City of Fort Lupton

City Council Agenda
Regular Meeting
May 19, 2020
7:00 p.m.
130 South McKinley Avenue

Remote Meeting Instructions
To join the meeting from your computer, tablet or smartphone:
https://global.gotomeeting.com/join/623516477
To join the meeting by phone:
United States (Toll Free): 1 866 899 4679
United States: +1 (312) 757-3117
Access Code: 623-516-477
Additional Instructions for the Virtual Meeting can be found at the end of this Agenda.

Pledge Of Allegiance

Call To Order - Roll Call

Persons To Address Council

This portion of the Agenda is provided to allow members of the audience to present comments to the City Council. The City Council may not respond to your comments this evening, rather they may take your comments and suggestions under advisement or your question may be directed to the appropriate staff member for follow-up. Please limit the time of your comments to three (3) minutes - Mayor Stieber

Approval Of Agenda

Review Of Accounts Payables

a. **05192020 Accounts Payable**

Documents:

05192020 Accounts Payable.pdf

Consent Agenda

Consent Agenda items are considered to be routine and will be enacted by one motion and vote. There will be no separate discussion of Consent Agenda items unless a Councilmember so requests, in which case the item may be removed/moved from the

Consent Agenda.

a. **05052020 City Council Meeting Minutes**

Documents:

05052020 City Council Meeting Minutes.pdf

b. **Second Reading Ordinance 2020-1083 Adopting An Ordinance Annexing Land Legally Described In Exhibit "A" Known As The C&M Rodriguez Annexation Nos. 1-5 And Approving The Annexation Agreement**

Documents:

Second Reading Ordinance 2020-1083 CM Rodriguez Annexation.pdf

c. **Second Reading Ordinance 2020-1084 Adopt An Ordinance Initially Zoning Land Known As The C&M Rodriguez Initial Zoning, Legally Described In Exhibit A, To The 'C-2' Heavy Industrial Zone District**

Documents:

Second Reading Ordinance 2020-1084 CM Rodriguez Initial Zoning.pdf

d. **Second Reading Ordinance 2020-1085 An Ordinance Accepting The Kurt W. Conner Family Trust And Fort Lupton Fire Protection District Public Right Of Way Dedication For 9th Street**

Documents:

Second Reading Ordinance 2020-1085 9thSt ROW Dedication.pdf

e. **Second Reading 2020-1086 An Ordinance Accepting The Kurt W. Conner Family Trust Public Right Of Way Dedication For County Road 31**

Documents:

Second Reading Ordinance 2020-1086 County Road 31 ROW Dedication.pdf

Action Memorandum

a. **AM 2020-099 A Resolution Approving The Cottonwood Greens Final PUD Development Plan And Final Plat For Filing Nos. 1 - 3 Submitted By Arbor Capital Partners, LLC To Create A Residential Subdivision**

Documents:

AM 2020-099 A Resolution Approving The Cottonwood Greens Final PUD Development Plan And Final Plat For Filing Nos 1-3 .Pdf
2020Rxxx Cottonwood Greens PUD Final Plat - Filing No. 1 - 3.Pdf
Cottonwood Greens Staff Report.pdf
Land Use Application.pdf
Withdrawal Letter For Filing Nos. 4 And 5.Pdf
Filing Plat Filing 1.Pdf
Final Plat Filing 2.Pdf
Final Plat Filing 3.Pdf
Layout Revisions Exhibit.pdf
Landscape And Phasing Plan.pdf
Development Guide.pdf
Phase III Drainage Report.pdf
Geotechnical Investigation Report.pdf
Preliminary Soils Report.pdf
Construction Documents.pdf
Grading Erosion And Sediment Plans.pdf
Civil Cost Estimate.pdf
Referral Responses.pdf

b. **AM 2020-100 Approve Purchase Of Tractor And Mower For Public Works Streets From High Plains For Not To Exceed $102,353.00 From The General Fund Public Works**

Documents:

AM 2020-100 Approving The Purchase Of Tractor And Mower For Public Works.pdf

c. **AM 2020-101 Escrow Agreement Between The City Of Fort Lupton And Fulton Village Land Developers LLC For Payment Of Cash In Lieu For 65 Lots In Fulton Village PUD Filing 2**

Documents:

AM 2020-101 Escrow Agreement For Payment Of Cash In Lieu For Fulton Village PUD Filing 2.Pdf

Staff Reports

Mayor/Council Reports

Future City Events

a. **05192020 Events And Cancellations**

Documents:

04212020 Upcoming Events.pdf

Adjourn

City Council Remote Meeting Instructions

NOTE: The meeting will be held at City Hall in the Council Chambers. You are welcome to attend in person or remotely through GoToMeetings. For your safety and ours we will be enforcing social distancing. Instructions will be provided prior to the start of the meeting. The meeting will begin promptly at 7:00 p.m.

If you would like to participate remotely, we encourage you to test the phone number and links prior to the start of the meeting. As each device requires initial adjustment.

To participate remotely for the meeting – You can also dial in using your phone.

(For supported devices, tap a one-touch number below to join instantly.)

Call: United States (Toll Free): 1 866 899 4679

- One-touch: tel:+18668994679,,623516477#

United States: +1 (312) 757-3117

- One-touch: Tel:+13127573117,,623516477#

Access Code: 623-516-477

New to GoToMeeting? Get the app now and be ready when your first meeting starts:
Https://Global.gotomeeting.com/Install/623516477

If you have already installed the app, click on the following link:

Https://Global.gotomeeting.com/Join/623516477

Please read the entirety of the procedures listed below for your use.

When calling in, please be sure to mute your microphone on your computer, phone or tablet. City staff and/or the Mayor will provide instructions on when and how comments can be made by the public. Other instructions on meeting conduct will be provided at the start of meeting.

Remote Participation:

Options for Remote Participation

1. **By Telephone:** Members of the public who wish to provide public comment on any item must call:

To participate, dial the following phone number: **1 866-899-4679** or **1 (312) 757-3117**, then there will be a prompt to enter the **Access Code 623-516-477**.

2. **By Electronic Mail**: Members of the public may also provide public comment or comment on a specific item by sending an email to Mpena@Fortluptonco.gov. The email must be received by 6:00 p.m. the day of the meeting. The moderator will read the email to the City Council.

3. **In Person:** To promote social distancing, the lobby at City Hall will have a tablet available to participate electronically if you would like to provide public comment. There will be seating spread six feet apart throughout the lobby while waiting for the opportunity to speak

Check Report

City of Fort Lupton

By Check Number

Date Range: 05/05/2020 - 05/18/2020

Vendor Number / Payable #	Vendor Name / Payable Type	Post Date	Payment Date / Payable Description	Payment Type	Discount Amount / Discount Amount	Payment Amount / Payable Amount	Number
Bank Code: Golf Course-Golf Course							
000567	HIGH COUNTRY BEVERAGE CORP		05/07/2020	Regular	0.00	478.15	83671
W-38648359	Invoice	05/07/2020	GOLF-BEVERAGES-PRO SHOP		0.00	478.15	
001301	AAA AUTO PARTS INC		05/11/2020	Regular	0.00	44.85	83672
84975	Invoice	05/08/2020	GOLF-10W30 OIL-MAINT		0.00	38.88	
85079	Invoice	05/08/2020	GOLF-BITS-MAINT		0.00	5.97	
000024	ACE HARDWARE OF FORT LUPTON		05/11/2020	Regular	0.00	68.49	83673
82365	Invoice	05/08/2020	GOLF-KEYS AND TAGS-MAINT		0.00	36.33	
82413	Invoice	05/08/2020	GOLF-FASTENERS-MAINT		0.00	4.20	
82585	Invoice	05/08/2020	GOLF-FLUSH LEVER, GLOVES-PRO SHOP		0.00	27.96	
002254	ADIDAS AMERICA INC		05/11/2020	Regular	0.00	1,459.75	83674
6150397847	Invoice	05/08/2020	GOLF-MERCHANDISE-PRO SHOP		0.00	835.96	
6150420158	Invoice	05/08/2020	GOLF-MERCHANDISE HATS-PRO SHOP		0.00	496.00	
6150442403	Invoice	05/08/2020	GOLF-BELTS-PRO SHOP		0.00	28.53	
6150446233	Invoice	05/08/2020	GOLF-MERCHANDISE-PRO SHOP		0.00	99.26	
000044	AGFINITY INC		05/11/2020	Regular	0.00	228.30	83675
I48453	Invoice	05/08/2020	GOLF-FUEL DELIVERY-MAINT		0.00	119.64	
I48454	Invoice	05/08/2020	GOLF-DYED DIESEL-MAINT		0.00	108.66	
000183	CALLAWAY GOLF SALES COMPANY		05/11/2020	Regular	0.00	445.92	83676
931418905	Invoice	05/08/2020	GOLF-2020 GOLF BALLS-PRO SHOP		0.00	445.92	
000206	CENTURYLINK		05/11/2020	Regular	0.00	51.99	83677
3945184B APR20	Invoice	05/08/2020	GOLF-TELEPHONE 04/19-05/18-MAINT		0.00	51.99	
000229	CINTAS FIRE PROTECTION		05/11/2020	Regular	0.00	490.53	83678
D51631744	Invoice	05/08/2020	GOLF-TESTING, INSPECTIONS-PRO SHOP		0.00	490.53	
000239	CITY OF FORT LUPTON		05/11/2020	Regular	0.00	24,805.87	83679
INV00712	Invoice	04/24/2020	GOLF-PAYROLL 4/4/20-4/17/20 PAID 4/24/20		0.00	24,514.68	
INV00715	Invoice	05/01/2020	GOLF-ONE AMERICA INV FOR MAY2020		0.00	291.19	
000241	CITY OF FT LUPTON-UTIL INVOICE		05/11/2020	Regular	0.00	193.16	83680
110249001 APR20	Invoice	05/08/2020	Water/Sewer Bill-Golf		0.00	81.19	
110252101 APR20	Invoice	05/08/2020	Water/Sewer Bill-Golf		0.00	51.47	
770214501 APR20	Invoice	05/08/2020	Water/Sewer Bill-Golf		0.00	60.50	
000461	FERRELLGAS LP		05/11/2020	Regular	0.00	5,279.61	83681
1110271683	Invoice	05/08/2020	GOLF-PROPANE-MAINT		0.00	1,569.54	
1110657224	Invoice	05/08/2020	GOLF-PROPANE-MAINT		0.00	1,411.54	
1110902684	Invoice	05/08/2020	GOLF-PROPANE-MAINT		0.00	785.98	
1111350290	Invoice	05/08/2020	GOLF-PROPANE-MAINT		0.00	515.87	
111225203	Invoice	05/08/2020	GOLF-PROPANE-MAINT		0.00	996.68	
000795	MILE HIGH TURFGRASS, LLC		05/11/2020	Regular	0.00	886.00	83682
7244	Invoice	05/08/2020	GOLF-5GAL CASE ASTRON,PROTESYN,XFACT...		0.00	886.00	
000999	SHAMROCK FOODS COMPANY		05/11/2020	Regular	0.00	876.11	83683
20551717	Invoice	05/08/2020	GOLF-FOOD/BEVERAGES-PRO SHOP		0.00	876.11	
001895	TERMINIX		05/11/2020	Regular	0.00	130.00	83684
95998129	Invoice	05/08/2020	GOLF-PEST CONTROL-PRO SHOP		0.00	130.00	
000044	AGFINITY INC		05/18/2020	Regular	0.00	306.99	83685

Vendor Number / Payable #	Vendor Name / Payable Type	Post Date	Payment Date / Payable Description	Payment Type	Discount Amount / Discount Amount	Payment Amount / Payable Amount	Number
I47763	Invoice	04/15/2020	GOLF-FUEL DELIVERIES-MAINT		0.00	306.99	
000073	AMERICAN EAGLE DISTRIBUTING CO		05/18/2020	Regular	0.00	311.55	83686
586323	Invoice	05/14/2020	GOLF-BEVERAGES-PRO SHOP		0.00	311.55	
000239	CITY OF FORT LUPTON		05/18/2020	Regular	0.00	21,155.81	83687
INV00717	Invoice	05/14/2020	GOLF-4/18/20-5/1/20 PAYROLL PD ON 5/8/...		0.00	21,155.81	
000567	HIGH COUNTRY BEVERAGE CORP		05/18/2020	Regular	0.00	803.50	83688
W38648610	Invoice	05/14/2020	GOLF-BEVERAGES-PRO SHOP		0.00	803.50	
001913	LUXOTTICA OF AMERICA, INC		05/18/2020	Regular	0.00	820.86	83689
6904629324	Invoice	05/14/2020	GOLF-MERCHANDISE-PRO SHOP		0.00	820.86	
000865	OFFICE DEPOT		05/18/2020	Regular	0.00	63.09	83690
461095361001	Invoice	05/14/2020	GOLF-LABELS-PRO SHOP		0.00	63.09	
000974	SAFE SYSTEMS INC		05/18/2020	Regular	0.00	125.69	83691
870192-1041	Invoice	05/14/2020	GOLF-SECURITY SYSTEMS		0.00	125.69	
001137	UNITED POWER		05/18/2020	Regular	0.00	3,366.71	83692
1194602 APR20	Invoice	05/18/2020	United Power		0.00	358.30	
1195001 APR20	Invoice	05/18/2020	United Power		0.00	2,672.56	
1195701 APR20	Invoice	05/18/2020	United Power		0.00	290.78	
19595600 APR20	Invoice	05/18/2020	United Power		0.00	24.43	
6601202 APR20	Invoice	05/18/2020	United Power		0.00	20.64	
001183	WAXIE SANITARY SUPPLY		05/18/2020	Regular	0.00	323.07	83693
78973401	Invoice	05/14/2020	GOLF-ECOSOFT GREEN SEAL-PRO SHOP		0.00	47.95	
78978478	Invoice	05/14/2020	GOLF-CLEAN TOUCH SOAP-PRO SHOP		0.00	96.46	
78987983	Invoice	05/14/2020	GOLF-SOLSTA DISINFECTANT-PRO SHOP		0.00	110.16	
79153487	Invoice	05/14/2020	GOLF-ENMOTION WHITE HIGH CAP-PRO SH...		0.00	68.50	
001207	WESTERN DISTRIBUTING INC		05/18/2020	Regular	0.00	106.00	83694
582020	Invoice	05/14/2020	GOLF-BEVERAGES-PRO SHOP		0.00	106.00	
001224	XCEL ENERGY-GAS		05/18/2020	Regular	0.00	302.64	83695
5322229501 APR20	Invoice	05/14/2020	GOLF-APR20 GAS BILL-PRO SHOP		0.00	170.13	
5322229501 MAR...	Invoice	05/14/2020	GOLF-MAR2020 GAS BILL-PRO SHOP		0.00	132.51	

Bank Code Golf Course Summary

Payment Type	Payable Count	Payment Count	Discount	Payment
Regular Checks	47	25	0.00	63,124.64
Manual Checks	0	0	0.00	0.00
Voided Checks	0	0	0.00	0.00
Bank Drafts	0	0	0.00	0.00
EFT's	0	0	0.00	0.00
	47	**25**	**0.00**	**63,124.64**

