

WATERLINE PROJECT CONTROL AND COORDINATE DATA

POINT NO.	BASELINE STATION	OFFSET	SIDE	DESCRIPTION	NORTHING	EASTING
Waterline 1						
100	300+00.00	0.0'	CL	Begin, 45° Bend (Restrained), connect to exist. waterline	1,672,528.2429	1,707,654.0050
101	300+20.00	0.0'	CL	Vertical PI	1,672,542.4840	1,707,668.0475
102	300+32.93	0.0'	CL	45° Bend (Restrained)	1,672,551.6893	1,707,677.1244
103	301+00.00	0.0'	CL	Vertical PI	1,672,618.7598	1,707,676.6533
104	302+27.00	0.0'	CL	Vertical PI and 1" Air Release	1,672,745.7567	1,707,675.7613
105	306+54.00	0.0'	CL	Vertical PI	1,673,172.7462	1,707,672.7622
106	309+59.00	0.0'	CL	Vertical PI	1,673,477.7386	1,707,670.6199
107	309+74.23	0.0'	CL	22.5° Bend (Restrained)	1,673,492.9648	1,707,670.5130
108	309+96.48	0.0'	CL	22.5° Bend (Restrained)	1,673,513.5842	1,707,678.8846
109	310+03.00	0.0'	CL	Vertical PI	1,673,520.1034	1,707,678.8388
110	310+08.06	0.0'	CL	12" x 12" Tee Fitting and Vertical PI	1,673,525.1593	1,707,678.8033
111	310+35.00	0.0'	CL	Begin Directional Drill	1,673,552.1026	1,707,678.6141
112	310+90.00	0.0'	CL	End Directional Drill	1,673,607.1013	1,707,678.2278
113	311+21.98	0.0'	CL	12" x 12" Tee Fitting and Vertical PI	1,673,639.0786	1,707,678.0031
114	311+25.89	0.0'	CL	33.75° Bend (Restrained)	1,673,642.9916	1,707,677.9757
115	311+27.00	0.0'	CL	Vertical PI	1,673,643.9165	1,707,677.3641
116	311+78.77	0.0'	CL	33.75° Bend (Restrained)	1,673,687.1010	1,707,648.8099
117	319+89.85	0.0'	CL	12" x 8" Tee Fitting and Vertical PI	1,674,498.0943	1,707,636.8272
118	325+00.00	0.0'	CL	Vertical PI	1,675,008.1857	1,707,629.2904
119	328+00.00	0.0'	CL	Vertical PI	1,675,308.1530	1,707,624.8583
120	328+88.00	0.0'	CL	Vertical PI	1,675,396.1434	1,707,623.5582
121	330+01.81	0.0'	CL	45° Bend (Restrained)	1,675,509.9399	1,707,621.8768
122	330+13.97	0.0'	CL	End, 45° Bend (Restrained), connect to exist. waterline	1,675,518.4135	1,707,613.1491
Waterline 2						
200	400+00.00	0.0'	CL	Begin, connect to 12" x 12" Tee Fitting Line 1.	1,673,525.1593	1,707,678.8033
201	400+12.00	0.0'	CL	Fire Hydrant Assy.	1,673,525.2436	1,707,690.8030
202	400+24.00	0.0'	CL	22.5° Bend (Restrained) and Vertical PI	1,673,525.3279	1,707,702.8027
203	400+41.93	0.0'	CL	22.5° Bend (Restrained)	1,673,532.4101	1,707,719.2801
204	401+68.00	0.0'	CL	Vertical PI	1,673,534.0790	1,707,845.3341
205	404+17.73	0.0'	CL	End, connect to exist. waterline	1,673,537.3852	1,708,095.0457
Waterline 3						
300	500+00.00	0.0'	CL	Begin, 22.5° Bend (Restrained), connect to exist. waterline	1,673,642.0880	1,707,523.0862
301	500+10.71	0.0'	CL	22.5° Bend	1,673,638.0602	1,707,533.0067
302	500+30.00	0.0'	CL	Begin Directional Drill	1,673,638.1957	1,707,552.2993
303	501+10.00	0.0'	CL	End Directional Drill	1,673,638.7576	1,707,632.2993
304	501+17.22	0.0'	CL	Vertical 45° Bend (Restrained)	1,673,638.8083	1,707,639.5171
305	501+20.03	0.0'	CL	Vertical 45° Bend (Restrained)	1,673,638.8280	1,707,642.3270
306	501+51.70	0.0'	CL	16" x 12" Reducer	1,673,639.0505	1,707,673.9963
307	501+55.71	0.0'	CL	End, 12" Valve connect to 12" x 12" Tee Fitting Line 1	1,673,639.0786	1,707,678.0031
Waterline 4						
400	600+00.00	0.0'	CL	Begin, 22.5° Bend, connect to exist. waterline	1,674,500.9799	1,707,515.9959
401	600+12.20	0.0'	CL	22.5° Bend (Restrained)	1,674,496.4765	1,707,527.3391
402	600+24.00	0.0'	CL	Begin Directional Drill	1,674,496.6508	1,707,539.1334
403	601+04.00	0.0'	CL	End Directional Drill	1,674,497.8327	1,707,619.1247
404	601+11.29	0.0'	CL	Vertical 45° Bend (Restrained)	1,674,497.9404	1,707,626.4139
405	601+14.67	0.0'	CL	Vertical 45° Bend (Restrained)	1,674,497.9903	1,707,629.7935
406	601+21.70	0.0'	CL	End, 8" Valve connect to 12" x 8" Tee Fitting Line 1	1,674,498.0943	1,707,636.8272

SUMMARY OF WATERLINE ITEMS
(For Information Only)

WATERLINE NO.	PIPE 12" WL L.F.	PIPE 8" WL RESTRAINED L.F.	Ø BORED 8" WL L.F.	PIPE 12" WL RESTRAINED L.F.	Ø BORED 12" WL L.F.	PIPE 16" WL RESTRAINED L.F.	BORED 16" WL L.F.	8" CAP EA.	12" CAP EA.	16" CAP EA.	8" VALVE ASSEMBLY ANCHORED EA.	12" VALVE ASSEMBLY ANCHORED EA.	FIRE HYDRANT ASSEMBLY EA.	REMOVE FH ASSEMBLY EA.	1" AIR RELEASE ASSEMBLY
Line 1	2,900.1	-	-	58.9	55.0	-	-	-	2	-	1	5	-	-	1
Line 2	417.7	-	-	-	-	-	-	-	1	-	-	-	1	1	-
Line 3	-	-	-	-	-	75.7	80.0	-	-	1	-	-	-	-	-
Line 4	-	41.7	80.0	-	-	-	-	1	-	-	-	-	-	-	-
Total	3,317.8	41.7	80.0	58.9	55.0	75.7	80.0	1	3	1	1	5	1	1	1

Ø All Bored Pipe will be restrained.
All pipe 11.00 LF or less in length shall be DICL, longer pipe may be PVC..

