS 40-41 FOR 83RD AVE. WEST DITCHES

83RD AVE. STA. 113+27.56 = 132ND ST. STA. 80+00.00

STATE OF OKLAHOMA
TULSA, OKLAHOMA 74119
WWW.CONNEXTEC.COM
CAN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CFC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CFC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREON.
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CFC, IT IS PROHIBITED.

PROFESSIONAL SEAL

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT.

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO.	DATE:	PROJECT NO.	NO.	DESCRIPTION
11/30/2023	170231.0102	11/30/2023	170231.0102		
DESIGNED BY: J.L.C.		DESIGNED BY: J.L.C.			
DRAWN BY: J.L.C.		DRAWN BY: J.L.C.			
APPROVED BY: S.N.H.		APPROVED BY: S.N.H.			
SCALE: AS SHOWN		SCALE: AS SHOWN			

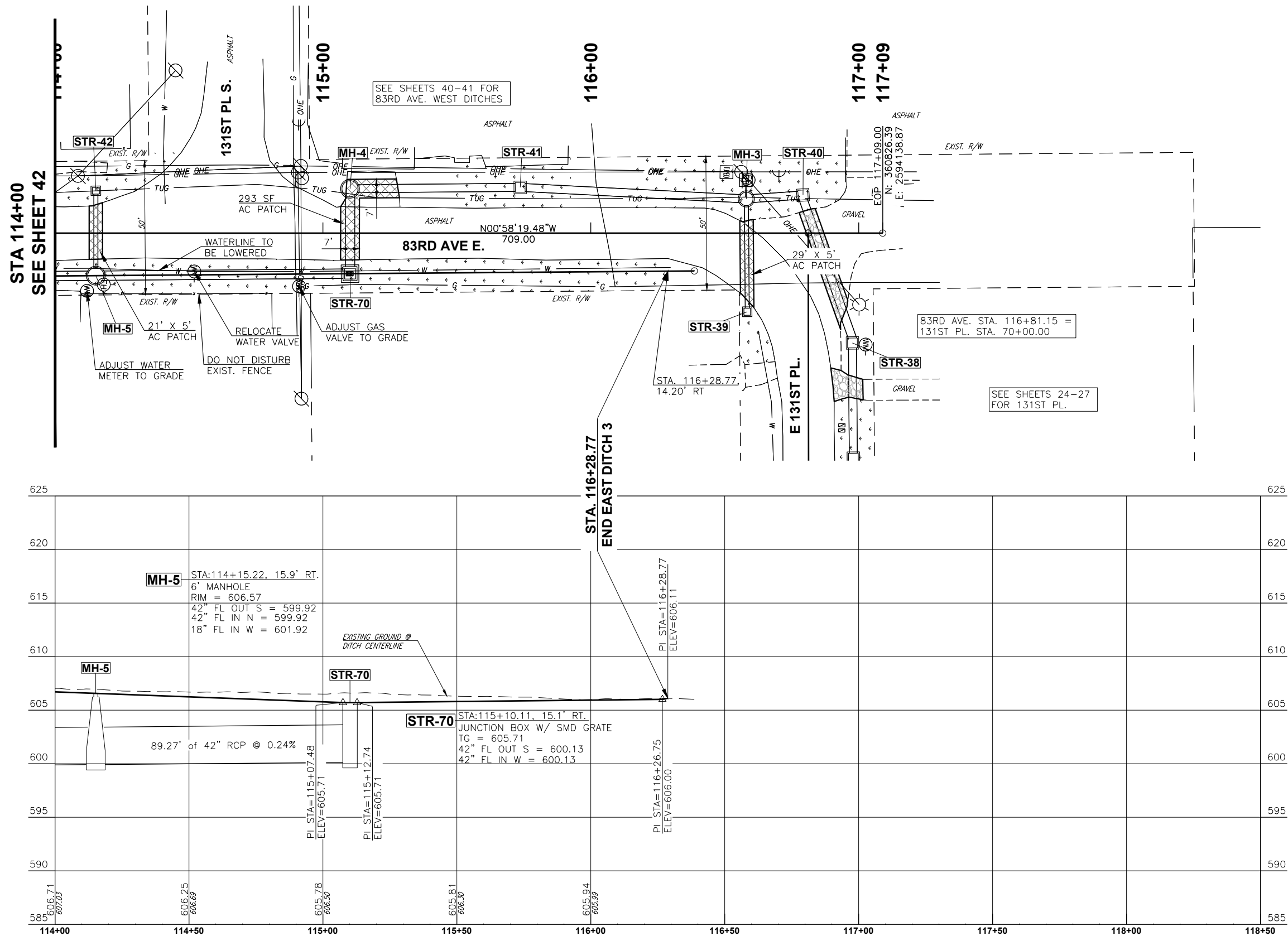
GARDENVIEW ADDITION DRAINAGE

SHEET NAME
83RD AVE EAST
DITCH PLAN &
PROFILE (1 OF 2)

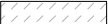
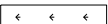
SHEET
42

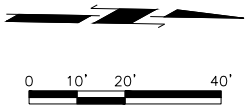
BIXBY, OKLAHOMA

PAGE 167 OF 215

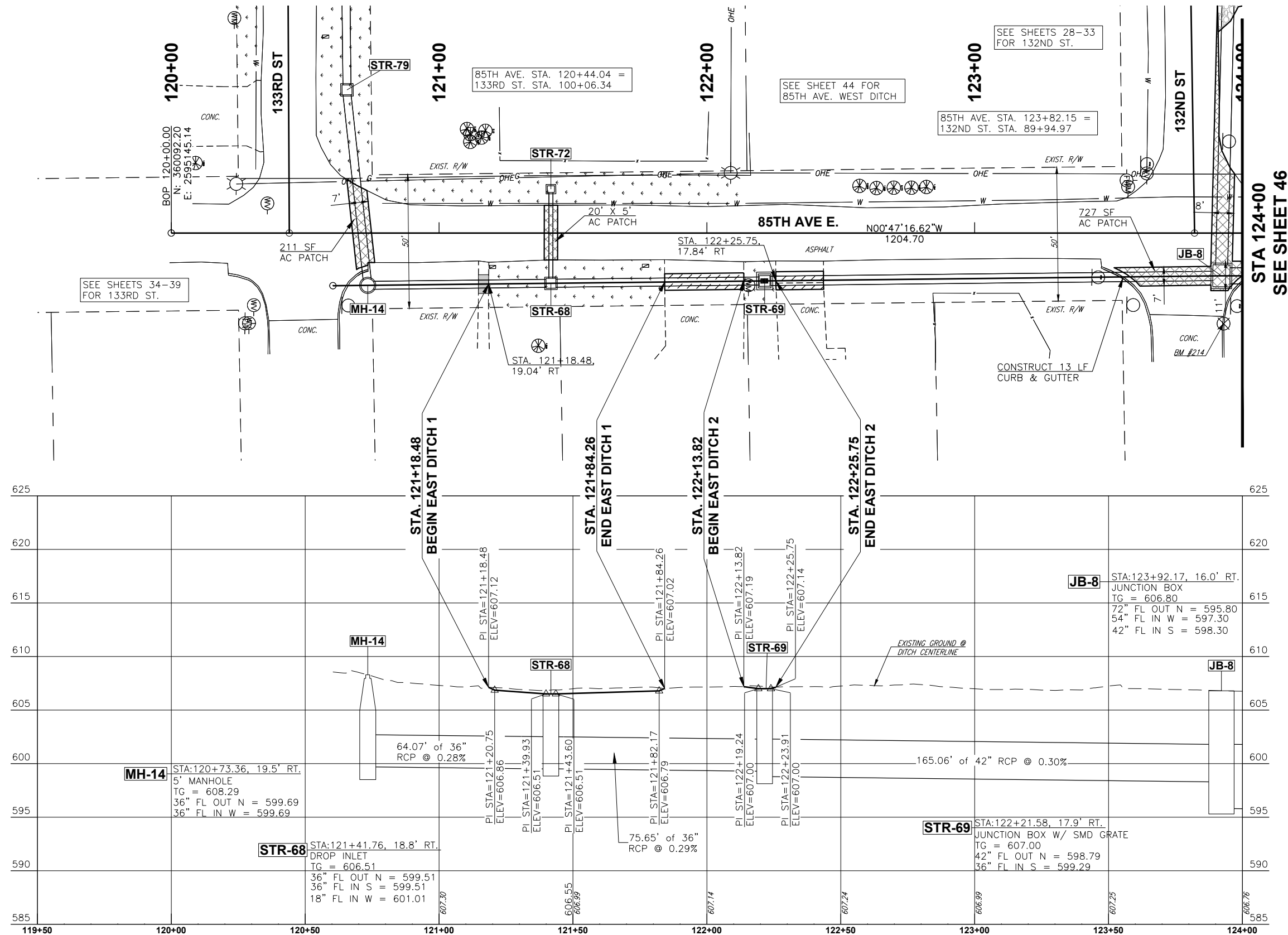


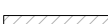
LEGEND

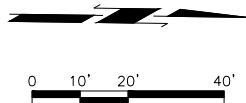
AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	



SHEET NAME 83RD AVE EAST DITCH PLAN & PROFILE (2 OF 2)		GARDENVIEW ADDITION DRAINAGE		SUBMITTAL:		PRELIMINARY		REVISION HISTORY				CEC CORPORATION TULSA, OKLAHOMA 74137 WWW.CONNECTCEC.COM STATE OF OK CERTIFICATE OF AUTHORIZATION J. L. CROOK CAP. 32 EXPIRES: 2024-06-30 COPYRIGHT © 2007 CEC. ALL RIGHTS RESERVED. NO REUSE OR MODIFICATION OR USE OF THIS DRAWING WITHOUT THE WRITTEN PERMISSION OF CEC IS PROHIBITED.				 CEC CORPORATION TULSA, OKLAHOMA 74137 WWW.CONNECTCEC.COM STATE OF OK CERTIFICATE OF AUTHORIZATION J. L. CROOK CAP. 32 EXPIRES: 2024-06-30 COPYRIGHT © 2007 CEC. ALL RIGHTS RESERVED. NO REUSE OR MODIFICATION OR USE OF THIS DRAWING WITHOUT THE WRITTEN PERMISSION OF CEC IS PROHIBITED.	
SHEET 43		BIXBY, OKLAHOMA		DATE:		11/30/2023		NO.		DESCRIPTION		DATE					
				PROJECT NO:		170231.0102											
				DESIGNED BY:		J.L.C.											
				DRAWN BY:		J.L.C.											
				APPROVED BY:		S.N.H.											
				SCALE:		AS SHOWN											



LEGEND	
AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	



CEC CORPORATION
TULSA, OKLAHOMA 74107
WWW.CONNEXCEC.COM

STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CASE 32 EXPIRES: 2024-06-30

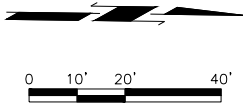
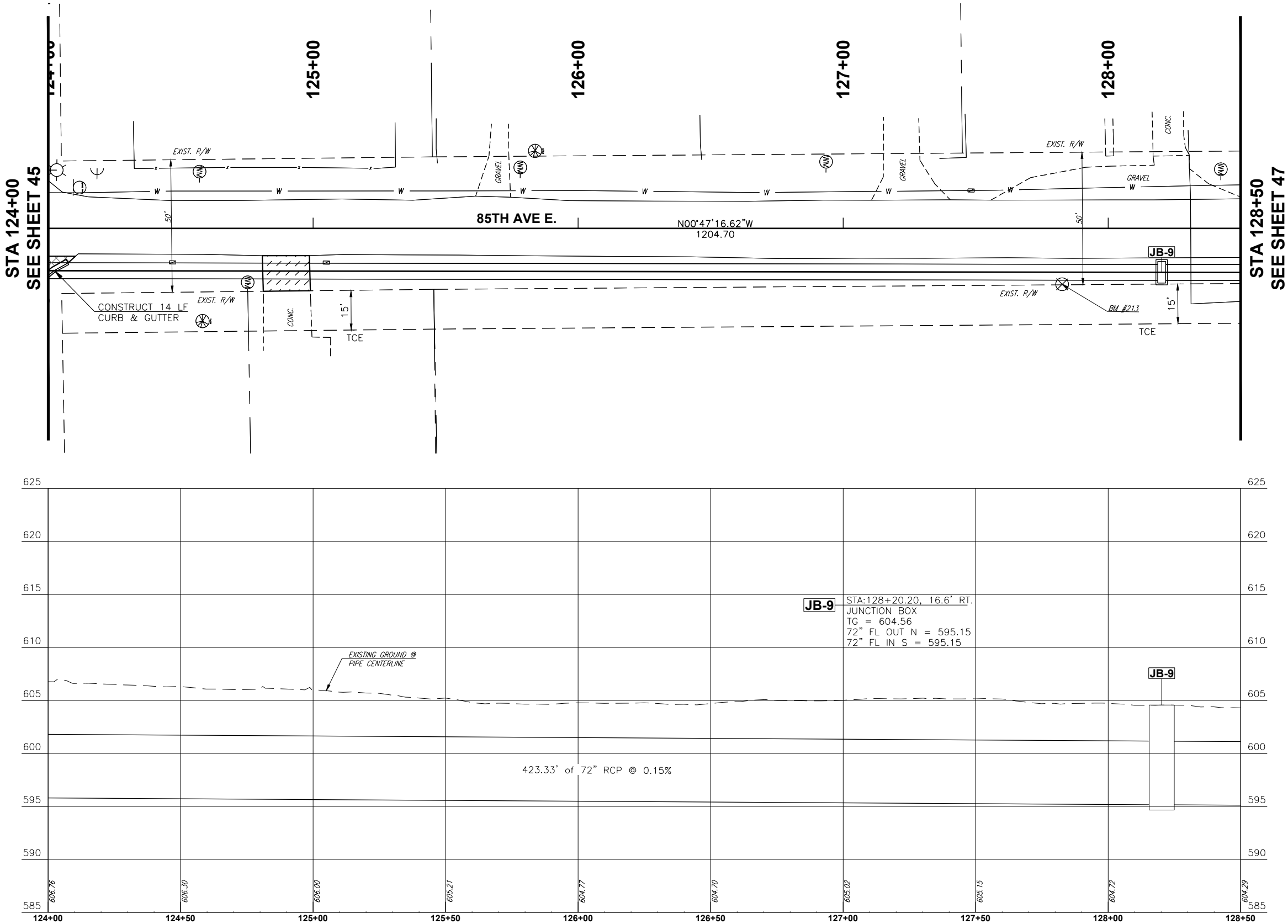
COPYRIGHT © 2007 CEC. ALL RIGHTS RESERVED.
NO PART OF THIS DOCUMENT MAY BE REPRODUCED OR
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN PERMISSION OF
CEC IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT



GARDENVIEW ADDITION DRAINAGE 85TH AVE EAST DITCH PLAN & PROFILE (1 OF 3)	SUBMITTAL:		PRELIMINARY	REVISION HISTORY	
	DATE:	11/30/2023	NO.	DESCRIPTION	DATE
	PROJECT NO:	170231.0102			
	DESIGNED BY:	J.L.C.			
	DRAWN BY:	J.L.C.			
	APPROVED BY:	S.N.H.			
SCALE:		AS SHOWN			
BIXBY, OKLAHOMA					
SHEET NAME 85TH AVE EAST DITCH PLAN & PROFILE (1 OF 3)		SHEET 45			



LEGEND	
AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	

CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXIONCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CEN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND LOCATION SPECIFICALLY IDENTIFIED ON THE DRAWING. ANY REUSE OR MODIFICATION OF THIS DRAWING WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED.

PROFESSIONAL SEAL

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT

REVISION HISTORY		SUBMITTAL	
NO.	DESCRIPTION	DATE	DATE

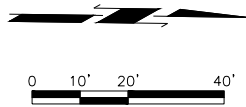
PRELIMINARY	DATE	PROJECT NO.	DESIGNED BY	DRAWN BY	APPROVED BY	SCALE
	11/30/2023	170231.0102	J.L.C.	J.L.C.	S.N.H.	AS SHOWN

GARDENVIEW ADDITION DRAINAGE

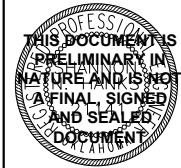
SHEET NAME
85TH AVE EAST
DITCH PLAN &
PROFILE (2 OF 3)

SHEET
46

BIXBY, OKLAHOMA



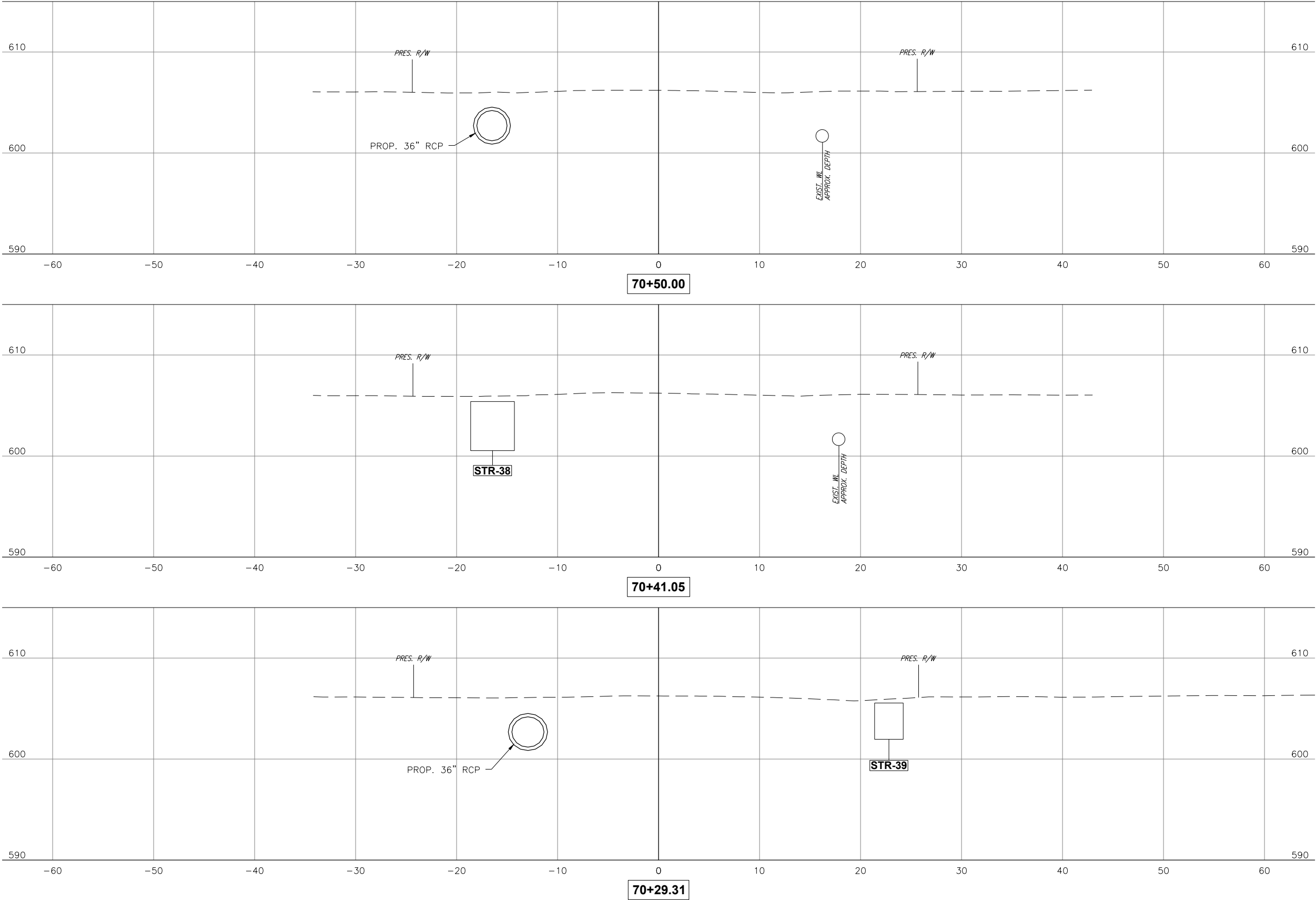
LEGEND	
AC PATCH	
CONCRETE DRIVEWAY	
ASPHALT DRIVEWAY	
T.B.S.C. DRIVEWAY	
PROPOSED STREET RETURN	
PROPOSED SIDEWALK	
GRADING LIMITS	



SUBMITTAL:		PRELIMINARY	REVISION HISTORY	
DATE:	11/30/2023		NO.	DESCRIPTION
PROJECT NO:	170231 0102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:	S.N.H.			
SCALE:	AS SHOWN			

GARDENVIEW ADDITION DRAINAGE	BIXBY, OKLAHOMA
SHEET NAME 85TH AVE EAST DITCH PLAN & PROFILE (3 OF 3)	
SHEET 47	

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\131ST PL CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
CAN 32 EXPIRES: 2024-06-30
STATE OF OKLAHOMA
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC CORPORATION.
NO PART OF THIS DRAWING IS TO BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY				
DATE:	PROJECT NO.	DESIGNED BY:	DRAWN BY:	APPROVED BY:	SCALE:	NO.	DESCRIPTION	DATE
11/30/2023	170231.0102	J.L.C.	J.L.C.	S.N.H.	AS SHOWN			

GARDENVIEW ADDITION DRAINAGE

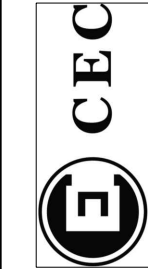
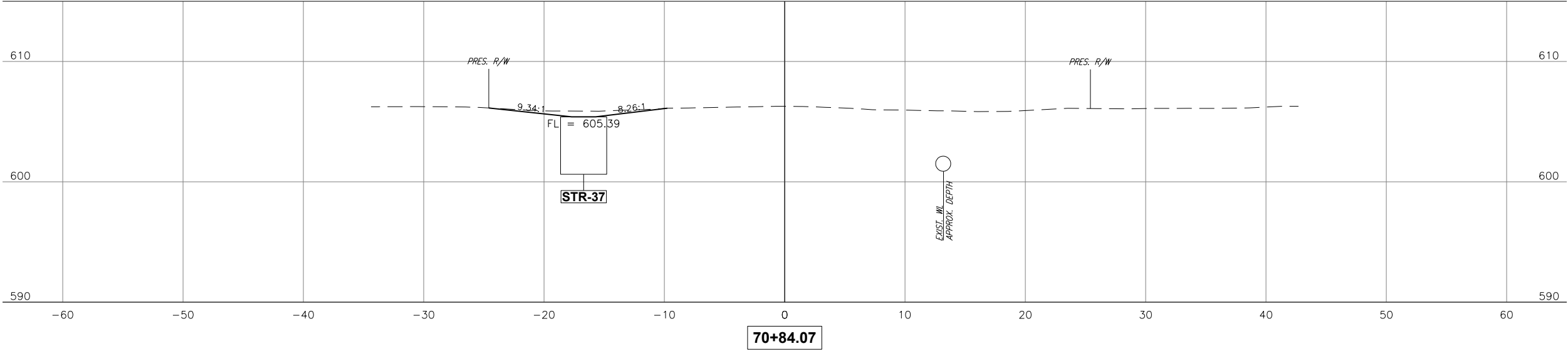
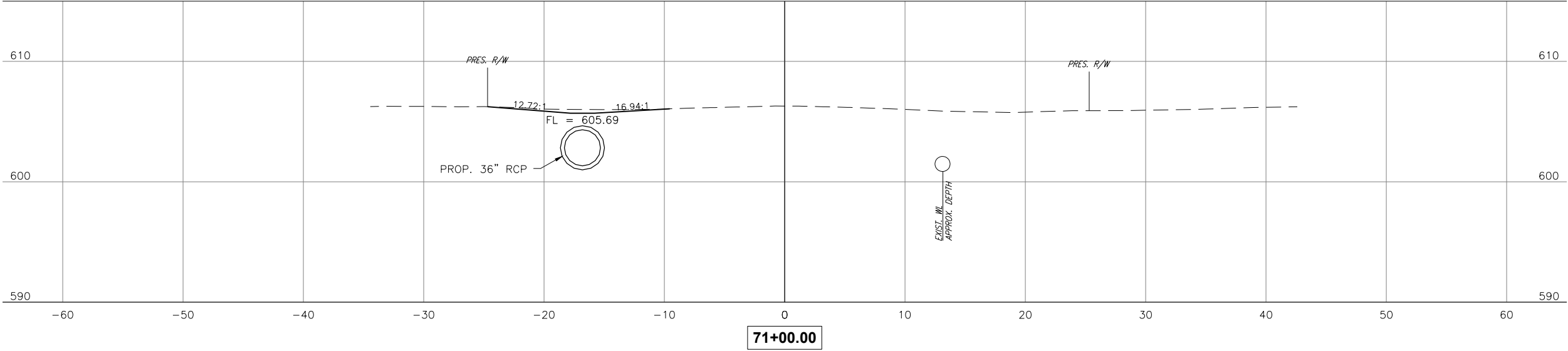
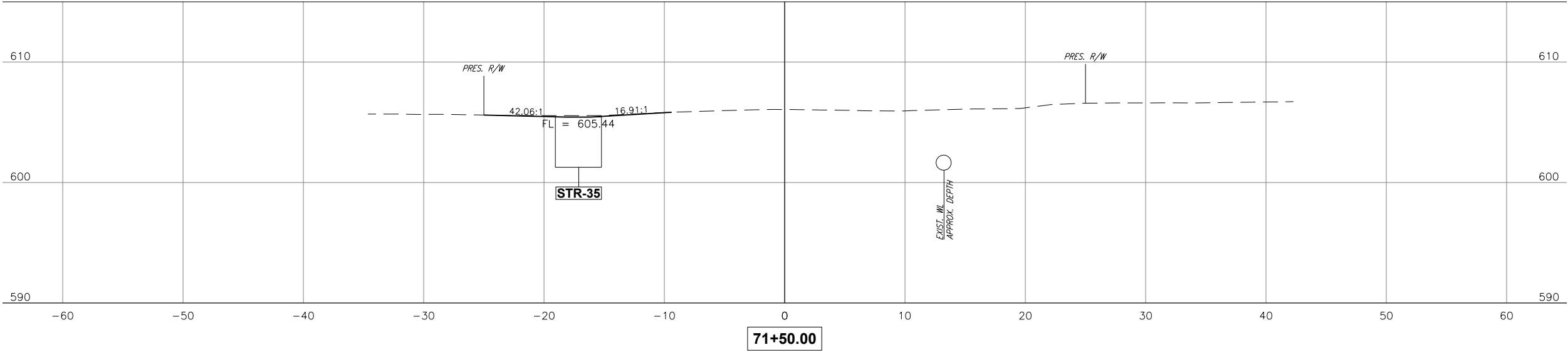
SHEET NAME
131ST PL CROSS
SECTION 1

SHEET
XS 1

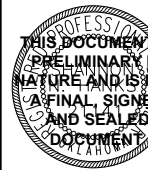
BIXBY, OKLAHOMA

Page 173 of 215

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\131ST PL CROSS SECTIONS.DWG



CEC CORPORATION
TULSA, OKLAHOMA 74137
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA
CAREER EXPIRES: 06/30/2024
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC CORPORATION.
NO PART OF THIS DRAWING MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC CORPORATION.