Vendor Number / Payable #	Vendor Name / Payable Type	Post Date	Payment Date / Payable Description	Payment Type	Discount Amount / Discount Amount	Payment Amount / Payable Amount	Number
Bank Code: Pooled Cash-Pooled Cash							
000031	ADAMSON POLICE PRODUCTS		05/11/2020	Regular	0.00	531.40	67462
INV325637	Invoice	05/07/2020	GF-UNIFORM ACCESSORIES GEERDES-PD		0.00	306.62	
INV325639	Invoice	05/07/2020	GF-SHOES/RADIO HELBIG-PD		0.00	123.20	
INV325785	Invoice	05/07/2020	GF-UNIFORMS GEERDES-PD		0.00	101.58	
000041	AGFINITY		05/11/2020	Regular	0.00	384.00	67463
H53679	Invoice	05/08/2020	SURFLAN & CORNERSTONE PLUS		0.00	384.00	
002137	APPLIED CONCEPT, INC		05/11/2020	Regular	0.00	258.00	67464
365963	Invoice	05/07/2020	GF-REMOTE LOCKS/CONTROL-PD		0.00	258.00	
000105	ASSOCIATED SUPPLY CO. INC		05/11/2020	Regular	0.00	663.50	67465
92867	Invoice	05/07/2020	REC-SPA SIGNET SENSOR (FLOW)		0.00	663.50	
000108	AUSMUS LAW FIRM PC		05/11/2020	Regular	0.00	11,272.50	67466
6658	Invoice	05/07/2020	GF-MAR/APR LEGAL FEES-LEGAL		0.00	11,272.50	
001820	BADGER METER		05/11/2020	Regular	0.00	780.00	67467
80052883	Invoice	05/07/2020	UF-READCTR ANALYTICS-W LINES		0.00	780.00	
000136	BG'S JAPANESE DESIGNS		05/11/2020	Regular	0.00	245.00	67468
6183	Invoice	05/07/2020	GF-EMBROIDERY SERVICES-PD		0.00	245.00	
000167	BRIGHTON FORD INC		05/11/2020	Regular	0.00	694.35	67469
290306	Invoice	05/08/2020	GF-INSTALL UNDER BELLY SHIELD UNIT2004-...		0.00	542.84	
291087	Invoice	05/08/2020	GF-INSTALL SPLASH SHIELD UNIT2004-PD		0.00	151.51	
000196	CARQUEST AUTO PARTS		05/11/2020	Regular	0.00	461.95	67470
2057-447355	Invoice	05/07/2020	OIL, AIR FILTERS, 10W30 OIL		0.00	130.15	
2057-447477	Invoice	05/07/2020	GF-CAB AIR ELEMENTS-STREETS		0.00	84.68	
2057-447615	Invoice	05/07/2020	GF-HYD HOSE, FITTINGS UNIT15-STREETS		0.00	113.54	
2057-447759	Invoice	05/07/2020	GF-15W40 GAL OIL-STREETS		0.00	82.79	
2057-448367	Invoice	05/07/2020	CEM-DIFFUSER,30W OIL		0.00	50.79	
000182	CEM SALES & SERVICE INC		05/11/2020	Regular	0.00	575.00	67471
151715	Invoice	05/07/2020	REC-SPA PLASTER		0.00	575.00	
000241	CITY OF FT LUPTON-UTIL INVOICE		05/11/2020	Regular	0.00	4,415.95	67472
110035001 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	34.65	
110221001 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	34.65	
110222001 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	34.65	
110251001 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	34.65	
330025001 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	34.65	
330031001 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	34.65	
330045001 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	113.17	
330092001 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	34.65	
330166001 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	56.58	
330920000 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	34.65	
550055501 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	65.99	
550057001 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	113.36	
550057601 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	768.89	
550057701 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	34.65	
660092001 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	34.65	
770109501 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	34.65	
770116501 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	34.65	
770229001 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	34.65	
770229501 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	39.27	
770229601 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	34.65	
770231101 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	34.65	
990004001 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	34.65	
990004101 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	51.25	
990005001 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	144.37	

Vendor Number / Payable #	Vendor Name / Payable Type	Post Date	Payment Date / Payable Description	Payment Type	Discount Amount / Discount Amount	Payment Amount / Payable Amount	Number
990006001 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	34.65	
990007001 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	34.70	
990008001 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	34.65	
990132001 APR20	Invoice	05/08/2020	Water/Sewer Bill-City		0.00	2,404.67	
000247	CLIFTONLARSONALLEN LLP		05/11/2020	Regular	0.00	20,000.00	67473
2458051	Invoice	05/07/2020	GF-2019 AUDIT-FIN		0.00	20,000.00	
000267	COLONIAL LIFE		05/11/2020	Regular	0.00	135.38	67474
7816820-0501982	Invoice	05/07/2020	GF-SUPPLEMENTAL INS FOR MAR20		0.00	135.38	
000268	COLORADO ANALYTICAL LAB		05/11/2020	Regular	0.00	46.00	67475
200403033	Invoice	05/07/2020	UF-TOTAL COLIFORM TESTING-W LINES		0.00	46.00	
000307	COMCAST CABLE COMM, LLC		05/11/2020	Regular	0.00	673.04	67476
606460124495 AP...	Invoice	05/08/2020	REC-CABLE TV SERVICES		0.00	292.14	
6460116038 APR20	Invoice	05/08/2020	Comcast 0116038		0.00	214.04	
6460163725 APR20	Invoice	05/08/2020	Comcast Acct 8497 60 646 0163725		0.00	166.86	
001517	CORE&MAIN LP		05/11/2020	Regular	0.00	1,574.81	67477
M124958	Invoice	05/07/2020	UF-FULL CIRCLE CLIPS-W LINES		0.00	807.00	
M252487	Invoice	05/07/2020	UF-BRASS BUSHINGS, BALL, ADPT-W LINES		0.00	767.81	
000429	EMPIRE PORTABLE RESTROOMS		05/11/2020	Regular	0.00	954.00	67478
49466	Invoice	05/07/2020	GF-PORTABLE RESTROM SRV 4/28-5/25-PAR...		0.00	447.00	
49580	Invoice	05/07/2020	GF-PORTABLE RESTROOM SERV 0428-05/25...		0.00	507.00	
001766	ERIKS NORTH AMERICA INC		05/11/2020	Regular	0.00	93.92	67479
BN053012	Invoice	05/07/2020	UF-COUPLINGS FOR JACK HAMMER-W LINES		0.00	93.92	
000454	FARIS MACHINERY COMPANY		05/11/2020	Regular	0.00	128.26	67480
C50884	Invoice	05/07/2020	GF-HYD FILTER CARTRIDGE-STREETS		0.00	128.26	
000455	FASTENAL COMPANY 01COFTL		05/11/2020	Regular	0.00	88.80	67481
COFTL164941	Invoice	05/11/2020	GF-SHOP PARTS-PW SHOP		0.00	88.80	
000513	G & G EQUIPMENT		05/11/2020	Regular	0.00	191.27	67482
96058	Invoice	05/07/2020	SPOOL TWIST		0.00	126.78	
96372	Invoice	05/07/2020	CEM-OIL CHANGE POWER DUMP		0.00	64.49	
002222	GREELEY LOCK & KEY		05/11/2020	Regular	0.00	2,098.00	67483
3245	Invoice	05/08/2020	5 new sensors		0.00	2,098.00	
000551	H&J CARPET CLEANING		05/11/2020	Regular	0.00	600.00	67484
3971	Invoice	05/07/2020	GF-SHAMPOO/REMOVE STAINS CITY HALL-F...		0.00	600.00	
000579	HRDIRECT		05/11/2020	Regular	0.00	519.94	67485
INV8590885	Invoice	05/08/2020	GF-POSTER GUARD 1 YEAR PD-HR		0.00	79.99	
INV8597737	Invoice	05/08/2020	GF-POSTER GUARD 1 YEAR-REC		0.00	79.99	
INV8788201	Invoice	05/07/2020	GF-POSTER GUARD 1 YEAR PARKS-HR		0.00	119.99	
INV8788203	Invoice	05/07/2020	GF-POSTER GUARD 1 YEAR MUSEUM-HR		0.00	79.99	
INV8788204	Invoice	05/07/2020	GF-POSTER GUARD 1 YEAR LIB-HR		0.00	79.99	
INV8788205	Invoice	05/07/2020	GF-POSTER GUARD 1 YEAR GOLF-HR		0.00	79.99	
002166	JBS PIPELINE CONTRACTORS		05/11/2020	Regular	0.00	79,402.80	67486
JBS0213 4	Invoice	05/08/2020	WST- Irrigation Line Mustang- Water		0.00	36,103.95	
JBS0213 MAY20	Invoice	05/08/2020	Uf-Sanitary & Water Replacement Project		0.00	26,871.04	
JBS0213 MAY20 2	Invoice	05/08/2020	WST- Irrigation Line Mustang- Water		0.00	7,194.40	
JBS0213 MAY20 3	Invoice	05/08/2020	UF- 2019 Sanitary & Water Lines Change Or...		0.00	9,233.41	
000745	LOUIS A GRESH		05/11/2020	Regular	0.00	1,500.00	67487
43020	Invoice	05/01/2020	GF-ARRAIGNMENTS/TRIALS APRIL 2020-CO...		0.00	1,500.00	
001926	MAMMOTH CREATIVE		05/11/2020	Regular	0.00	119.95	67488

Vendor Number / Payable #	Vendor Name / Payable Type	Post Date	Payment Date / Payable Description	Payment Type	Discount Amount / Discount Amount	Payment Amount / Payable Amount	Number
12GR-7188	Invoice	05/08/2020	GF-CUSTOM PRINTED BANNERS-LEGIS		0.00	119.95	
000862	O'REILLY AUTO PARTS		05/11/2020	Regular	0.00	882.29	67489
4489-195145	Invoice	05/07/2020	UF-FILTERS, WTR SEP- W LINES		0.00	166.68	
4489-195146	Invoice	05/07/2020	UF-A/T FILTER KIT UNIT36-W LINES		0.00	15.80	
4489-196659	Invoice	05/07/2020	CEM-OIL FILTERS & OIL		0.00	97.12	
4489-196668	Invoice	05/07/2020	GF-MOBIL 1 OIL, FILTERS, HYD FILTERS UNIT...		0.00	333.02	
4489-196673	Invoice	05/07/2020	GF-OIL, AIR AND HYD FILTERS, OIL-STREETS		0.00	254.51	
4489-197361	Invoice	05/07/2020	GF-CABIN FILTER UNIT15-STREETS		0.00	59.14	
4489-197369	Credit Memo	05/07/2020	GF-MOBIL 1 OIL UNIT15-STREETS		0.00	-43.98	
001643	PROCODE INC		05/11/2020	Regular	0.00	60,169.63	67490
1797	Invoice	05/07/2020	GF-FEB2020 BLDG INSPECTIONS/PERMIT FEE...		0.00	26,620.80	
1806	Invoice	05/07/2020	GF-MAR2020 BLDG INSPECTIONS/PERMIT F...		0.00	14,892.41	
1815	Invoice	05/07/2020	GF-APR2020 BLDG INSPC/PERMIT FEES-BLDG..		0.00	18,656.42	
000927	PURIFOY CHEV CO		05/11/2020	Regular	0.00	9.30	67491
153418	Invoice	05/07/2020	GF-CLIPS UNIT12-STREETS		0.00	9.30	
002447	SHIELA CALULOT		05/11/2020	Regular	0.00	666.18	67492
42120	Invoice	05/07/2020	GF-TRANSLATION SERVICES ILONGO-PD		0.00	666.18	
001040	STERICYCLE		05/11/2020	Regular	0.00	119.11	67493
3005074272	Invoice	05/07/2020	REC-BIO HAZARD		0.00	119.11	
001126	TYLER TECHNOLOGIES		05/11/2020	Regular	0.00	804.00	67494
130-12463	Invoice	05/07/2020	GF-VEHICLE CRADLE/CHARGER-PD		0.00	201.00	
130-12502	Invoice	05/07/2020	GF-VEHICLE CRADLE/CHARGER 132-PD		0.00	603.00	
001149	UTILITY NOTIFICATION CENTER		05/11/2020	Regular	0.00	372.50	67495
220040521	Invoice	05/07/2020	SSTX-SST-RTL TRANSMISSION SERVICES-STR...		0.00	372.50	
001156	VERIZON WIRELESS SVCS LLC		05/11/2020	Regular	0.00	4,185.08	67496
9853421415	Invoice	05/08/2020	Verizon Bill		0.00	4,185.08	
001963	WASTE CONNECTIONS OF COLO, INC		05/11/2020	Regular	0.00	904.59	67497
1187327-4266393	Invoice	05/08/2020	Waste Connections		0.00	113.13	
1187330-4266395	Invoice	05/08/2020	Waste Connections		0.00	276.68	
31172871-4266163	Invoice	05/08/2020	Waste Connections		0.00	236.16	
31174336-4266394	Invoice	05/08/2020	Waste Connections		0.00	145.20	
31174339-4266396	Invoice	05/08/2020	Waste Connections		0.00	48.53	
31174340-4266397	Invoice	05/08/2020	Waste Connections		0.00	84.89	
001183	WAXIE SANITARY SUPPLY		05/11/2020	Regular	0.00	2,176.34	67498
79096969	Invoice	05/07/2020	REC-GYM FLOOR MATERIALS		0.00	1,991.91	
79128244	Invoice	05/07/2020	CPR-BLUE MICROFIBER TERRY CLOTH-COM ...		0.00	184.43	
001188	WELD CNTY CLERK/RECORDER		05/11/2020	Regular	0.00	244.00	67499
20-5219	Invoice	05/08/2020	GF-SOUTH PLATTE VALLEY FORT PROP-LEGIS		0.00	39.00	
20-6762	Invoice	05/07/2020	GF-LEGAL RECORDINGS-PLAN		0.00	205.00	
001212	WILLIAMS AND WEISS CONSULTING		05/11/2020	Regular	0.00	3,262.50	67500
1373	Invoice	05/08/2020	2020 Water Resource Plan & Decree Account..		0.00	3,262.50	
000026	ACTIVE CABLING & COMMUNICATIONS LLC		05/18/2020	Regular	0.00	405.43	67501
202577	Invoice	05/12/2020	Outside Phone Wiring		0.00	272.91	
202578	Invoice	05/12/2020	Finishing Cabling for receipt printer		0.00	132.52	
000031	ADAMSON POLICE PRODUCTS		05/18/2020	Regular	0.00	97.18	67502
INV326213	Invoice	05/13/2020	GF-EARPIECE-PD		0.00	97.18	
000034	ADT SECURITY SYSTEM		05/18/2020	Regular	0.00	116.96	67503
50576495 MAY20	Invoice	05/12/2020	MONTHLY SECURITY MONITORING 5/25-6/24		0.00	116.96	
000037	ADVANCED URGENT CARE AND OCC MED		05/18/2020	Regular	0.00	105.00	67504

Vendor Number / Payable #	Vendor Name / Payable Type	Post Date	Payment Date / Payable Description	Payment Type	Discount Amount / Discount Amount	Payment Amount / Payable Amount	Number
56038	Invoice	05/12/2020	GF-HEP B VACCINE MIRAGLIA-PD		0.00	105.00	
002453	AMANDA MARIE GOSS		05/18/2020	Regular	0.00	665.00	67505
2006416.001	Invoice	05/12/2020	REC-SUMMER CAMP REFUND		0.00	665.00	
002455	ANDREA ROBERTSON		05/18/2020	Regular	0.00	250.00	67506
2006423.001	Invoice	05/12/2020	REC-SUMMER CAMP REFUND		0.00	250.00	
002454	AVRIL GRIFFITHS		05/18/2020	Regular	0.00	665.00	67507
2006417.001	Invoice	05/12/2020	REC-SUMMER CAMP REFUNDS		0.00	665.00	
001646	BANK OF COLORADO		05/18/2020	Regular	0.00	307.47	67508
6682 APR2020	Invoice	05/13/2020	FUEL/NATURAL GAS PURCHASE APR2020		0.00	307.47	
002457	BRYANNA DUNLAP		05/18/2020	Regular	0.00	665.00	67509
2006413.001	Invoice	05/12/2020	REC-SUMMER CAMP REFUND		0.00	665.00	
002459	CAROLINA CHAVEZ		05/18/2020	Regular	0.00	94.50	67510
2006412.001	Invoice	05/12/2020	REC-MEMBERSHIP REFUND		0.00	94.50	
002450	CHANDELL DALE		05/18/2020	Regular	0.00	39.14	67511
2006404.001	Invoice	05/12/2020	REC-REFUND CLASS FEES		0.00	39.14	
002449	CHANTELLE ESPINOZA		05/18/2020	Regular	0.00	39.14	67512
2006403.001	Invoice	05/12/2020	REC-REFUND OF CLASS FEES		0.00	39.14	
000307	COMCAST CABLE COMM, LLC		05/18/2020	Regular	0.00	176.14	67513
606460147405 M...	Invoice	05/12/2020	CPR-INTERNET/PHONE SERVICES 03/20-04/...		0.00	176.14	
001517	CORE&MAIN LP		05/18/2020	Regular	0.00	842.95	67514
M230441	Invoice	05/13/2020	UF-SUPPLIES-W LINES		0.00	842.95	
000361	DBC IRRIGATION SUPPLY		05/18/2020	Regular	0.00	703.55	67515
S3691425.001	Invoice	05/13/2020	CEM-RAINBIRD SPRINKLER ROTORS		0.00	703.55	
000388	DIGETEKS, LLC		05/18/2020	Regular	0.00	3,000.00	67516
6987	Invoice	05/12/2020	DigeTekS Support Hours		0.00	3,000.00	
002192	DMD SYSTEMS RECOVERY INC		05/18/2020	Regular	0.00	1,225.00	67517
111800	Invoice	05/12/2020	DMD Systems Recovery - Recycle Program		0.00	1,225.00	
000454	FARIS MACHINERY COMPANY		05/18/2020	Regular	0.00	3,473.22	67518
W57809	Invoice	05/12/2020	Vactor Repairs		0.00	3,473.22	
000482	FORT LUPTON CAR WASH LLC		05/18/2020	Regular	0.00	220.75	67519
100	Invoice	05/12/2020	GF-VEHICLE MAINTENANCE-PD		0.00	220.75	
000579	HRDIRECT		05/18/2020	Regular	0.00	159.98	67520
INV8597736	Invoice	05/12/2020	GF-POSTER GUARD 1 YEAR COM CTR-HR		0.00	79.99	
INV8597738	Invoice	05/12/2020	GF-POSTER GUARD 1 YEAR CITY HALL-HR		0.00	79.99	
002180	JAMES ARTHUR MOORHEAD		05/18/2020	Regular	0.00	200.00	67521
E0021517-1 MAY...	Invoice	05/12/2020	GF-RESTITUTION-CASE REFUND 37678		0.00	200.00	
002317	JIMMY DOMINGUEZ		05/18/2020	Regular	0.00	77.67	67522
2006405.001	Invoice	05/12/2020	REC-REFUND CLASS FEES		0.00	77.67	
002325	KATY FOX		05/18/2020	Regular	0.00	1,330.00	67523
2006415.001	Invoice	05/12/2020	REC-SUMMER CAMP REFUND		0.00	1,330.00	
002452	LACEY KESTERKE		05/18/2020	Regular	0.00	46.57	67524
2006407.001	Invoice	05/12/2020	REC-REFUND CLASS FEES		0.00	46.57	
002461	MARIA CHAVEZ		05/18/2020	Regular	0.00	200.00	67525
2006429.001	Invoice	05/12/2020	REC-ROOM RENTAL REFUND		0.00	200.00	
002460	MARIA IGUADO		05/18/2020	Regular	0.00	200.00	67526