FIRE HYDRANTS REQUIRED

STATION	BURY LINE ELEVATION	TOP OF PIPE ELEVATION	FIRE HYDRANT BURY REQUIRED †	VALVE STEM EXT. REQUIRED (ft) †
400+12.00	1,320.01	1,314.79	6.0'	1.0'

† For Details See Sheet 188 (WL-101)

WATER SYSTEM BILL OF MATERIALS

BID ITEM	QUANTITY	UNIT
NASP C900/905 RJ 8" Waterline (Restrained)	42	LF
NASP C900/905 RJIB 8" Waterline Bored	80	LF
Vinylplex C900-07 12" Waterline	3,318	LF
NASP C900/905 RJ 12" Waterline (Restrained)	79	LF
NASP C900/905 RJIB 12" Waterline Bored	55	LF
NASP C900/905 RJ 16" Waterline (Restrained)	76	LF
NASP C900/905 RJIB 16" Waterline Bored	80	LF
CLOW 2638 8" Anchored Valve Assembly	1	EA
M&H Valve Co. 4500 12" Anchored Valve Assembly	5	EA
CLOW 2545 Fire Hydrant Assembly	1	EA
Fire Hydrant Assembly (Removed)	1	EA
Air Release Assembly	1	EA
8" Pipe Cut and Cap	1	EA
12" Pipe Cut and Cap	3	EA
16" Pipe Cut and Cap	1	EA
Pipe Removed	55	LF

UTILITY OWNERS

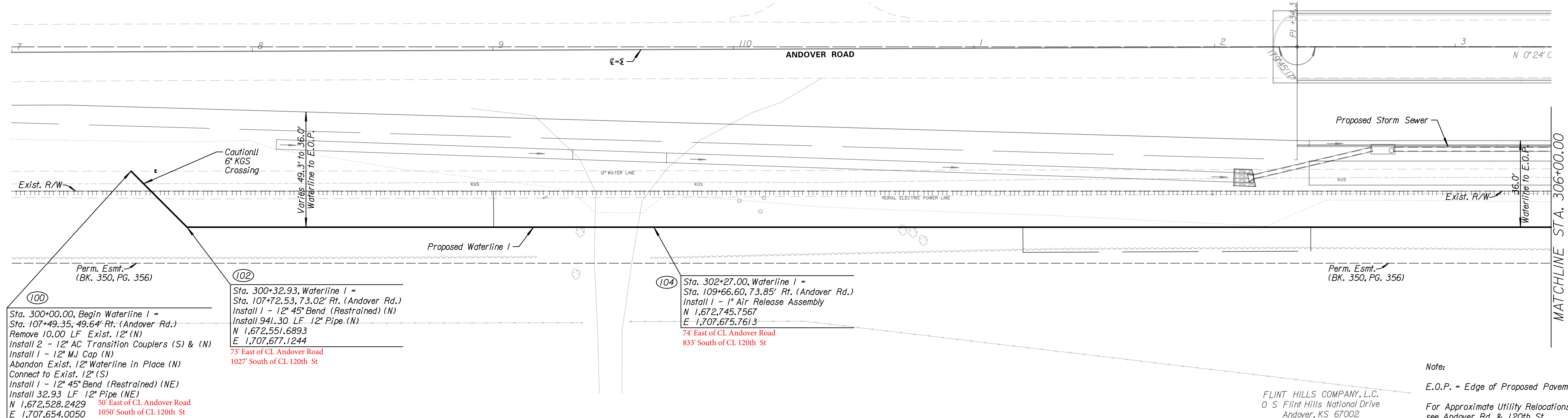
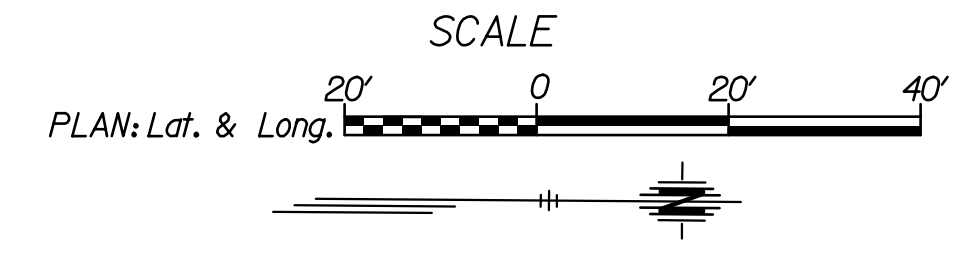
City of Andover Steve Anderson Asst. Public Works Director 1609 E. Central Ave. Andover, KS 67002 (316) 733-1303 Water, Storm, Sewer	City of Wichita Water Dept. Greg Lolley 455 N. Main Wichita, KS 67202 (316) 268-4334 Water Main	Oneok - Kansas Gas Service Jim Coe 1021 E. 26th St. Wichita, KS 67219 (316) 832-3126 Gas
City of Andover Bill Braitsch Street Superintendent 1609 E. Central Ave. Andover, KS 67002 (316) 733-8290 (316) 239-8041 (cell)	Butler County RWD #5 Terry Brown 700 N. Main Benton, KS 67017 (316) 461-9427 Water	Westar Energy Shane Price 1900 E. Central Wichita, KS 67201 (316) 261-6315 Electrical
City of Andover Brian Walls 1609 E. Central Ave. Andover, KS 67002 (316) 733-2621 Sanitary Sewer	AT&T Jason Edwards 154 N. Broadway Room 210 Wichita, KS 67202 (316) 268-2008 Telephone, Fiber Optic	Butler County Rural Electric Doug Veatch 216 S. Main Street El Dorado, KS 67042 (316) 321-9600 Electrical
	Cox Communications Pat Roth 901 George Washington Blvd. Wichita, KS 67211 (316) 260-7170 Cable Television	

Utility Notes:

Visual indications of utilities are as shown. Underground locations shown, as furnished by their lessors, are approximate and should be verified in the field at the time of construction. For actual field locations of underground utilities, call 1-800-344-7233. Verification of utilities is the Contractor's responsibility.



STATE	PROJECT NO.	YEAR	SHEET NO.	TOTAL SHEETS
KANSAS	8 N-0635-01	2017	181	265



DATE	
BY	
REFERENCES NOTED	
REFERENCES CHECKED	

100

Sta. 300+00.00, Begin Waterline I = Sta. 107+49.35, 49.64' Rt. (Andover Rd.)
 Remove 10.00 LF Exist. 12" (N)
 Install 2 - 12" AC Transition Couplers (S) & (N)
 Install 1 - 12" MJ Cap (N)
 Abandon Exist. 12" Waterline in Place (N)
 Connect to Exist. 12" (S)
 Install 1 - 12" 45° Bend (Restrained) (NE)
 Install 32.93 LF 12" Pipe (NE)
 N 1,672,528.2429 50' East of CL Andover Road
 E 1,707,654.0050 1050' South of CL 120th St

Perm. Esmt. (BK. 350, PG. 356)

102

Sta. 300+32.93, Waterline I = Sta. 107+72.53, 73.02' Rt. (Andover Rd.)
 Install 1 - 12" 45° Bend (Restrained) (N)
 Install 941.30 LF 12" Pipe (N)
 N 1,672,551.6893
 E 1,707,677.1244
 73' East of CL Andover Road
 1027' South of CL 120th St