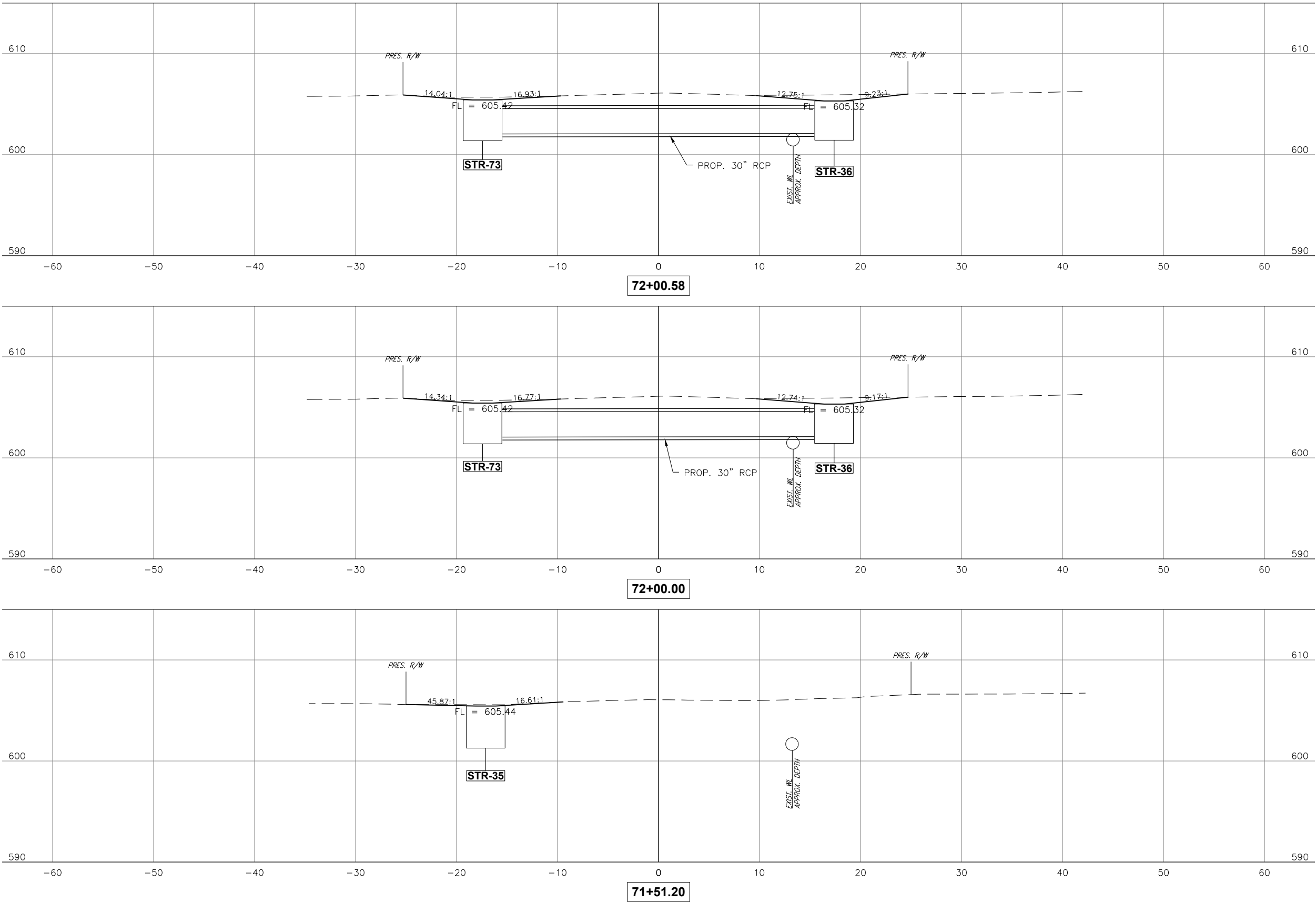


SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	11/30/2023	PROJECT NO:	170231.0102	NO.	DESCRIPTION
DESIGNED BY:	J.L.C.	DRAWN BY:	J.L.C.		
APPROVED BY:	S.N.H.	SCALE:	AS SHOWN		

GARDENVIEW ADDITION DRAINAGE
131ST PL CROSS SECTION 2
BIXBY, OKLAHOMA

SHEET
XS 2

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\131ST PL CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED ON THE DRAWING.
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE:	AS SHOWN				

GARDENVIEW ADDITION DRAINAGE

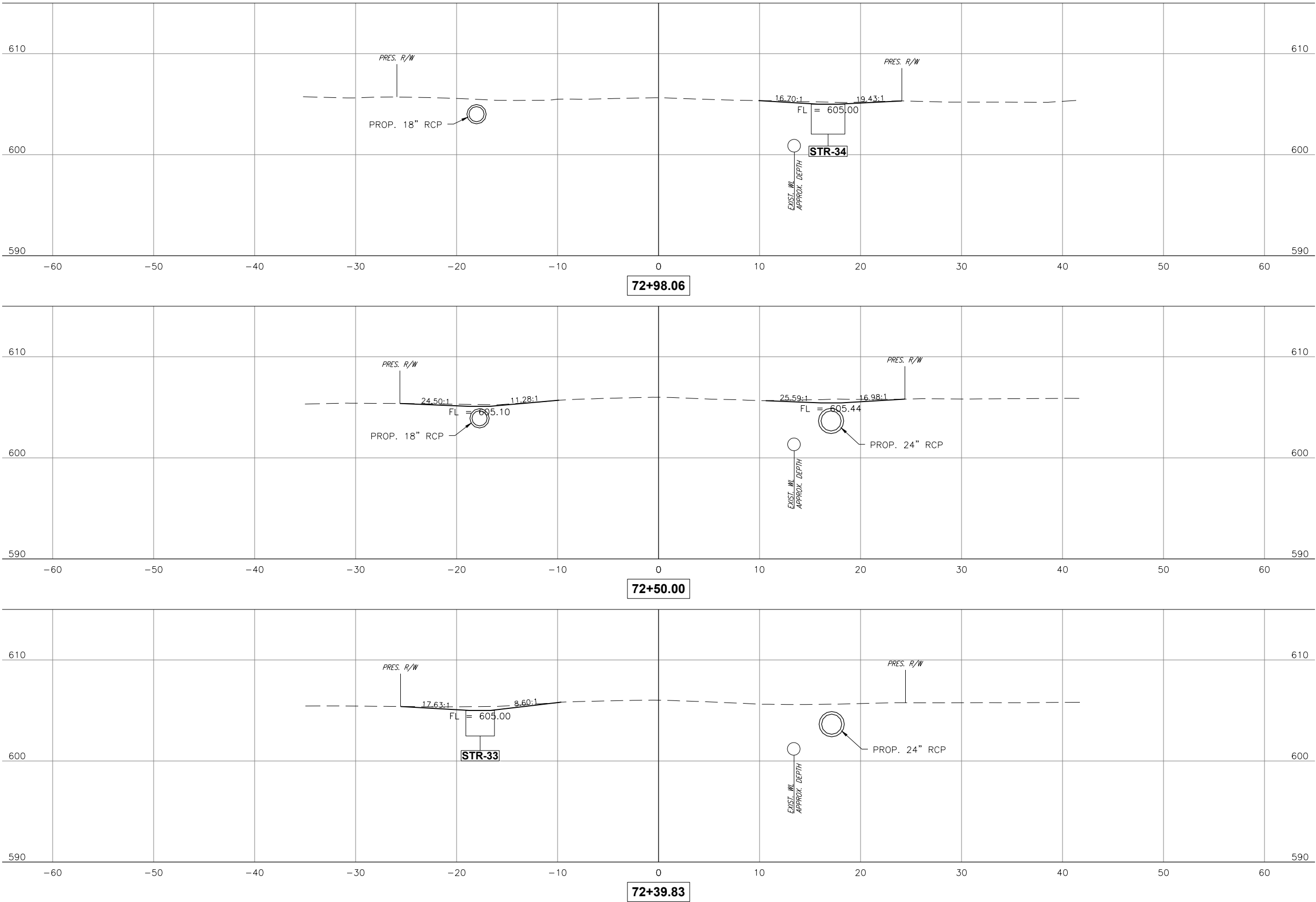
SHEET NAME
131ST PL CROSS
SECTION 3

SHEET
XS 3

BIXBY, OKLAHOMA

Page 175 of 215

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\131ST PL CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED ON THE DRAWING.
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:	PRELIMINARY		REVISION HISTORY	
	DATE:	PROJECT NO.	NO.	DESCRIPTION
DATE:	11/30/2023	170231.0102		
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:	S.N.H.			
SCALE:	AS SHOWN			

GARDENVIEW ADDITION DRAINAGE

SHEET NAME

131ST PL CROSS SECTION 4

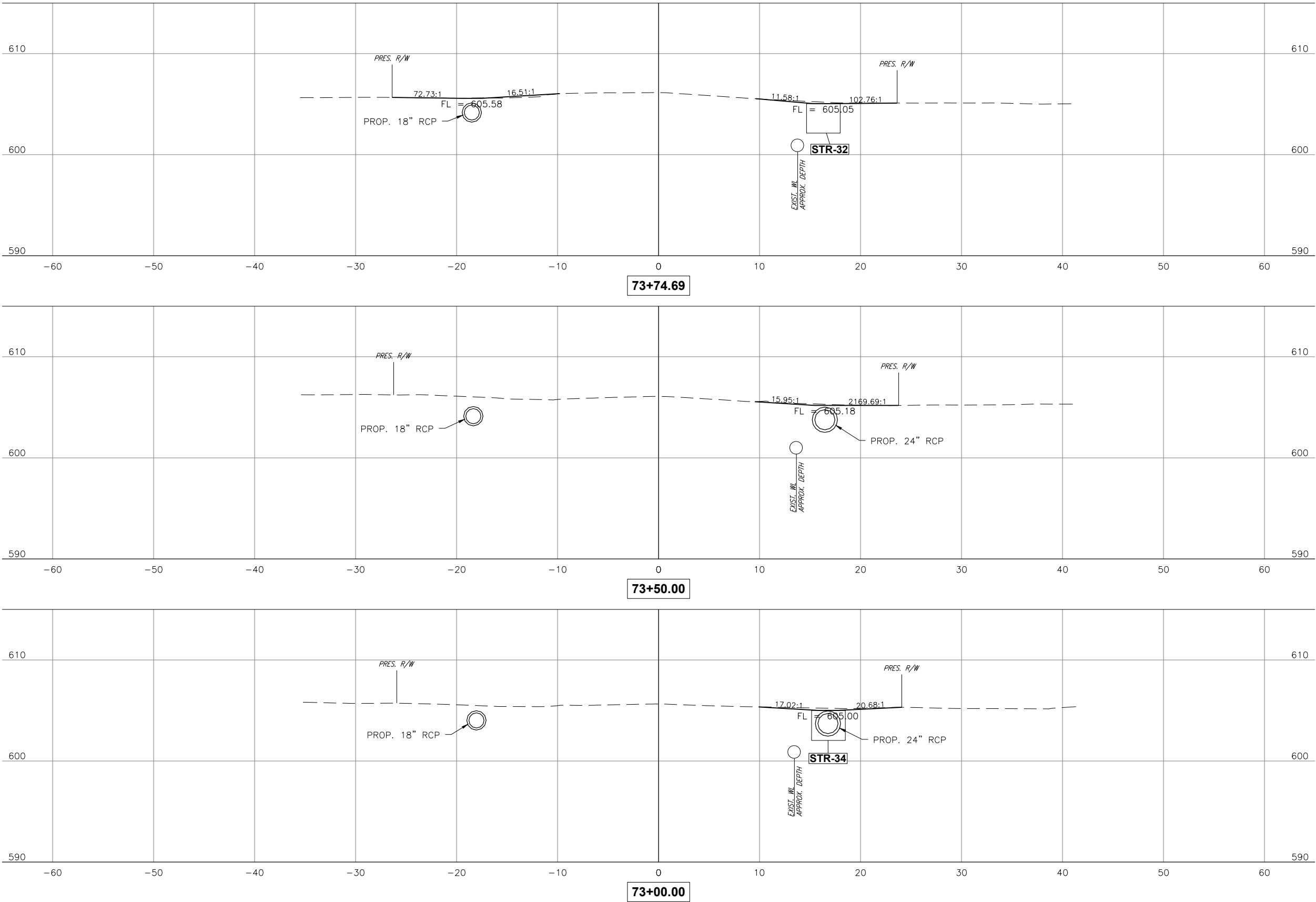
SHEET

XS 4

BIXBY, OKLAHOMA

PAGE 176 OF 215

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\131ST PL CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND LOCATION SPECIFICALLY IDENTIFIED ON THE DRAWING.
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

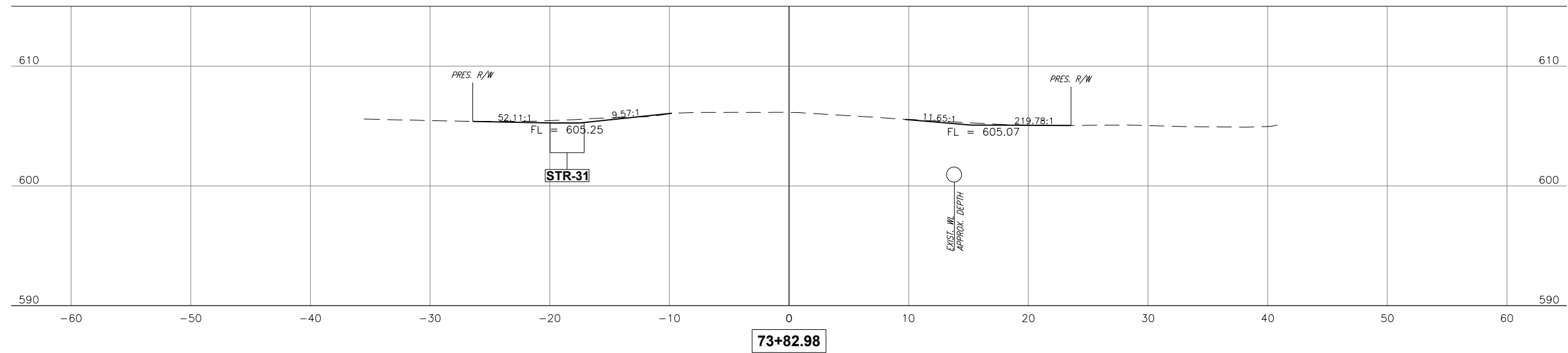
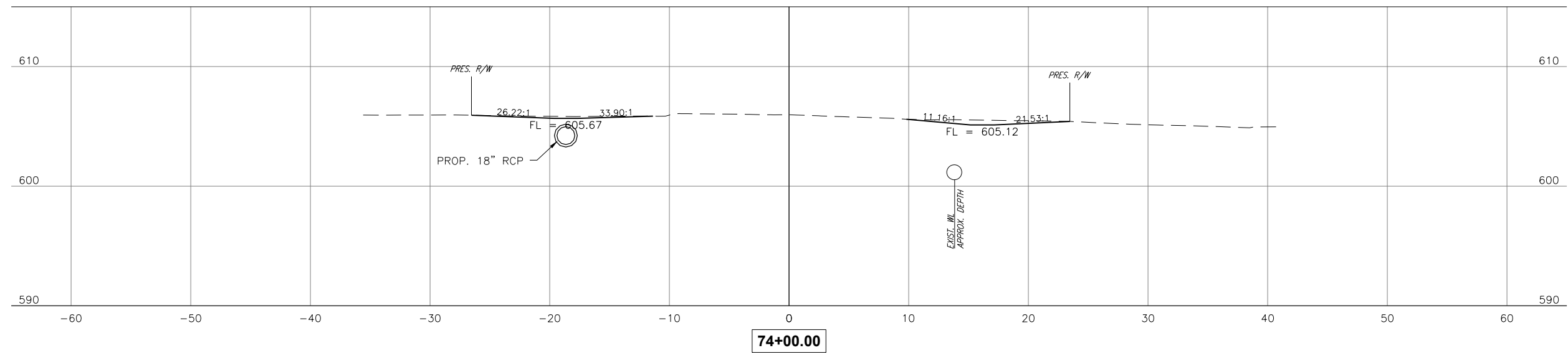
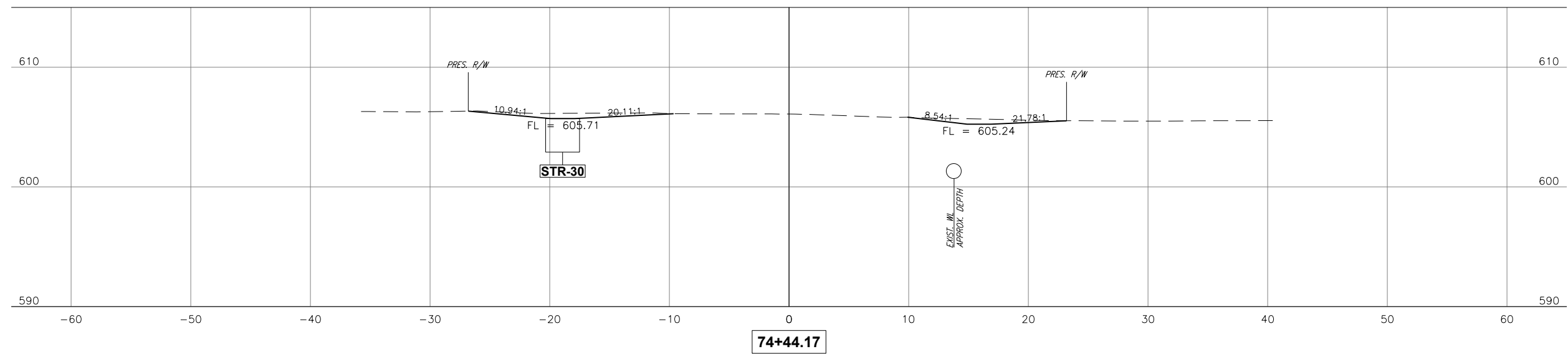
SUBMITTAL:		PRELIMINARY		REVISION HISTORY		
DATE:	PROJECT NO.	NO.	DESCRIPTION	DATE		
11/30/2023	170231.0102					
DESIGNED BY: J.L.C.						
DRAWN BY: J.L.C.						
APPROVED BY: S.N.H.						
SCALE: AS SHOWN						

GARDENVIEW ADDITION DRAINAGE

SHEET NAME
131ST PL CROSS
SECTION 5

SHEET
XS 5

BIXBY, OKLAHOMA



CEC CORPORATION
1300 S. MAIN STREET
TULSA, OKLAHOMA 74137
WWW.CONNECTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAP 32 EXPIRES: 2024-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

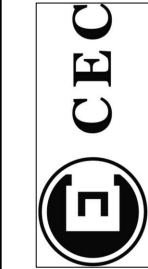
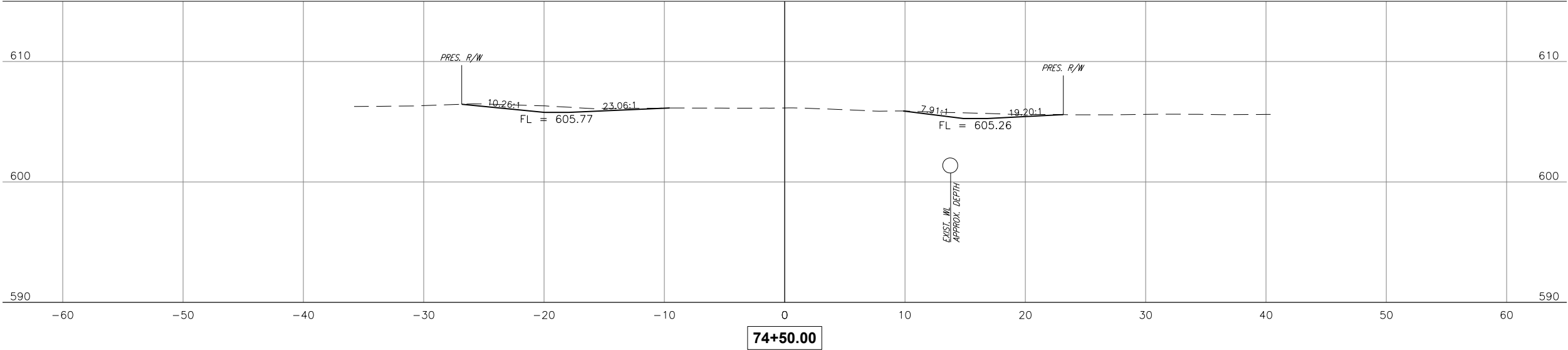


SUBMITTAL:		PRELIMINARY	REVISION HISTORY		
DATE:	PROJECT NO:	11/30/2023 170231.0102	NO.	DESCRIPTION	DATE
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

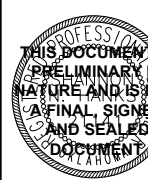
GARDENVIEW ADDITION DRAINAGE

SHEET NAME
131ST PL CROSS
SECTION 6

SHEET
XS 6



CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA
CAREER EXPIRES: 06/30/2024
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC CORPORATION.
NO PART OF THIS DRAWING MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC CORPORATION.