Vendor Number / Payable #	Vendor Name / Payable Type	Post Date	Payment Date / Payable Description	Payment Type	Discount Amount / Discount Amount	Payment Amount / Payable Amount	Number
2006409.001	Invoice	05/12/2020	REC-ROOM RENTAL FEE		0.00	200.00	
002255	MARIELA MATA		05/18/2020	Regular	0.00	410.00	67527
2006410.001	Invoice	05/12/2020	REC-ROOM RENTAL REFUND		0.00	410.00	
002194	METROWEST NEWSPAPERS		05/18/2020	Regular	0.00	1,600.00	67528
15485 202004	Invoice	05/12/2020	GF-PUBLIC NOTICES/LEGAL ADS		0.00	1,600.00	
002194	METROWEST NEWSPAPERS		05/18/2020	Regular	0.00	2,379.52	67529
202004	Invoice	05/12/2020	GF-PUBLIC NOTICES/LEGAL ADS		0.00	2,379.52	
002456	MOLLY TIBBEN		05/18/2020	Regular	0.00	621.00	67530
2006428.001	Invoice	05/12/2020	REC-SUMMER CAMP REFUND		0.00	621.00	
000869	OPERATIONS MANAGEMENT INT		05/18/2020	Regular	0.00	117,136.33	67531
351230-21-06	Invoice	05/13/2020	UF-OMI MONTHLY BILLING		0.00	117,136.33	
000893	PETROCK FENDEL POZNANOVIC PC		05/18/2020	Regular	0.00	2,600.00	67532
31371	Invoice	05/12/2020	SWTX-APR LEGAL SERVICES-WTP		0.00	2,600.00	
002265	QUADIENT FINANCE USA INC		05/18/2020	Regular	0.00	536.00	67533
8870 APR20	Invoice	05/12/2020	GF-APR20 POSTAGE CHARGES		0.00	536.00	
002493	QUADIENT LEASING USA INC		05/18/2020	Regular	0.00	454.80	67534
H8294541	Invoice	05/13/2020	GF-Q2 2020 POSTAGE METER LEASE-ADMIN		0.00	454.80	
002462	QUALITY OF COLORADO		05/18/2020	Regular	0.00	130.69	67535
7280	Invoice	05/12/2020	GF-FIRST AID SUPPLIES-FAC		0.00	130.69	
002219	RECREATION BY LEMMIE JONES LLC		05/18/2020	Regular	0.00	36,950.00	67536
RLJ2020-006	Invoice	05/12/2020	RC- Spiral Stairwell-Pool- Rec		0.00	36,950.00	
000956	ROCKY MOUNTAIN LOW VOLTAGE		05/18/2020	Regular	0.00	1,218.82	67537
20200888	Invoice	05/12/2020	CPR-FIRE ALARM INSPECTION/REPAIRS-COM...		0.00	1,218.82	
002458	TABALA MORREALE		05/18/2020	Regular	0.00	665.00	67538
2006425.001	Invoice	05/12/2020	REC-SUMMER CAMP REFUND		0.00	665.00	
002190	TABITHA GARCIA		05/18/2020	Regular	0.00	70.00	67539
2006411.001	Invoice	05/12/2020	REC-SHELTER RENTAL REFUND		0.00	70.00	
001530	TARGET SPECIALTY PRODUCTS		05/18/2020	Regular	0.00	1,720.00	67540
INVP500108490	Invoice	05/12/2020	GF-24-04-10 TARGET PRO-PARKS		0.00	860.00	
INVP500108942	Invoice	05/12/2020	GF-24-04-10 TARGET PRO-PARKS		0.00	860.00	
002451	TEYA HENDERSON		05/18/2020	Regular	0.00	419.30	67541
2006408.001	Invoice	05/12/2020	REC-REFUND OF CLASS FEES		0.00	419.30	
001101	TODD HODGES DESIGN LLC		05/18/2020	Regular	0.00	9,968.75	67542
3203	Invoice	05/13/2020	GF-PLANNING SERVICES 4/27-5/10-PLAN		0.00	9,968.75	
001137	UNITED POWER		05/18/2020	Regular	0.00	32,472.65	67543
10553102 MAY20	Invoice	05/18/2020	United Power		0.00	22.30	
1195501 MAY20	Invoice	05/18/2020	United Power		0.00	1,466.59	
1196401 MAY20	Invoice	05/18/2020	United Power		0.00	33.82	
1207701 MAY2020	Invoice	05/18/2020	United Power		0.00	21.05	
1223101 MAY2020	Invoice	05/18/2020	United Power		0.00	20.00	
1240301 MAY20	Invoice	05/18/2020	United Power		0.00	255.57	
1241801 MAY2020	Invoice	05/18/2020	United Power		0.00	355.89	
1241903 MAY2020	Invoice	05/18/2020	United Power		0.00	57.13	
1276101 MAY20	Invoice	05/18/2020	United Power		0.00	553.44	
1279801 MAY20	Invoice	05/18/2020	United Power		0.00	24.72	
1295501 MAY2020	Invoice	05/18/2020	United Power		0.00	51.75	
1296101 MAY20	Invoice	05/18/2020	United Power		0.00	464.39	
1299501 MAY2020	Invoice	05/18/2020	United Power		0.00	112.00	

Vendor Number / Payable #	Vendor Name / Payable Type	Post Date	Payment Date / Payable Description	Payment Type	Discount Amount / Discount Amount	Payment Amount / Payable Amount	Number
1302801 MAY2020	Invoice	05/18/2020	United Power		0.00	1,553.46	
1302901 MAY20	Invoice	05/18/2020	United Power		0.00	141.39	
1316801 MAY20	Invoice	05/18/2020	United Power		0.00	502.26	
1322501 MAY2020	Invoice	05/18/2020	United Power		0.00	6,166.14	
1360303 MAY20	Invoice	05/18/2020	United Power		0.00	40.89	
13842400 MAY20	Invoice	05/18/2020	United Power		0.00	53.05	
14427100 MAY20	Invoice	05/18/2020	United Power		0.00	144.89	
15232500 MAY20	Invoice	05/18/2020	United Power		0.00	21.20	
17149700 MAY20	Invoice	05/18/2020	United Power		0.00	52.80	
17761600 MAY20	Invoice	05/18/2020	United Power		0.00	20.00	
17868800 MAY20	Invoice	05/18/2020	United Power		0.00	20.00	
18057500 MAY20	Invoice	05/18/2020	United Power		0.00	471.53	
18498400 MAY20	Invoice	05/18/2020	United Power		0.00	480.86	
18762100 MAY20	Invoice	05/18/2020	United Power		0.00	85.36	
19545100 MAY20	Invoice	05/18/2020	United Power		0.00	360.16	
20040100 MAY20	Invoice	05/18/2020	United Power		0.00	360.49	
3399301 MAY20	Invoice	05/18/2020	United Power		0.00	52.13	
6612303 MAY20	Invoice	05/18/2020	United Power		0.00	21.07	
6779701 MAY20	Invoice	05/18/2020	United Power		0.00	4,806.71	
704901 MAY20	Invoice	05/18/2020	United Power		0.00	7,588.71	
7225800 MAY20	Invoice	05/18/2020	United Power		0.00	21.51	
726705 MAY20	Invoice	05/18/2020	United Power		0.00	20.00	
7280200 MAY20	Invoice	05/18/2020	United Power		0.00	21.90	
733101 MAY2020	Invoice	05/18/2020	United Power		0.00	300.86	
762901 MAY20	Invoice	05/18/2020	United Power		0.00	808.71	
803908 MAY20	Invoice	05/18/2020	United Power		0.00	4,273.64	
8976200 MAY20	Invoice	05/18/2020	United Power		0.00	644.28	
001183	WAXIE SANITARY SUPPLY		05/18/2020	Regular	0.00	1,125.39	67545
79024281	Invoice	05/12/2020	GF-CLEAN TOUCH-FAC		0.00	96.46	
79065322	Invoice	05/12/2020	GF-HAND SOAP-FAC		0.00	176.52	
79132036	Invoice	05/12/2020	GF-HAND SANITIZER STANDS-FAC		0.00	190.53	
79153461	Invoice	05/13/2020	GF-PAPER PRODUCTS/SOAP-PARKS		0.00	661.88	
001189	WELD COUNTY ACCTG DEPART		05/18/2020	Regular	0.00	1,962.23	67546
43020	Invoice	05/12/2020	GF-APR2020 FUEL PURCHASES		0.00	1,962.23	
001199	WELD COUNTY PUBLIC SAFETY IT		05/12/2020	Regular	0.00	-4,800.00	73443
000119	BANK OF COLORADO		05/08/2020	Bank Draft	0.00	5,680.29	DFT0001242
INV0000752	Invoice	05/08/2020	HSA DISTRIBUTION		0.00	5,680.29	
000119	BANK OF COLORADO		05/08/2020	Bank Draft	0.00	691.27	DFT0001243
INV0000753	Invoice	05/08/2020	HSA DISTRIBUTION		0.00	691.27	
001416	VALIC_1		05/08/2020	Bank Draft	0.00	31,119.62	DFT0001244
INV0000754	Invoice	05/08/2020	VALIC - 457(b) $ Contributions		0.00	31,119.62	
001265	IRS		05/08/2020	Bank Draft	0.00	43,918.67	DFT0001245
INV0000755	Invoice	05/08/2020	Federal Withholding		0.00	43,918.67	
001418	CO DEPARTMENT OF REVENUE		05/08/2020	Bank Draft	0.00	7,068.92	DFT0001246
INV0000756	Invoice	05/08/2020	CO Withholding		0.00	7,068.92	
001416	VALIC_1		05/07/2020	Bank Draft	0.00	24.68	DFT0001250
INV0000757	Invoice	05/07/2020	VALIC - Regular Plan Retirement Contributio...		0.00	24.68	
001265	IRS		05/07/2020	Bank Draft	0.00	36.96	DFT0001251
INV0000758	Invoice	05/07/2020	Federal Withholding		0.00	36.96	
001416	VALIC_1		05/08/2020	Bank Draft	0.00	210.68	DFT0001254
INV0000759	Invoice	05/08/2020	VALIC - PD Retirement Plan Contributions		0.00	210.68	
001265	IRS		05/08/2020	Bank Draft	0.00	60.97	DFT0001255

Vendor Number / Payable #	Vendor Name / Payable Type	Post Date	Payment Date / Payable Description	Payment Type	Discount Amount / Discount Amount	Payment Amount / Payable Amount	Number
INV0000760	Invoice	05/08/2020	Federal Withholding		0.00	60.97	
001418	CO DEPARTMENT OF REVENUE		05/08/2020	Bank Draft	0.00	31.14	DFT0001256
INV0000761	Invoice	05/08/2020	CO Withholding		0.00	31.14	
000465	FIRE & POLICE PENSION ASC		05/08/2020	Bank Draft	0.00	1,686.50	DFT0001261
50820	Invoice	05/08/2020	GF-FPPA FOR 05/08/20 PAYROLL-PD		0.00	1,686.50	

Bank Code Pooled Cash Summary

Payment Type	Payable Count	Payment Count	Discount	Payment
Regular Checks	192	84	0.00	429,949.47
Manual Checks	0	0	0.00	0.00
Voided Checks	0	1	0.00	-4,800.00
Bank Drafts	11	11	0.00	90,529.70
EFT's	0	0	0.00	0.00
	203	**96**	**0.00**	**515,679.17**

All Bank Codes Check Summary

Payment Type	Payable Count	Payment Count	Discount	Payment
Regular Checks	239	109	0.00	493,074.11
Manual Checks	0	0	0.00	0.00
Voided Checks	0	1	0.00	-4,800.00
Bank Drafts	11	11	0.00	90,529.70
EFT's	0	0	0.00	0.00
	250	**121**	**0.00**	**578,803.81**

Fund Summary

Fund	Name	Period	Amount
600	GOLF ENTERPRISE FUND	5/2020	63,124.64
999	POOLED CASH/CONSOLIDATED CASH	5/2020	515,679.17
			578,803.81

RECORD OF PROCEEDINGS
FORT LUPTON CITY COUNCIL/ENTERPRISE BOARDS
May 5, 2020

The City Council of the City of Fort Lupton met in a regular session at the City Complex, 130 South McKinley Avenue, the regular meeting place of the City Council, on Tuesday, May 5, 2020. Due to the City's Disaster Declaration of March 17, 2020 related to the COVID-19 virus, the meeting was held with virtual access provided through GoToMeetings. Mayor Zo Stieber called the meeting to order at 7:00 p.m. and invited everyone to join her in the Pledge of Allegiance.

ROLL CALL

Mari Peña, City Clerk, called the roll. Those present were Mayor Zo Stieber, and Council Member Bruce Fitzgerald, Chris Ceretto and Michael Sanchez. Councilmembers Shannon Rhoda, David Crespin, and Tommy Holton participated by electronic communication (GoToMeeting).

Also present were City Administrator, Chris Cross, City Clerk, Mari Peña, City Attorney, Andy Ausmus and Planning Director, Todd Hodges.

The following staff participated by electronic communication (GoToMeeting): Assistant City Administrator, Glenda Aretxuloeta, Public Works Director, Roy Vestal, Chief John Fryar, Finance Director, Leann Perino, and Planners, Alyssa Knutson and Maria Lancto.

Mayor Stieber read the following General Advisement:

The President of the United States, the Governor of the State of Colorado and I, as Mayor of the City of Fort Lupton have collectively declared federal, state and local emergencies due to the outbreak of the Covid-19 virus. As such, tonight's meeting shall be held virtually so as to insure the health and safety of the general public and the City of Fort Lupton City Council and staff.

The intent and purpose of the Fort Lupton Emergency Policy and Procedures is to ensure that the City is innovative in providing the general public the most meaningful access possible in light of the current emergency challenges present as a result of the Covid-19 pandemic. Therefore, subject to social distancing and public health orders, members of the general public will be offered both the opportunity to be physically and or electronically present for meetings at the City, subject to existing health conditions.

An electronic link has been made available for tonight's meeting on the City's website and social media platforms and as posted here at City Hall, so that the general public and City Council and staff may participate electronically via the internet, on the phone or in limited circumstances, in person.

PERSONS TO ADDRESS COUNCIL

The City Clerk, Mari Peña stated that there was no one from the public to address the Council.

DRAFT

RECORD OF PROCEEDINGS
FORT LUPTON CITY COUNCIL/ENTERPRISE BOARDS
May 5, 2020

PROCLAMATION

Mayor Stieber proclaimed May 2020 as Mental Health Month.

APPROVAL OF AGENDA

It was moved by Chris Ceretto and seconded by Bruce Fitzgerald to approve the Agenda as presented. Motion passed unanimously on roll call vote.

REVIEW OF ACCOUNTS PAYABLES

Council reviewed the May 5, 2020 payables; which were emailed to City Council prior to the start of the meeting. There were no questions or comments from the Mayor or Council.

CONSENT AGENDA

It was moved by Tommy Holton and seconded by David Crespin to approve the Consent Agenda the following items: 04212020 City Council Meeting Minutes, Accepting the Withdrawal of City Liquor License Application from Circle K Stores Inc. DBA Circle K Store 2704959 (AM 2020-097), Approving an Agreement with Civic Plus for Purchase of CivicClerk and CP Media for an Amount of $4,032 for 2020 Allocated from the General Fund Information Technology Department for the Council Chambers Upgrade (AM 2020-098). Motion passed unanimously on roll call vote.