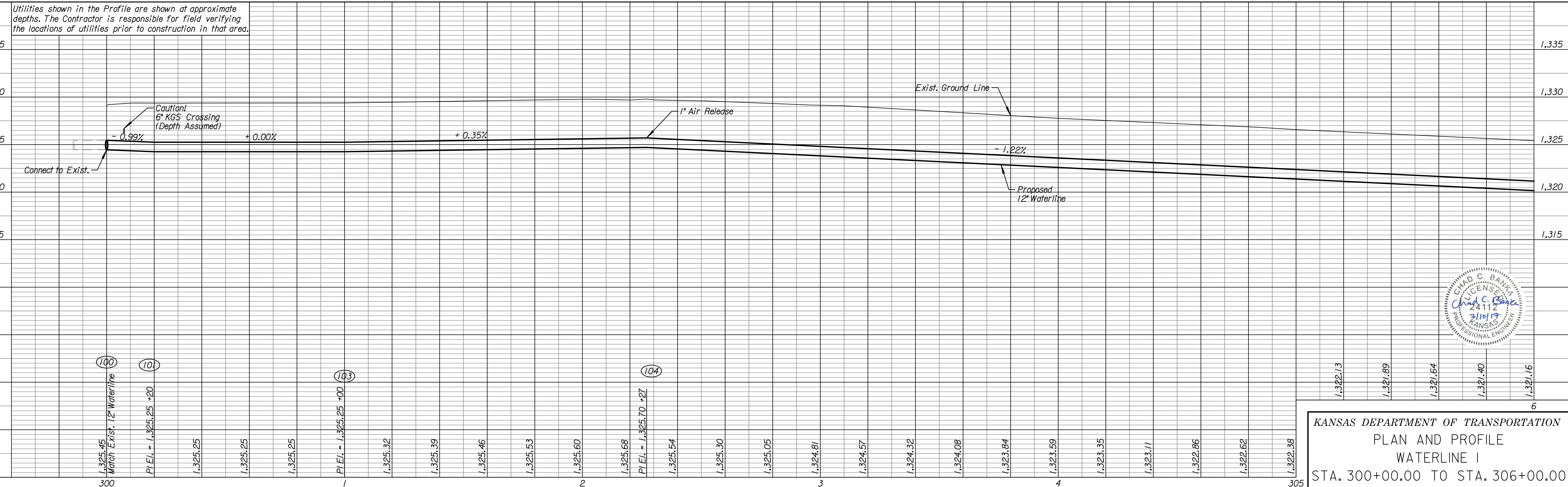
104

Sta. 302+27.00, Waterline I = Sta. 109+66.60, 73.85' Rt. (Andover Rd.)
 Install 1 - 1" Air Release Assembly
 N 1,672,745.7567
 E 1,707,675.7613
 74' East of CL Andover Road
 833' South of CL 120th St

Perm. Esmt. (BK. 350, PG. 356)

Note:
 E.O.P. = Edge of Proposed Pavement
 For Approximate Utility Relocations see Andover Rd. & 120th St. Utility Information Sheets 35-39

FLINT HILLS COMPANY, L.C.
 0 S Flint Hills National Drive
 Andover, KS 67002



Utilities shown in the Profile are shown at approximate depths. The Contractor is responsible for field verifying the locations of utilities prior to construction in that area.

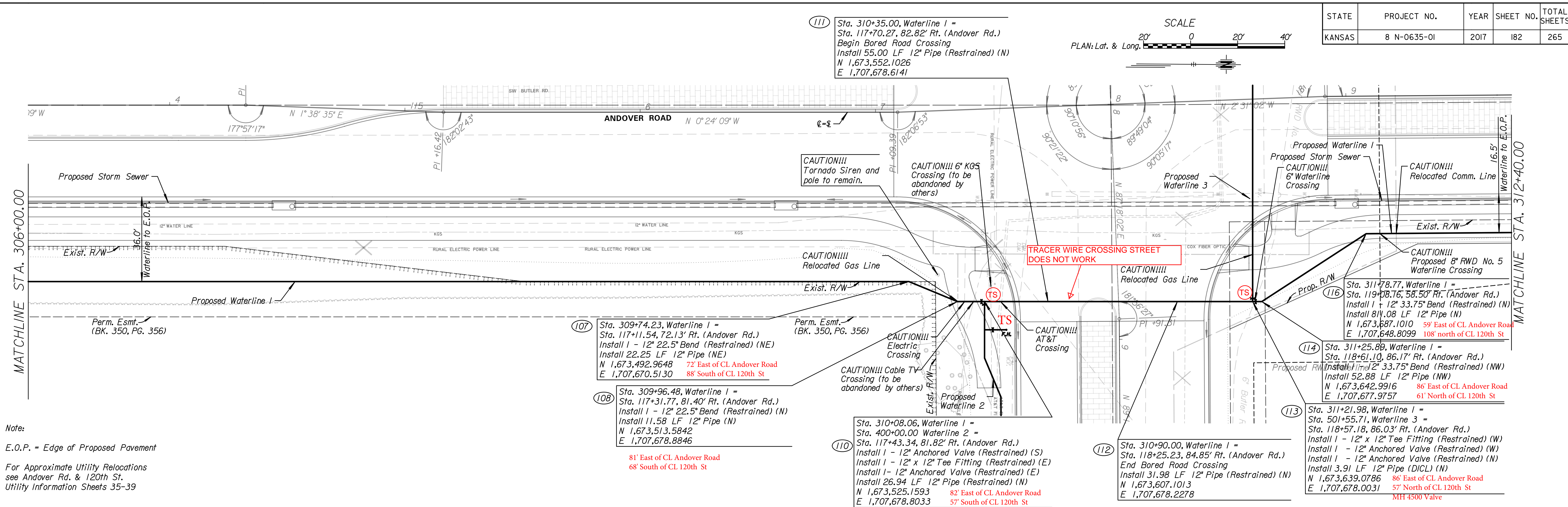
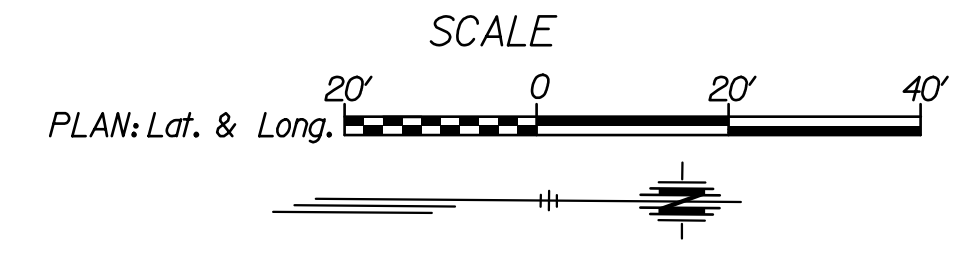
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 Plotted : 9/14/2017



KANSAS DEPARTMENT OF TRANSPORTATION
 PLAN AND PROFILE
 WATERLINE I
 STA. 300+00.00 TO STA. 306+00.00

MATCHLINE STA. 306+00.00

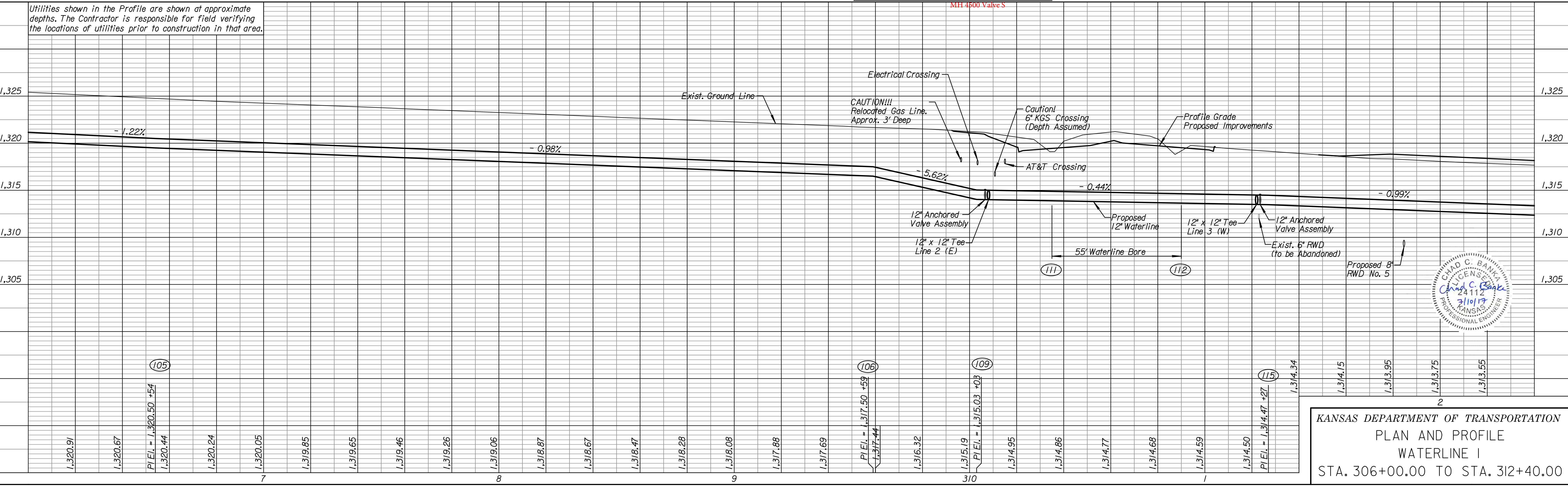
STATE	PROJECT NO.	YEAR	SHEET NO.	TOTAL SHEETS
KANSAS	8 N-0635-01	2017	182	265



DATE	BY

Note:
 E.O.P. = Edge of Proposed Pavement
 For Approximate Utility Relocations
 see Andover Rd. & 120th St.
 Utility Information Sheets 35-39