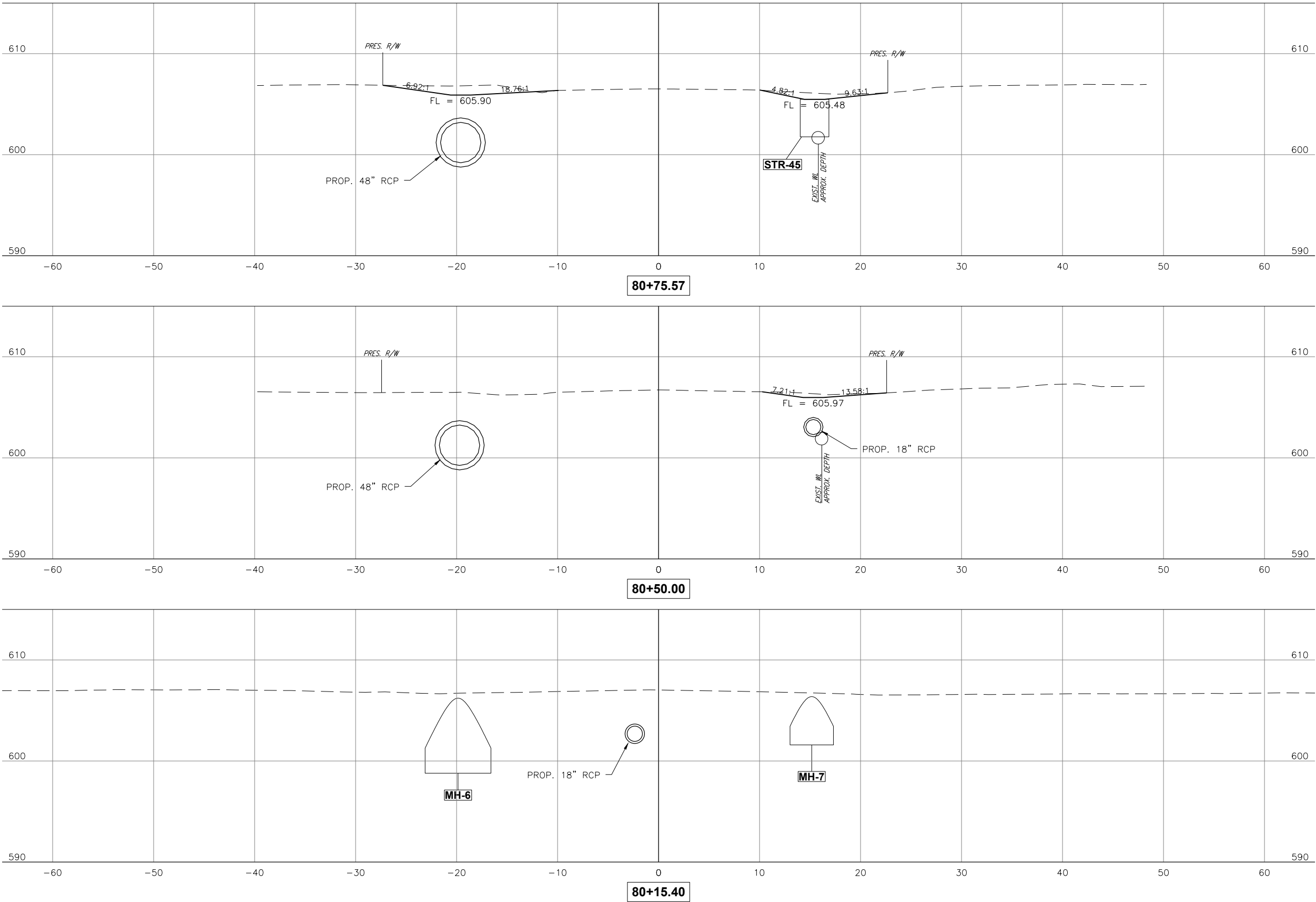
SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	11/30/2023	PROJECT NO:	170231.0102	NO.	DESCRIPTION
DESIGNED BY:	J.L.C.	DRAWN BY:	J.L.C.		
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

GARDENVIEW ADDITION DRAINAGE
BIXBY, OKLAHOMA

SHEET NAME
131ST PL CROSS
SECTION 7

SHEET
XS 7

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\132ND ST CROSS SECTIONS.DWG





CEC
CONSULTING ENGINEERING CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXTEC.COM
CAN 32 EXPIRES: 2024-06-30
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED ON THE DRAWING.
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY		
DATE:	PROJECT NO:	DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE
11/30/2023	170231.0102					
DESIGNED BY: J.L.C.						
DRAWN BY: J.L.C.						
APPROVED BY: S.N.H.						
SCALE: AS SHOWN						

GARDENVIEW ADDITION DRAINAGE

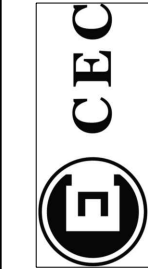
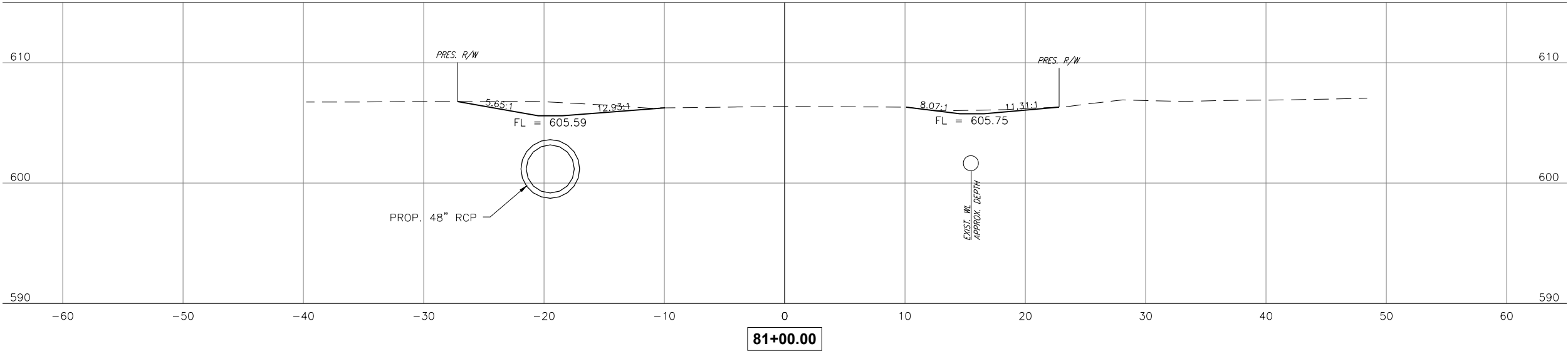
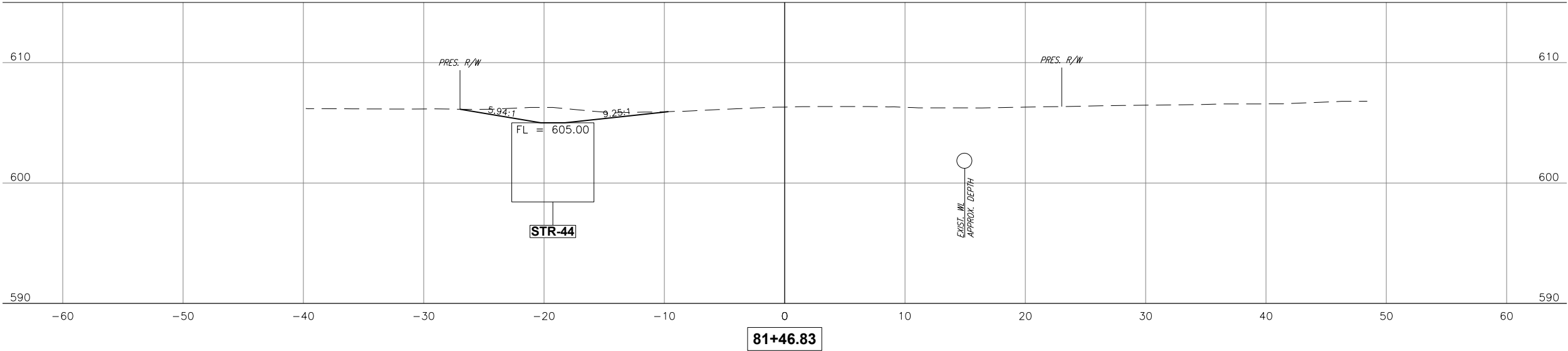
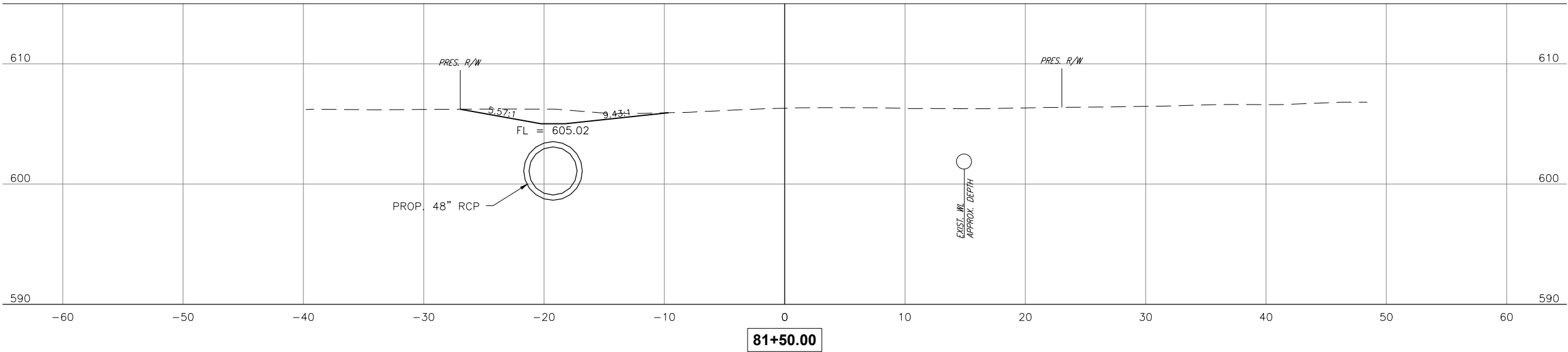
SHEET NAME
132ND ST CROSS
SECTION 1

SHEET
XS 8

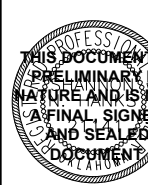
BIXBY, OKLAHOMA

Page 180 of 215

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\132ND ST CROSS SECTIONS.DWG



CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXTEC.COM
STATE OF OKLAHOMA
CAREER EXPIRES: 12/31/2024
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC CORPORATION.
NO PART OF THIS DRAWING MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC CORPORATION.



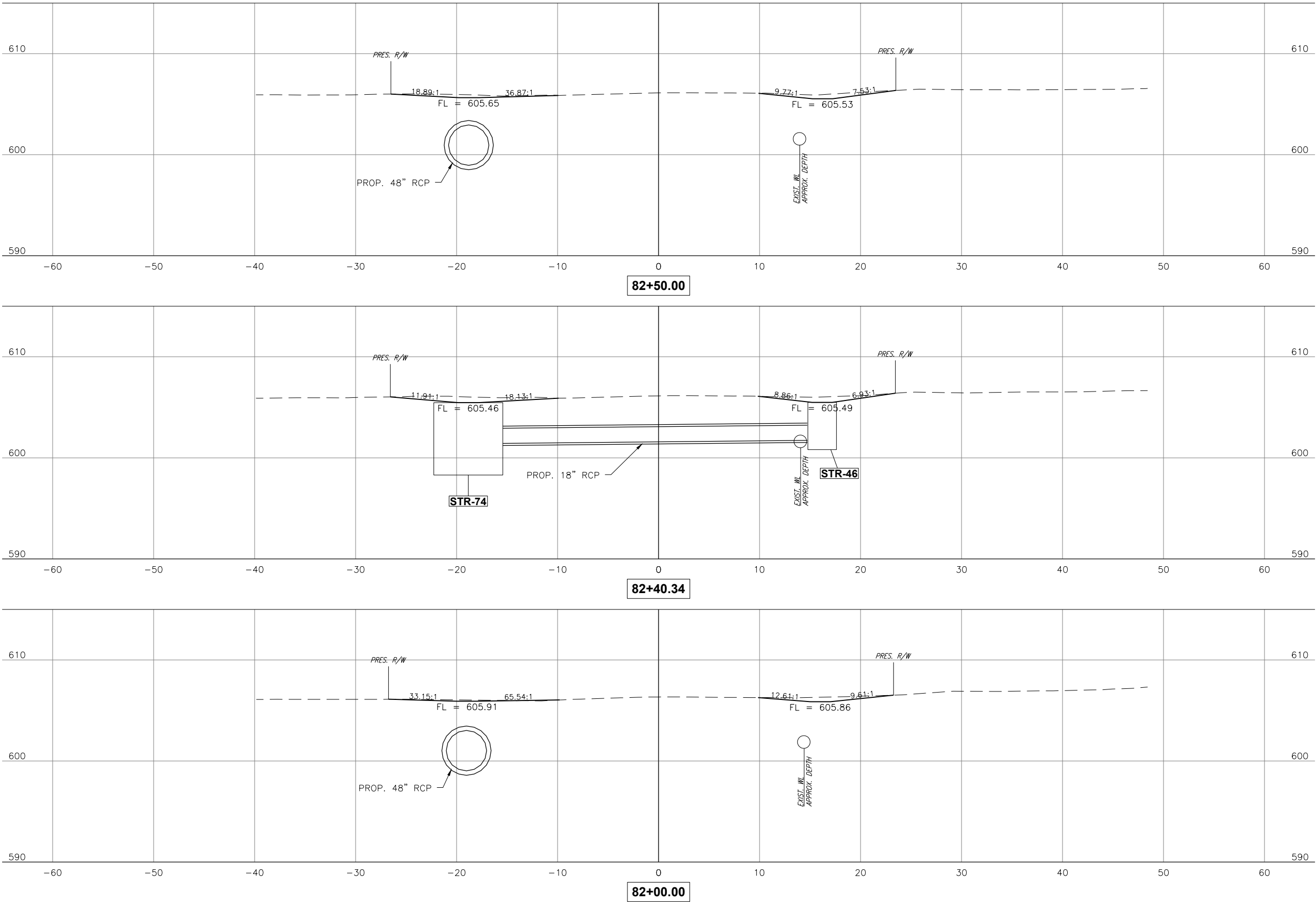
SUBMITTAL:	PRELIMINARY	REVISION HISTORY		
		NO.	DESCRIPTION	DATE
DATE:	11/30/2023			
PROJECT NO.:	170231.0102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:	S.N.H.			
SCALE:	AS SHOWN			

GARDENVIEW ADDITION DRAINAGE

SHEET NAME
132ND ST CROSS
SECTION 2

SHEET
XS 9

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\132ND ST CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED ON THE DRAWING.
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY		
DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE		
11/30/2023	170231.0102					
DESIGNED BY: J.L.C.						
DRAWN BY: J.L.C.						
APPROVED BY: S.N.H.						
SCALE: AS SHOWN						

GARDENVIEW ADDITION DRAINAGE

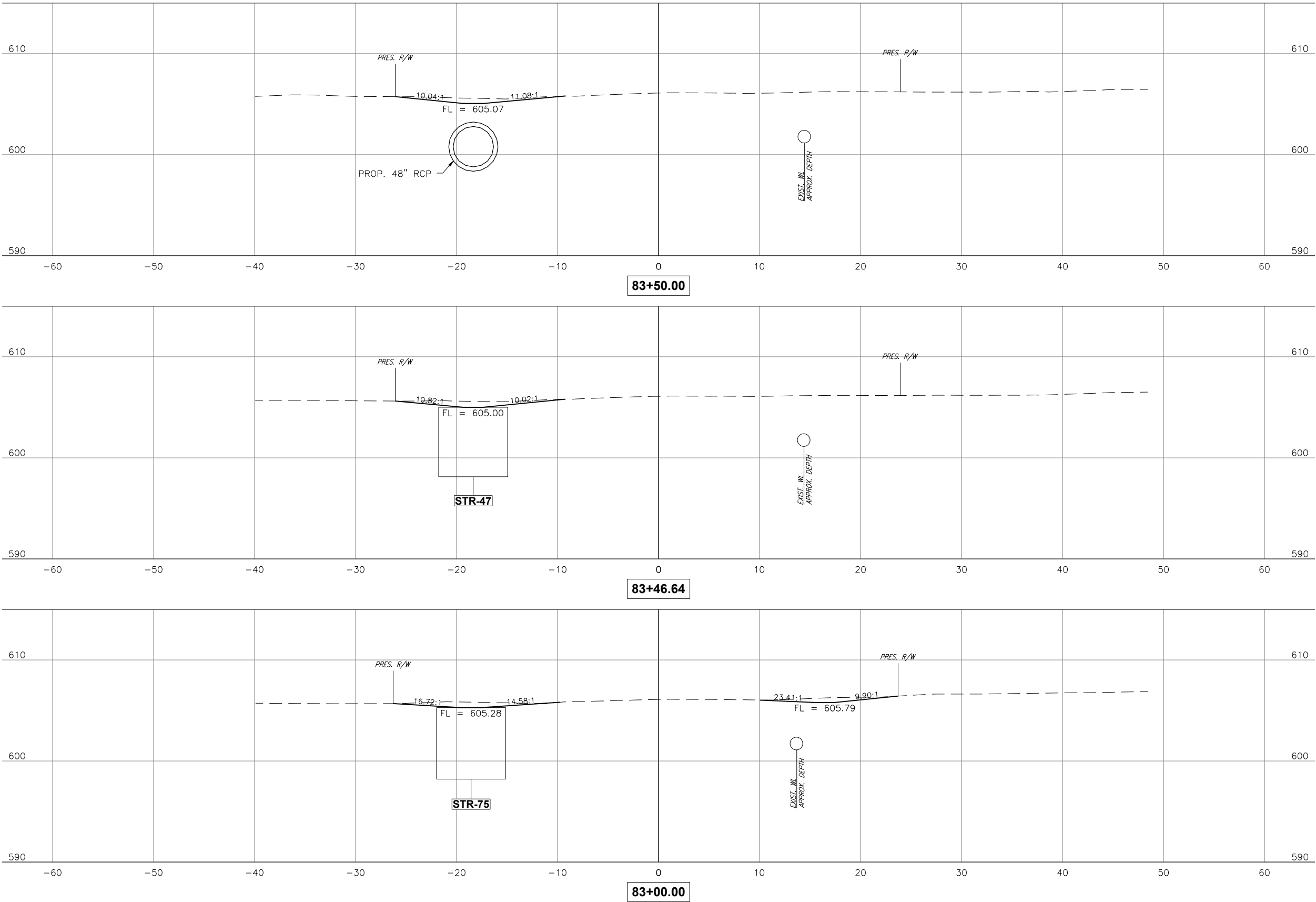
SHEET NAME
132ND ST CROSS
SECTION 3

SHEET
XS 10

BIXBY, OKLAHOMA

Page 182 of 215

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\132ND ST CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC CORPORATION.
NO PART OF THIS DRAWING IS TO BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE: AS SHOWN					

GARDENVIEW ADDITION DRAINAGE

SHEET NAME

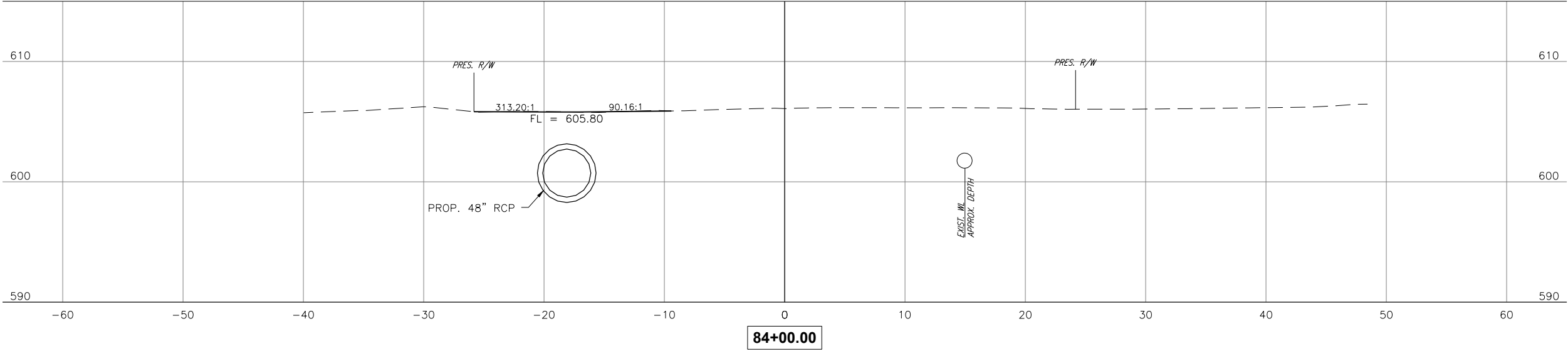
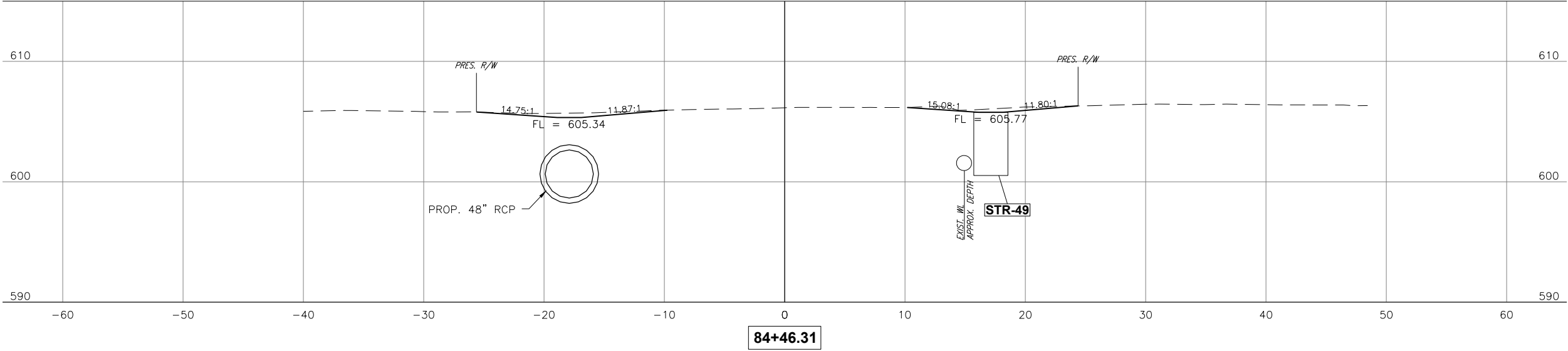
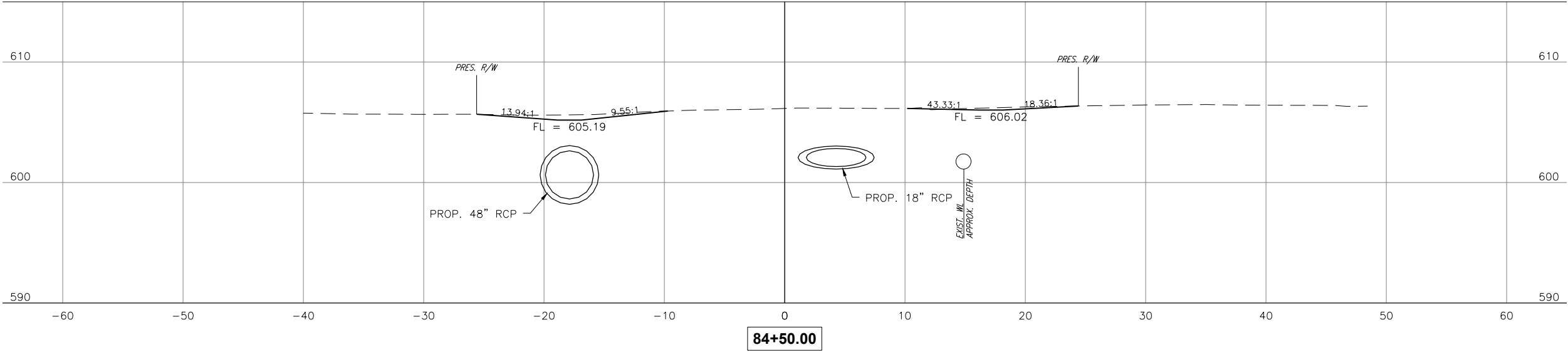
132ND ST CROSS SECTION 4

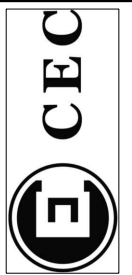
SHEET

XS 11

BIXBY, OKLAHOMA

Page 183 of 215





CEC CORPORATION
TULSA, OKLAHOMA 74137
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CEN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC CORPORATION.
NO PART OF THIS DRAWING IS TO BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY		
DATE:	PROJECT NO.	NO.	DESCRIPTION	NO.	DESCRIPTION	DATE
11/30/2023	170231.0102					
DESIGNED BY: J.L.C.						
DRAWN BY: J.L.C.						
APPROVED BY: S.N.H.						
SCALE: AS SHOWN						