PUBLIC HEARINGS

AM 2020-093 Adopt an Annexation Known as the Morrison Annexation, to Annex Land Legally Described in Exhibit "A" to the Proposed Ordinance and Approving the Annexation Agreement

The Mayor opened the public hearing at 7:15 p.m. and read the following advisement to the applicant's representative prior to opening the public hearing: You understand that the Applicant has a right to continue this public hearing to such a date to allow a full in person public hearing? You have agreed to voluntarily waive that right on behalf of the Applicant by proceeding tonight electronically, is that correct? On behalf of the Applicant, you have voluntarily signed and submitted the written waiver and consent to proceed electronically tonight, correct? Therefore, on behalf of the Applicant, you waive Applicant's right to proceed in an in person public hearing and have consented to proceed forward voluntarily tonight in this virtual City Council meeting, is that correct?

The applicant's representative Terry Epstein, with Holsinger Law answered yes to all questions.

The City Planner, Alyssa Knutson, stated the applicants, Andrew Morrison and Kamber Morrison, have submitted a request for annexation of land totaling 37.58 acres, more or less,

known as the Morrison Annexation. The Property is located approximately a quarter mile north of County Road 8 and west and adjacent to County Road 29 right of way. The proposed initial zoning is 'A' Agricultural, which is being presented to City Council for approval under a separate Action Memorandum and Ordinance following the hearing on this Annexation. The Applicant is interested in inclusion into the Northern Colorado Water Conservancy District and the Municipal Subdistrict in order to supply water to the property. The current uses of the property are agricultural and residential, and is not expected to change at this time. All notification requirements have been met.

Ms. Upstein stated that the proposed project will not entail any new development and the use won't change. The purpose of the annexation is for the property to be included in the water district to supply water to the property.

Mayor Stieber read the following advisement: Have you had a full and fair opportunity to present all facts, submittals, documents, testimony and presentations in support of the application before the City Council tonight? Ms. Epstein answered "yes." Has there been anything that you or the Applicant would have liked to have presented in support of Applicant's application that you feel you were prevented from doing so? Ms. Epstein answered "no and nothing further."

Mayor Stieber asked if anyone from the public wished to speak for or against the matter. Hearing none, Mayor Stieber closed the public hearing at 7:22 p.m.

No further discussion occurred.

It was moved by David Crespin and seconded by Chris Ceretto to adopt Ordinance 2020-1087 ADOPT ORDINANCE 2020-1087 ANNEXING LAND LEGALLY DESCRIBED IN EXHIBIT "A" KNOWN AS THE MORRISON ANNEXATION AND APPROVING THE ANNEXATION AGREEMENT. Motion passed unanimously on roll call vote.

AM 2020-095 Adopt an Ordinance to Initially Zone Land Legally Described in Exhibit A of the Proposed Ordinance and Known as the Morrison Initial Zoning to the 'A' Agricultural Zone District

The Mayor opened the public hearing at 7:25 p.m. and read the following advisement to the applicant's representative prior to opening the public hearing: You understand that the Applicant has a right to continue this public hearing to such a date to allow a full in person public hearing? You have agreed to voluntarily waive that right on behalf of the Applicant by proceeding tonight electronically, is that correct? On behalf of the Applicant, you have voluntarily signed and submitted the written waiver and consent to proceed electronically tonight, correct? Therefore, on behalf of the Applicant, you waive Applicant's right to proceed in an in person public hearing and have consented to proceed forward voluntarily tonight in this virtual City Council meeting, is that correct?

The applicant's representative, Terry Epstein, with Holsinger Law answered yes to all questions.

The City Planner, Alyssa Knutson, stated the applicants, Andrew Morrison and Kamber Morrison, have submitted a request for initial zoning of certain land identified in Exhibit A of the Ordinance to the 'A' Agricultural Zone District. The property that is the subject of the initial zoning is situated a quarter mile north of County Road 8 and west and adjacent to County Road 29 right of way. City Council just reviewed and approved an Ordinance to approve the annexation known as the Morrison Annexation. This request is to initially zone the property included within that Annexation.

There was no presentation by the applicant's representative.

Mayor Stieber read the following advisement: Have you had a full and fair opportunity to present all facts, submittals, documents, testimony and presentations in support of the application before the City Council tonight? Ms. Epstein answered "yes." Has there been anything that you or the Applicant would have liked to have presented in support of Applicant's application that you feel you were prevented from doing so? Ms. Epstein answered "no and nothing further."

Mayor Stieber asked if anyone from the public wished to speak for or against the matter. Hearing none, Mayor Stieber closed the public hearing at 7:27 p.m.

No further discussion occurred.

It was moved by Chris Ceretto and seconded by Bruce Fitzgerald to adopt ORDINANCE 2020-1088 ADOPT ORDINANCE 2020-1088 INITIALLY ZONING LAND KNOWN AS THE MORRISON INITIAL ZONING, LEGALLY DESCRIBED IN EXHIBIT A, TO THE 'A' AGRICULTURAL ZONE DISTRICT

AM 2020-096 Approving a Resolution for the SB Weakland Investments Site Plan

The Mayor opened the public hearing at 7:31 p.m. and read the following advisement to the applicant's representative prior to opening the public hearing: You understand that the Applicant has a right to continue this public hearing to such a date to allow a full in person public hearing? You have agreed to voluntarily waive that right on behalf of the Applicant by proceeding tonight electronically, is that correct? On behalf of the Applicant, you have voluntarily signed and submitted the written waiver and consent to proceed electronically tonight, correct? Therefore, on behalf of the Applicant, you waive Applicant's right to proceed in an in person public hearing and have consented to proceed forward voluntarily tonight in this virtual City Council meeting, is that correct?

The applicant, Scott Weakland, answered yes to all questions.

The City Planner, Maria Lancto, stated that the applicants, Scott and Barb Weakland, have submitted a request for a site plan application for outside storage of equipment, semi tractor-trailers, and storage containers, to be known as the SB Weakland Investments Site Plan. The site is located approximately 0.05 miles south of Barley Avenue and 0.53 miles east of County Road

31. The property is zoned I-2 Heavy Industrial, and the proposed use is a use by right in this zone district.

The applicant's representative, Chad Cox, with Western Engineering Consultants, stated that the property is undergoing significant improvements to enhance the site. There was no further presentation.

Mayor Stieber read the following advisement: Have you had a full and fair opportunity to present all facts, submittals, documents, testimony and presentations in support of the application before the City Council tonight? Mr. Weakland answered "yes." Has there been anything that you or the Applicant would have liked to have presented in support of Applicant's application that you feel you were prevented from doing so? Mr. Weakland and Mr. Cox answered "no and nothing further."

Mayor Stieber asked if anyone from the public wished to speak for or against the matter. Hearing none, Mayor Stieber closed the public hearing at 7:36 p.m.

No further discussion occurred.

It was moved by Chris Ceretto and seconded by Bruce Fitzgerald to approve Resolution 2020R047 A RESOLUTION OF THE CITY COUNCIL OF FORT LUPTON APPROVING THE SB WEAKLAND INVESTMENTS SITE PLAN LOCATED APPROXIMATELY 0.05 MILES SOUTH OF BARLEY AVENUE AND 0.53 MILES EAST OF COUNTY ROAD 31. Motion passed unanimously on roll call vote.

ACTION AGENDA

AM 2020-094 Approve Payment to Colorado Department of Public Health and Environment (CDPH&E) Invoice for North Lift Station Site Location Application and Design Review Fees of $7,643.00 Allocated from the Utility Fund

CDPH&E invoiced the City for Site Location Application and Design Review in association with the 2017 North Lift Station Project.

$4,643.00 for Site Location Application	Inv # WUSA181040760
$3,000.00 for Design Review	Inv # WUDR181040761

This project from 2003 was never submitted to CDPH&E for review and approvals. This was first noted by CDPH&E during the 2013 State Inspection. The City contracted PEC in 2017 to prepare the required documents during the City's application for discharge permit renewal. The invoices were lost during the transition of personnel at OMI. The documents were submitted to CDPH&E, but the fees were never paid. The review and approvals for the North Lift Station will not occur until the fees are paid.

The Guidance Document for the "Site Location and Design Approval Regulations for Domestic Wastewater Treatment Works" (5CCR 1002-22), The Colorado Water Quality Control Act

establishes the statutory framework for Regulation No. 22 by requiring site location and design approval with the Division. The Division is authorized to assess fees for the review of wastewater site applications and wastewater design reviews in accordance with the provision of Section 25-8-702 of the Water Quality Control Act. The fees for site application and design reviews are set by statue and are based upon the type of project and associated, proposed hydraulic capacity. Because fees are set by statute, the Division cannot waive fees for site location or design review work that is required and performed in accordance with the statue and Regulation 22.

It was moved by Tommy Holton and seconded by Chris Ceretto to approve payment to Colorado Department of Public Health and Environment (CDPH&E) Invoice for North Lift Station Site Location Application and Design Review Fees of $7,643.00 Allocated from the Utility Fund. Motion passed unanimously on roll call vote.

STAFF

There were no staff reports.

MAYOR/COUNCIL REPORTS

There was no Mayor or Council reports.

FUTURE CITY EVENTS

May 12th	Virtual Town Hall Meeting, 130 S. McKinley Ave. 6:30 p.m.
May 19th	Virtual City Council Meeting, 130 S. McKinley Ave. 7:00 p.m.
May 26th	Virtual Town Hall Meeting, 130 S. McKinley Ave. 6:30 p.m.
May 25th	City Offices closed in observance of Memorial Day Memorial Day Services **Cancelled** at Hillside Cemetery

Mayor Stieber asked if anyone that was participating electronically from the public wished to speak. No one responded.

ADJOURNMENT

Mayor Stieber adjourned the meeting at 7:45 p.m.

Respectfully Submitted,

_____

Maricela Peña, City Clerk

DRAFT

Approved by City Council

_____
Zo Stieber, Mayor

DRAFT

ORDINANCE NO. 2020-1083

INTRODUCED BY: CHRIS CERETTO

ADOPT ORDINANCE 2020-1083 ANNEXING LAND LEGALLY DESCRIBED IN EXHIBIT "A" KNOWN AS THE C&M RODRIGUEZ ANNEXATION NOS. 1 – 5 AND APPROVING THE ANNEXATION AGREEMENT.

INTRODUCED, READ, AND PASSED ON FIRST READING, AND ORDERED PUBLISHED this 21st day of April 2020.

PUBLISHED in the Fort Lupton Press the 29th day of April 2020.

FINALLY READ BY TITLE ONLY, PASSED AND ORDERED PUBLISHED BY TITLE ONLY this 19th day of May 2020.

PUBLISHED BY TITLE ONLY the 27th day of May 2020.

EFFECTIVE (after publication) the 26th day of June 2020.

CITY OF FORT LUPTON, COLORADO

_____

Zo Stieber, Mayor

ATTEST:

_____

Maricela Peña, City Clerk

Approved as to form:

_____

Andy Ausmus, City Attorney

EXHIBIT A

LEGAL DESCRIPTION C&M RODRIGUEZ SERVICES INC. ANNEXATION NO. 1:

A PARCEL OF LAND IN THE CITY OF FORT LUPTON, COLORADO LOCATED IN THE SE 1/4 OF SECTION 19, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH P.M., WELD COUNTY COLORADO, BEING MORE PARTICULARLY DESCRIBED AS FOLLOWS:

BASIS OF BEARING: CONSIDERING THE NORTH LINE OF THE SW 1/4 OF SECTION 20, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH P.M., TO BEAR NORTH 89°45'30" EAST BETWEEN THE MONUMENTS SHOWN ON THIS SURVEY AND WITH ALL OTHER BEARINGS CONTAINED HEREIN RELATIVE THERETO;

COMMENCING AT THE SOUTHEAST CORNER OF SECTION 19 TOWNSHIP 2 NORTH RANGE 66 WEST OF THE 6TH P.M.;
THENCE ALONG THE SOUTH LINE OF THE SE 1/4 OF SECTION 19, S 89°48'25" W FOR A DISTANCE OF 210.00 FEET;
THENCE DEPARTING SAID SOUTH LINE N 00°11'29" W FOR A DISTANCE OF 30.00 FEET TO A POINT ON THE NORTH RIGHT-OF-WAY LINE OF COUNTY ROAD 18 AS GRANTED BY A ROAD PETITION FILED APRIL 14, 1884 IN BOOK 3 AT PAGE 344 WELD COUNTY RECORDS, THE POINT OF BEGINNING;
THENCE ALONG SAID WESTERLY RIGHT OF WAY OF STATE HIGHWAY 85 THE FOLLOWING THREE (3) COURSES AND DISTANCES;
1. N 00°11'29" W FOR A DISTANCE OF 20.90 FEET;
2. N 43°52'01" E FOR A DISTANCE OF 129.40 FEET;
3. N 00°23'08" W FOR A DISTANCE OF 385.39 FEET;

THENCE DEPARTING SAID WEST RIGHT-OF-WAY LINE S 13°50'57" E FOR A DISTANCE OF 513.81 FEET TO A POINT ON THE NORTH RIGHT-OF-WAY LINE OF SAID COUNTY ROAD 18;
THENCE ALONG SAID NORTH RIGHT-OF-WAY LINE S 89°48'25" W FOR A DISTANCE OF 210.00 FEET TO THE POINT OF BEGINNING.

CONTAINING A CALCULATED AREA OF 0.83 ACRES.

LEGAL DESCRIPTION C&M RODRIGUEZ SERVICES INC. ANNEXATION NO. 2:

A PARCEL OF LAND IN THE CITY OF FORT LUPTON, COLORADO LOCATED IN THE SE 1/4 OF SECTION 19, AND THE SW 1/4 OF SECTION 20, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH P.M., WELD COUNTY COLORADO, BEING MORE PARTICULARLY DESCRIBED AS FOLLOWS:

BASIS OF BEARING: CONSIDERING THE NORTH LINE OF THE SW 1/4 OF SECTION 20, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH P.M., TO BEAR NORTH

89°45'30" EAST BETWEEN THE MONUMENTS SHOWN ON THIS SURVEY AND WITH ALL OTHER BEARINGS CONTAINED HEREIN RELATIVE THERETO;

COMMENCING AT THE SOUTHEAST CORNER OF SECTION 19 TOWNSHIP 2 NORTH RANGE 66 WEST OF THE 6TH P.M.;
THENCE ALONG THE SOUTH LINE OF THE SW 1/4 OF SECTION 20, N 89°45'30" E FOR A DISTANCE OF 109.99 FEET;
THENCE DEPARTING SAID SOUTH LINE N 01°41'07" W FOR A DISTANCE OF 30.01 FEET TO A POINT ON THE NORTH RIGHT-OF-WAY LINE OF COUNTY ROAD 18 AS GRANTED BY A ROAD PETITION FILED APRIL 14, 1884 IN BOOK 3 AT PAGE 344 WELD COUNTY RECORDS, THE POINT OF BEGINNING;
THENCE ALONG THE EAST RIGHT-OF WAY LINE OF STATE HIGHWAY 85 THE FOLLOWING FIVE (5) COURSES AND DISTANCES;
1. N 01°41'07" W FOR A DISTANCE OF 238.83 FEET;
2. S 89°48'16" W FOR A DISTANCE OF 69.30 FEET;
3. N 00°20'17" W FOR A DISTANCE OF 1052.73 FEET;
4. S 89°56'16" W FOR A DISTANCE OF 34.30 FEET TO A POINT ON THE WEST LINE OF SAID SECTION 20;
5. ALONG SAID WEST LINE, N 00°20'17" W FOR A DISTANCE OF 461.07 FEET;

THENCE DEPARTING SAID EAST RIGHT-OF-WAY LINE S 05°08'02" W FOR A DISTANCE OF 1258.86 FEET TO A POINT ON THE WEST RIGHT-OF-WAY LINE OF SAID STATE HIGHWAY 85;
THENCE S 13°50'57" E FOR A DISTANCE OF 513.81 FEET TO A POINT ON THE NORTH RIGHT-OF-WAY LINE OF SAID COUNTY ROAD 18;
THENCE ALONG SAID NORTH RIGHT-OF-WAY LINE N 89°45'30" E FOR A DISTANCE OF 109.21 TO THE POINT OF BEGINNING.

CONTAINING A CALCULATED AREA OF 3.83 ACRES.