- (107) Sta. 309+74.23, Waterline 1 = Sta. 117+11.54, 72.13' Rt. (Andover Rd.)
 Install 1 - 12" 22.5" Bend (Restrained) (NE)
 Install 22.25 LF 12" Pipe (NE)
 N 1,673,492.9648 72' East of CL Andover Road
 E 1,707,670.5130 88' South of CL 120th St
- (108) Sta. 309+96.48, Waterline 1 = Sta. 117+31.77, 81.40' Rt. (Andover Rd.)
 Install 1 - 12" 22.5" Bend (Restrained) (N)
 Install 11.58 LF 12" Pipe (N)
 N 1,673,513.5842
 E 1,707,678.8846
 81' East of CL Andover Road
 68' South of CL 120th St
- (109) Sta. 310+08.06, Waterline 1 = Sta. 400+00.00 Waterline 2 = Sta. 117+43.34, 81.82' Rt. (Andover Rd.)
 Install 1 - 12" Anchored Valve (Restrained) (S)
 Install 1 - 12" x 12" Tee Fitting (Restrained) (E)
 Install 1 - 12" Anchored Valve (Restrained) (E)
 Install 26.94 LF 12" Pipe (Restrained) (N)
 N 1,673,525.1593 82' East of CL Andover Road
 E 1,707,678.8033 57' South of CL 120th St
 MH 4500 Valve S
- (110) Sta. 310+90.00, Waterline 1 = Sta. 118+25.23, 84.85' Rt. (Andover Rd.)
 End Bored Road Crossing
 Install 31.98 LF 12" Pipe (Restrained) (N)
 N 1,673,607.1013
 E 1,707,678.2278
- (111) Sta. 310+35.00, Waterline 1 = Sta. 117+70.27, 82.82' Rt. (Andover Rd.)
 Begin Bored Road Crossing
 Install 55.00 LF 12" Pipe (Restrained) (N)
 N 1,673,552.1026
 E 1,707,678.6141
- (112) Sta. 311+21.98, Waterline 1 = Sta. 501+55.71, Waterline 3 = Sta. 118+57.18, 86.03' Rt. (Andover Rd.)
 Install 1 - 12" x 12" Tee Fitting (Restrained) (W)
 Install 1 - 12" Anchored Valve (Restrained) (W)
 Install 1 - 12" Anchored Valve (Restrained) (N)
 Install 3.91 LF 12" Pipe (D/C/L) (N)
 N 1,673,639.0786 86' East of CL Andover Road
 E 1,707,678.0031 57' North of CL 120th St
 MH 4500 Valve
- (113) Sta. 311+25.80, Waterline 1 = Sta. 118+61.10, 86.17' Rt. (Andover Rd.)
 Install 1 - 12" 33.75" Bend (Restrained) (NW)
 Install 52.88 LF 12" Pipe (NW)
 N 1,673,642.9916 86' East of CL Andover Road
 E 1,707,677.9757 61' North of CL 120th St
- (114) Sta. 311+78.77, Waterline 1 = Sta. 119+08.76, 58.50' Rt. (Andover Rd.)
 Install 1 - 12" 33.75" Bend (Restrained) (N)
 Install 814.08 LF 12" Pipe (N)
 N 1,673,687.1010 59' East of CL Andover Road
 E 1,707,648.8099 108' North of CL 120th St
- (115) Sta. 311+78.77, Waterline 1 = Sta. 119+08.76, 58.50' Rt. (Andover Rd.)
 Install 1 - 12" 33.75" Bend (Restrained) (N)
 Install 814.08 LF 12" Pipe (N)
 N 1,673,687.1010 59' East of CL Andover Road
 E 1,707,648.8099 108' North of CL 120th St

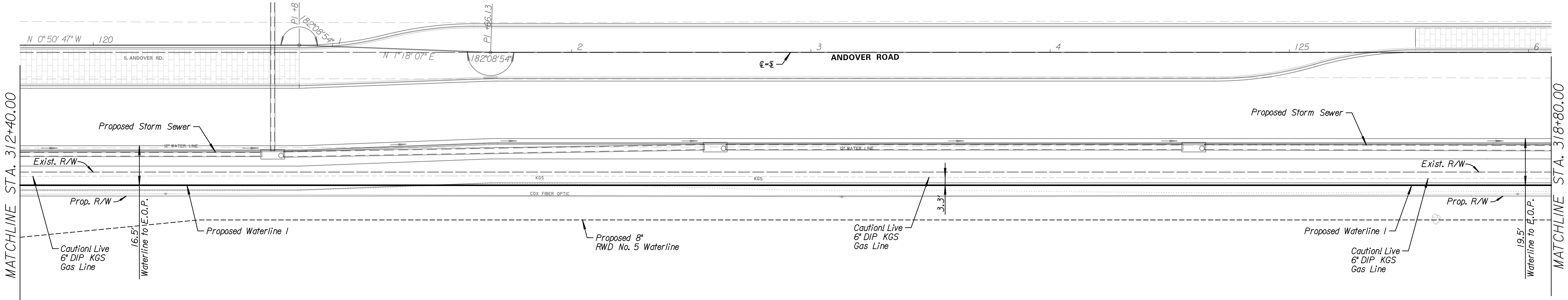
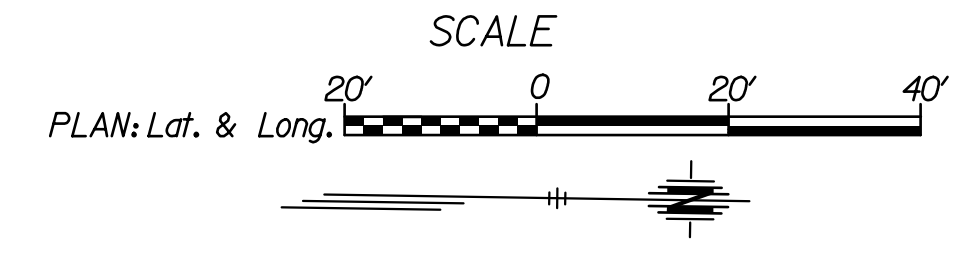


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KANSAS DEPARTMENT OF TRANSPORTATION
 PLAN AND PROFILE
 WATERLINE 1
 STA. 306+00.00 TO STA. 312+40.00