GARDENVIEW ADDITION DRAINAGE

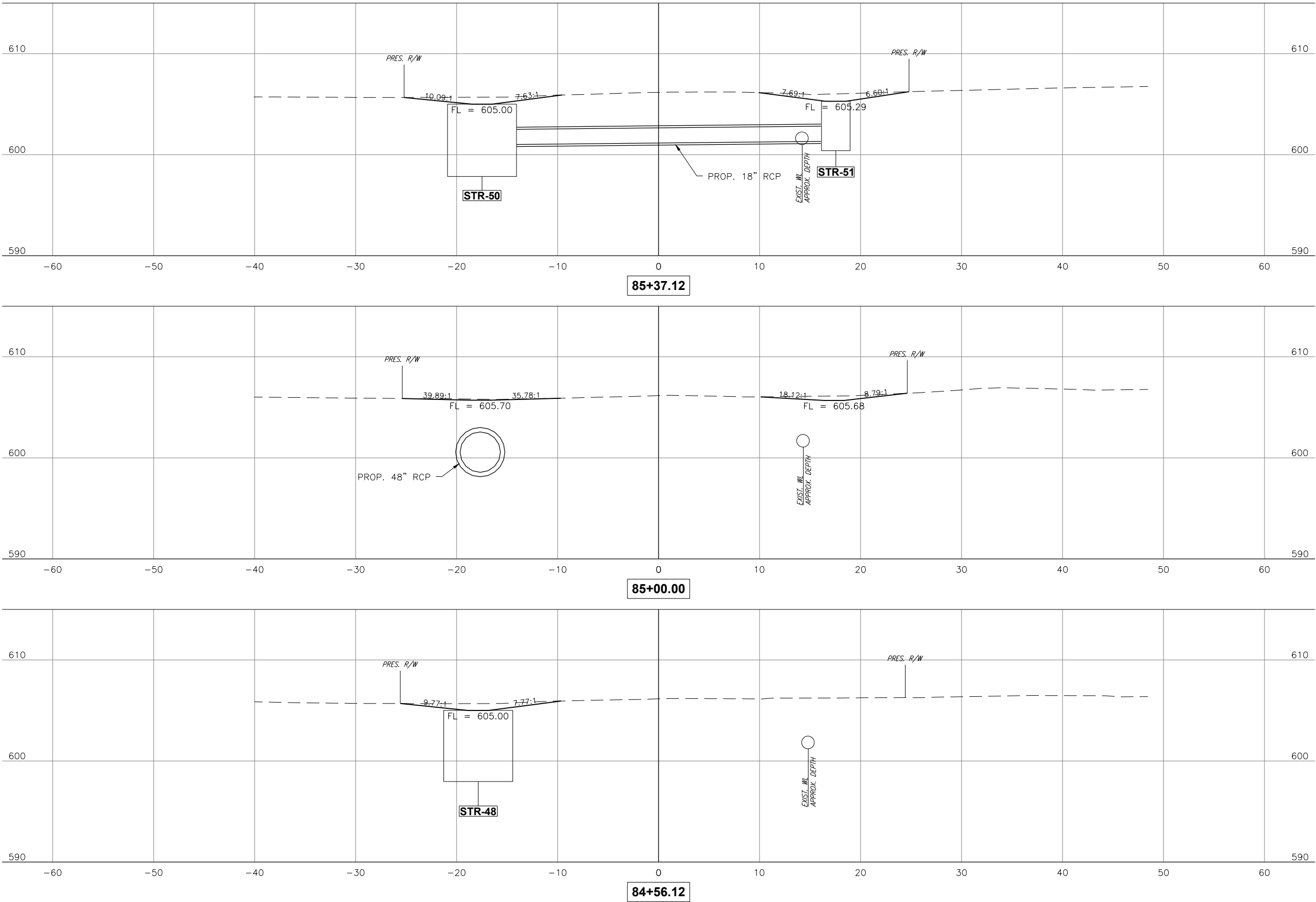
SHEET NAME
132ND ST CROSS
SECTION 5

SHEET
XS 12

BIXBY, OKLAHOMA

PAGE 184 OF 215

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\132ND ST CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CEN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED ON THE DRAWING.
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:	PRELIMINARY		REVISION HISTORY	
	DATE:	PROJECT NO.	NO.	DESCRIPTION
DATE:	11/30/2023	170231.0102		
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:	S.N.H.			
SCALE:	AS SHOWN			

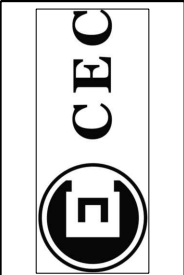
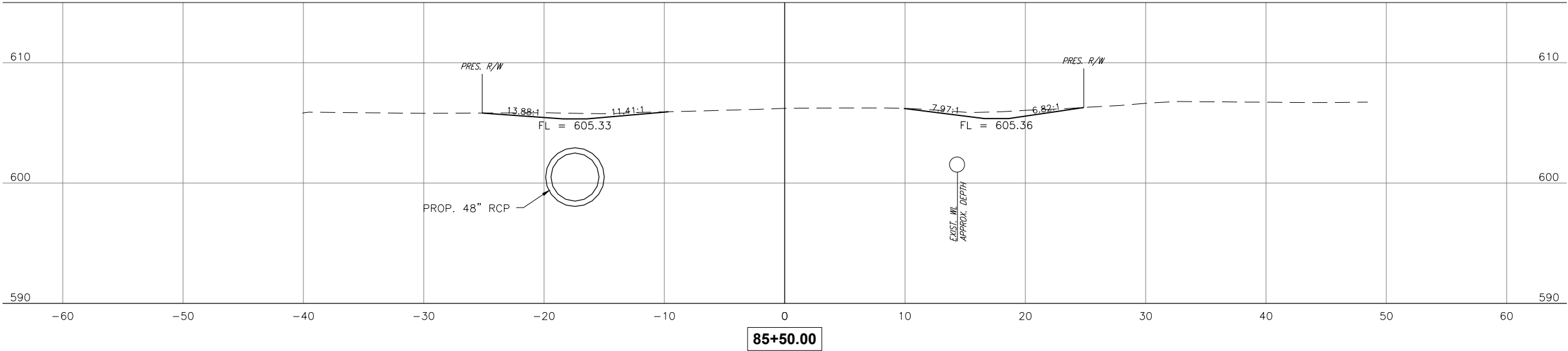
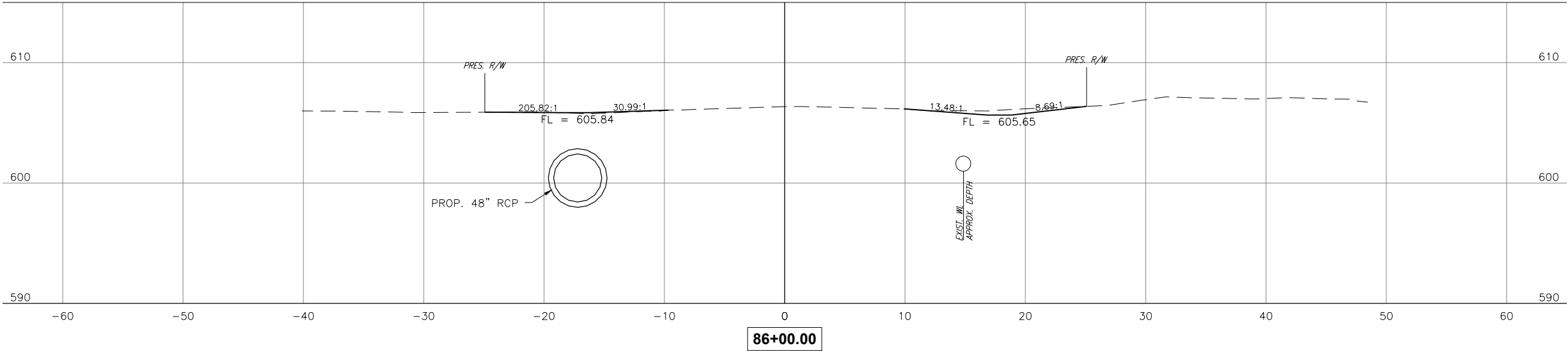
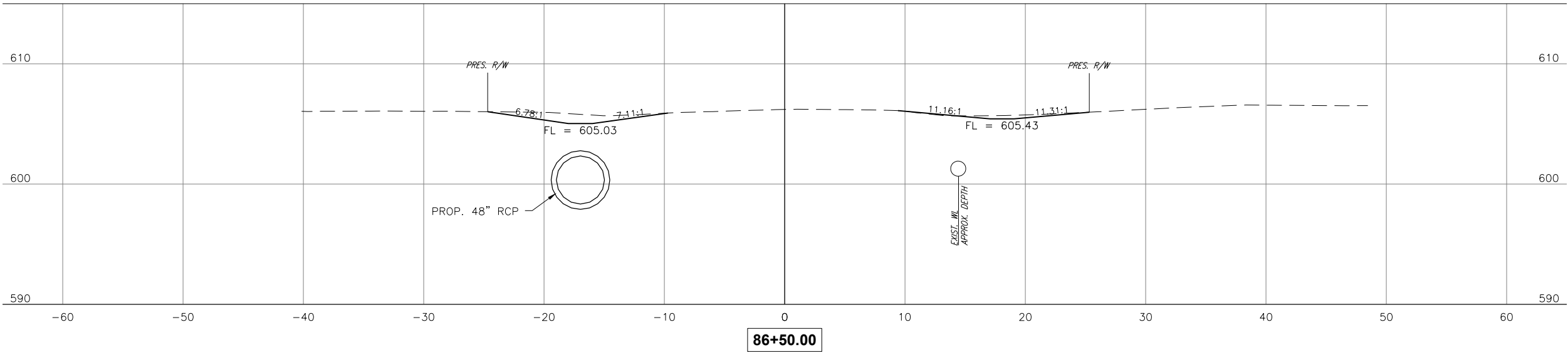
GARDENVIEW ADDITION DRAINAGE

SHEET NAME
132ND ST CROSS
SECTION 6

SHEET
XS 13

BIXBY, OKLAHOMA

Page 185 of 215



CEC CORPORATION
TULSA, OKLAHOMA 74137
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
C.A. 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC CORPORATION.
IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY
IDENTIFIED IN THE DRAWING. ANY REUSE OR REPRODUCTION
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED.

THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

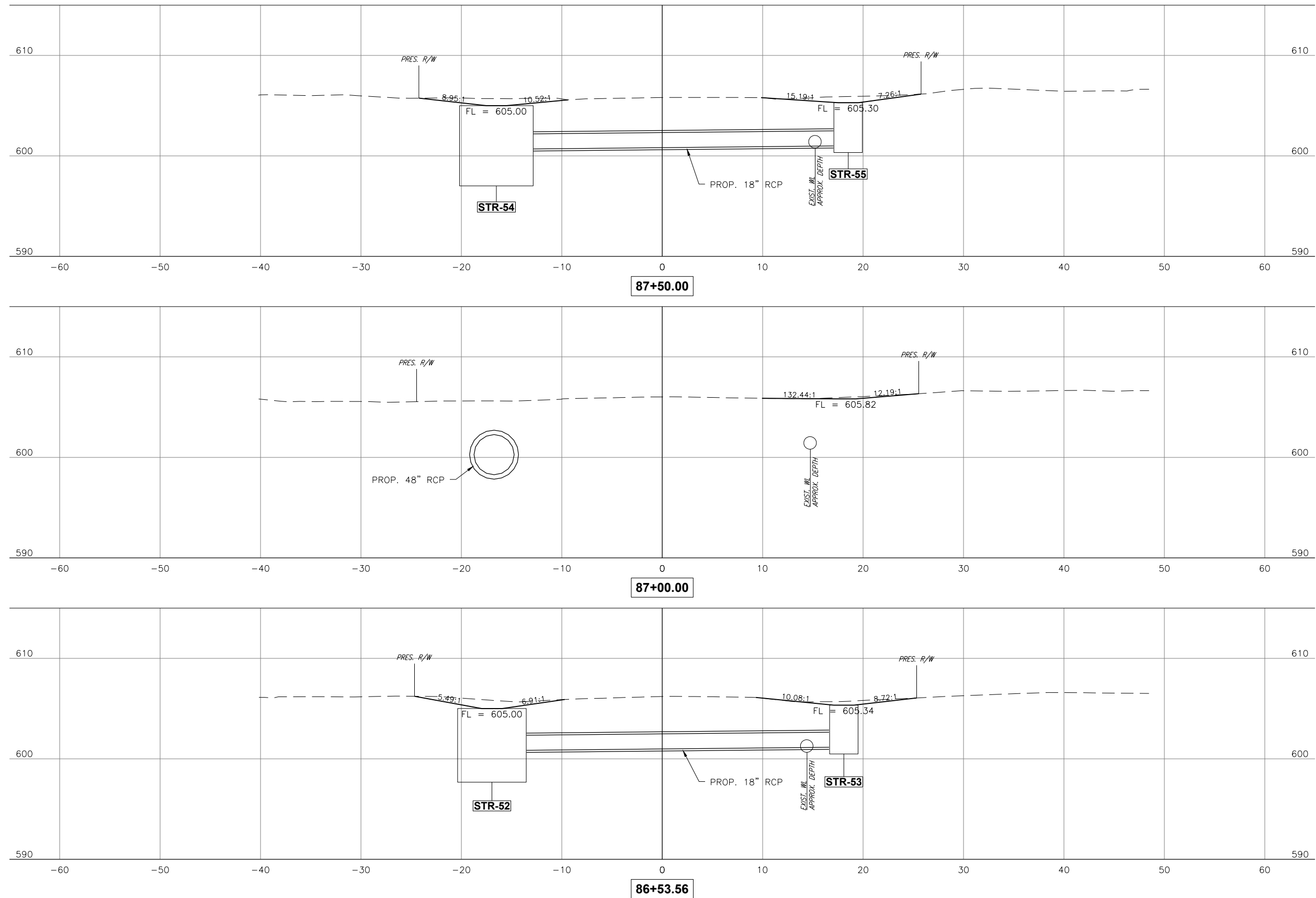
SUBMITTAL:	PRELIMINARY	REVISION HISTORY		
		NO.	DESCRIPTION	DATE
DATE:	11/30/2023			
PROJECT NO.:	170231.0102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:	S.N.H.			
SCALE:	AS SHOWN			

GARDENVIEW ADDITION DRAINAGE

SHEET NAME
132ND ST CROSS
SECTION 7

SHEET
XS 14

BIXBY, OKLAHOMA



CEC CORPORATION
1300 S. MAIN STREET
TULSA, OKLAHOMA 74137
WWW.CONNECTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAP. 32. EXPIRES: 2024-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

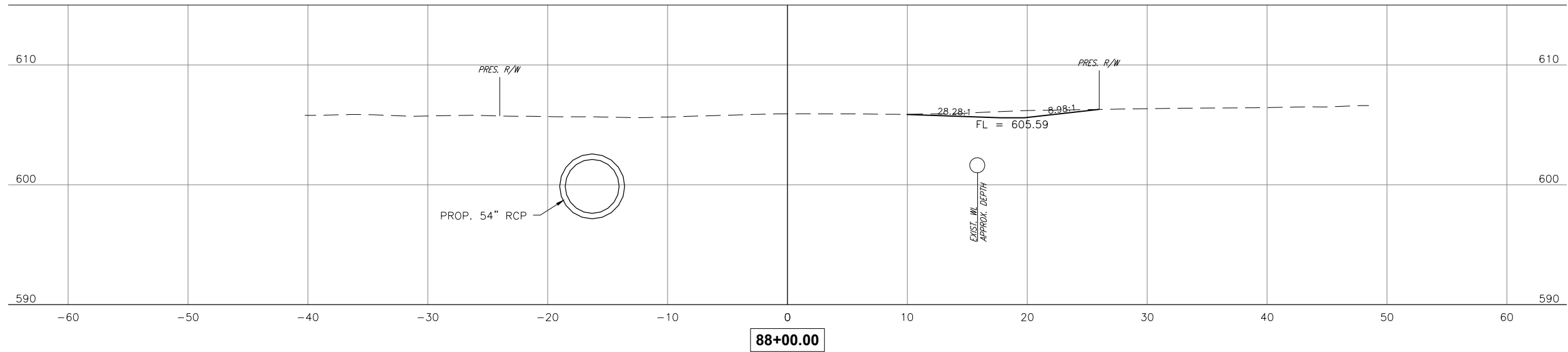
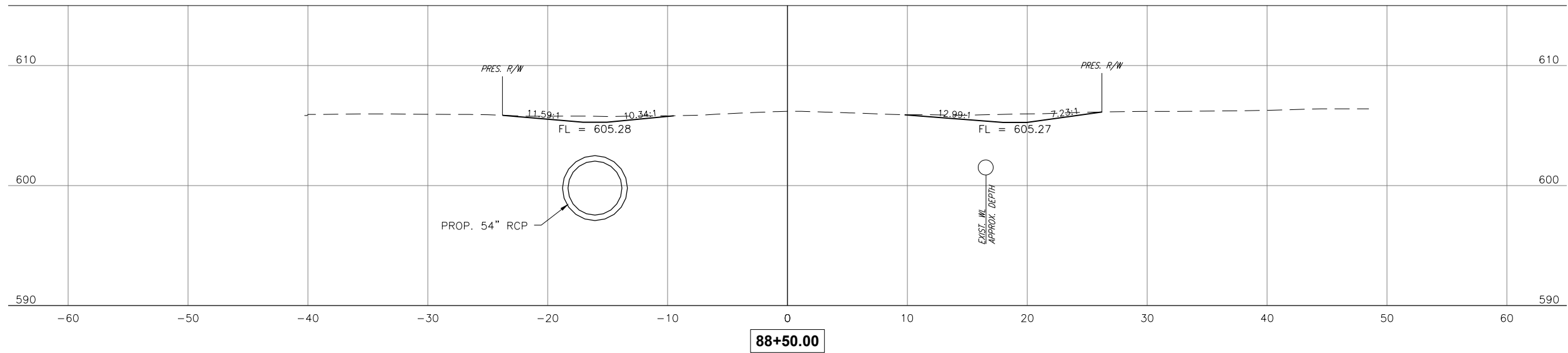
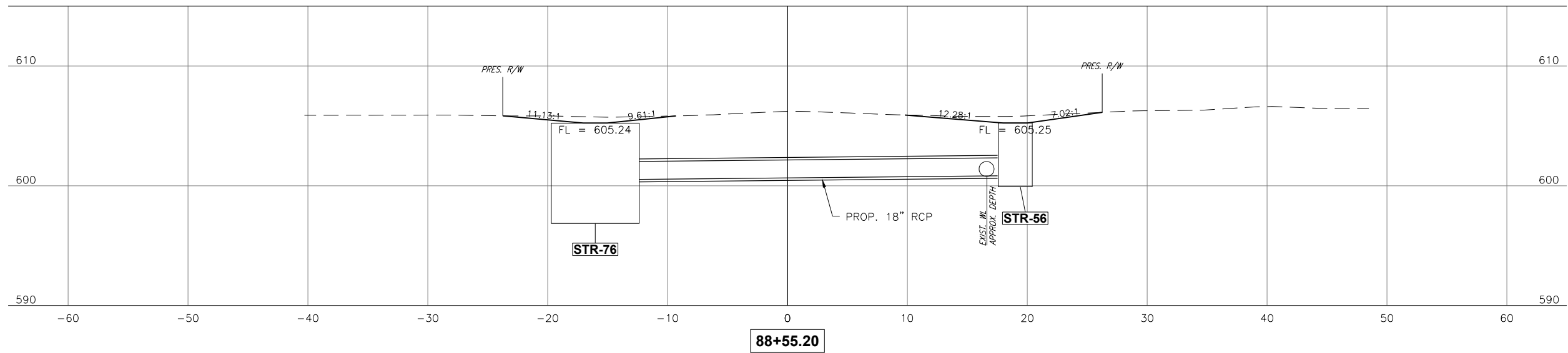


SUBMITTAL:		PRELIMINARY	REVISION HISTORY	
DATE:	11/30/2023		NO.	DESCRIPTION
PROJECT NO:	170231.0102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:	S.N.H.			
SCALE:	AS SHOWN			

GARDENVIEW ADDITION DRAINAGE

SHEET NAME
132ND ST CROSS
SECTION 8

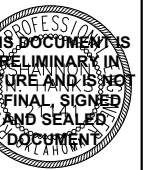
SHEET
XS 15



TULSA, OKLAHOMA 74137
P: 918.983.9401
WWW.CONNECTTEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAN# 32 EXP/DATE: 2024-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

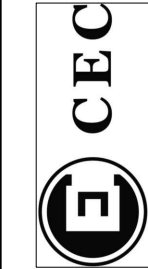
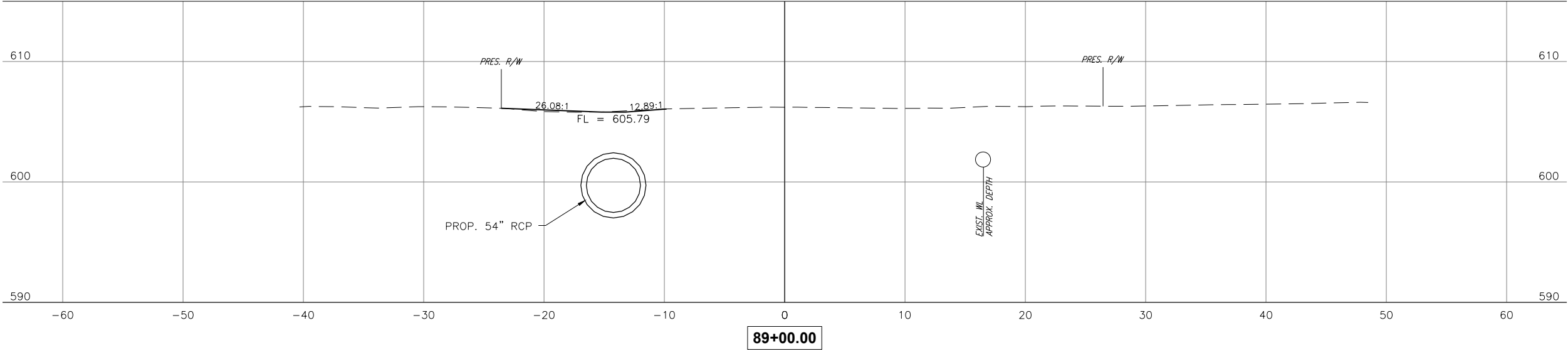


DATE:	11/30/2023	NO.	DESCRIPTION	DATE
PROJECT NO:	170231.0102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:	S.N.H.			
SCALE:	AS SHOWN			

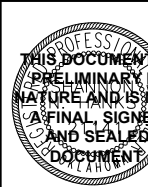
GARDENVIEW ADDITION DRAINAGE

SHEET NAME
IND ST CROSS
SECTION 9

SHEET
KS 16



CEC CORPORATION
TULSA, OKLAHOMA 74137
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA
CAREER EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC CORPORATION.
NO PART OF THIS DRAWING MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC CORPORATION.