<u>LEGAL DESCRIPTION C&M RODRIGUEZ SERVICES INC. ANNEXATION NO. 3:</u>

A PARCEL OF LAND IN THE CITY OF FORT LUPTON, COLORADO LOCATED IN THE E 1/2 OF SECTION 19, AND THE SW 1/4 OF SECTION 20, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH P.M., WELD COUNTY COLORADO, BEING MORE PARTICULARLY DESCRIBED AS FOLLOWS:

BASIS OF BEARING: CONSIDERING THE NORTH LINE OF THE SW 1/4 OF SECTION 20, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH P.M., TO BEAR NORTH 89°45'30" EAST BETWEEN THE MONUMENTS SHOWN ON THIS SURVEY AND WITH ALL OTHER BEARINGS CONTAINED HEREIN RELATIVE THERETO;

COMMENCING AT THE SOUTHEAST CORNER OF SECTION 19 TOWNSHIP 2 NORTH RANGE 66 WEST OF THE 6TH P.M.;

THENCE ALONG THE SOUTH LINE OF THE SE 1/4 OF SECTION 19, S 89°48'25" W FOR A DISTANCE OF 210.00 FEET;
THENCE DEPARTING SAID SOUTH LINE N 00°11'29" W FOR A DISTANCE OF 30.00 FEET TO A POINT ON THE NORTH RIGHT-OF-WAY LINE OF COUNTY ROAD 18 AS GRANTED BY A ROAD PETITION FILED APRIL 14, 1884 IN BOOK 3 AT PAGE 344 WELD COUNTY RECORDS;
THENCE ALONG SAID WESTERLY RIGHT OF WAY OF STATE HIGHWAY 85 THE FOLLOWING THREE (3) COURSES AND DISTANCES;
1. N 00°11'29" W FOR A DISTANCE OF 20.90 FEET;
2. N 43°52'01" E FOR A DISTANCE OF 129.40 FEET;
3. N 00°23'08" W FOR A DISTANCE OF 385.39 FEET TO THE POINT OF BEGINNING;
THENCE DEPARTING SAID WEST RIGHT-OF-WAY LINE N 00°25'31" E FOR A DISTANCE OF 4733.45 FEET;
THENCE S 01°35'04" E FOR A DISTANCE OF 2619.96 FEET TO THE EAST ONE-QUARTER CORNER OF SAID SECTION 19;
THENCE ALONG THE NORTH LINE OF THE SW 1/4 OF SAID SECTION 20, N 89°18'45" E FOR A DISTANCE OF 35.00 FEET; THENCE S 00°18'28" E FOR A DISTANCE OF 1322.01 FEET; THENCE S 89°56'16' W FOR A DISTANCE OF 34.30 FEET TO A POINT ON THE WEST LINE OF SAID SW 1/4; THENCE ALONG SAID WEST LINE, N 00°20'17" W FOR A DISTANCE OF 461.07 FEET;
THENCE DEPARTING SAID WEST LINE S 05°08'02" W FOR A DISTANCE OF 1258.86 FEET TO THE POINT OF BEGINNING.

CONTAINING A CALCULATED AREA OF 7.23 ACRES.

<u>LEGAL DESCRIPTION C&M RODRIGUEZ SERVICES INC. ANNEXATION NO. 4:</u>

A PARCEL OF LAND IN THE CITY OF FORT LUPTON, COLORADO LOCATED IN THE E 1/2 OF SECTION 19, AND THE E 1/2 OF SECTION 18, AND THE W 1/2 OF SECTION 17 AND THE NW 1/4 OF SECTION 20, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH P.M., WELD COUNTY COLORADO, BEING MORE PARTICULARLY DESCRIBED AS FOLLOWS:

BASIS OF BEARING: CONSIDERING THE NORTH LINE OF THE SW 1/4 OF SECTION 20, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH P.M., TO BEAR NORTH 89°45'30" EAST BETWEEN THE MONUMENTS SHOWN ON THIS SURVEY AND WITH ALL OTHER BEARINGS CONTAINED HEREIN RELATIVE THERETO;

COMMENCING AT THE SOUTHEAST CORNER OF SECTION 19 TOWNSHIP 2 NORTH RANGE 66 WEST OF THE 6TH P.M.;
THENCE ALONG THE SOUTH LINE OF THE SE 1/4 OF SECTION 19, S 89°48'25" W FOR A DISTANCE OF 210.00 FEET;
THENCE DEPARTING SAID SOUTH LINE N 00°11'29" W FOR A DISTANCE OF 30.00 FEET TO A POINT ON THE NORTH RIGHT-OF-WAY LINE OF COUNTY ROAD 18 AS

GRANTED BY A ROAD PETITION FILED APRIL 14, 1884 IN BOOK 3 AT PAGE 344 WELD COUNTY RECORDS, THE POINT OF BEGINNING;
THENCE ALONG SAID WESTERLY RIGHT OF WAY OF STATE HIGHWAY 85 THE FOLLOWING THREE (3) COURSES AND DISTANCES;
1. N 00°11'29" W FOR A DISTANCE OF 20.90 FEET;
2. N 43°52'01" E FOR A DISTANCE OF 129.40 FEET;
3. N 00°23'08" W FOR A DISTANCE OF 385.39 FEET TO THE POINT OF BEGINNING;
THENCE CONTINUING ALONG SAID WEST RIGHT-OF-WAY LINE THE FOLLOWING SEVEN (7) COURSES AND DISTANCES;
1. N 00°23'08" W FOR A DISTANCE OF 792.63 FEET;
2. N 00°10'09" W FOR A DISTANCE OF 989.19 FEET;
3. N 00°21'28" W FOR A DISTANCE OF 2974.27 FEET TO A POINT ON THE NORTH LINE OF SECTION 19;
4. N 00°58'51" W FOR A DISTANCE OF 33.24 FEET;
5. N 00°28'19" W FOR A DISTANCE OF 1122.64 FEET;
6. N 00°29'44" W FOR A DISTANCE OF 1474.43 FEET TO THE NORTH LINE OF THE SE 1/4 OF SECTION 18;
7. N 00°28'59" W FOR A DISTANCE OF 1358.99 FEET;
THENCE DEPARTING SAID WEST RIGHT-OF-WAY LINE, S 01°23'12" E FOR A DISTANCE OF 3983.71 FEET; THENCE N 00°11'25" E FOR A DISTANCE OF 5275.81 FEET TO THE NE SECTION CORNER OF SAID SECTION 18; THENCE ALONG THE NORTH LINE OF THE NW 1/4 OF SECTION 17, N 87°19'17" E FOR A DISTANCE OF 22.85 FEET TO A POINT ON THE EAST RIGHT-OF-WAY LINE OF STATE HIGHWAY 85;
THENCE ALONG SAID EAST RIGHT-OF-WAY LINE THE FOLLOWING TEN (10) COURSES AND DISTANCES;
1. S 00°32'01" E FOR A DISTANCE OF 2650.36 FEET;
2. S 00°29'30" E FOR A DISTANCE OF 2482.99 FEET;
3. S 09°58'26" E FOR A DISTANCE OF 121.84 FEET;
4. S 00°19'48" E FOR A DISTANCE OF 27.88 FEET;
5. N 89°38'15" E FOR A DISTANCE OF 95.00 FEET;
6. S 00°16'18" E FOR A DISTANCE OF 27.16 FEET;
7. S 33°22'45" W FOR A DISTANCE OF 90.10 FEET;
8. S 00°18'45" E FOR A DISTANCE OF 248.00 FEET;
9. S 89°41'15" W FOR A DISTANCE OF 50.00 FEET;
10. S 00°18'45" E FOR A DISTANCE OF 2293.50 FEET TO A POINT ON THE NORTH LINE OF THE SW 1/4 OF SECTION 20; THENCE ALONG SAID NORTH LINE S 89°18'45" W FOR A DISTANCE OF 45.00 FEET TO THE WEST ONE-QUARTER CORNER OF SAID SECTION 20; THENCE N 01°35'04" W FOR A DISTANCE OF 2619.96 FEET; THENCE S 00°25'31" W FOR A DISTANCE OF 4733.45 FEET TO THE POINT OF BEGINNING.

CONTAINING A CALCULATED AREA OF 17.98 ACRES.

<u>LEGAL DESCRIPTION C&M RODRIGUEZ SERVICES INC. ANNEXATION NO. 5:</u>

A PARCEL OF LAND IN THE CITY OF FORT LUPTON, COLORADO LOCATED IN THE E 1/2 OF SECTION 18, AND THE E 1/2 OF SECTION 7, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH P.M., WELD COUNTY COLORADO, BEING MORE PARTICULARLY DESCRIBED AS FOLLOWS:

BASIS OF BEARING: CONSIDERING THE EAST LINE OF THE SE 1/4 OF SECTION 7, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH P.M., TO BEAR NORTH 00°38'04" WEST BETWEEN THE MONUMENTS SHOWN ON THIS SURVEY AND WITH ALL OTHER BEARINGS CONTAINED HEREIN RELATIVE THERETO;

COMMENCING AT THE NORTHEAST SECTION CORNER OF SAID SECTION 18 SAID POINT BEING THE POINT OF BEGINNING; THENCE ON THE EAST LINE OF THE SE 1/4 OF SAID SECTION 7,
N 00°38'03" W FOR A DISTANCE OF 139.50 FEET TO A POINT OF CURVATURE;
THENCE DEPARTING SAID EAST LINE ON A CURVE TO THE LEFT HAVING A RADIUS OF 1176.00 FEET A DELTA ANGLE OF 01°48'27" FOR AN ARC DISTANCE OF 37.10 FEET THE CHORD OF WHICH BEARS N 14°07'01" W FOR A DISTANCE OF 37.10 FEET;
THENCE N 15°01'31" W FOR A DISTANCE OF 820.58 FEET;
THENCE N 09°37'09" W FOR A DISTANCE OF 1596.90 FEET;
THENCE N 16°22'30" E FOR A DISTANCE OF 82.53 FEET;
THENCE N 09°04'01" W FOR A DISTANCE OF 235.90 FEET;
THENCE N 05°16'29" E FOR A DISTANCE OF 262.40 FEET TO A POINT OF CURVATURE;
ON A CURVE TO THE LEFT HAVING A RADIUS OF 985.00 A DELTA ANGLE OF 14°34'53" FOR AN ARC LENGTH OF 250.68 FEET THE CHORD OF WHICH BEARS N 02°01'01" W FOR A DISTANCE OF 250.00 FEET;
THENCE N 09°18'31" W FOR A DISTANCE OF 1910.37 FEET TO A POINT ON THE NORTH LINE OF THE NE 1/4 OF SAID SECTION 7;
THENCE ALONG SAID NORTH LINE S 87°40'49" W FOR A DISTANCE OF 151.24 FEET;
THENCE DEPARTING SAID NORTH LINE ALONG THE WEST RIGHT-OF-WAY LINE OF STATE HIGHWAY 85 THE FOLLOWING SIX (6) COURSES AND DISTANCES;
1. S 09°37'58" E FOR A DISTANCE OF 686.16 TO A POINT OF CURVATURE;
2. ON A CURVE TO THE RIGHT HAVING A RADIUS OF 5640.00 FEET A DELTA ANGLE OF 05°04'48" FOR AN ARC DISTANCE OF 500.06 FEET THE CHORD OF WHICH BEARS S 07°08'45" E FOR A DISTANCE OF 499.90 FEET;
3. S 04°32'43" E FOR A DISTANCE OF 1242.34 FEET TO A POINT OF CURVATURE;
4. ON A CURVE TO THE LEFT HAVING A RADIUS OF 5820.00 FEET A DELTA ANGLE OF 01°06'59" FOR AN ARC DISTANCE OF 113.40 FEET THE CHORD OF WHICH BEARS S 04°58'10" E FOR A DISTANCE OF 113.40 FEET;
5. S 48°42'20" W FOR A DISTANCE OF 86.00 FEET;
6. S 06°18'10" E FOR A DISTANCE OF 18.23 FEET TO A POINT ON THE NORTH RIGHT-OF-WAY LINE OF COUNTY ROAD 22.5;

THENCE ALONG SAID NORTH RIGHT-OF-WAY LINE, S 87°58'19" W FOR A DISTANCE OF 590.71 FEET TO A POINT ON THE EAST RIGHT-OF-WAY LINE OF COUNTY ROAD 25.5;
THENCE ALONG SAID EAST RIGHT-OF-WAY LINE, N 00°36'04" W FOR A DISTANCE OF 2603.83 FEET TO A POINT ON THE NORTH LINE OF THE NE 1/4 OF SAID SECTION 7;
THENCE ALONG SAID NORTH LINE, S 87°40'49" W FOR A DISTANCE OF 30.02 FEET TO THE EAST ONE-SIXTEENTH CORNER OF SAID SECTION 7;
THENCE CONTINUING ALONG SAID NORTH LINE, S 87°40'49" W FOR A DISTANCE OF 30.01 FEET TO A POINT ON THE WEST RIGHT-OF-WAY LINE OF SAID COUNTY ROAD 25.5;
THENCE ALONG SAID WEST RIGHT-OF-WAY LINE, S 00°36'04" E FOR A DISTANCE OF 2663.54 FEET TO A POINT ON THE SOUTH RIGHT-OF-WAY LINE OF SAID COUNTY ROAD 22.5;
THENCE ALONG SAID SOUTH RIGHT-OF-WAY LINE, N 87°58'19" E FOR A DISTANCE OF 671.51 FEET TO A POINT ON THE WEST RIGHT-OF-WAY LINE OF STATE HIGHWAY 85;
THENCE ALONG THE WEST RIGHT-OF-WAY LINE OF SAID HIGHWAY THE FOLLOWING SEVEN (7) COURSES AND DISTANCES;
1. S 43°33'40" E FOR A DISTANCE OF 93.32 FEET;
2. S 08°04'10" E FOR A DISTANCE OF 110.10 FEET;
3. S 08°36'40" E FOR A DISTANCE OF 1129.80 FEET;
4. S 08°50'41" E FOR A DISTANCE OF 533.00 FEET;
5. S 08°53'42" E FOR A DISTANCE OF 788.10 FEET;
6. S 08°47'27" E FOR A DISTANCE OF 472.92 FEET TO A POINT OF CURVATURE;
7. ON A CURVE TO THE RIGHT HAVING A RADIUS OF 5640.04 FEET A DELTA ANGLE OF 08°17'58" FOR AN ARC LENGTH OF 816.98 FEET THE CHORD OF WHICH BEARS S 04°37'43" E FOR A DISTANCE OF 816.26 FEET; THENCE DEPARTING SAID WEST RIGHT-OF-WAY LINE,
S 01°23'12" E FOR A DISTANCE OF 3983.71 FEET; THENCE N 00°11'25' E FOR A DISTANCE OF 5275.78 FEET TO THE POINT OF BEGINNING. ALONG WITH A PARCEL OF LAND DESCRIBED AS FOLLOWS;

A PARCEL OF LAND IN THE CITY OF FORT LUPTON, COLORADO LOCATED IN THE NE 1/4 OF SECTION 7, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH P.M., WELD COUNTY COLORADO, BEING MORE PARTICULARLY DESCRIBED AS FOLLOWS:

BASIS OF BEARING: CONSIDERING THE NORTH LINE OF THE NE 1/4 OF SECTION 7, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH P.M., TO BEAR SOUTH 87°40'48" WEST BETWEEN THE MONUMENTS SHOWN ON THIS SURVEY AND WITH ALL OTHER BEARINGS CONTAINED HEREIN RELATIVE THERETO;

COMMENCING AT THE NORTHEAST SECTION CORNER OF SAID SECTION 7, THENCE S 87°40'48" W FOR A DISTANCE OF 890.88 TO THE NORTHEAST CORNER OF LOT B OF RE-4015 AND ALSO A POINT ON THE WEST RIGHT-OF-WAY OF HIGHWAY 85 BEING THE POINT OF BEGINNING; THENCE ALONG HIGHWAY 85 THE FOLLOWING THREE (3) COURSES AND DISTANCES;

1. S 09°37'58" E FOR A DISTANCE OF 686.16 TO A POINT OF CURVATURE;
2. ON A CURVE TO THE RIGHT HAVING A RADIUS OF 5640.00 FEET A DELTA ANGLE OF 05°04'48" FOR AN ARC DISTANCE OF 500.06 FEET THE CHORD OF WHICH BEARS S 07°08'45" E FOR A DISTANCE OF 499.90 FEET;
3. S 04°32'43" E FOR A DISTANCE OF 645.64 FEET TO THE SOUTHEAST CORNER OF SAID LOT B; THENCE ALONG THE SOUTH LINE OF SAID LOT B THE FOLLOWING THREE (3) COURSES AND DISTANCES;

1. N 48°18'51' W FOR A DISTANCE OF 300.89 FEET;
2. N 42°07'31" W FOR A DISTANCE OF 272.35 FEET;
3. N 46°14'01" W FOR A DISTANCE OF 281.30 FEET TO A POINT ON THE EAST RIGHT-OF-WAY LINE OF COUNTY ROAD 25.5; THENCE ALONG SAID EAST RIGHT-OF-WAY LINE,

N00°36'04" W FOR A DISTANCE OF 1203.48 FEET TO THE NORTH LINE OF SAID NE 1/4; THENCE N 87°40'49" E FOR A DISTANCE OF 395.32 FEET TO THE POINT OF BEGINNING.

CONTAINING A COMBINED CALCULATED AREA OF 54.44 ACRES.