STATE	PROJECT NO.	YEAR	SHEET NO.	TOTAL SHEETS
KANSAS	8 N-0635-01	2017	183	265



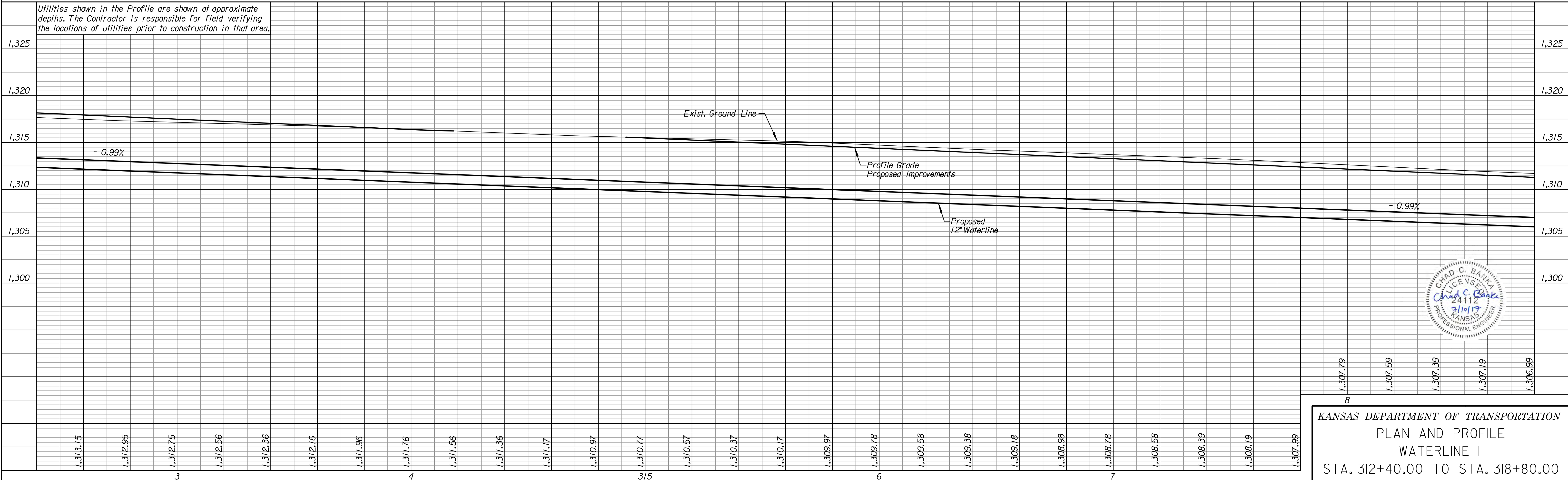
DATE	
BY	
REFERENCES NOTED	
REFERENCES CHECKED	

Taylor Enterprises, Inc.
0 SW 120th Street
Andover, KS 67002

Taylor Enterprises, Inc.
0 SW 120th Street
Andover, KS 67002

Note:
E.O.P. = Edge of Proposed Pavement
For Approximate Utility Relocations
see Andover Rd. & 120th St.
Utility Information Sheets 35-39

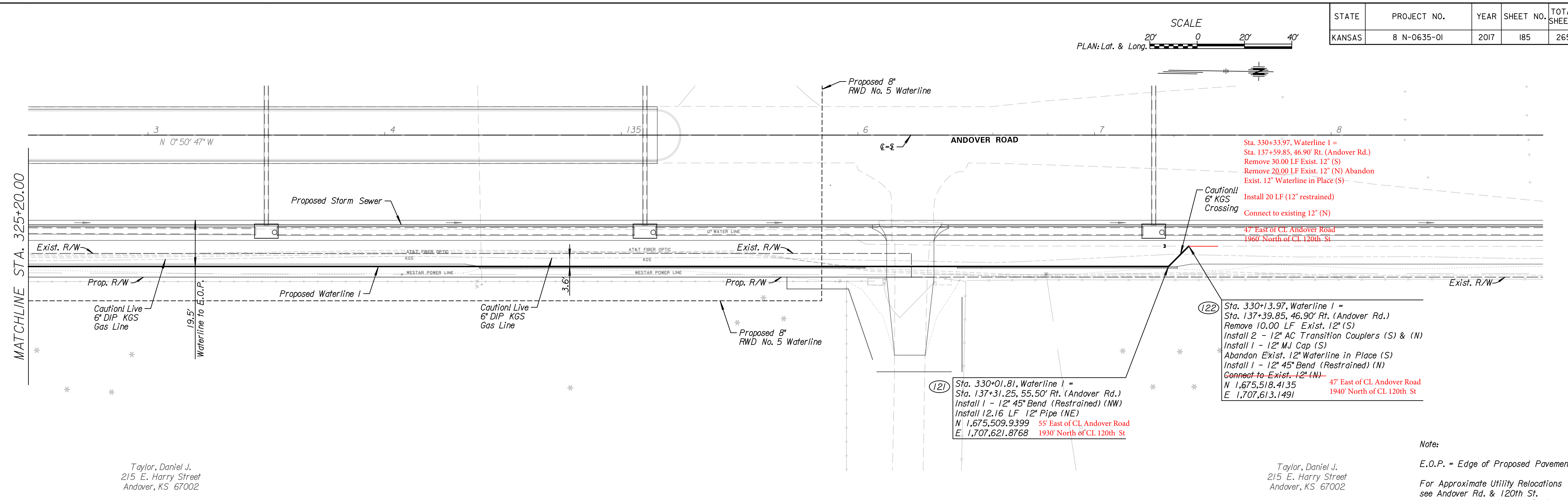
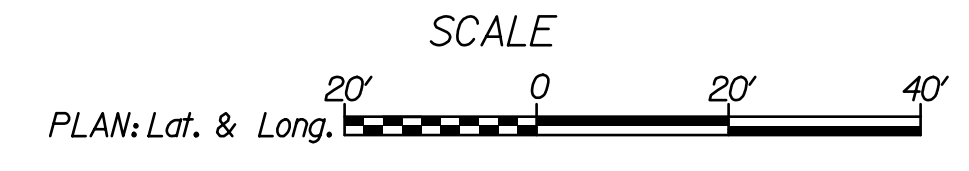
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KANSAS DEPARTMENT OF TRANSPORTATION
PLAN AND PROFILE
WATERLINE I
STA. 312+40.00 TO STA. 318+80.00

Drawn By : examples
Plotted : 9/14/2017
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STATE	PROJECT NO.	YEAR	SHEET NO.	TOTAL SHEETS
KANSAS	8 N-0635-01	2017	185	265



Sta. 330+33.97, Waterline I =
Sta. 137+59.85, 46.90' Rt. (Andover Rd.)
Remove 30.00 LF Exist. 12" (S)
Remove 20.00 LF Exist. 12" (N) Abandon
Exist. 12" Waterline in Place (S)
Install 20 LF (12" restrained)
Connect to existing 12" (N)

(122) Sta. 330+13.97, Waterline I =
Sta. 137+39.85, 46.90' Rt. (Andover Rd.)
Remove 10.00 LF Exist. 12" (S)
Install 2 - 12" AC Transition Couplers (S) & (N)
Install 1 - 12" MJ Cap (S)
Abandon Exist. 12" Waterline in Place (S)
Install 1 - 12" 45° Bend (Restrained) (N)
~~Connect to Exist. 12" (N)~~
N 1,675,518.4135 47' East of CL Andover Road
E 1,707,613.1491 1940' North of CL 120th St

(121) Sta. 330+01.81, Waterline I =
Sta. 137+31.25, 55.50' Rt. (Andover Rd.)
Install 1 - 12" 45° Bend (Restrained) (NW)
Install 12.16 LF 12" Pipe (NE)
N 1,675,509.9399 55' East of CL Andover Road
E 1,707,621.8768 1930' North of CL 120th St