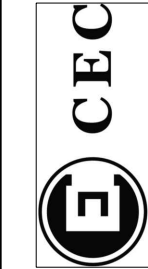
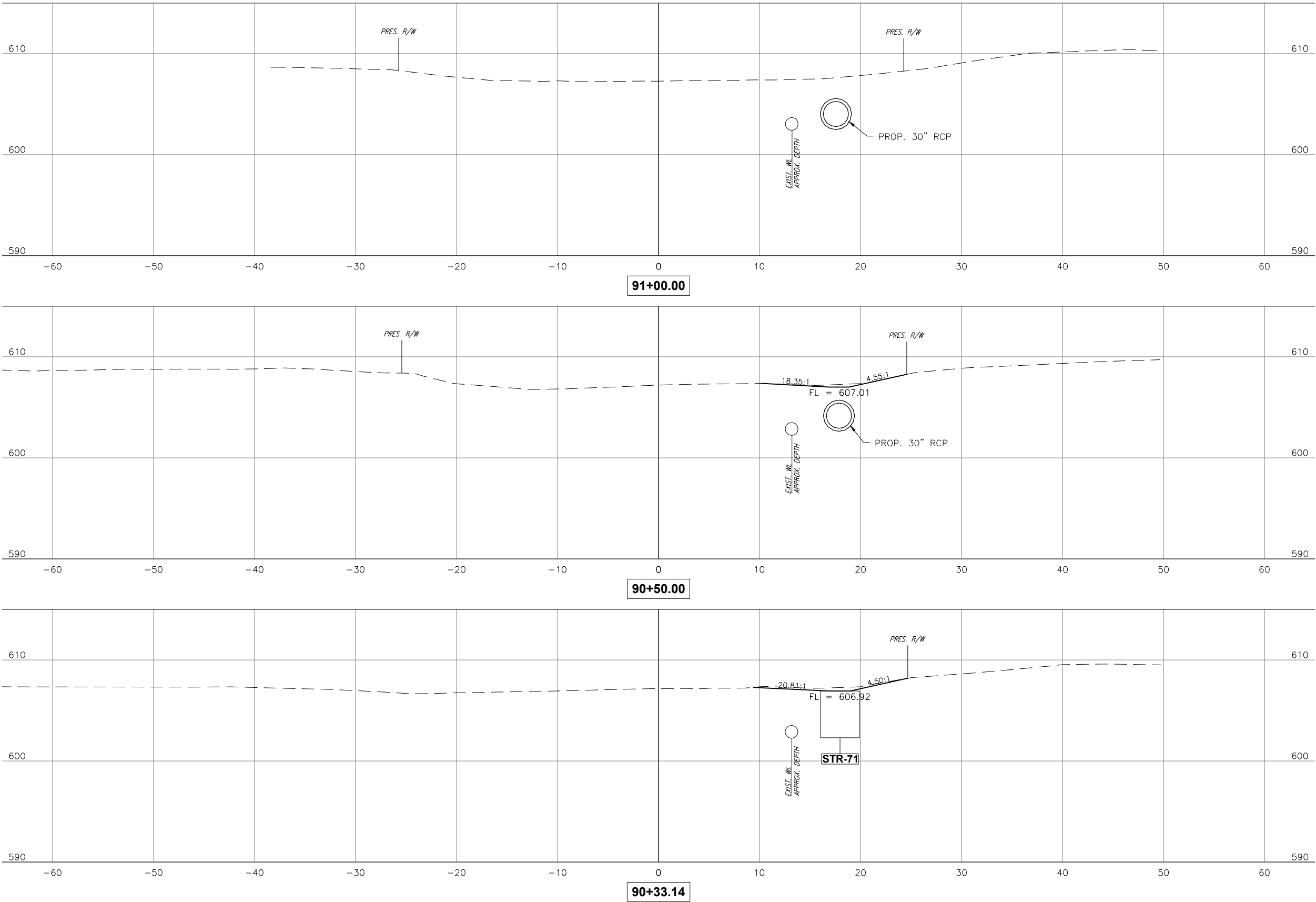


SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	11/30/2023	NO.	DESCRIPTION	NO.	DATE
PROJECT NO:	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

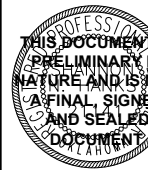
GARDENVIEW ADDITION DRAINAGE
BIXBY, OKLAHOMA

SHEET NAME
132ND ST CROSS
SECTION 10

SHEET
XS 17



CEC CORPORATION
TULSA, OKLAHOMA 74137
WWW.CONNEXTEC.COM
STATE OF OKLAHOMA
CAREER 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC CORPORATION.
NO PART OF THIS DRAWING MAY BE REPRODUCED OR
TRANSMITTED IN ANY FORM OR BY ANY MEANS,
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC CORPORATION.

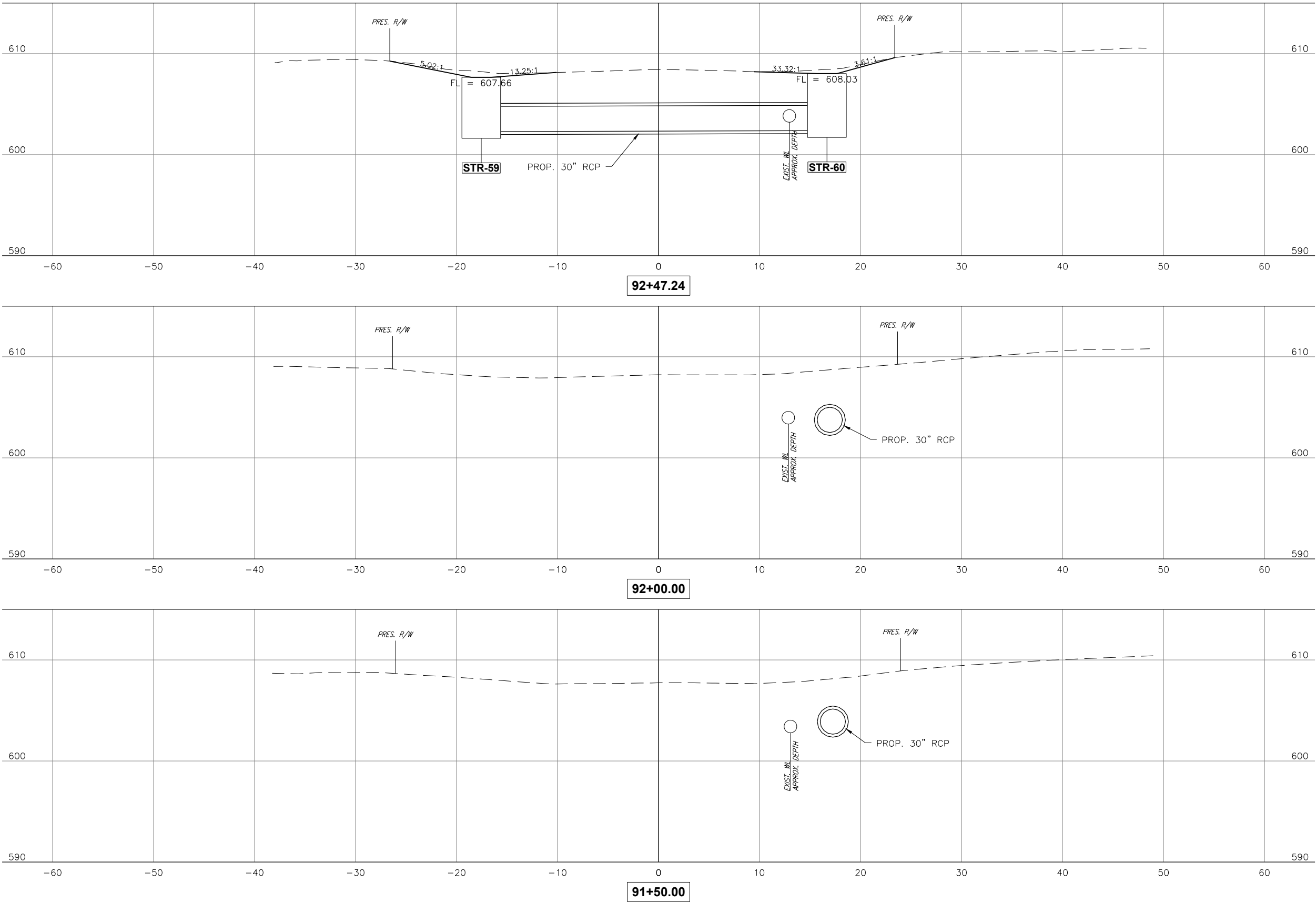


SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	11/30/2023	PROJECT NO:	170231.0102	NO.	DESCRIPTION
DESIGNED BY:	J.L.C.	DRAWN BY:	J.L.C.		
APPROVED BY:	S.N.H.	SCALE:	AS SHOWN		

GARDENVIEW ADDITION DRAINAGE
133RD ST CROSS SECTION 1
BIXBY, OKLAHOMA

SHEET NAME
133RD ST CROSS SECTION 1

SHEET
XS 18





CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXTEC.COM
CAN 32 EXPIRES: 2024-06-30
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC CORPORATION. NO PART OF THIS DRAWING
MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT
EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:	PRELIMINARY		REVISION HISTORY		
	DATE:	PROJECT NO.	NO.	DESCRIPTION	DATE
DESIGNED BY:	11/30/2023	170231.0102			
DRAWN BY:	J.L.C.	J.L.C.			
APPROVED BY:	S.N.H.	S.N.H.			
SCALE:	AS SHOWN	AS SHOWN			

GARDENVIEW ADDITION DRAINAGE

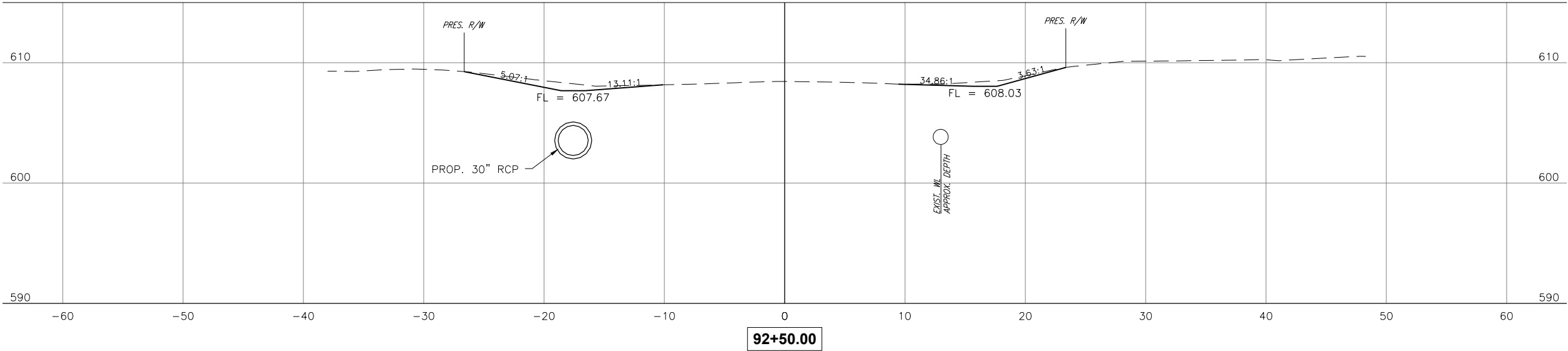
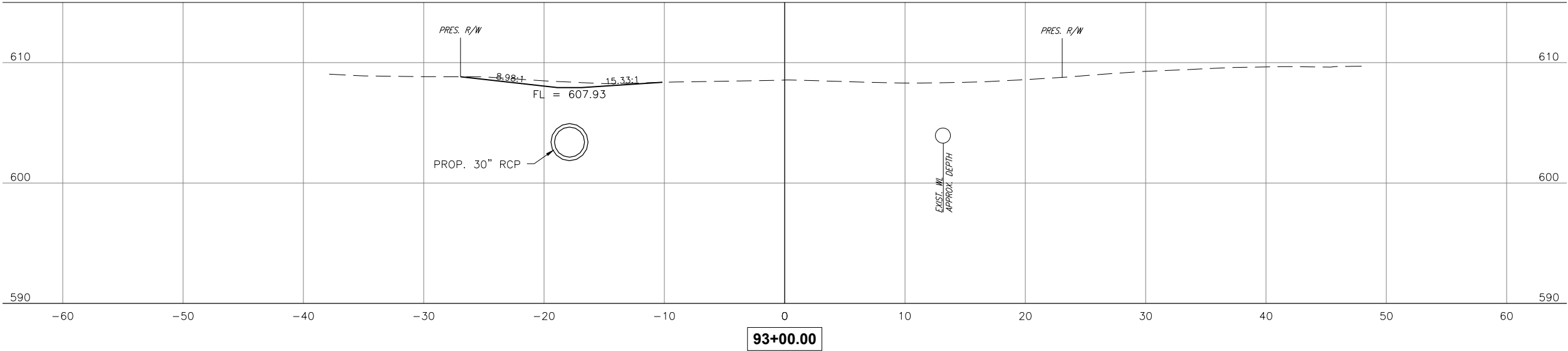
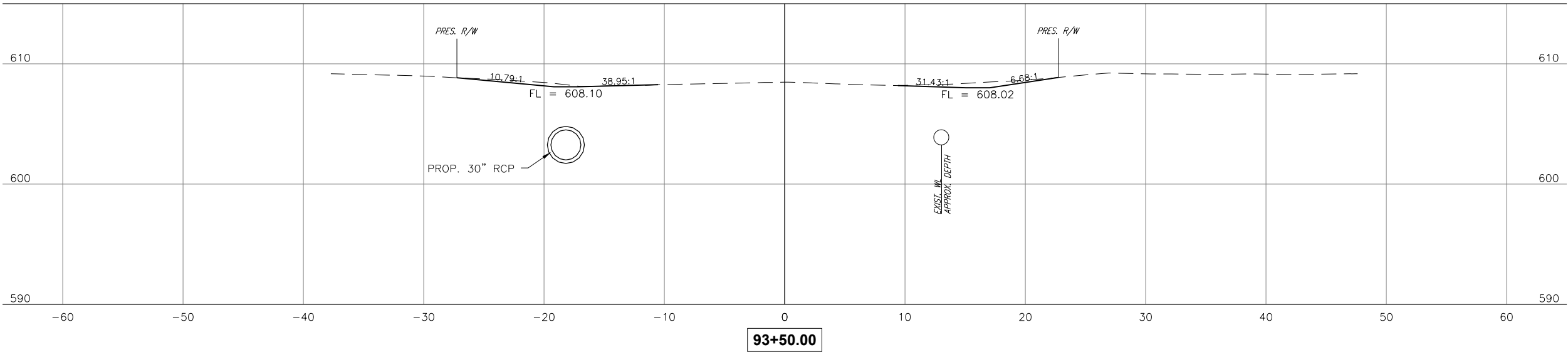
SHEET NAME
133RD ST CROSS
SECTION 2

SHEET
XS 19

BIXBY, OKLAHOMA

Page 191 of 215

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\133RD ST CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXTEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
C.A. 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED ON THE DRAWING.
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY		
DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE		
11/30/2023	170231.0102					
DESIGNED BY: J.L.C.						
DRAWN BY: J.L.C.						
APPROVED BY: S.N.H.						
SCALE:	AS SHOWN					

GARDENVIEW ADDITION DRAINAGE

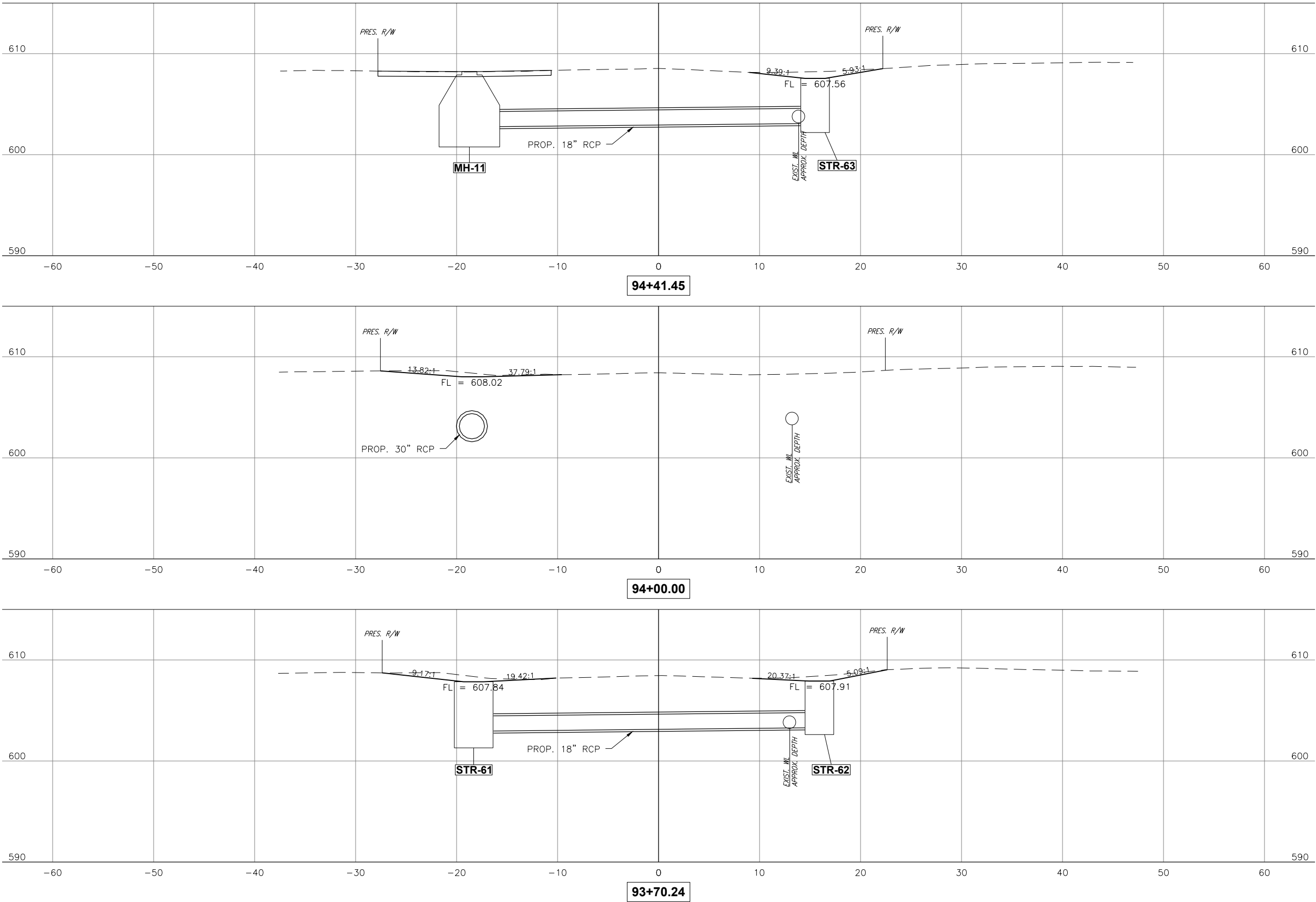
SHEET NAME
133RD ST CROSS
SECTION 3

SHEET
XS 20

BIXBY, OKLAHOMA

Page 192 of 215

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\133RD ST CROSS SECTIONS.DWG



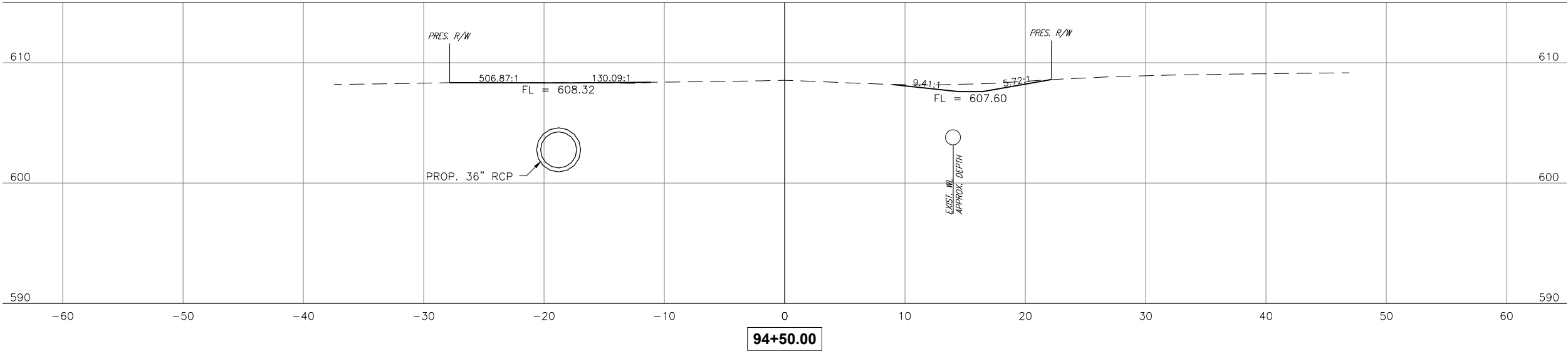
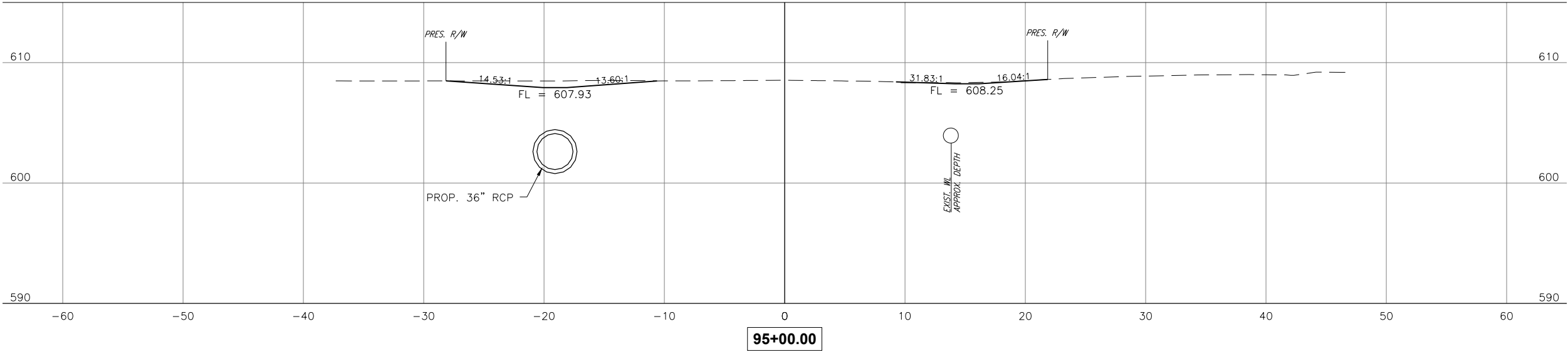
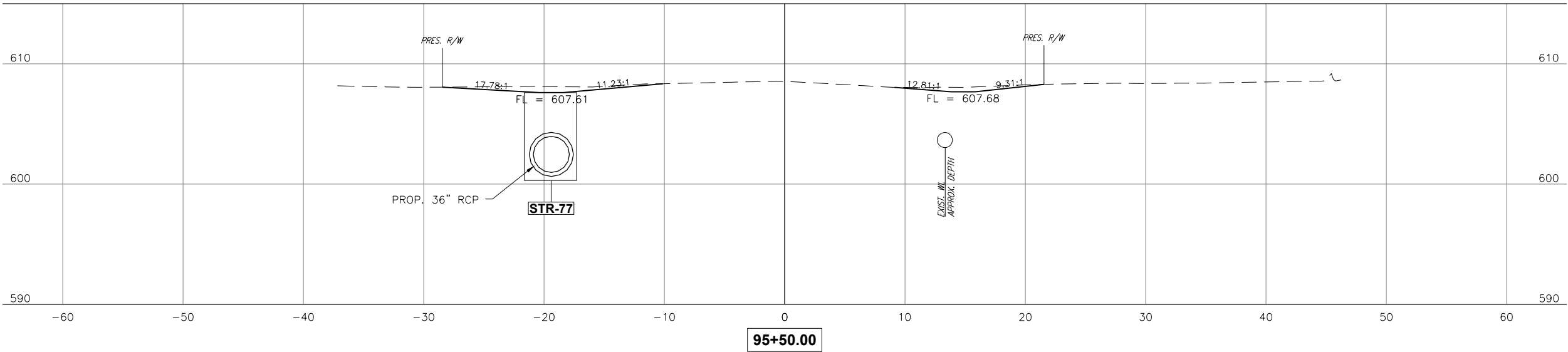
CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CEN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC CORPORATION.
NO PART OF THIS DRAWING IS TO BE REPRODUCED OR
TRANSMITTED IN ANY FORM OR BY ANY MEANS,
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC. IT IS PROHIBITED.