ORDINANCE NO. 2020-1084

INTRODUCED BY: BRUCE FITZGERALD

ADOPT ORDINANCE 2020-1084 INITIALLY ZONING LAND KNOWN AS THE C&M RODRIGUEZ INITIAL ZONING, LEGALLY DESCRIBED IN EXHIBIT A, TO THE 'C-2' HEAVY INDUSTRIAL ZONE DISTRICT.

INTRODUCED, READ, AND PASSED ON FIRST READING, AND ORDERED PUBLISHED this 21st day of April 2020.

PUBLISHED in the Fort Lupton Press the 29th day of April 2020.

FINALLY READ BY TITLE ONLY, PASSED AND ORDERED PUBLISHED BY TITLE ONLY this 19th day of May 2020.

PUBLISHED BY TITLE ONLY the 27th day of May 2020.

EFFECTIVE (after publication) the 26th day of June 2020.

CITY OF FORT LUPTON, COLORADO

_____
Zo Stieber, Mayor

ATTEST:

_____
Maricela Peña, City Clerk
Approved as to form:

_____
Andy Ausmus, City Attorney

EXHIBIT A

LOT B OF RE 4015, LYING IN THE EAST ½ OF THE NORTHEAST ¼ OF SECTION 7, TOWNSHIP 2 NORTH, RANGE 66 WEST, OF THE 6TH P.M., WELD COUNTY, COLORADO.

ORDINANCE NO. 2020-1085

INTRODUCED BY: SHANNON RHODA

A ORDINANCE OF THE CITY COUNCIL OF FORT LUPTON ACCEPTING THE KURT W. CONNER FAMILY TRUST AND FORT LUPTON FIRE PROTECTION DISTRICT PUBLIC RIGHT OF WAY DEDICATION FOR 9TH STREET LOCATED IN THE SOUTH HALF OF THE SOUTHEAST QUARTER OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH PRINCIPAL MERIDIAN, BEING PART OF LOT 2, CONNER TRUST - FORT LUPTON FIRE PROTECTION DISTRICT MINOR SUBDIVISION PLAT, WELD COUNTY, COLORADO.

THIS RIGHT OF WAY IS CREATED AND GRANTED THIS 21ST DAY OF APRIL 2020.

INTRODUCED, READ, AND PASSED ON FIRST READING, AND ORDERED PUBLISHED this 21st day of April 2020.
PUBLISHED in the Fort Lupton Press the 29th day of April 2020.

FINALLY READ BY TITLE ONLY, PASSED AND ORDERED PUBLISHED BY TITLE ONLY this 19th day of May 2020.

PUBLISHED BY TITLE ONLY the 27th day of May 2020.

EFFECTIVE (after publication) the 26th day of June 2020.

CITY OF FORT LUPTON, COLORADO

_____
Zo Stieber, Mayor

ATTEST:

_____
Maricela Peña, City Clerk

Approved as to form:

_____
Andy Ausmus, City Attorney

ORDINANCE NO. 2020-1086

INTRODUCED BY: CHRIS CERETTO

A ORDINANCE OF THE CITY COUNCIL OF FORT LUPTON ACCEPTING THE KURT W. CONNER FAMILY TRUST PUBLIC RIGHT OF WAY DEDICATION FOR COUNTY ROAD 31 LOCATED IN THE SOUTH HALF OF THE SOUTHEAST QUARTER OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH PRINCIPAL MERIDIAN, BEING PART OF LOT 2, CONNER TRUST - FORT LUPTON FIRE PROTECTION DISTRICT MINOR SUBDIVISION PLAT, WELD COUNTY, COLORADO.

THIS RIGHT OF WAY IS CREATED AND GRANTED THIS 21ST DAY OF APRIL 2020.

INTRODUCED, READ, AND PASSED ON FIRST READING, AND ORDERED PUBLISHED this 21st Day of April 2020.

PUBLISHED in the Fort Lupton Press the 29th day of April 2020.

FINALLY READ BY TITLE ONLY, PASSED AND ORDERED PUBLISHED BY TITLE ONLY this 19th day of May 2020.

PUBLISHED BY TITLE ONLY the 27th day of May 2020.

EFFECTIVE (after publication) the 26th day of June 2020.

CITY OF FORT LUPTON, COLORADO

_____

Zo Stieber, Mayor

ATTEST:

_____

Maricela Peña, City Clerk

Approved as to form:

_____

Andy Ausmus, City Attorney

CITY OF FORT LUPTON
CITY COUNCIL

CITY OF Fort Lupton EST 1836

COME PAINT YOUR FUTURE WITH US

Zo Stieber, Mayor

Shannon Rhoda, Ward 1
Chris Ceretto, Ward 2
Michael Sanchez, Ward 3

David Crespin, Ward 1
Tommy Holton, Ward 2
Bruce Fitzgerald, Ward 3

AM 2020-099

A RESOLUTION OF THE CITY COUNCIL OF FORT LUPTON APPROVING THE COTTONWOOD GREENS FINAL PUD DEVELOPMENT PLAN AND FINAL PLAT FOR FILING NOS. 1 – 3 SUBMITTED BY ARBOR CAPITAL PARTNERS, LLC TO CREATE A RESIDENTIAL SUBDIVISION

I. Agenda Date: Council Meeting – May 19, 2020

II. Attachments:

a. Proposed Resolution
b. Staff Report
c. Land Use Application
d. Withdrawal Letter for Filings Nos. 4 – 5
e. Final Plat Maps for Filing Nos. 1 – 3
f. Layout Revisions Exhibit
g. Landscape & Phasing Plan
h. Development Guide
i. Phase III Drainage Report
j. Preliminary Geotechnical Evaluation Report
k. Construction Drawings & Grading, Erosion and Sediment Plans
l. Civil Costs Estimate
m. Referral Responses

III. Summary Statement:

Arbor Capital Partners, LLC has applied for approval of the Cottonwood Greens Final PUD Development Plan and Final Plats for Filings Nos. 1 – 3 ("Final PUD Plats"). The proposed development is for a residential subdivision that will include single-family detached houses and single-family attached (townhomes) house, as well as a neighborhood park, pocket parks, and a trail system that will interconnect to the Fort Lupton Parks & Trails Master Plan. The Property is located north and adjacent to 9th Street, and between Northrup Avenue and County Road 31.

IV. Submitted by: _____
Planner

V. Finance Reviewed _____
Finance Director

VI. Approved for Presentation: _____
City Administrator

VII. Attorney Reviewed _____ Approved _____ Pending Approval

VIII. Certification of Council Approval: _____ _____
City Clerk Date

IX. Detail of Issue/Request:

Arbor Capital Partners, LLC has applied for approval of the Cottonwood Greens Final PUD Development Plan and Final Plats for Filings Nos. 1 – 3 ("Final PUD Plats"). The proposed development is for a residential subdivision that will include single-family detached houses and single-family attached (townhomes) house, as well as a neighborhood park, pocket parks, and a trail system that will build out a portion of the Fort Lupton Parks & Trails Master Plan. The single-family attached portion of the development will require additional submittals and review prior to development of Track D included in Filing 3. The Property is located north and adjacent to 9th Street, and between Northrup Avenue and County Road 31.

Additional information on this application can be found in the attached application materials, as well as the attached staff report. Other submittal documents may not be included with this packet, but can be available for review upon request.

X. Legal/Political Considerations:

This Final PUD Plat is being reviewed under the PUD Planned Unit Development District provisions in the Zoning Regulations, as well as the final plat provisions of the code in the Subdivision Regulations. Section 16-45(c)(3) states that, except as specifically provided in this Section, PUD plan applications shall be processed in the same manner as set forth in this Code for major subdivisions. Section 17-23 states that a final plat is to be reviewed by City Council, and does not require Planning Commission review. The Code requires that a subdivision improvements agreement be submitted by the applicant for review by the City Attorney and City Council. A subdivision improvements agreement has been addressed in the conditions of approval included on the proposed resolution.

This is the final step in the major subdivision process. The first step is approval of a sketch PUD plat (reviewed and approved on May 6, 2019), and the second step is approval of the preliminary PUD plat (reviewed and approved on December 16, 2019).

Notifications are not required for a final plat, however referral agencies were provided with the submittal documents for review. All referral comments received are enclosed with this Action Memorandum.

The original submittal requested approval of Filing Nos. 1 - 5, however the Applicant has requested a withdrawal of Filing Nos. 4 and 5 in order to address oil and gas operations that affect those filings. A request was submitted by the Application to withdraw consideration of Filing Nos. 4 and 5, and is included in the materials attached to this Action Memorandum.

XI. Alternatives/Options:

The City Council has the following three options for each request:

a) Approve the proposed resolution.
b) Approve the proposed resolution with conditions.
c) Continue the hearing for additional information or further study.
d) Deny the proposed resolution.

XII. Financial Considerations:

All applicable land use application fees have been paid and a fee deposit has been submitted to cover costs related to the application.

XIII. Staff Recommendation:

Staff recommends conditional approval of the Cottonwood Greens Final PUD Development Plan and Final Plat for Filing Nos. 1 – 3.

RESOLUTION NO. 2020Rxxx

A RESOLUTION OF THE CITY COUNCIL OF FORT LUPTON APPROVING THE COTTONWOOD GREENS FINAL PUD DEVELOPMENT PLAN AND FINAL PLATS FOR FILING NOS. 1 – 3 SUBMITTED BY ARBOR CAPITAL PARTNERS, LLC TO CREATE A RESIDENTIAL SUBDIVISION LOCATED IN SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH P.M., CITY OF FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO.

WHEREAS, Arbor Capital Partners, LLC ("Applicant") has applied for approval of the Cottonwood Greens Final PUD Development Plan and Final Plats for Filing Nos. 1 – 3 (the "Application") for a single-family residential subdivision; and

WHEREAS, pursuant to Section 16-45(c)(3) of the Fort Lupton Zoning Regulations, PUD development plan applications shall be processed in the same manner as set forth in the Fort Lupton Subdivision Regulations; and

WHEREAS, the Fort Lupton City Council held a public hearing on May 19, 2020, for the purpose of reviewing the Cottonwood Greens Final PUD Development Plan and Final Plats for Filing Nos. 1 – 3 to subdivide the property for a residential subdivision; and

WHEREAS, after review of the Application, and consideration of staff comments, Applicant's presentation, and any public input, the City Council finds that the Application is in conformance with the Colorado Revised Statutes, City codes and policies, and Comprehensive Plan adopted by the City; and

NOW THEREFORE BE IT RESOLVED that the Fort Lupton City Council reviewed the plans and supporting documentation, all referral comments and any citizen input in response to this application. Based upon review of the applicable policies and goals in the Fort Lupton Comprehensive Plan, review of the Subdivision and Zoning Regulations, an analysis of referral comments and facts presented on this date, the City Council hereby recommends approval of the Cottonwood Greens Final PUD Development Plan and Final Plats for Filing Nos. 1 – 3 located in Section 33, Township 2 North, Range 66 West of the 6th P.M,, City of Fort Lupton, County of Weld, State of Colorado with the following conditions:

I. Prior to recording the Final Plats for Filing Nos. 1 – 3:

A. The title of the Final Plats shall be updated to include the Project No. LUP2020-0010 and Plan No. FPL2020-0002.

B. Any redlines provided by City staff shall be made to the Final Plat maps.

C. Applicant shall finalize a subdivision improvements agreement for review and approval by City Council.

D. Submit cash-in-lieu or transfer appropriate water shares for the filings being recorded.

E. Applicant shall provide written evidence that the comments from United Power have been adequately addressed.

F. Applicant shall provide written evidence that the comments from Xcel Energy (Public Service Company) have been adequately addressed.

G. Applicant shall finalize trail names and trailhead locations and signage with Planning Department staff.

H. Applicant shall provide written evidence that the comments from Public Works have be adequately addressed.

II. Prior to the start of construction:

A. Applicant shall provide written evidence that the comments from the Fort Lupton Fire Protection District have been adequately addressed.

III. The Final Plats shall be recorded within three (3) years of approval.

APPROVED AND PASSED BY A MAJORITY VOTE OF THOSE ELECTED TO THE CITY COUNCIL OF THE CITY OF FORT LUPTON, COLORADO THIS 19th DAY OF MAY 2020.

City of Fort Lupton, Colorado

_____

Zo Stieber, Mayor

Attest:

_____

Maricela Peña, City Clerk

Approved as to form:

_____

Andy Ausmus, City Attorney

COTTONWOOD GREENS FINAL PUD DEVELOPMENT PLAN & FINAL PLAT FOR FILING NOS. 1 – 3
STAFF REPORT
LUP2020-0010 & PLAN NO. FPL2020-0002

PROJECT DESCRIPTION

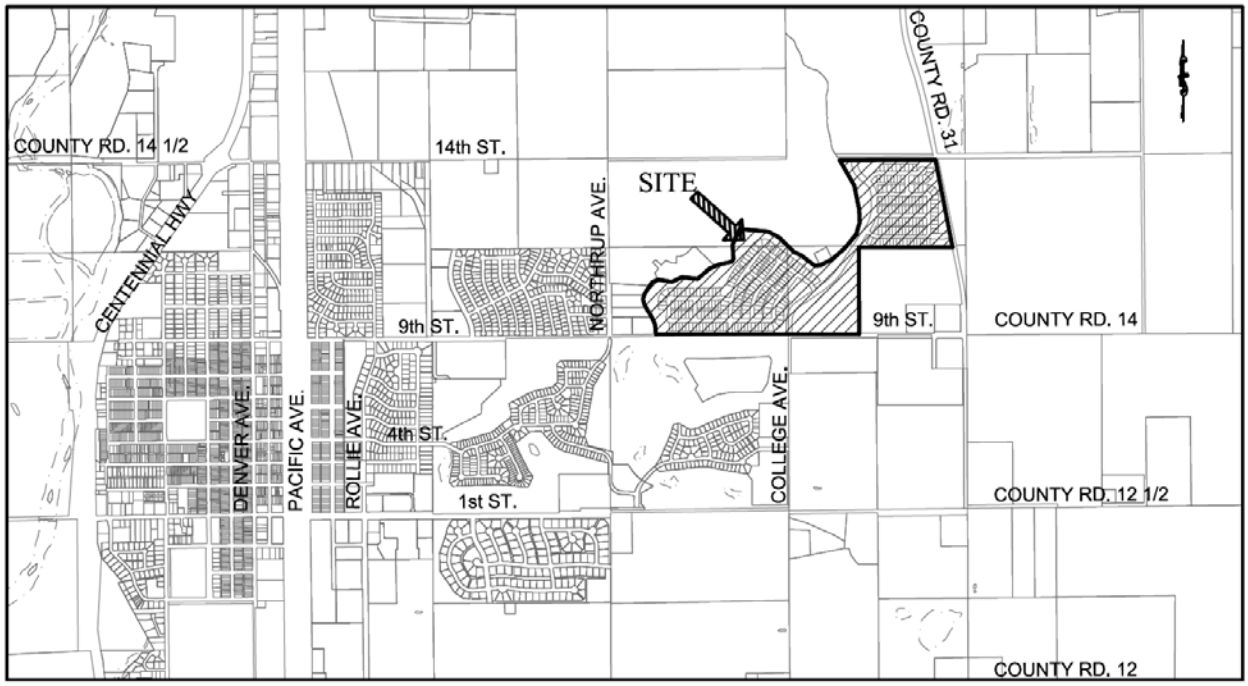
Project No.: LUP2020-0010 / Plan No.: FPL2020-002

Project Name: Cottonwood Greens PUD Final PUD Development Plan & Final Plat Filing Nos. 1 – 3

Owner's Name: Arbor Capital Partners, LLC ("Applicant")

Location of Request:

The site consists of land located north and adjacent to 9th Street and west and adjacent to County Road 31 (the "Property"). The Property is located in South Half of Section 33, Township 2 North, Range 66 West of the 6th Principal Meridian, City of Fort Lupton., County of Weld, State of Colorado.



Nature of Request:

The Applicant has submitted a request for approval of a Final PUD Development Plan and Final Plat Filing Nos. 1 – 3 for a residential subdivision. The original submittal requested approval of Filing Nos. 1 -5, however the Applicant has requested a withdrawal of Filing Nos. 4 – 5 in order to address oil and gas operations that affect those filings. Total lots anticipated for Filing Nos. 1 – 3 are to be 184 lots (Filing No. 1 – 67 lots, Filing No. 2 – 58 lots, and Filing No. 3 – 59 lots). The development will include single-family detached houses and single-family attached (townhomes) houses, as well as a neighborhood

park, pocket parks and a trail system will build out a portion of the Fort Lupton Parks & Trails Master Plan.

Site Size: 130.95 acres, more or less, for the entire development, with Filing No. 1 – 20.61± acres, Filing No. 2 – 12.53± acres, and Filing No. 3 – 47.98± acres. The remaining acreage is included within the planned additional future filings that will be submitted at a later date.