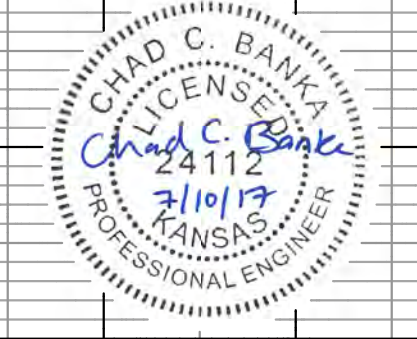
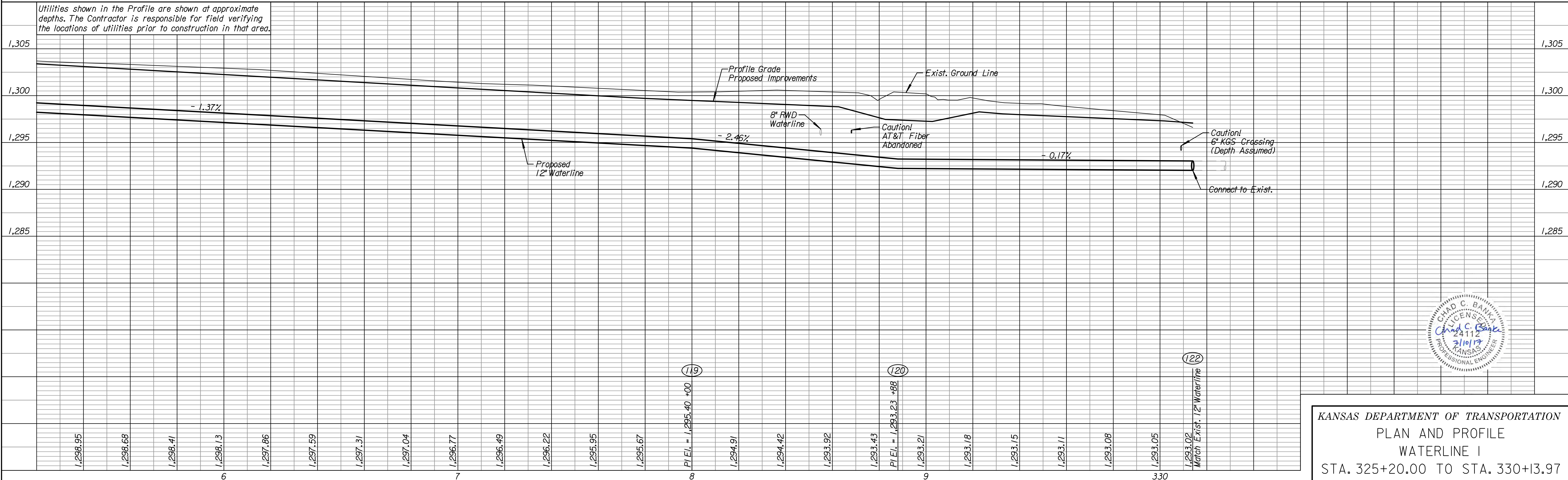
Taylor, Daniel J.
215 E. Harry Street
Andover, KS 67002

Taylor, Daniel J.
215 E. Harry Street
Andover, KS 67002

Note:
E.O.P. = Edge of Proposed Pavement
For Approximate Utility Relocations
see Andover Rd. & 120th St.
Utility Information Sheets 35-39

DATE	BY	REFERENCES NOTED	REFERENCES CHECKED

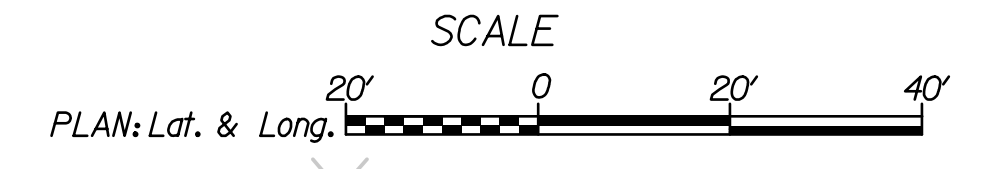
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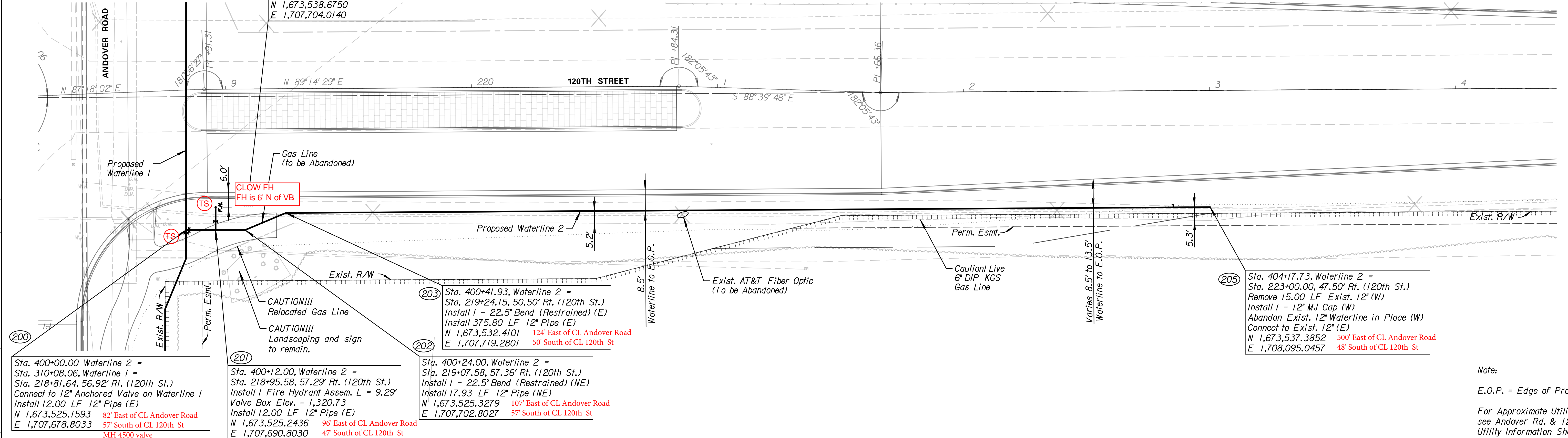
KANSAS DEPARTMENT OF TRANSPORTATION
PLAN AND PROFILE
WATERLINE I
STA. 325+20.00 TO STA. 330+13.97

Drawn By : examples
Plotted : 9/14/2017
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STATE	PROJECT NO.	YEAR	SHEET NO.	TOTAL SHEETS
KANSAS	8 N-0635-01	2017	186	265



Sta. 400+30.38, 11.78' Lt. Waterline 2 =
 Sta. 219+08.96, 44.03' Rt. (120th St.)
 Remove Exist. Fire Hydrant Assem.
 Return to City of Andover Shop Building
 1606 N Andover Road, Andover KS
 Install 1 - 6" MJ Cap (N)
 Abandon Exist. 12" Waterline in Place (W & E)
 N 1,673,538.6750
 E 1,707,704.0140



Sta. 400+00.00 Waterline 2 =
 Sta. 310+08.06, Waterline 1 =
 Sta. 218+81.64, 56.92' Rt. (120th St.)
 Connect to 12" Anchored Valve on Waterline 1
 Install 12.00 LF 12" Pipe (E)
 N 1,673,525.1593 82' East of CL Andover Road
 E 1,707,678.8033 57' South of CL 120th St
 MH 4500 valve