SUBMITTAL:	PRELIMINARY	REVISION HISTORY			
		NO.	DESCRIPTION	DATE	
DATE:	11/30/2023				
PROJECT NO:	170231.0102				
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

GARDENVIEW ADDITION DRAINAGE	
SHEET NAME	
133RD ST CROSS SECTION 4	
SHEET	
XS 21	
BIXBY, OKLAHOMA	

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\133RD ST CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CEN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED ON THE DRAWING.
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY		
DATE:	PROJECT NO:	DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE
11/30/2023	170231.0102					
DESIGNED BY: J.L.C.						
DRAWN BY: J.L.C.						
APPROVED BY: S.N.H.						
SCALE:	AS SHOWN					

GARDENVIEW ADDITION DRAINAGE

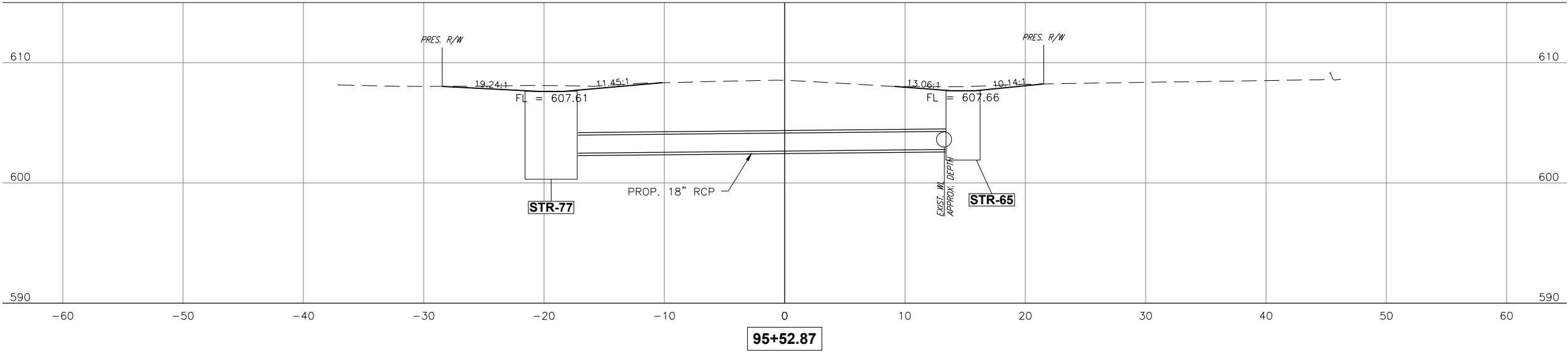
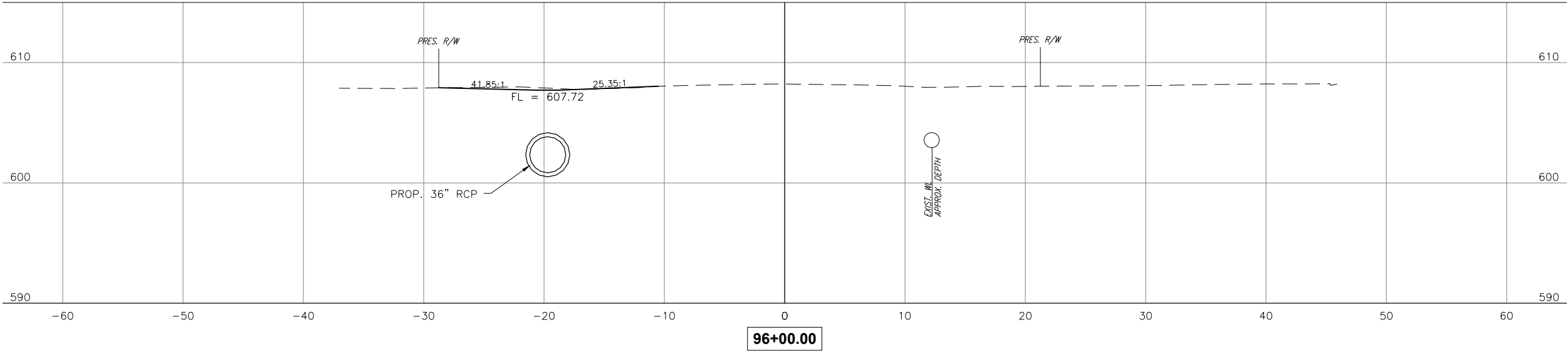
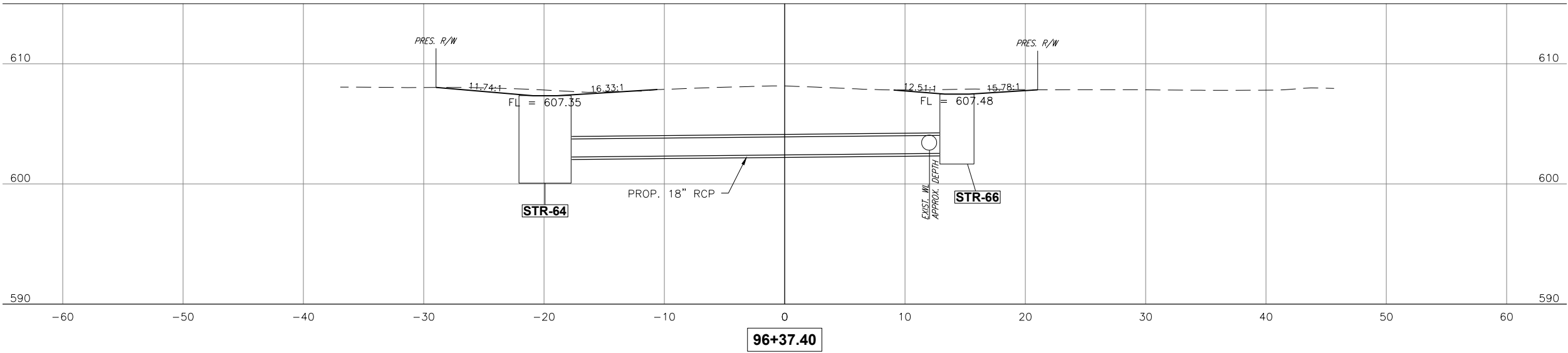
SHEET NAME
133RD ST CROSS
SECTION 5

SHEET
XS 22

BIXBY, OKLAHOMA

Page 194 of 215

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\133RD ST CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CEN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC CORPORATION.
NO PART OF THIS DRAWING IS TO BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY		
DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE		
11/30/2023	170231.0102					
DESIGNED BY: J.L.C.						
DRAWN BY: J.L.C.						
APPROVED BY: S.N.H.						
SCALE: AS SHOWN						

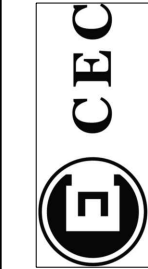
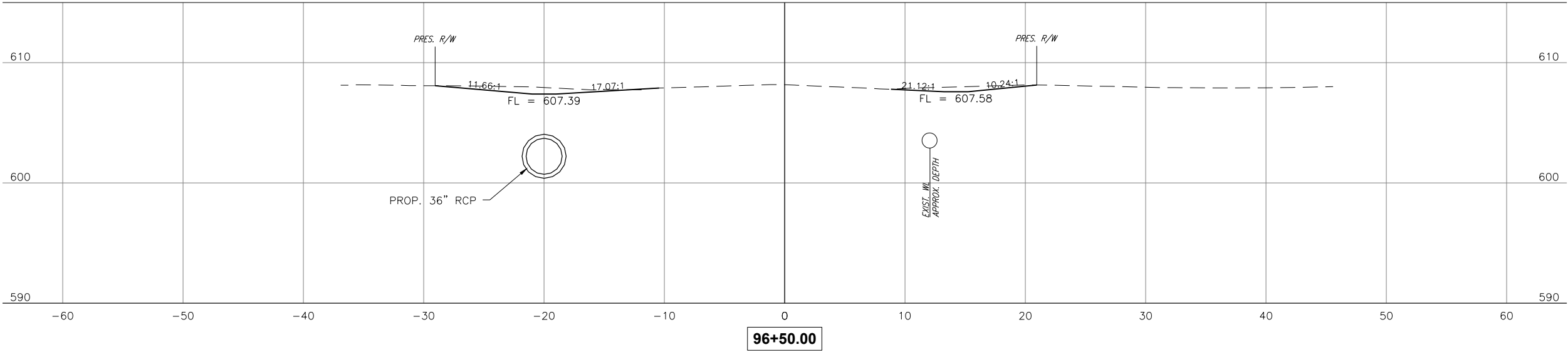
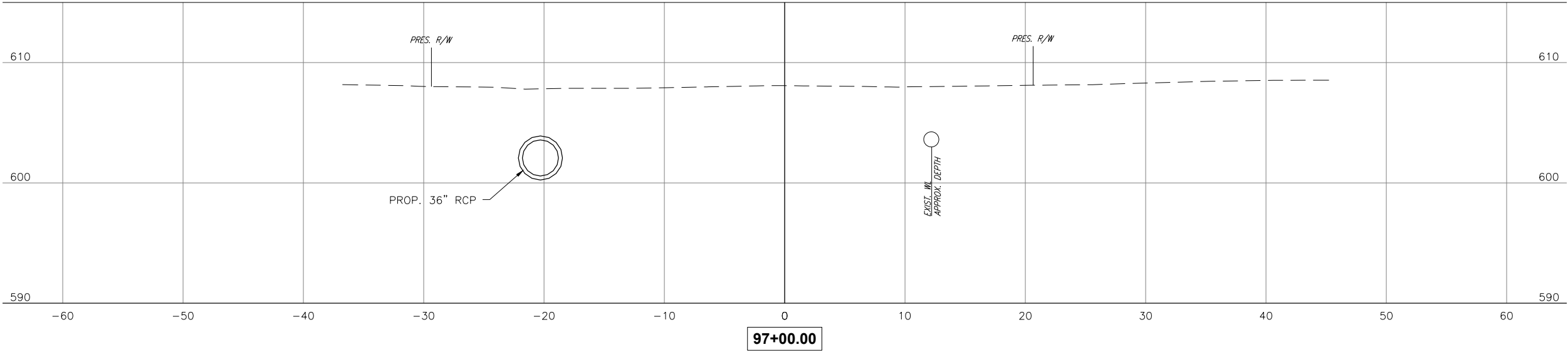
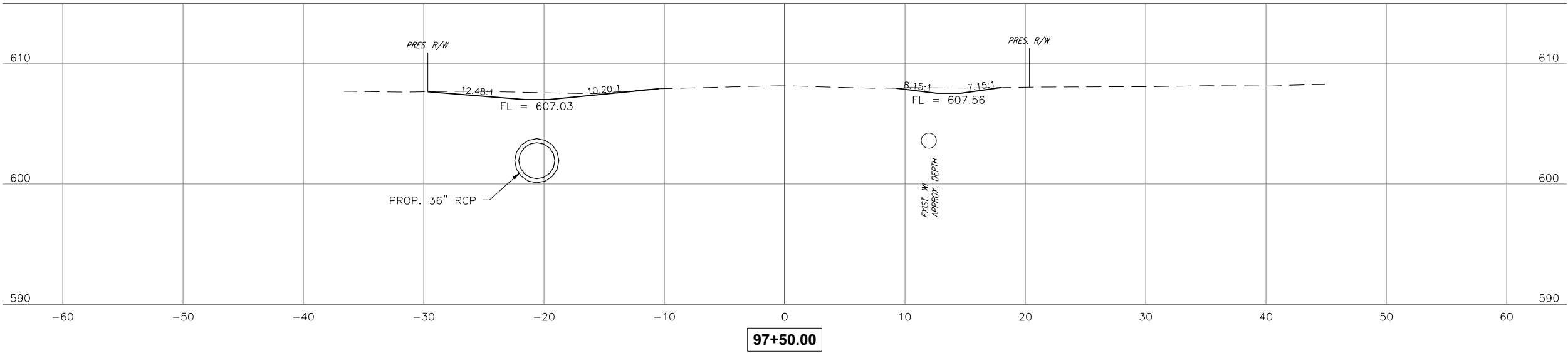
GARDENVIEW ADDITION DRAINAGE

SHEET NAME
133RD ST CROSS
SECTION 6

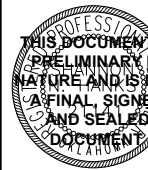
SHEET
XS 23

BIXBY, OKLAHOMA

Page 195 of 215



CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA
CAREER EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC CORPORATION.
IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED ON THE DRAWING.
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.



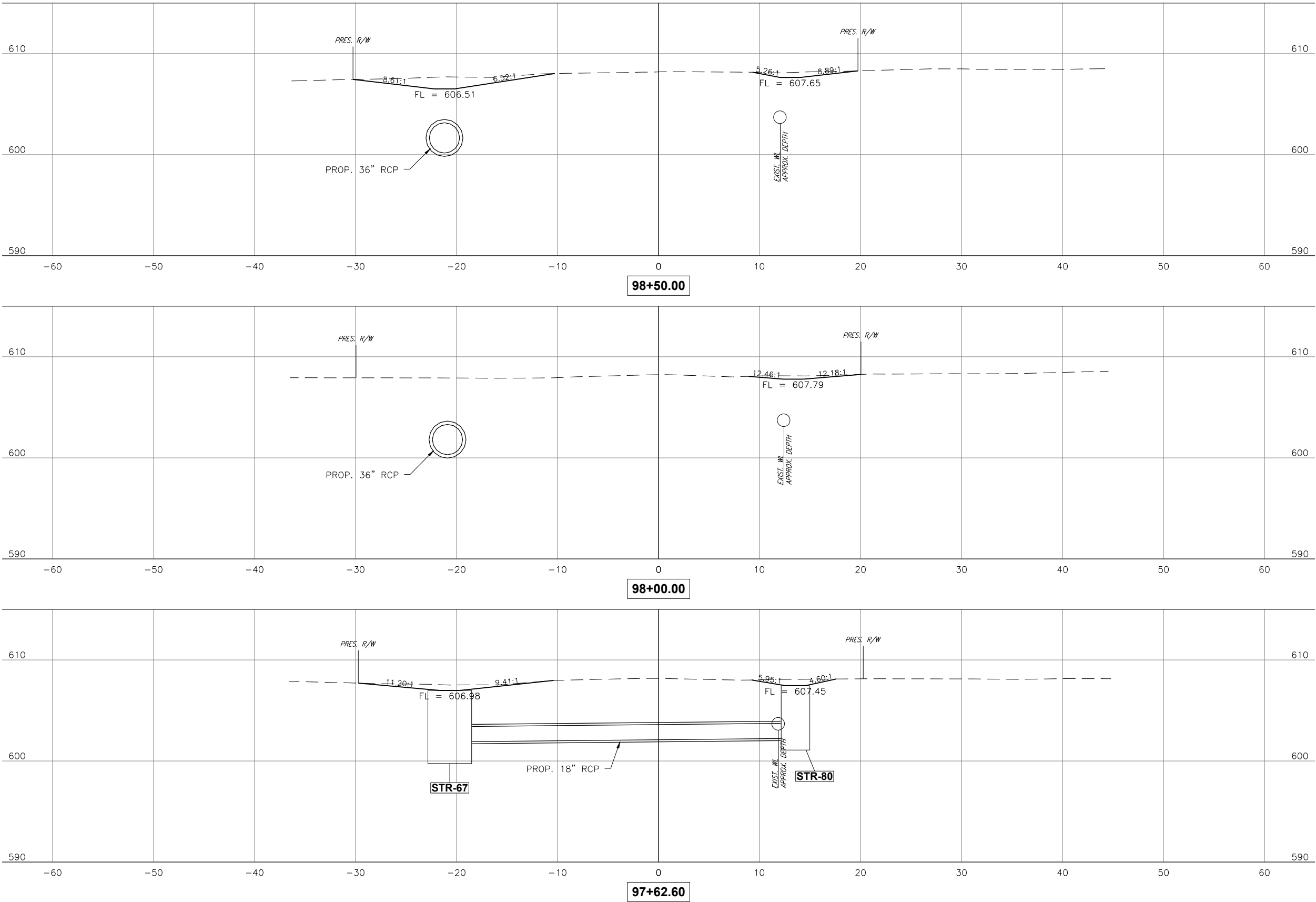
SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	11/30/2023	PROJECT NO.	170231.0102	NO.	DESCRIPTION
DESIGNED BY:	J.L.C.	DRAWN BY:	J.L.C.		
APPROVED BY:	S.N.H.	SCALE:	AS SHOWN		

GARDENVIEW ADDITION DRAINAGE
133RD ST CROSS SECTION 7
BIXBY, OKLAHOMA

SHEET NAME
133RD ST CROSS SECTION 7

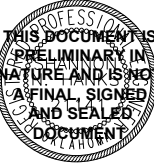
SHEET
XS 24

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\133RD ST CROSS SECTIONS.DWG





CEC
CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXTEC.COM
STATE OF OKLAHOMA
CAREER EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED ON THE DRAWING.
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY		
DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE		
11/30/2023	170231.0102					
DESIGNED BY: J.L.C.						
DRAWN BY: J.L.C.						
APPROVED BY: S.N.H.						
SCALE: AS SHOWN						

GARDENVIEW ADDITION DRAINAGE

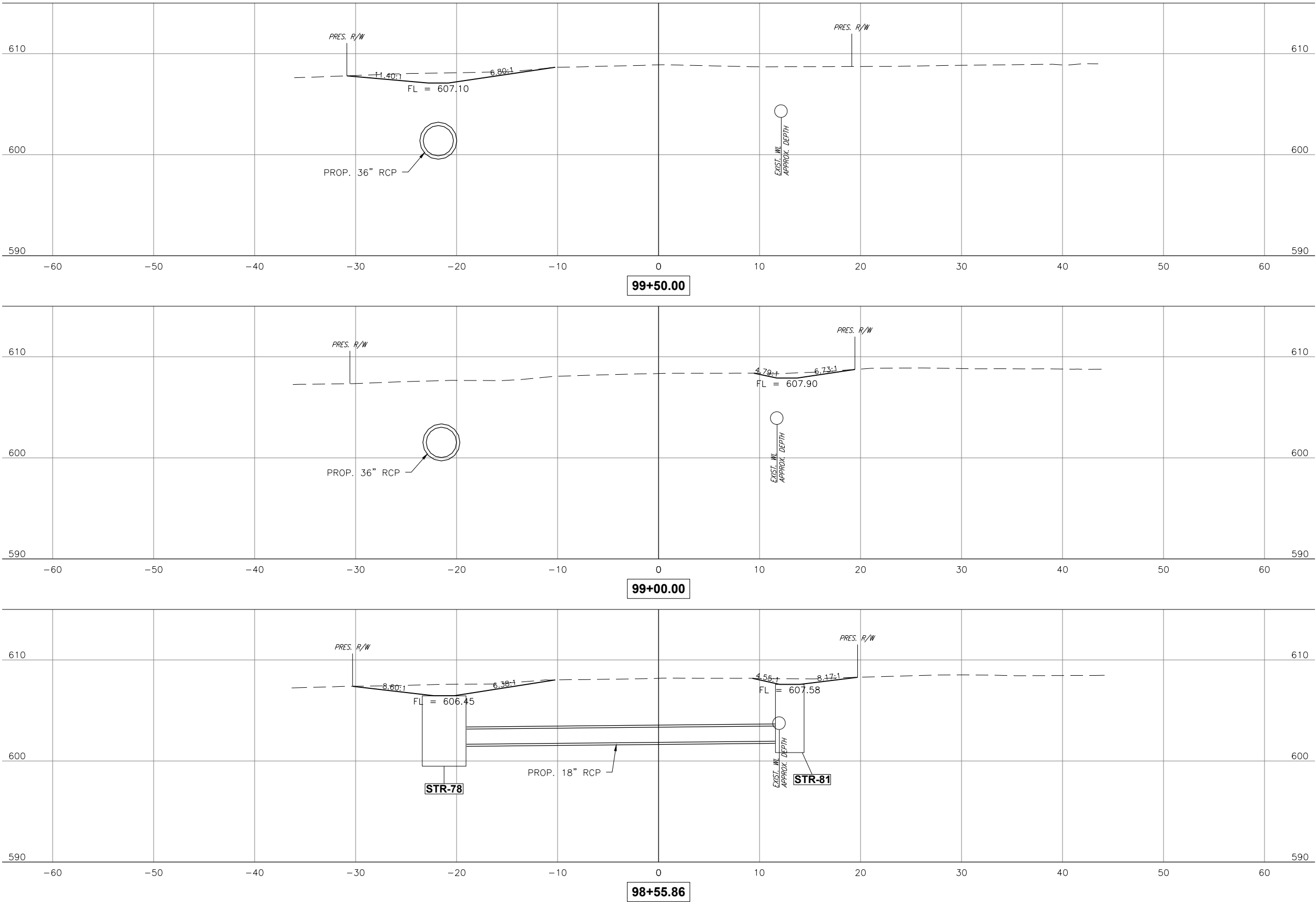
SHEET NAME
133RD ST CROSS
SECTION 8

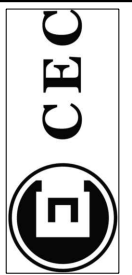
SHEET
XS 25

BIXBY, OKLAHOMA

Page 197 of 215

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\133RD ST CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
CAN 32 EXPIRES: 2024-06-30
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO.	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE: AS SHOWN					

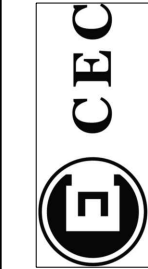
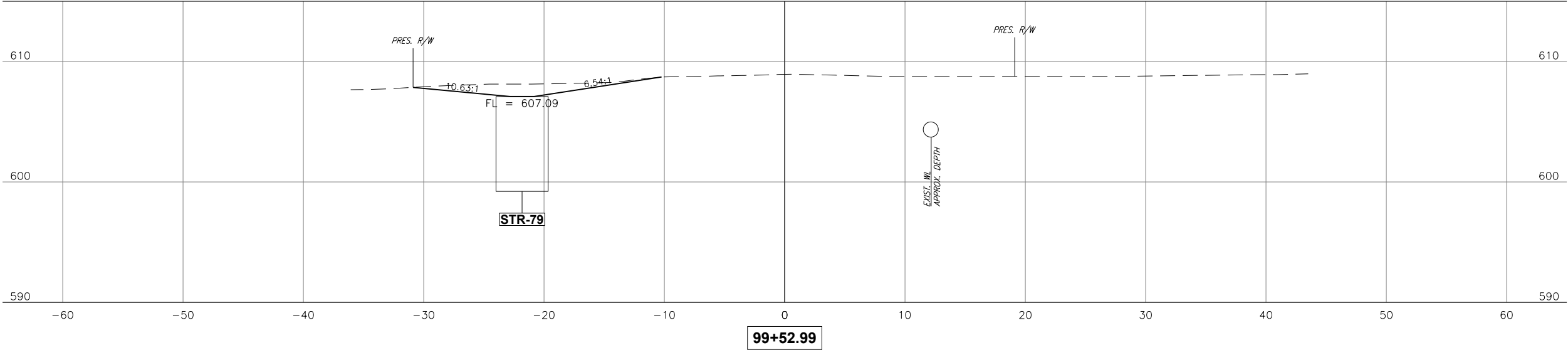
GARDENVIEW ADDITION DRAINAGE

SHEET NAME
133RD ST CROSS
SECTION 9

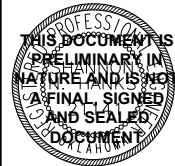
SHEET
XS 26

BIXBY, OKLAHOMA

Page 198 of 215



CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAREER 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC CORPORATION.
NO PART OF THIS DRAWING MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC CORPORATION.



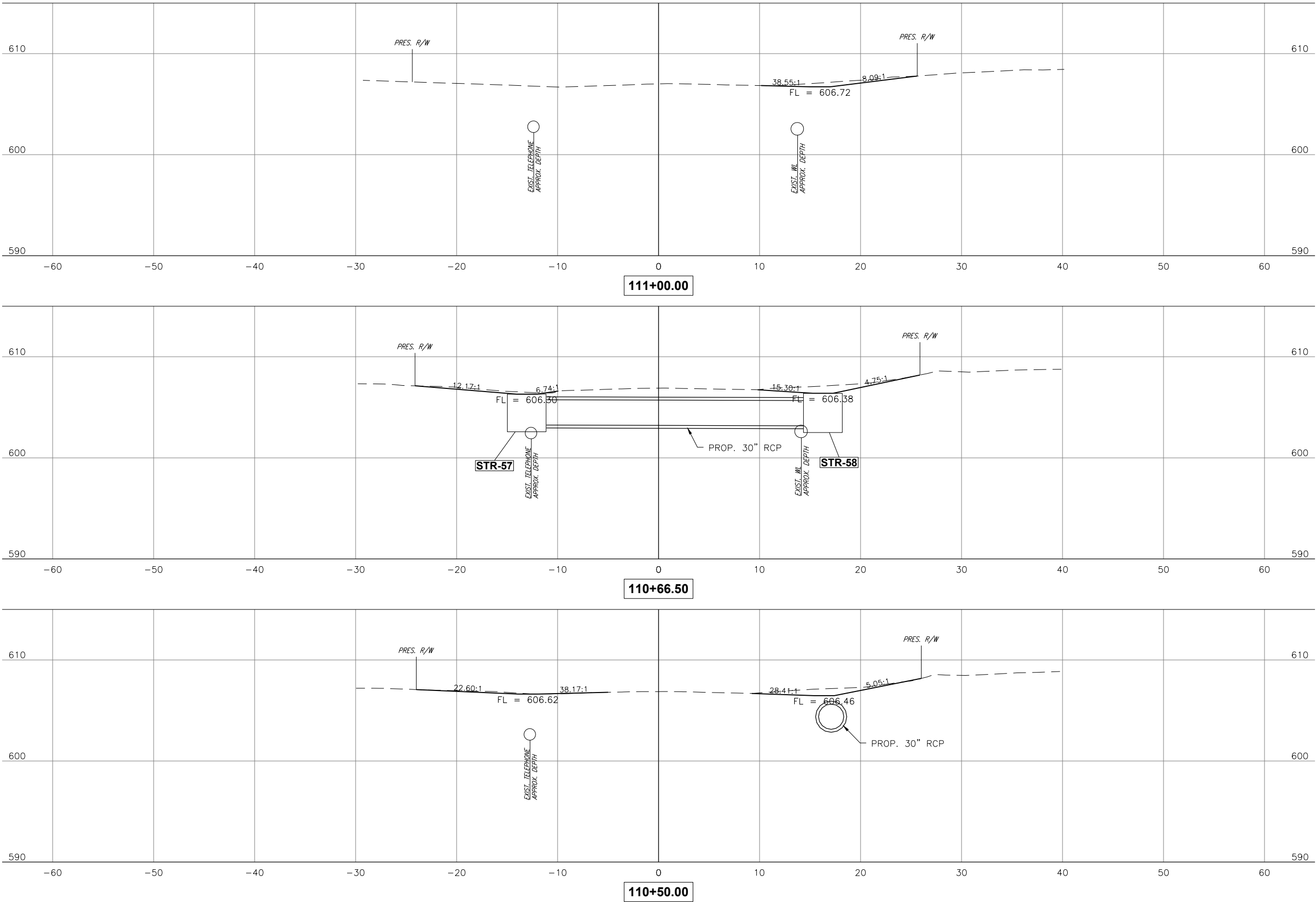
SUBMITTAL:	PRELIMINARY	REVISION HISTORY		
		NO.	DESCRIPTION	DATE
DATE:	11/30/2023			
PROJECT NO:	170231.0102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:	S.N.H.			
SCALE:	AS SHOWN			

GARDENVIEW ADDITION DRAINAGE	
BIXBY, OKLAHOMA	

SHEET NAME
133RD ST CROSS SECTION 10

SHEET
XS 27

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\83RD AVE CROSS SECTIONS.DWG





CEC
TULSA, OKLAHOMA 74137
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA
CAREER EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED ON THE DRAWING.
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT.