Zone District: PUD Planned Unit Development.

Proposed Use: A residential subdivision to include single-family detached houses and single-family attached (townhomes) houses.

Existing Use: Vacant/Agricultural

Meeting Date: City Council – May 19, 2020 at 7:00 PM.

Meeting Location: Fort Lupton City Hall – Council Chambers, 130 S. McKinley Ave., Fort Lupton, Colorado. In the event that the City Hall remains closed at the time of the hearings due to COVID-19, the public meeting will be held remotely, accessible to the public by phone and internet.

Staff Recommendation: Approval with conditions, as shown on the proposed resolution.

SUMMARY OF PREVIOUS APPLICATIONS

In 2006, the City Council approved a metropolitan district, final plat, subdivision improvement agreement, and PUD development plan for this property. However, the subdivision was never developed, and the property ownership became fragmented. The metropolitan district remains in effect, however each separate ownership parcel(s) will be required to start the development process over.

On May 6, 2019, the Fort Lupton City Council approved the Cottonwood Greens Sketch PUD Plat (Resolution 2019R034), and on December 16, 2019, the PUD Development Plan and Preliminary PUD Plat was approved (Resolution 2019R090).

APPLICATION PROCESS

The Applicant is requesting approval of a PUD development plan and final plats for Filing Nos. 1 – 3 of the Cottonwood Greens PUD. Pursuant to Section 16-45(c)(3) of the Fort Lupton Municipal Code (FLMC), except as specifically provided in said Section, PUD plan applications shall be processed in the same manner as set forth in this Code for major subdivisions, including all preapplication conferences, sketch PUD plan, preliminary PUD plan and final PUD plan applications, public hearings and recording with the County Clerk and Recorder.

Section 17-23 states that a final plat is to be reviewed by City Council at a public meeting. A final plat does not require Planning Commission review. The Code requires that a subdivision improvements agreement be submitted by the applicant for review by the City Attorney and City Council. A subdivision improvements agreement has been addressed in the conditions of approval included on the proposed resolution.

This is the final step in the major subdivision process. The single-family attached homes proposed on Tract D will require additional submittals and review prior to development of Tract D. The first step is approval

of a sketch PUD plat (reviewed and approved on May 6, 2019), and the second step is approval of the preliminary PUD plat (reviewed and approved on December 16, 2019).

NOTIFICATION REQUIREMENTS

Notifications are not required for a final plat, however referral agencies were provided with the submittal documents for review. All referral comments received are enclosed with this Action Memorandum.

CONFORMANCE WITH CITY STANDARDS, REGULATIONS AND POLICIES

Section 16-45 – PUD Planned Unit Development District

a) The Planned Unit Development (PUD) Provisions contained herein are intended to provide for the planning and development of substantial tracts of land, suitable in location and character for the uses proposed, as unified and integrated entities in accordance with detailed development plans.

This application is for the first three filings of a proposed 130.95 acre subdivision that includes attached and detached single-family residential. Staff believes that this residential development meets the intent of the PUD zoning regulations, as detailed in the enclosed submittal materials, as well as below.

(1) PUD permit requirements. All development within a PUD District must be in accordance with an approved PUD plan. No building or development permits shall be issued within a PUD District unless they are in conformance with an approved PUD plan for that District.

A preliminary PUD plan was previously approved by the City Council on December 16, 2019, concurrently with approval of the Preliminary PUD Plat submitted by the Applicant. The final PUD plan has been submitted with the final plat.

(2) PUD plan format and content, general. In accordance with this Section, PUD plans shall contain unique district regulations that apply to specific parcels of land within a PUD District, including permitted and special uses, lot sizes, bulk, density, general layout, architectural guidelines and location of and standards for public facilities and amenities, and any design standards that vary from the City of Fort Lupton Standards and Specifications for the Design and Construction of Public Improvements. Unless specifically modified by a PUD plan, all provisions of the City's Code and adopted standards and specifications shall apply within PUD Districts. PUD plans shall be in the same general format as required for subdivision plats.

A PUD plan has been submitted for the proposed development, and is laid out in the previously submitted and approved Preliminary PUD Plat maps, and is also included in the Final PUD Plat maps and related submittal documents.

(3) PUD plan process, general. All PUD plan applications shall be submitted and processed simultaneously with the subdivision applications for the property. PUD plan and subdivision applications may also be processed concurrently with the proposed amendment to the

Official Zoning Map, creating a PUD District. Except as specifically provided in this Section, PUD plan applications shall be processed in the same manner as set forth in this Code for major subdivisions, including all preapplication conferences, sketch PUD plan, preliminary PUD plan applications, public hearings and recording with the County Clerk and Recorder.

These requirements have been met. The City has a general land use application. A sketch PUD plan was approved by City Council in May 6, 2019, and the PUD plan and Preliminary PUD Plat was approved on December 16, 2019. This is the final step in the PUD Plan process. An amendment to the Official Zoning Map was not required for this application, because PUD zoning was already in place for the proposed uses prior to this application.

(4) Maintenance of private facilities. The owner shall establish an organization for the ownership and maintenance of any approved private streets and/or common open space areas unless other adequate arrangements for the ownership and maintenance thereof are provided in a manner acceptable to the City.

The conditions of approval listed in the proposed Resolution require that a subdivision improvements agreement be submitted for approval by City Council prior to recording the Final Plat maps. These items will address the ownership and maintenance of streets and open space within the subdivision.

(5) PUD size. Unless specifically waived by the City Council, the area included in a PUD plan must be at least ten (10) acres in size.

This development is over ten (10) acres, and therefore meets this requirement.

(6) Approval. Approval of a final PUD plan by the City Council shall be by ordinance.

A final PUD plan is submitted concurrently with the Final Plats for Filing Nos. 1 – 3 for consideration by City Council with the existing resolution. The PUD zoning was completed by Ordinance with the annexation and zoning of the entire Cottonwood PUD properties in 2005.

b) Intent. PUD provisions are intended to further the following objectives:

(1) To permit and encourage innovative design and high quality, master-planned urban developments on large parcels of land.

(2) To permit greater flexibility in the application of zoning and development standards and greater freedom in providing a mix of land uses in the development of a balanced community.

(3) To preserve critical environmental resources, provide above-average open space and recreational amenities, include exceptional design and provide greater efficiency in the layout and provision of roads, utilities and other infrastructure.

(4) To provide flexibility in land planning and development, resulting in amenable relationships between buildings and ancillary uses, and permitting more intensive use of land where well-related open space and recreational facilities are integrated into overall design.

(5) To encourage unity and diversity in land development, resulting in convenient and harmonious groupings of uses, structures and common facilities, varied type design and layout of housing and other buildings and appropriate relationships of open spaces to intended uses and structures.

(6) To encourage unified and planned development of a site, with or without customary subdivision into single lots, and without specific application of the district regulations as provided for individual lots, subject to the regulations set forth herein.

(7) To provide for and encourage the preservation and enhancement of desirable natural landscape and other features unique to a development site.

(8) To provide reasonable standards and criteria by which the specific proposals for a PUD can be evaluated.

(9) To provide a procedure which can relate the design and layout of unified residential, commercial or industrial developments to the particular site and demand for such development in a manner consistent with the preservation of property values within established residential areas.

With respect to Section 16-45(d)(1)-(9) above, staff finds that the proposed final PUD plat substantively meets the intent of this subsection. The development will provide a variety of residential types (attached and detached), thus providing a higher diversity of housing project within the City for a variety of demographics. The development will include a trail system to connect to the larger trail system of the City's Proposed Trail Map. Staff believes that this residential development meets the intent of the PUD Zone District.

c) General location and planning requirements.

(1) Relation to major transportation system. PUD districts shall be located with respect to major streets and highways or other transportation facilities to be directly accessible without creating traffic on minor streets in residential areas outside such district.

The project will have access off of 9th Street, which will be built out into a collector street, County Road 31, which is planned to be an arterial, and 14th Street, which will also be an arterial according to the City's transportation plan. Staff finds that the proposed development meets this objective.

(2) Relation to public utilities and community facilities. PUD districts shall be located in relation to public utilities and community facilities and services, either existing or to be available by the time development reaches the stage where they will be required, so that such facilities can be provided at reasonable cost and with reasonable efficiency.

Utilities are located near the Property, and is able to be served. Additional information on this is included in the submittal documents received from the Applicant, and addressed in the referral response received from the Public Works Director/City Engineer. Staff finds that the development meets this objective.

(3) Relation to general pattern of urban development. PUD districts shall be planned and located in general compliance with the Comprehensive Plan and shall relate to the major elements of the urban pattern, including housing, commercial facilities and principal places of employment, by physical proximity of major streets so as to provide for the convenience and amenity of residents of the community and to reduce general traffic congestion by a close relationship between origins and destinations.

The Future Land Use Map designates this area as Single Family Detached land use. This designation allows for neighborhoods of predominately single-family detached homes on individual lots. This can consist of a variety of development types, including higher density homes within the City's urban core and planned subdivisions within the residential growth areas. The proposed subdivision complies with this land use designation.

In addition, the project is located near already developed portions of the City, including being directly north of the Coyote Creek Golf Course, Twombley Elementary, and also near other residential within the City. This proximity to current development contributes to the convenience for future residents of the development.

d) Physical character of the site. The site shall be suitable for the development proposed without hazards to structures, occupants or any property from probability of flooding on the site or on adjacent lands, from erosion or deposition of eroded material on adjacent lands, from subsidence of the soils or from other dangerous conditions. Soil, groundwater level, drainage and topography shall be appropriate to both the kind and pattern of use intended.

The project is not located within a floodplain. The Applicant is working with the City Engineer on finalizing plans for drainage on the site and a Phase III Drainage report was submitted with the submittal materials. Staff finds that the development meets this objective.

e) Site planning; external relationships.

(1) Vehicular access. Entrances and exits for vehicles shall be designed to encourage smooth traffic flow with minimum hazards to passing traffic or to traffic entering or leaving the development. Merging or turnout lanes may be required where anticipated traffic flows from or to the PUD indicate the need for such lanes. In no case shall streets within a PUD district connect to streets outside the district in such a way as to encourage use of any minor streets for through traffic.

A traffic impact study was submitted with the preliminary PUD plat application materials for review by the City Engineer, Fire District, and Planning staff. The City Engineer is working with the application on a subdivision improvements agreement, which will address any infrastructure needed to address traffic impacts. Staff finds that the development meets this objective.

(2) Perimeter setback and screening. If topographical or other barriers do not provide adequate buffer between the PUD and adjacent uses, structures on the perimeter of the PUD shall be set back a distance equal to the minimum setback requirement of the adjoining district, or

shall be permanently screened by fences, walls or plantings as required to sufficiently protect the privacy and amenity of adjacent uses, to protect the planned development from potentially adverse external influences such as a major street or highway and, as necessary, to make transition from adjoining district.

The proposed residential uses are compatible to adjacent uses; in addition, an overall landscaping plan was submitted with the application materials and includes perimeter landscaping surrounding the site.

f) Modifications of subdivision regulations.

(1) The improvements required under the subdivision regulations, including streets, storm drainage, sanitary sewerage and potable water systems, shall be provided in each PUD.

The Applicant is working with the City Engineer to finalize a subdivision improvements agreement prior to construction. This agreement will go before City Council for approval prior to recording the final plats for Filings Nos. 1 – 3. In addition, the Property is located within a metro district, which will assist with the development of these improvements.

(2) The requirements and standards for the construction of streets and utilities set forth in the City of Fort Lupton Standards and Specifications for the Design and Construction of Public Improvements shall be subject to modification where the plan and program for a PUD make adequate provision for vehicular and pedestrian access and circulation, recreation, utility and service needs of the tract when fully developed and occupied, and also provide such covenants, easements or other legal documents and provisions as will assure conformity to and successful implementation of the plan. Such modifications shall be contained within the PUD plan, subject to approval by the City Council.

The Applicant is working with the City Engineer to finalize these improvements prior to construction.

REFERRALS

Referrals were provided to the list below. Any comments received are enclosed with the Planning Commission packet.

Building/Grounds Manager	City Attorney	Police Chief
Public Works Director	Building Inspector	Recreation Manager
Golf Course Manager	OMI	GIS Specialist
Finance Director	Fort Lupton Fire Protection District	CDOT
Weld County School District RE-8	Colorado Parks and Wildlife	NCWCD
Fulton Ditch Company	Army Corp of Engineers	United Power
Comcast	CenturyLink	Xcel Energy
Postmaster	Weld County Department of Planning	

STAFF RECOMMENDATION

Staff recommendation conditional approval of the Cottonwood Greens Final PUD Development Plan and PUD Final Plat. Conditions are listed under the proposed Resolution included with the Planning Commission packet.

For more information on this development, please refer to the application materials packet provided. Additional documents may be available for review at the Fort Lupton City Hall.

Form PLAN002

CITY OF Fort Lupton EST 1836

COME PAINT YOUR FUTURE WITH US

Planning & Building

130 S. McKinley Avenue
Fort Lupton, CO 80621

Phone: 303.857.6694
Fax: 303.857.0351

www.fortlupton.org

Project No. _____

Land Use Application Form

A. CONTACT INFORMATION

1) Property Owner Name: Jim Righeimer/Lee Lowrey Managing Partner

Company: Arbor Capital Partners, LLC

Phone: (949)566-8162 Email: Jim@rfcomsites.com

Address: 4040 MacArthur Blvd., Ste. 250 Newport Beach, CA 92660

Preferred method of contact? Email: ☑ Phone: ☐ Mail: ☐

2) Representative Name: Kristin Turner

Company: TB Group

Phone: 970.532.5891 Email: kristin@tbgroup.us

Address: 444 Mountain Avenue Berthoud, CO 80513

Preferred method of contact? Email: ☑ Phone: ☐ Mail: ☐

3) Billing Contact *(where invoices should be directed to)*: Attn: Gloria Morales

Billing Company: Arbor Capital Partners, LLC

Phone: (949)566-8162 Email: Gloria@rfcomsites.com

Address: 4040 MacArthur Blvd., Ste. 250 Newport Beach, CA 92660

B. SITE DESCRIPTION

Site Address: Vacant Land, County Road 14 Fort Lupton, CO 80621

Parcel Number: R5355286, R5353686, R5354286,R4646207, R4646107

Existing Zone Classification: PUD Proposed Zone Classification: PUD

Water Type: Municipal Name: Fort Lupton

Sewage Type: Municipal District Name or Location Hauled to: _____

C. APPLICATION TYPE (CHECK ALL THAT APPLY)

☐ Sketch Plat	☐ Administrative Site Plan	☐ PUD Plan (Preliminary & Final)
☐ Preliminary Plat	☐ Special Use Permit	☐ Variance
☑ Final Plat	☐ Oil & Gas Permit	☐ Administrative Variance
☐ Minor Subdivision	☐ Annexation & Initial Zone	☐ Appeal
☐ Amended Plat	☐ Change of Zone	☐ Other: _____
☐ Site Plan	☐ Comp Plan Amendment	

Project No. _____

D. PROJECT DESCRIPTION

Project Name: Cottonwood Greens

Please provide a short description of the proposed project in the space provided below:

This is a proposal for a residential subdivision with PUD zoning. Single family detached houses and single family attached (townhomes) are proposed for this site. In addition, a neighborhood park, pocket parks and a trail system are proposed.

E. REQUIRED DOCUMENTS

For an application to be considered complete, and for planning staff to begin review and schedule any applicable public hearings, this Land Use Application Form must be fully completed and all required attachments included. Planning staff will review the application for completeness and will provide notice to the representative and/or owner whether the application has been deemed complete.

F. CERTIFICATIONS

Representative Certification

By signing this application, I attest that I am acting with the knowledge and consent of all owners of the property that is the subject of this application, and that I have been designated to act as the representative for the project described in this land use application. I further certify that all information submitted with this application is true and accurate to the best of my knowledge.

Representative: _____ Date: 1/24/20

Owner Certification

I hereby certify that I am the legal owner of record of the property that is the subject of this application. I hereby authorize the representative listed on this application, if any, to communicate directly with City officials and to submit documentation and information regarding this application on my behalf.