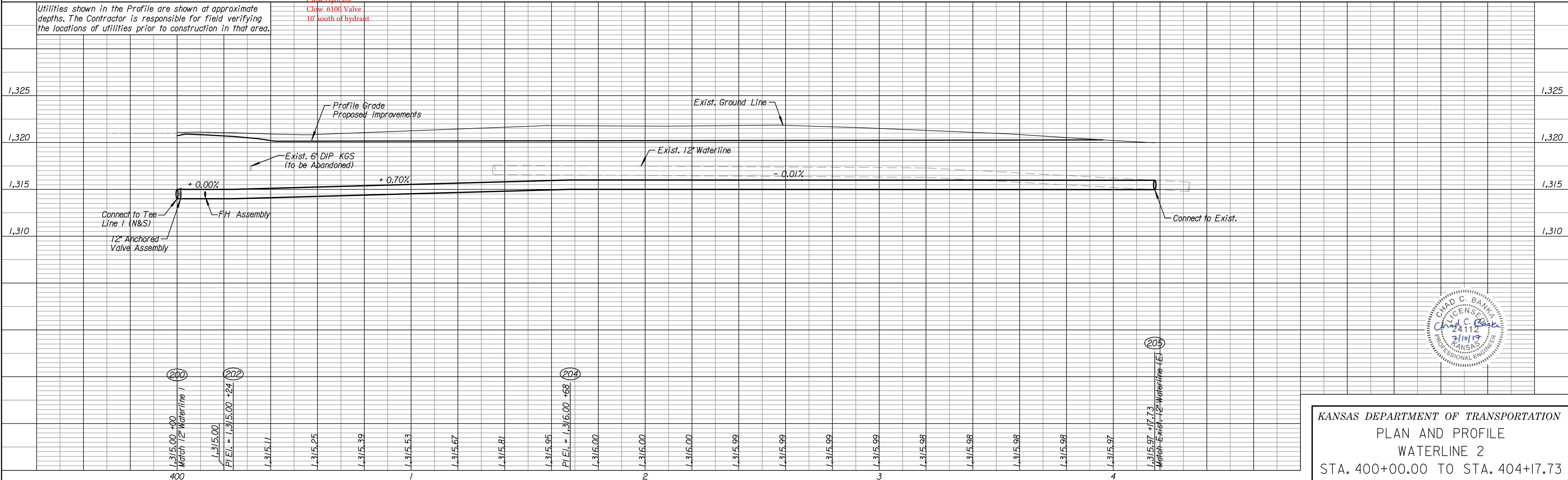
Sta. 400+12.00, Waterline 2 =
 Sta. 218+95.58, 57.29' Rt. (120th St.)
 Install 1 Fire Hydrant Assem. L = 9.29'
 Valve Box Elev. = 1,320.73
 Install 12.00 LF 12" Pipe (E)
 N 1,673,525.2436 96' East of CL Andover Road
 E 1,707,690.8030 47' South of CL 120th St

Sta. 400+24.00, Waterline 2 =
 Sta. 219+07.58, 57.36' Rt. (120th St.)
 Install 1 - 22.5" Bend (Restrained) (NE)
 Install 17.93 LF 12" Pipe (NE)
 N 1,673,525.3279 107' East of CL Andover Road
 E 1,707,702.8027 57' South of CL 120th St

Sta. 404+17.73, Waterline 2 =
 Sta. 223+00.00, 47.50' Rt. (120th St.)
 Remove 15.00 LF Exist. 12" (W)
 Install 1 - 12" MJ Cap (W)
 Abandon Exist. 12" Waterline in Place (W)
 Connect to Exist. 12" (E)
 N 1,673,537.3852 500' East of CL Andover Road
 E 1,708,095.0457 48' South of CL 120th St

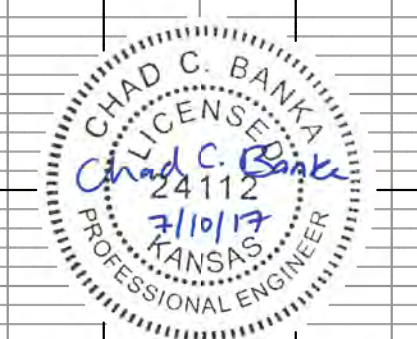
Note:
 E.O.P. = Edge of Proposed Pavement
 For Approximate Utility Relocations
 see Andover Rd. & 120th St.
 Utility Information Sheets 35-39

Utilities shown in the Profile are shown at approximate depths. The Contractor is responsible for field verifying the locations of utilities prior to construction in that area.



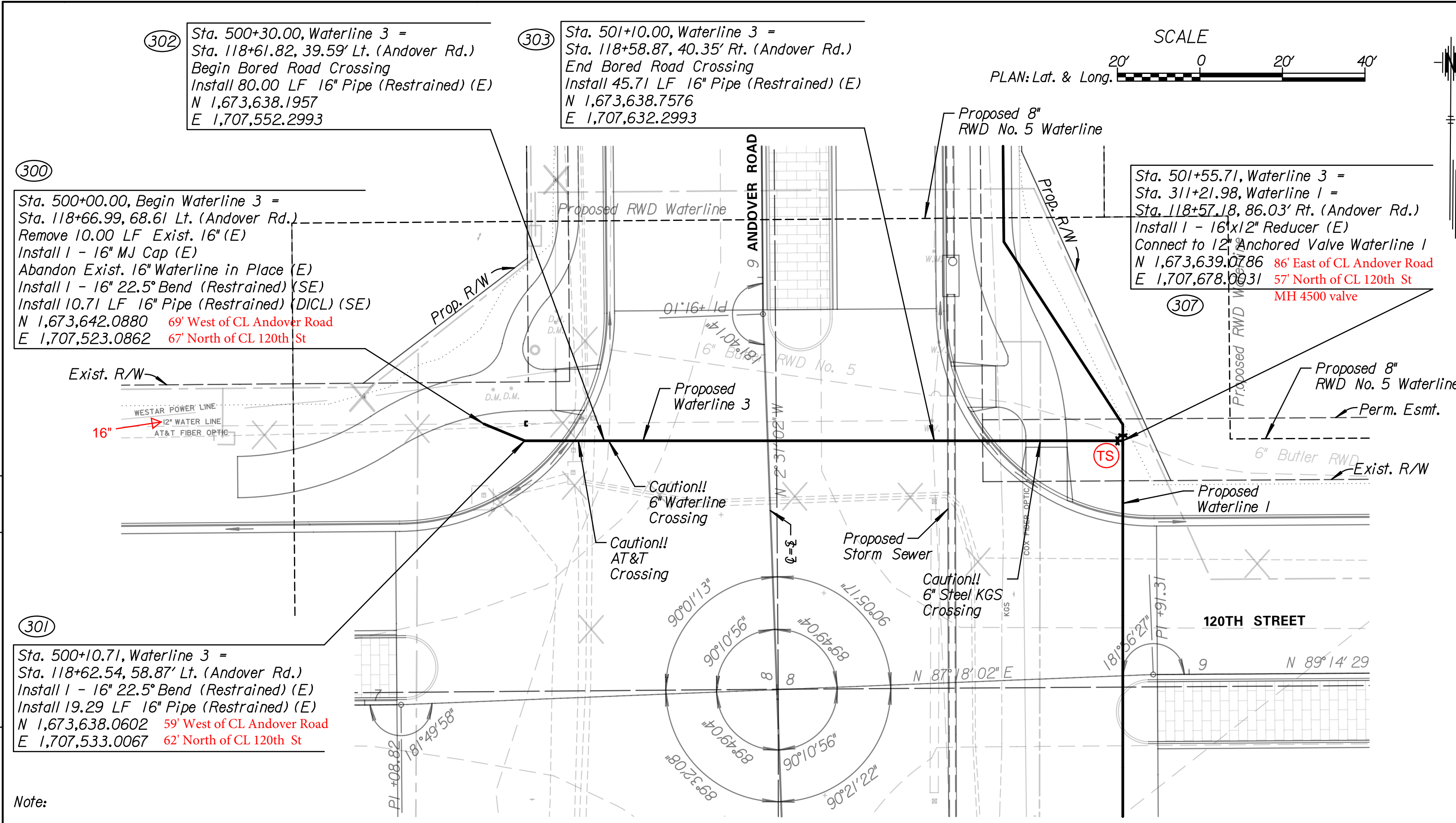
DATE	
BY	
REFERENCES NOTED	
REFERENCES CHECKED	

Drawn By : examples
 Plotted : 9/14/2017
 File : c:\transystems\pw_local\transyscorp-pw\ccbank\id0196556\C-WTR-M02-101.dgn