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE: AS SHOWN					

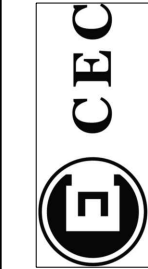
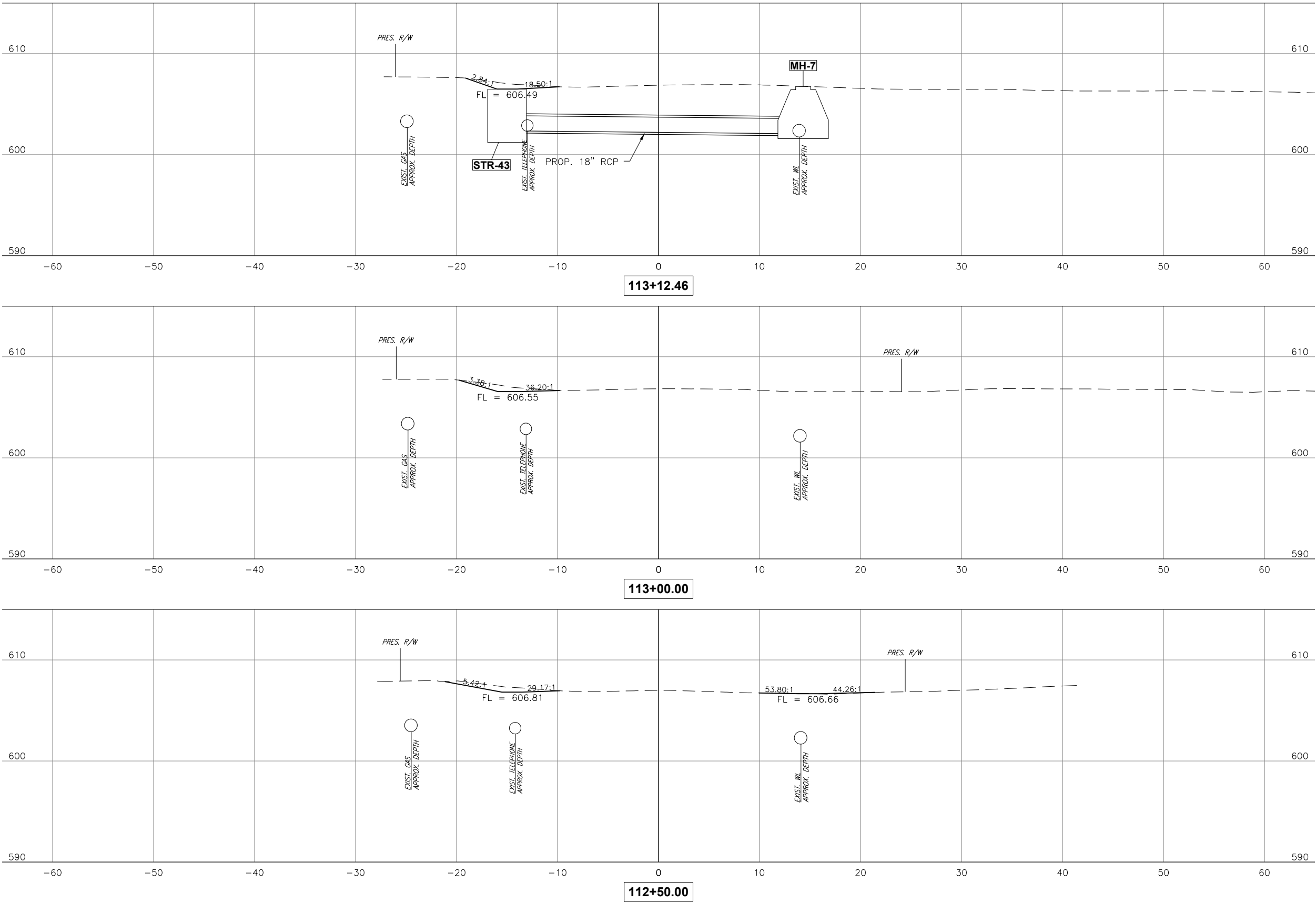
GARDENVIEW ADDITION DRAINAGE

SHEET NAME
83RD AVE CROSS SECTION 1

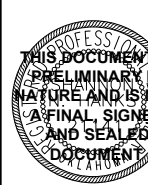
SHEET
XS 28

BIXBY, OKLAHOMA

Page 200 of 215



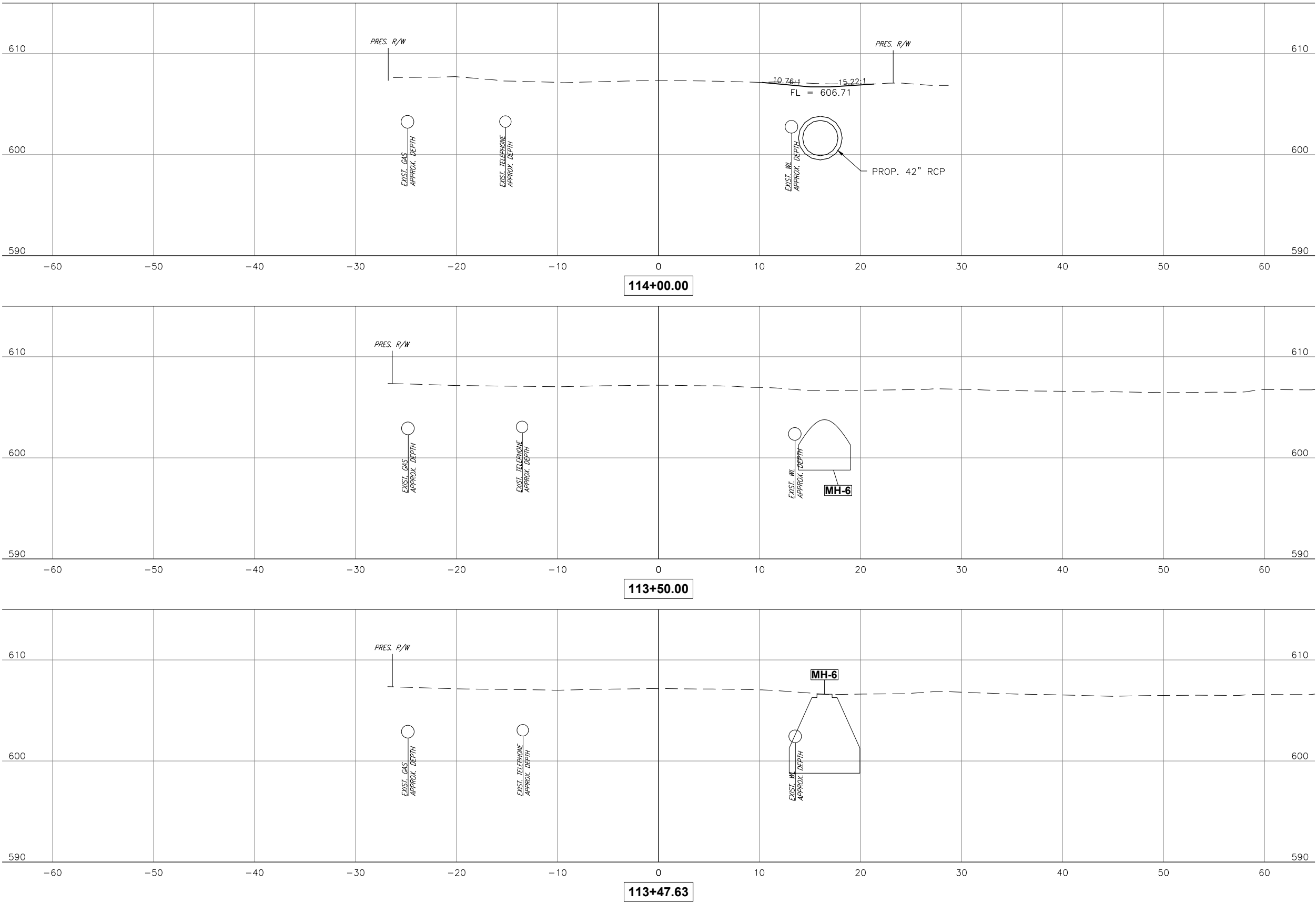
CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA
CANNOT BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC CORPORATION.

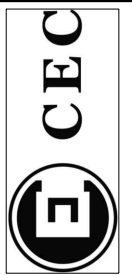


SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	11/30/2023	PROJECT NO:	170231.0102	NO.	DESCRIPTION
DESIGNED BY:	J.L.C.	DRAWN BY:	J.L.C.		
APPROVED BY:	S.N.H.	SCALE:	AS SHOWN		

GARDENVIEW ADDITION DRAINAGE	
SHEET NAME	
83RD AVE CROSS SECTION 2	
SHEET	
XS 29	
Page 201 of 215	

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\83RD AVE CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED IN THE DRAWING.
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY		
DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE		
11/30/2023	170231.0102					
DESIGNED BY: J.L.C.						
DRAWN BY: J.L.C.						
APPROVED BY: S.N.H.						
SCALE: AS SHOWN						

GARDENVIEW ADDITION DRAINAGE

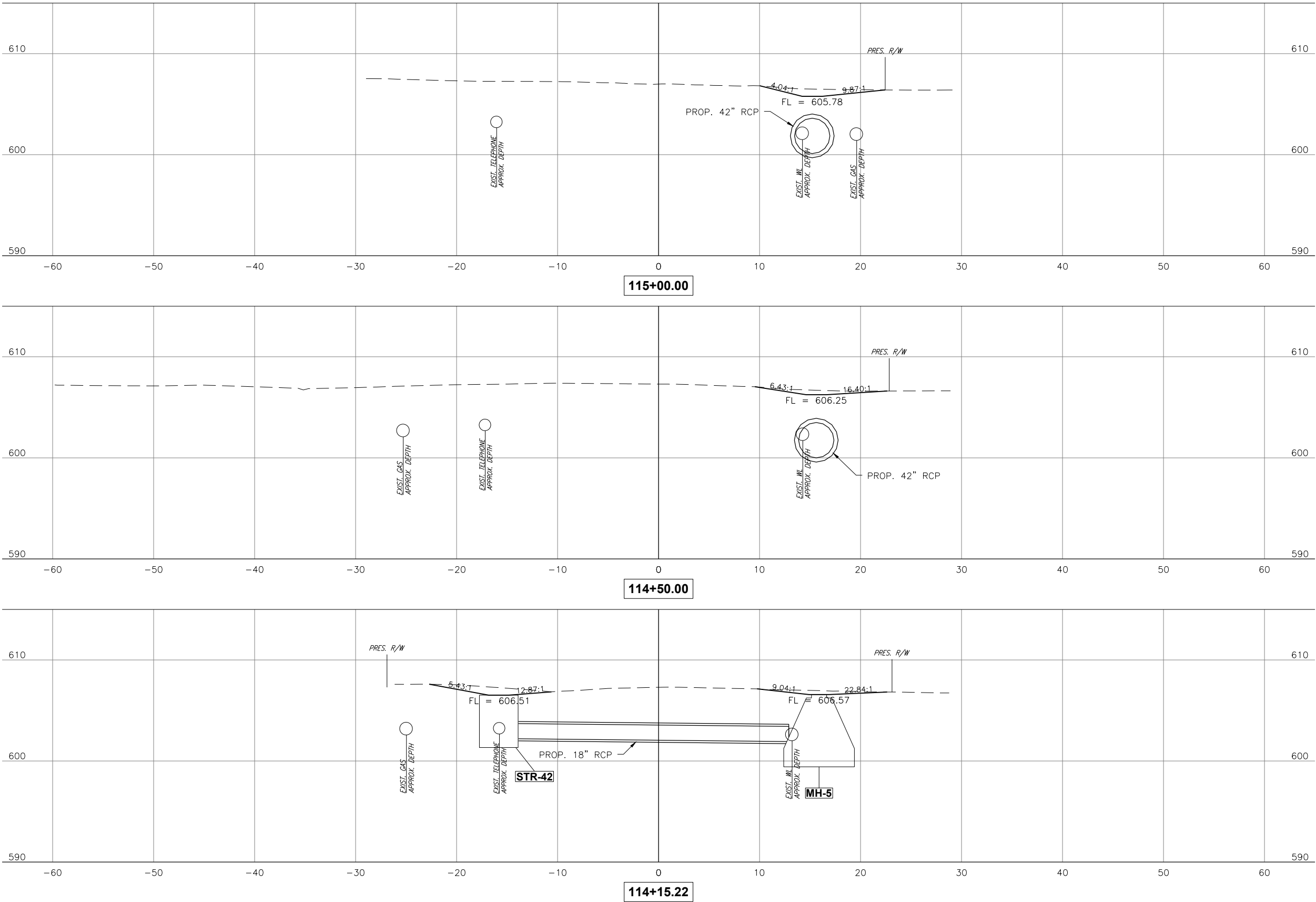
SHEET NAME
83RD AVE CROSS
SECTION 3

SHEET
XS 30

BIXBY, OKLAHOMA

Page 202 of 215

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\83RD AVE CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74137
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED ON THE DRAWING.
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC, IT IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE: AS SHOWN					

GARDENVIEW ADDITION DRAINAGE

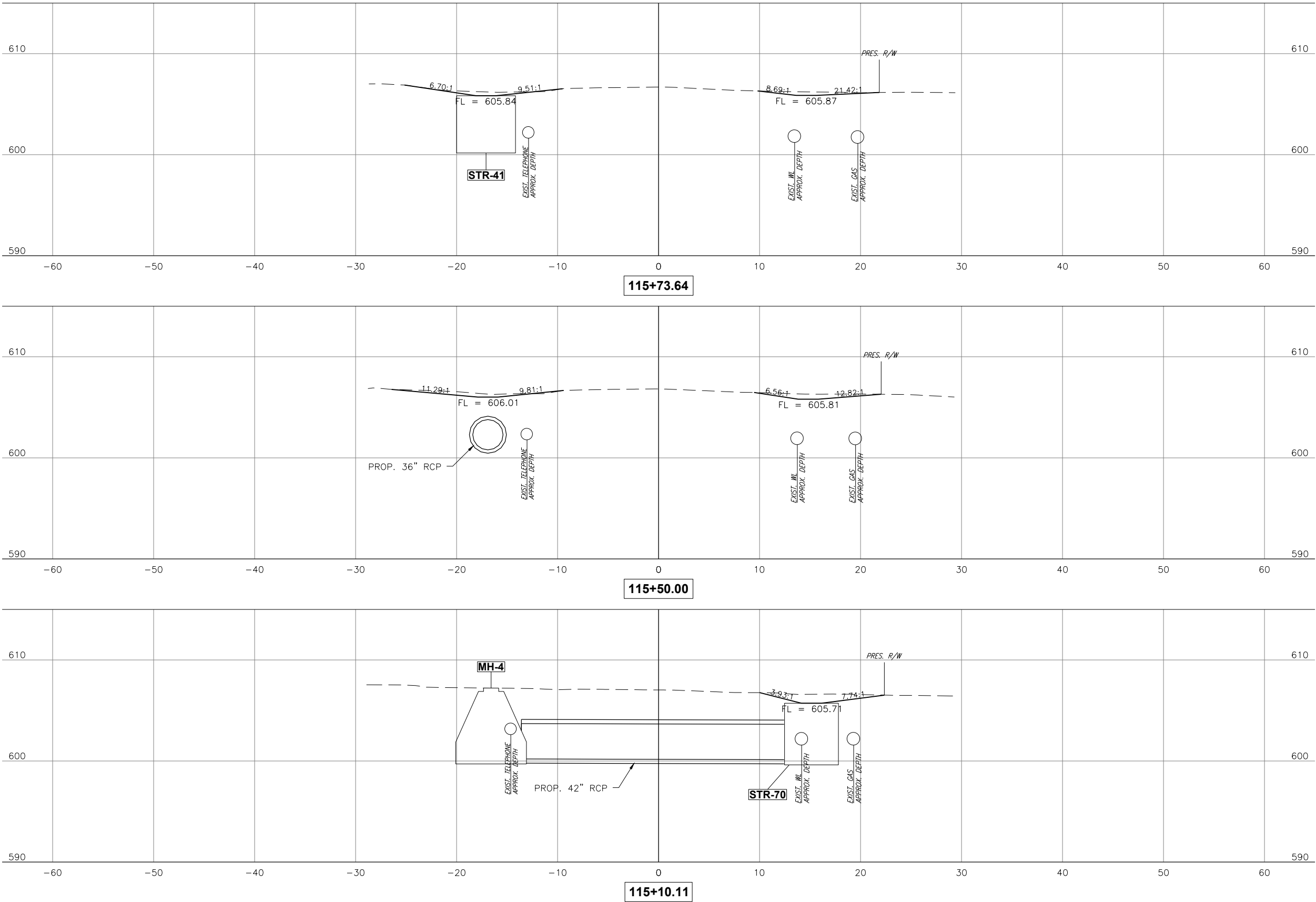
SHEET NAME
83RD AVE CROSS
SECTION 4

SHEET
XS 31

BIXBY, OKLAHOMA

Page 203 of 215

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\83RD AVE CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
STATE OF OKCERIFICATE OF AUTHORIZATION
CAN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. NO PART OF THIS DRAWING
MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE: AS SHOWN					

GARDENVIEW ADDITION DRAINAGE

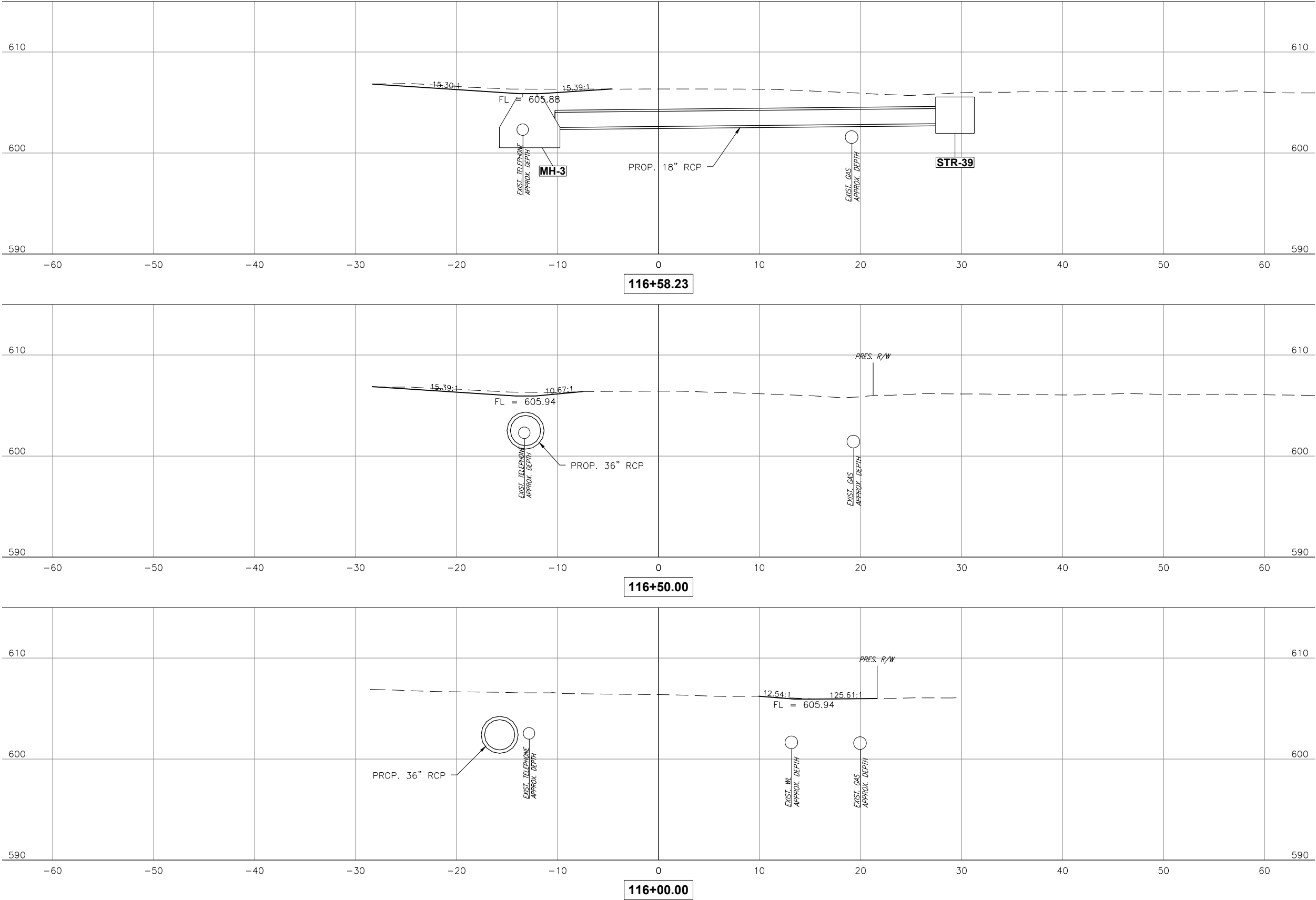
SHEET NAME
83RD AVE CROSS
SECTION 5

SHEET
XS 32

BIXBY, OKLAHOMA

Page 204 of 215

PLOT DATE: November 30, 2023, DRAWING FILE: N:\TULSA\TULSA\PROJECTS\BIXBY - 131ST ST - MEMORIAL TO MINGO\PROJECT DRAWINGS\GARDENVIEW PLANS\83RD AVE CROSS SECTIONS.DWG





CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNEXCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CAN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC CORPORATION.
NO PART OF THIS DRAWING IS TO BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT EXPRESS WRITTEN AUTHORIZATION OF CEC CORPORATION.

THIS DOCUMENT IS PRELIMINARY IN NATURE AND IS NOT A FINAL, SIGNED AND SEALED DOCUMENT.

SUBMITTAL:		PRELIMINARY		REVISION HISTORY	
DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE	
11/30/2023	170231.0102				
DESIGNED BY: J.L.C.					
DRAWN BY: J.L.C.					
APPROVED BY: S.N.H.					
SCALE: AS SHOWN					

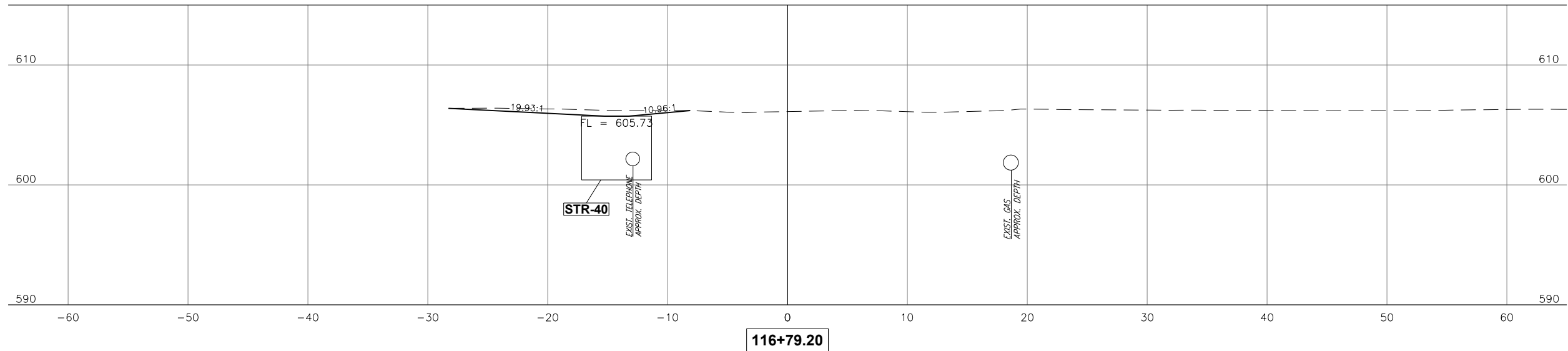
GARDENVIEW ADDITION DRAINAGE

SHEET NAME
83RD AVE CROSS SECTION 6

SHEET
XS 33

BIXBY, OKLAHOMA

Page 205 of 215



CEC CORPORATION
1300 S. MAIN STREET
TULSA, OKLAHOMA 74137
P: 918.663.0401
WWW.CONNECTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAP 32 EXPIRES: 2024-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

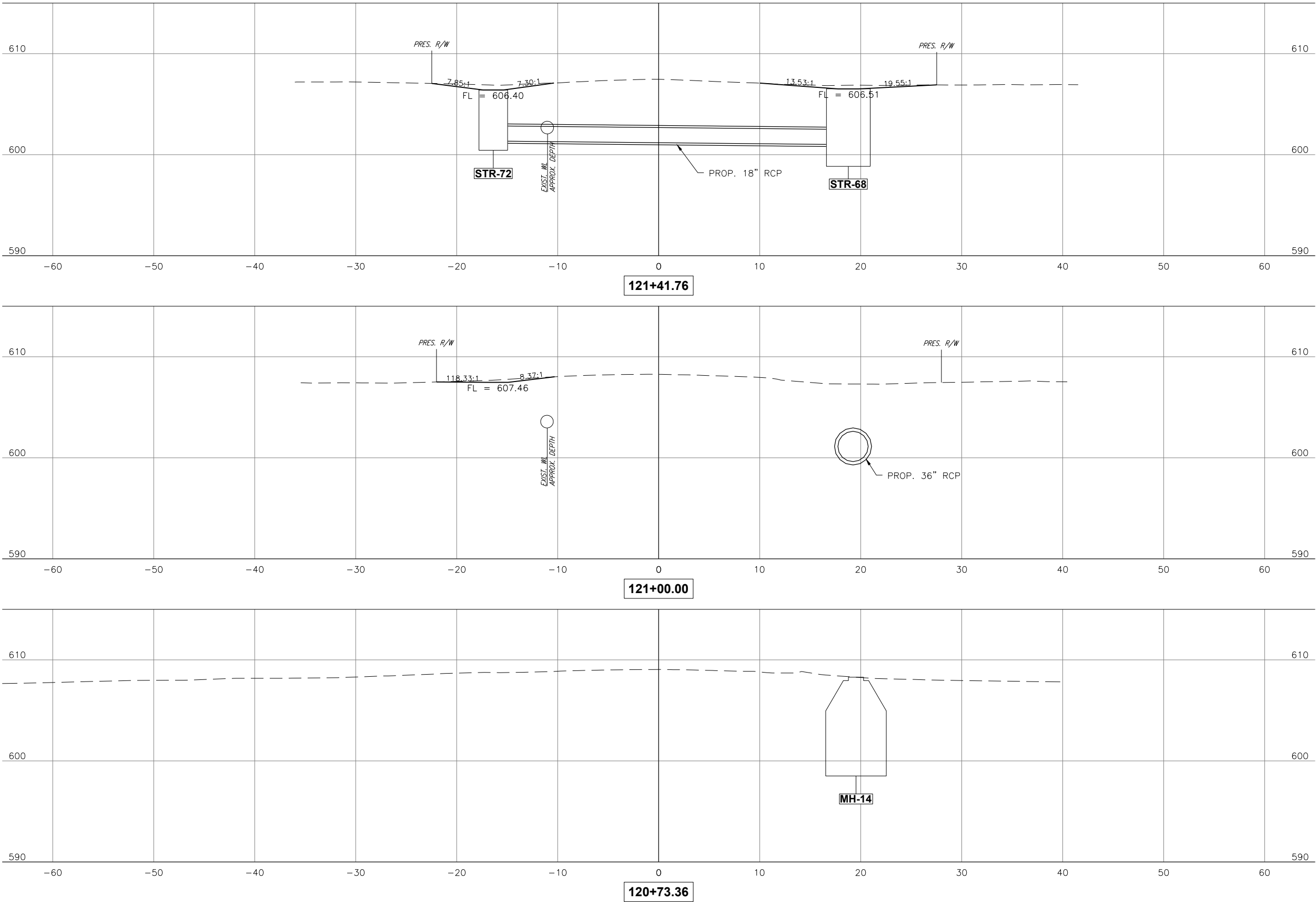


SUBMITTAL:	PRELIMINARY	REVISION HISTORY		
		NO.	DESCRIPTION	DATE
DATE:	11/30/2023			
PROJECT NO:	17/023 0102			
DESIGNED BY:	J.L.C.			
DRAWN BY:	J.L.C.			
APPROVED BY:	S.N.H.			
SCALE:	AS SHOWN			

GARDENVIEW ADDITION DRAINAGE

SHEET NAME
83RD AVE CROSS
SECTION 7

SHEET
XS 34





CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
CAN 32 EXPIRES: 06/06/30

STATE OF OK CERTIFICATE OF AUTHORIZATION
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC. ANY
REPRODUCTION OR DISTRIBUTION OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:	PRELIMINARY		REVISION HISTORY		
	DATE:	PROJECT NO:	NO.	DESCRIPTION	DATE
DATE:	11/30/2023	170231.0102			
DESIGNED BY:	J.L.C.				
DRAWN BY:	J.L.C.				
APPROVED BY:	S.N.H.				
SCALE:	AS SHOWN				

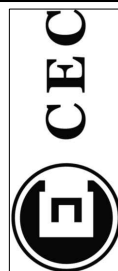
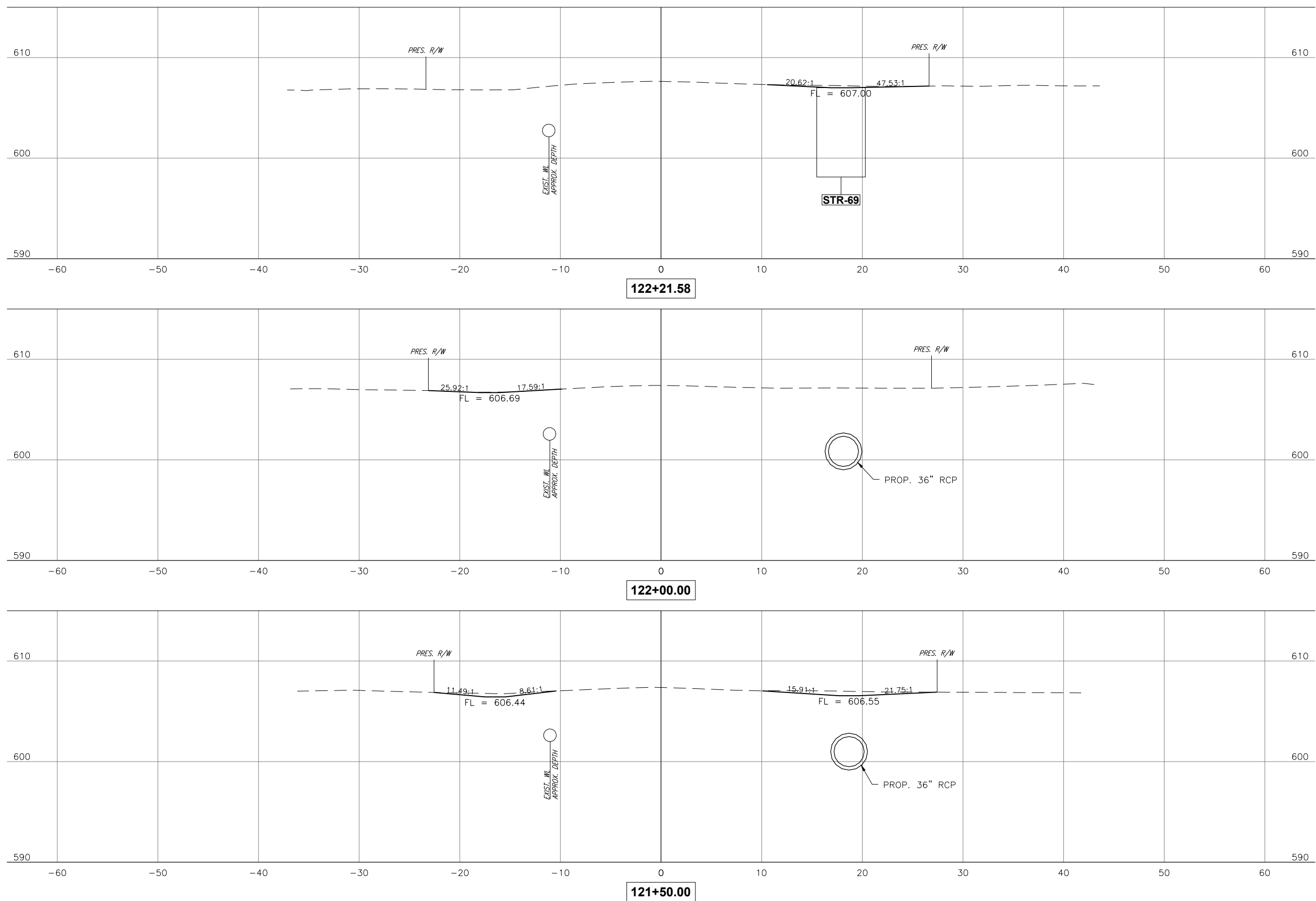
GARDENVIEW ADDITION DRAINAGE

SHEET NAME
85TH AVE CROSS
SECTION 1

SHEET
XS 35

BIXBY, OKLAHOMA

Page 207 of 215



CEC CORPORATION
1000 S MAIN STREET
TULSA, OKLAHOMA 74117
P: 918.663.9401
WWW.CONNECTCEC.COM

STATE OF OK CERTIFICATE OF AUTHORIZATION
CAR 32 EXPIRES: 2024-06-30

COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS PROPERTY OF CEC. ANY
MODIFICATION OR USE OF THIS DRAWING
WITHOUT EXPRESS WRITTEN AUTHORIZATION OF
CEC IS PROHIBITED.

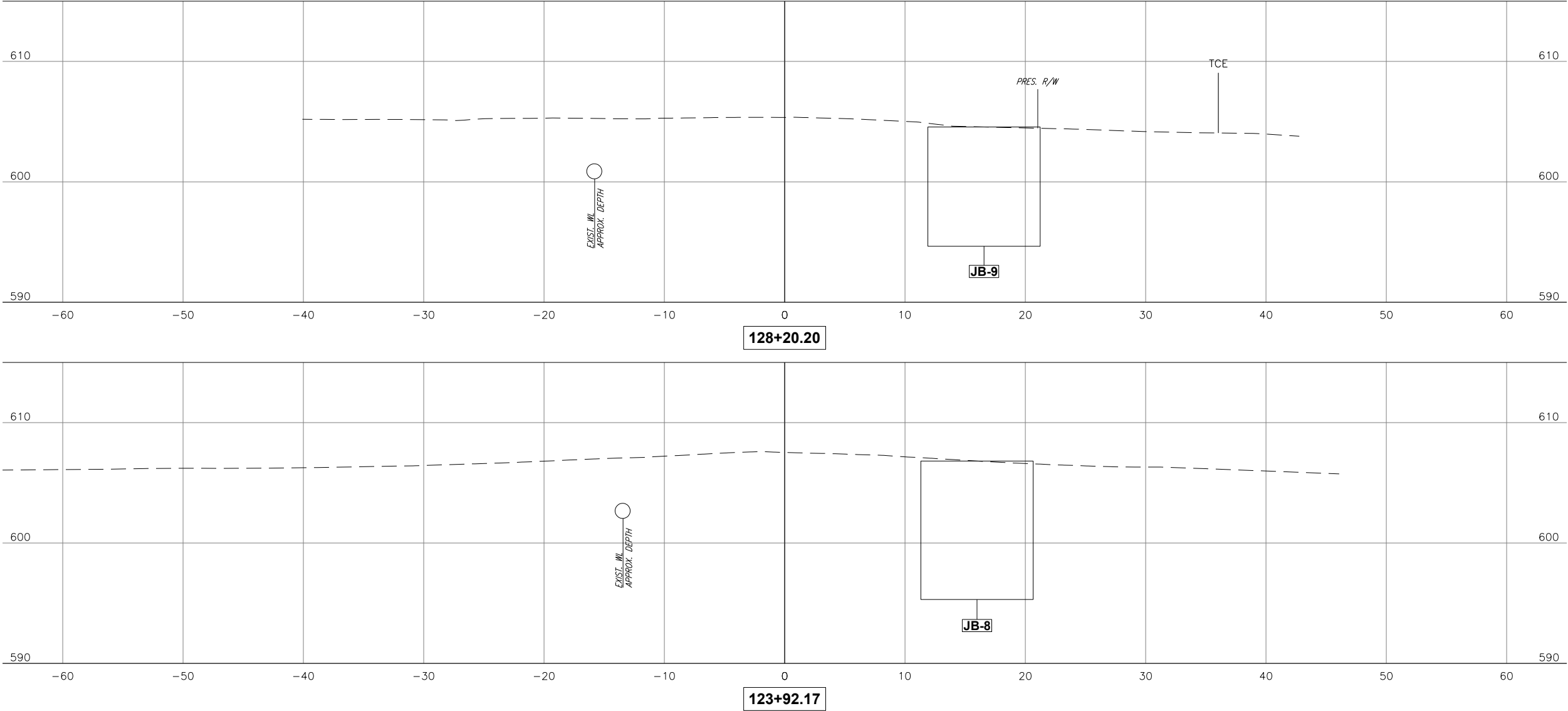


SUBMITTAL	REVISION HISTORY	
	NO.	DESCRIPTION
PRELIMINARY		
DATE:	11/30/2023	
PROJECT NO:	17031.0102	
DESIGNED BY:	J.L.C.	
DRAWN BY:	J.L.C.	
APPROVED BY:	S.N.H.	

GARDENVIEW ADDITION DRAINAGE

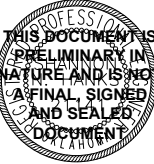
SHEET NAME
85TH AVE CROSS
SECTION 2

SHEET
XS 36





CEC CORPORATION
TULSA, OKLAHOMA 74117
WWW.CONNECTCEC.COM
STATE OF OKLAHOMA CERTIFICATE OF AUTHORIZATION
CEN 32 EXPIRES: 2024-06-30
COPYRIGHT © 2017 CEC. ALL RIGHTS RESERVED.
THIS DRAWING IS THE PROPERTY OF CEC CORPORATION.
THIS DRAWING IS NOT TO BE REPRODUCED OR COPIED IN ANY MANNER WITHOUT THE WRITTEN AUTHORIZATION OF CEC. IT IS PROHIBITED.



THIS DOCUMENT IS
PRELIMINARY IN
NATURE AND IS NOT
A FINAL, SIGNED
AND SEALED
DOCUMENT

SUBMITTAL:		PRELIMINARY		REVISION HISTORY		
DATE:	PROJECT NO.	NO.	DESCRIPTION	DATE		
11/30/2023	170231.0102					
DESIGNED BY: J.L.C.						
DRAWN BY: J.L.C.						
APPROVED BY: S.N.H.						
SCALE:	AS SHOWN					

GARDENVIEW ADDITION DRAINAGE

SHEET NAME
85TH AVE CROSS
SECTION 3

SHEET
XS 37

BIXBY, OKLAHOMA

Page 209 of 215



APPLICATION FOR CLOSINGS, VACATIONS OR ENCROACHMENTS

APPLICATION IS HEREBY MADE TO THE CITY OF BIXBY TO CONSIDER ONE OF THE FOLLOWING:

CHOOSE (1) CLOSURE: ☒ ENCROACHMENT: _____ VACATION: _____

CHOOSE (1) EASEMENT: ☒ RIGHT OF WAY: _____ PLAT: _____

Property Location: 7542 & 7548 E. 156th Pl. S.

Legal Description: Crossing at Conrad Village 1 and 2 1

Parcel number: 57657732368220 & 57657732368230
Subdivision Lot Block

Plat name* (if applicable): Crossing at Conrad Village

***If unplatted: Attach legal description and electronic legal description in WORD format**

Project Details (Include-purpose of project, why the request, new proposal, etc.):

Replatting Crossing at Conrad Village Block 1, Lots 1:5 to place oil well in Reserve Area and reconfigure pie-shaped Lot 1 for better house fit. This phase is still under construction and Utility Easement was only designed for AEP-PSO electric. Line has not yet been installed and is being relocated to a new U/E to be included in the replat.

Applicant (Name & Company): Tanner Consulting, LLC

Address: 5323 S. Lewis Ave.

City: Tulsa State: OK Zip: 74105

Phone: (918) 745-9929 Fax: (918) 745-9969

Email: eenyart@tannerbaitshop.com

Property Owner(s) of Record: Conrad Farms Bixby, LLC

Address: PO Box 3052

City: Claremore State: OK Zip: 74018

Phone: (918) 613-0766 Fax: _____

Email: bjgreen347@msn.com

SIGNATURE OF APPLICANT: Erik Enyart DATE: 01/04/2025

(TYPE OR PRINT NAME OF APPLICANT SIGNING): Erik Enyart for Tanner Consulting, LLC

☐ CHECK BOX IF ATTACHING OWNER'S SIGNATURE AUTHORIZATION FORM

SIGNATURE OF PROPERTY OWNER(S): Erik Enyart DATE: 01/04/2025

(PRINT NAME OF OWNER(S)

SIGNING):

Brian Green

APPLICATION FOR
CLOSINGS, VACATIONS AND/OR ENCROACHMENTS



NG

UTILITY COMPANY REVIEW FOR:

CHOOSE (1) CLOSURE: X DEDICATION: _____ VACATION: _____

CHOOSE (1) EASEMENT: X RIGHT OF WAY: _____ PLAT: _____

Applicant (Name & Company): Tanner Consulting, LLC

Phone: (918) 745-9929 Email: eenyart@tannerbaitshop.com

Property Location: 7542 & 7548 E. 156th Pl. S.

Legal Description: Crossing at Conrad Village 1 & 2 1
Subdivision Lot Block

Parcel number: 57657732368220 & 57657732368230

Plat name* (if applicable): Crossing at Conrad Village

***If unplatted: Attach legal description and electronic legal description in WORD format**

AEP/PSO: **Steve Williams** Signature: _____
Phone: 918.599.6506 Comments: _____
Email: swilliams@aep.com _____

Windstream: **Bruce Sims** Signature: _____
Phone: 501.679.6225 Comments: _____
Email: Bruce.Sims@windstream.com _____

ONG: **Chandler Eidson** Signature: _____
Phone: 918.831.8221 Comments: _____
Email: Chandler.Eidson@onegas.com _____

OG&E: **Tim Dobrinski** Signature: _____
Phone: 918.227.6203 Comments: _____
Email: dobrintd@oge.com _____

BTC: **Richard Gann** Signature: _____
Phone: 918.366.0253 Comments: _____
Email: rgann@mybtc.com _____

COX CABLE: **Kadi Calfy** Signature: _____
Phone: 918.286.4542 Comments: _____
Email: Kadi.Calfy@cox.com _____

NOTES: _____



PAGE 1 OF 1

Exhibit "A.1"
Crossing at Conrad Village
Utility Easement Closing/Vacation Description

Description

PART OF A TEN (10) FOOT UTILITY EASEMENT WITHIN LOTS ONE (1) AND TWO (2), BLOCK ONE (1), "CROSSING AT CONRAD VILLAGE", A SUBDIVISION WITHIN THE CITY OF BIXBY, TULSA COUNTY, STATE OF OKLAHOMA, ACCORDING TO THE RECORDED PLAT THEREOF (PLAT NO. 7079), BEING MORE PARTICULARLY DESCRIBED AS FOLLOWS:

COMMENCING AT THE SOUTHEAST CORNER OF SAID LOT 2, THENCE NORTH 1°24'23" WEST, AND ALONG THE EAST LINE OF LOT 2, FOR A DISTANCE OF 17.50 FEET TO THE POINT OF BEGINNING;

THENCE SOUTH 88°35'37" WEST AND PARALLEL WITH THE SOUTH LINE OF LOT 2, FOR A DISTANCE OF 5.00 FEET; THENCE NORTH 1°24'23" WEST AND PARALLEL WITH THE EAST LINE OF LOT 2, FOR A DISTANCE OF 88.87 FEET; THENCE SOUTHEASTERLY ALONG A 125.00-FOOT-RADIUS, NON-TANGENT CURVE TO THE RIGHT, HAVING AN INITIAL TANGENT BEARING OF SOUTH 77°33'35" EAST, A CENTRAL ANGLE OF 4°46'31", A CHORD BEARING AND DISTANCE OF SOUTH 75°10'19" EAST FOR 10.42 FEET, FOR AN ARC DISTANCE OF 10.42 FEET; THENCE SOUTH 1°24'23" EAST AND PARALLEL WITH THE WEST LINE OF SAID LOT 1, FOR A DISTANCE OF 85.96 FEET; THENCE SOUTH 88°35'37" WEST AND PARALLEL WITH THE SOUTH LINE OF LOT 1, FOR A DISTANCE OF 5.00 FEET TO THE POINT OF BEGINNING;

THE ABOVE-DESCRIBED PARTIAL UTILITY EASEMENT CONTAINS 875 SQUARE FEET OR 0.020 ACRES.

Basis of Bearing

THE BEARINGS SHOWN HEREON ARE BASED UPON THE RECORDED PLAT OF "CROSSING AT CONRAD VILLAGE".

Certification

I, DAN E. TANNER, OF TANNER CONSULTING, LLC, CERTIFY THAT THE ATTACHED DESCRIPTION CLOSES IN ACCORD WITH EXISTING RECORDS, IS A TRUE REPRESENTATION OF THE EASEMENT AS DESCRIBED, AND MEETS THE MINIMUM TECHNICAL STANDARDS FOR LAND SURVEYING OF THE STATE OF OKLAHOMA.



DAN E. TANNER, P.L.S.
OKLAHOMA P.L.S. #1435
OKLAHOMA CA #2661
EXPIRATION DATE: 6/30/25

Exhibit "A.2"

Crossing at Conrad Village Utility Easement Closing/Vacation Exhibit

EAST 156TH PLACE SOUTH



15' UTILITY EASEMENT

20' BUILDING LINE

17.5' UTILITY EASEMENT

SOUTH 76TH EAST AVENUE

10.42'

R=125.00'

Δ=4°46'31"

CB=S75°10'19"E

CD=10.42'

ITB=S77°33'35"E

N1°24'23"W
88.87'
S1°24'23"E
85.96'

5.00'

POB S88°35'37"W

5.00'

S88°35'37"W

POINT OF COMMENCEMENT
SW CORNER LOT 1, BLOCK 1

LEGEND

CB	CHORD BEARING	RESERVE A & UTILITY EASEMENT & OVERLAND DRAINAGE EASEMENT
CD	CHORD DISTANCE	
Δ	DELTA ANGLE	
ITB	INITIAL TANGENT BEARING	
POB	POINT OF BEGINNING	
R	RADIUS	



Tanner Consulting LLC
5323 SOUTH LEWIS AVENUE, TULSA OKLAHOMA 74105-6539 | 918.745.9929

01/03/2025 EENYART 20052EX_BLOCK1UECLOSING

Project: 20052 - U/E Closing/Vacation Closure

Total Traverse Length:		195.25
Closure:	36.03 17 SE	0.003
1:	69.442.560	Closure Precision
Closure Area:		874.974 SF
		0.020 Acres

20052Ex_Block1UEClosing_Closure.xlsm - 1/3/2025 8:49 AM - Page 1