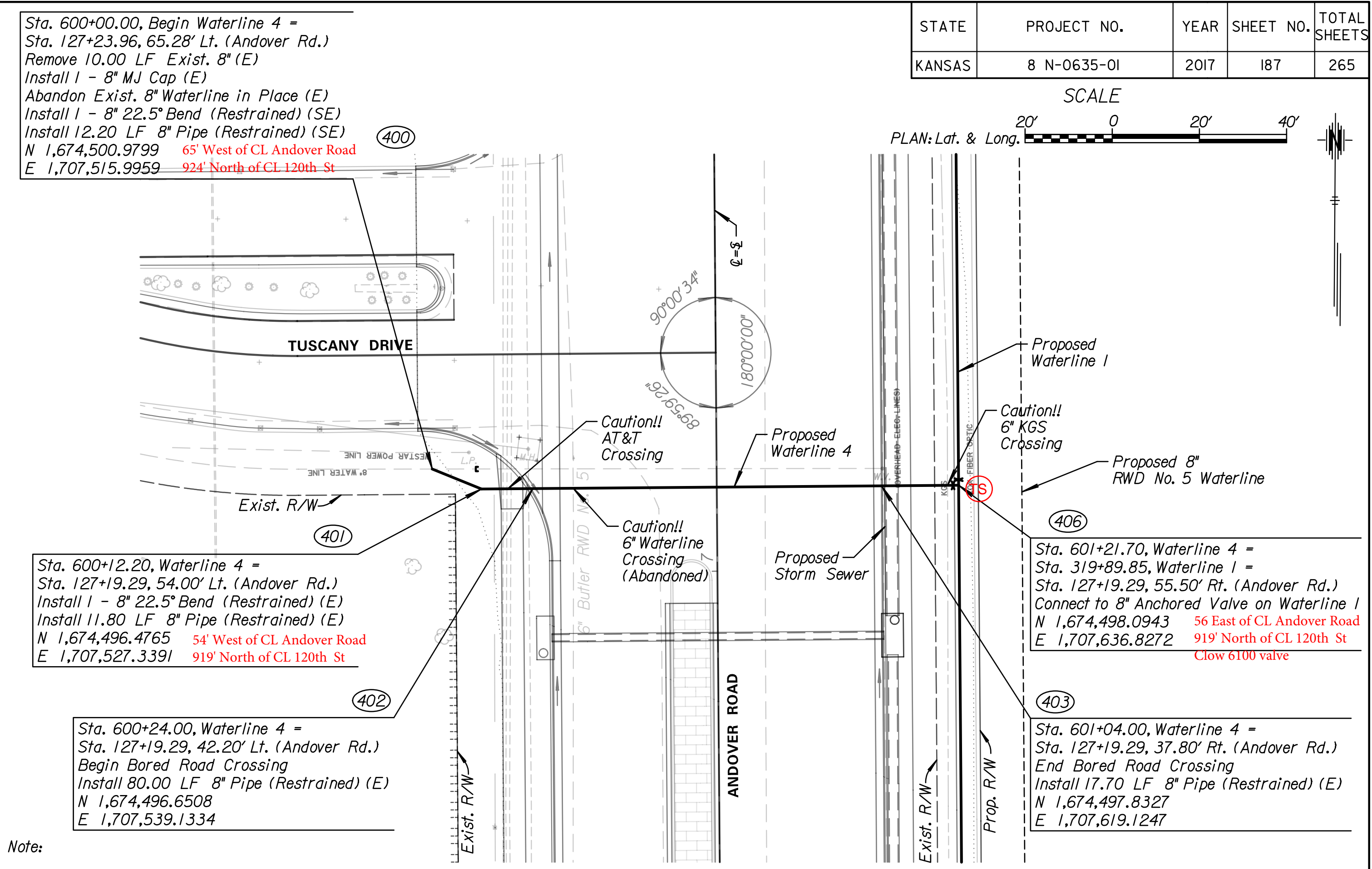


KANSAS DEPARTMENT OF TRANSPORTATION
 PLAN AND PROFILE
 WATERLINE 2
 STA. 400+00.00 TO STA. 404+17.73

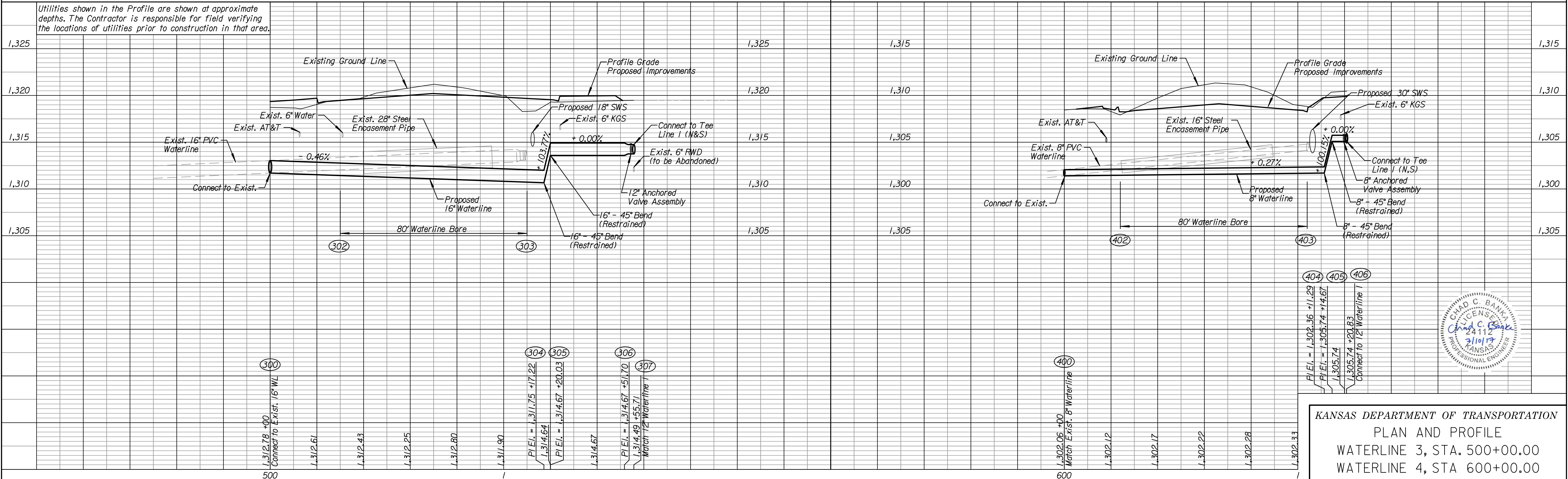
STATE	PROJECT NO.	YEAR	SHEET NO.	TOTAL SHEETS
KANSAS	8 N-0635-01	2017	187	265



Note:
For Approximate Utility Relocations
see Andover Rd. & 120th St.
Utility Information Sheets 35-39



Note:
For Approximate Utility Relocations
see Andover Rd. & 120th St.
Utility Information Sheets 35-39



Utilities shown in the Profile are shown at approximate depths. The Contractor is responsible for field verifying the locations of utilities prior to construction in that area.

Drawn By: examples
File: c:\transystems\pw_local\transyscorp-pw\cobbank\0196556\C-WTR-M03-101.dgn
Plotted: 9/14/2017

KANSAS DEPARTMENT OF TRANSPORTATION
PLAN AND PROFILE
WATERLINE 3, STA. 500+00.00
WATERLINE 4, STA. 600+00.00