Owner: _____ Date: 1.24.2020

For Office Use Only

Received Date: _____

If the application is not complete, state reasons why it is incomplete:

_____

_____

_____

Deemed Complete Date: _____

Fees Submitted: _____ Escrow Submitted: _____

Alyssa Knutson

From: Don Guerra <don.guerra@landassetstrategies.com>
Sent: Monday, May 11, 2020 12:58 PM
To: Alyssa Knutson; Todd Hodges
Cc: 'kristin@tbgroup.us'; Jim Righeimer; Tristan D. Harris
Subject: Cottonwood Greens Filings 4 & 5

Follow Up Flag: Follow up
Flag Status: Flagged

Good morning Alyssa & Todd – Abor Capital Partners, LLC is currently scheduled to present Cottonwood Greens, Filings 1 through 5 to Ft. Lupton's City Council on Tuesday, May 19, 2020. As we had discussed last week, we would like to withdraw Filings 4 and 5 from our current submittal. We do intend to resubmit Filings 4 and 5 at a later date, and we recognize that additional fees will be required upon our resubmittal. We are requesting the withdrawal to allow us to modify the Filing 4 and 5 plats based on coordination with the oil and gas operations within Filings 4 and 5. We will still be presenting Cottonwood Greens Filings 1, 2 and 3 to City Council on May 19th.

Please let me know if you have any questions concerning this request or if you require any further documentation.

Thank you Alyssa & Todd.

Don

Don Guerra
Land Asset Strategies, LLC
619 12th Street, #31
Golden, Colorado 80402
(303) 905-3496
Don.Guerra@landassetstrategies.com

LAND ASSET STRATEGIES

COTTONWOOD GREENS FILING NO. 1

LOCATED IN THE SOUTH HALF OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH PRINCIPAL MERIDIAN, CITY OF FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO

20.46 ACRES

LEGAL DESCRIPTION:

A PLAT OF A PORTION OF THE SOUTH HALF OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE SIXTH PRINCIPAL MERIDIAN, CITY OF FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO, BEING MORE PARTICULARLY DESCRIBED AS FOLLOWS:

BASIS OF BEARINGS: BEARINGS ARE BASED ON THE SOUTH LINE OF THE SOUTHWEST QUARTER OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE SIXTH PRINCIPAL MERIDIAN, MONUMENTED AT THE EAST END BY A FOUND 2–1/2" ALUMINUM CAP STAMPED "2017 LS 38091" AND AT THE WEST END BY A FOUND 1–1/2" BRASS CAP STAMPED "1995 LS 13155". SAID SOUTH LINE BEARS SOUTH 89°50'24" WEST, WITH ALL BEARINGS CONTAINED HEREIN RELATIVE THERETO;

COMMENCING AT THE SOUTH QUARTER CORNER OF SAID SECTION 33;

THENCE ALONG THE EAST LINE OF SAID SOUTHWEST QUARTER NORTH 00°08'34" WEST 30.00 FEET TO THE NORTH RIGHT–OF–WAY LINE OF 9TH STREET, AND THE **POINT OF BEGINNING**;

THENCE ALONG SAID NORTH RIGHT–OF–WAY LINE SOUTH 89°50'24" WEST 907.51 FEET;

THENCE DEPARTING SAID NORTH RIGHT–OF–WAY LINE NORTH 00°09'36" WEST 12.50 FEET TO A POINT OF NON–TANGENT CURVATURE;

THENCE ALONG THE ARC OF A CURVE TO THE LEFT WHOSE CENTER BEARS NORTH 00°09'36" WEST, HAVING A RADIUS OF 15.00 FEET, A CENTRAL ANGLE OF 90°00'00", AND AN ARC LENGTH OF 23.56 FEET;

THENCE NORTH 00°09'36" WEST 133.00 FEET TO A POINT OF CURVATURE;

THENCE ALONG THE ARC OF A CURVE TO THE LEFT WHOSE CENTER BEARS SOUTH 89°50'24" WEST, HAVING A RADIUS OF 12.00 FEET, A CENTRAL ANGLE OF 90°00'00", AND AN ARC LENGTH OF 18.85 FEET;

THENCE NORTH 00°09'36" WEST 60.00 FEET TO A POINT OF NON–TANGENT CURVATURE;

THENCE ALONG THE ARC OF A CURVE TO THE LEFT WHOSE CENTER BEARS NORTH 0°09'36" WEST, HAVING A RADIUS OF 12.00 FEET, A CENTRAL ANGLE OF 90°00'00", AND AN ARC LENGTH OF 18.85 FEET;

THENCE NORTH 89°50'24" E, A DISTANCE OF 60.00 FEET TO A POINT OF NON–TANGENT CURVATURE;

THENCE ALONG THE ARC OF A CURVE TO THE LEFT WHOSE CENTER BEARS NORTH 89°50'24" E, HAVING A RADIUS OF 12.00 FEET, A CENTRAL ANGLE OF 90°00'00", AND AN ARC LENGTH OF 18.85 FEET;

THENCE NORTH 89°50'24" E, A DISTANCE OF 236.00 FEET TO A POINT OF CURVATURE;

THENCE ALONG THE ARC OF A CURVE TO THE LEFT WHOSE CENTER BEARS NORTH 0°09'36" WEST, HAVING A RADIUS OF 12.00 FEET, A CENTRAL ANGLE OF 90°00'00", AND AN ARC LENGTH OF 18.85 FEET;

THENCE NORTH 89°50'24" E, A DISTANCE OF 60.00 FEET TO A POINT OF NON–TANGENT CURVATURE;

THENCE ALONG THE ARC OF A CURVE TO THE LEFT WHOSE CENTER BEARS NORTH 89°50'24" E, HAVING A RADIUS OF 12.00 FEET, A CENTRAL ANGLE OF 90°00'00", AND AN ARC LENGTH OF 18.85 FEET;

THENCE NORTH 89°50'24" E, A DISTANCE OF 108.00 FEET;

THENCE NORTH 00°09'36" WEST 68.50 FEET;

THENCE NORTH 01°36'28" E, A DISTANCE OF 53.39 FEET;

THENCE NORTH 07°52'44" E, A DISTANCE OF 53.06 FEET;

THENCE NORTH 14°19'48" E, A DISTANCE OF 52.72 FEET;

THENCE NORTH 20°44'26" E, A DISTANCE OF 52.39 FEET;

THENCE NORTH 27°06'41" E, A DISTANCE OF 52.07 FEET;

THENCE NORTH 33°40'37" E, A DISTANCE OF 52.08 FEET;

THENCE NORTH 36°28'21" E, A DISTANCE OF 68.50 FEET;

THENCE NORTH 53°31'39" WEST 108.00 FEET TO A POINT OF CURVATURE;

THENCE ALONG THE ARC OF A CURVE TO THE LEFT WHOSE CENTER BEARS SOUTH 36°28'21" WEST, HAVING A RADIUS OF 12.00 FEET, A CENTRAL ANGLE OF 90°00'00", AND AN ARC LENGTH OF 18.85 FEET;

THENCE NORTH 53°31'39" WEST 60.00 FEET TO A POINT OF NON–TANGENT CURVATURE;

THENCE ALONG THE ARC OF A CURVE TO THE LEFT WHOSE CENTER BEARS NORTH 53°31'39" WEST, HAVING A RADIUS OF 12.00 FEET, A CENTRAL ANGLE OF 90°00'00", AND AN ARC LENGTH OF 18.85 FEET;

THENCE NORTH 36°28'21" E, A DISTANCE OF 60.00 FEET;

THENCE NORTH 53°31'39" WEST 128.00 FEET;

THENCE NORTH 36°28'21" E, A DISTANCE OF 330.00 FEET;

THENCE NORTH 53°31'39" WEST 108.00 FEET TO A POINT OF CURVATURE;

THENCE ALONG THE ARC OF A CURVE TO THE LEFT WHOSE CENTER BEARS SOUTH 36°28'21" WEST, HAVING A RADIUS OF 12.00 FEET, A CENTRAL ANGLE OF 90°00'00", AND AN ARC LENGTH OF 18.85 FEET;

THENCE NORTH 66°48'49" WEST 67.27 FEET TO A POINT OF NON–TANGENT CURVATURE;

THENCE ALONG THE ARC OF A CURVE TO THE RIGHT WHOSE CENTER BEARS SOUTH 68°21'46" EAST, HAVING A RADIUS OF 76.00 FEET, A CENTRAL ANGLE OF 47°47'57", AND AN ARC LENGTH OF 63.40 FEET;

THENCE NORTH 31°56'48" WEST 118.29 FEET;

THENCE NORTH 75°18'38" EAST 63.86 FEET;

THENCE NORTH 86°02'13" EAST 64.53 FEET;

THENCE SOUTH 69°00'32" EAST OF 55.66 FEET;

THENCE SOUTH 55°37'53" EAST 57.09 FEET;

THENCE SOUTH 50°33'48" EAST 54.54 FEET;

THENCE SOUTH 50°33'48" EAST 50.07 FEET;

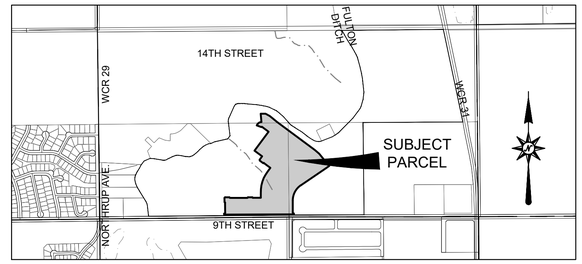
THENCE SOUTH 53°31'39" EAST 620.00 FEET;

THENCE SOUTH 51°59'14" EAST 54.10 FEET;

THENCE SOUTH 48°27'49" EAST 64.35 FEET;

THENCE SOUTH 39°03'03" EAST 215.00 FEET TO A POINT OF NON–TANGENT CURVATURE;

(CONTINUED AT RIGHT)



VICINITY MAP
SCALE: 1"=1000'

(CONTINUED FROM LEFT)

THENCE ALONG THE ARC OF A CURVE TO THE RIGHT WHOSE CENTER BEARS NORTH 37°02'57" WEST, HAVING A RADIUS OF 1042.50 FEET, A CENTRAL ANGLE OF 2°51'04", AND AN ARC LENGTH OF 51.87 FEET;

THENCE SOUTH 55°48'06" WEST 428.22 FEET TO A POINT OF CURVATURE;

THENCE ALONG THE ARC OF A CURVE TO THE LEFT WHOSE CENTER BEARS SOUTH 34°11'54" E, HAVING A RADIUS OF 257.50 FEET, A CENTRAL ANGLE OF 55°48'14", AND AN ARC LENGTH OF 250.80 FEET;

THENCE SOUTH 00°00'08" E, A DISTANCE OF 165.60 FEET TO A POINT OF CURVATURE;

THENCE ALONG THE ARC OF A CURVE TO THE LEFT WHOSE CENTER BEARS NORTH 89°59'52" E, HAVING A RADIUS OF 15.00 FEET, A CENTRAL ANGLE OF 89°42'14", AND AN ARC LENGTH OF 23.48 FEET;

THENCE SOUTH 00°17'38" WEST 12.50 FEET TO THE NORTH RIGHT–OF–WAY LINE OF SAID 9TH STREET;

THENCE ALONG SAID NORTH RIGHT–OF–WAY LINE NORTH 89°42'22" WEST 67.43 FEET TO THE **POINT OF BEGINNING**;

CONTAINING AN AREA OF 897,852 SQUARE FEET OR 20.61 ACRES, MORE OR LESS.

DEDICATION:

KNOW ALL MEN BY THESE PRESENTS THAT WE, AIMS I, A GENERAL PARTNERSHIP; THE RANCH ESTATES, GENERAL PARTNERSHIP, LLP, A COLORADO LIMITED LIABILITY COMPANY, BEING THE SOLE OWNERS OF THE LAND DESCRIBED HEREIN, HAVE CAUSED SAID LAND TO BE LAID OUT AND PLATTED UNDER THE NAME OF COTTONWOOD GREENS FILING NO. 1, AND DO HEREBY DEDICATE TO THE CITY OF FORT LUPTON AND ITS LICENSEES FOR PUBLIC USE FOREVER ALL STREETS, ALLEYS AND UTILITY EASEMENTS AS INDICATED HEREON. IN COMPLIANCE WITH THE CITY OF FORT LUPTON SUBDIVISION REGULATIONS AND BY CONTRACTUAL AGREEMENT, THE LANDOWNERS SHALL BEAR ALL EXPENSES INVOLVED IN IMPROVEMENTS.

IN WITNESS WHEREOF, WE HAVE HEREUNTO SET OUT HANDS AND SEALS THIS _____ DAY OF

_____ 20____.

AIMS I, A GENERAL PARTNERSHIP

BY: _____ AS: _____

NOTARY CERTIFICATE:

STATE OF COLORADO)
)SS
COUNTY OF WELD)

THE FOREGOING INSTRUMENT WAS ACKNOWLEDGED BEFORE ME BY AIMS I, A GENERAL PARTNERSHIP

THIS _____ DAY OF _____ 20____.

MY COMMISSION EXPIRES: _____

_____
NOTARY PUBLIC

THE RANCH ESTATES, GENERAL PARTNERSHIP LLC, A COLORADO LIMITED LIABILITY COMPANY

BY: _____ AS: _____

NOTARY CERTIFICATE:

STATE OF COLORADO)
)SS
COUNTY OF WELD)

THE FOREGOING INSTRUMENT WAS ACKNOWLEDGED BEFORE ME BY THE RANCH ESTATES, GENERAL PARTNERSHIP LLC, A COLORADO LIMITED LIABILITY COMPANY

THIS _____ DAY OF _____ 20____.

THERMO FARMS I, A GENERAL PARTNERSHIP

BY: _____ AS: _____

MY COMMISSION EXPIRES: _____

_____
NOTARY PUBLIC

NOTARY CERTIFICATE:

STATE OF COLORADO)
)SS
COUNTY OF WELD)

THE FOREGOING INSTRUMENT WAS ACKNOWLEDGED BEFORE ME BY THERMO FARMS, A GENERAL PARTNERSHIP

THIS _____ DAY OF _____ 20____.

MY COMMISSION EXPIRES: _____

_____
NOTARY PUBLIC

SURVEY CERTIFICATE:

I, MICHAEL LLOYD POOL, A DULY REGISTERED LAND SURVEYOR IN THE STATE OF COLORADO, DO HEREBY CERTIFY THAT THIS PLAT OF COTTONWOOD GREENS FILING NO. 1 WAS PERFORMED BY ME OR UNDER MY DIRECT SUPERVISION, AND THAT THIS PLAT HAS BEEN PREPARED IN COMPLIANCE WITH ALL APPLICABLE LAWS OF THE STATE OF COLORADO AT THE TIME OF THIS SURVEY AND WITHIN MY CONTROL, AND IS ACCURATE TO THE BEST OF MY KNOWLEDGE, INFORMATION AND BELIEF.

COLORADO LICENSED
MICHAEL LLOYD POOL
38304
PROFESSIONAL LAND SURVEYOR

_____
MICHAEL LLOYD POOL, PLS
COLORADO REG. NO. 38304
FOR AND ON BEHALF OF ATWELL, LLC

NOTICE: ACCORDING TO COLORADO LAW YOU MUST COMMENCE ANY LEGAL ACTION BASED UPON ANY DEFECT IN THIS SURVEY WITHIN THREE YEARS AFTER YOU FIRST DISCOVER SUCH DEFECT. IN NO EVENT MAY ANY ACTION BASED UPON ANY DEFECT IN THIS SURVEY BE COMMENCED MORE THAN TEN YEARS FROM THE DATE OF THE CERTIFICATE SHOWN HEREON.

WATER CERTIFICATE:

I HEREBY CERTIFY THAT ALL REQUIRED WATER RIGHTS HAVE BEEN TRANSFERRED TO THE CITY OF FORT LUPTON.

_____
CITY ADMINISTRATOR

CITY ENGINEER'S APPROVAL:

APPROVED THIS _____ DAY OF _____, 20_____,

_____
CITY ENGINEER

PLANNING COMMISSION RECOMMENDATION:

RECOMMENDED THIS _____ DAY OF _____, 20_____, BY RESOLUTION NO. _____.

_____
CHAIRPERSON, FORT LUPTON PLANNING COMMISSION

MAYOR'S CERTIFICATE:

THIS IS TO CERTIFY THAT A PLAT OF THE ABOVE–DESCRIBED PROPERTY WAS APPROVED BY RESOLUTION NO. _____

OF THE CITY OF FORT LUPTON PASSED AND ADOPTED ON THE _____ DAY OF _____, A.D. 20____ AND THAT THE MAYOR OF THE CITY OF FORT LUPTON, AS AUTHORIZED BY SAID RESOLUTION ON BEHALF OF THE CITY OF FORT LUPTON, HEREBY ACKNOWLEDGES AND ADOPTS THE SAID PLAT UPON WHICH THIS CERTIFICATE IS ENDORSED FOR ALL PURPOSES INDICATED THEREON.

ATTEST:

_____
MAYOR

_____
CITY CLERK

CITY ADMINISTRATOR'S APPROVAL:

APPROVED THIS _____ DAY OF _____, 20_____,

_____
CITY ADMINISTRATOR

CITY WATER AND SEWER DEPARTMENT APPROVAL:

APPROVED THIS _____ DAY OF _____, 20_____,

_____
DIRECTOR OF PUBLIC WORKS

RECORDER'S CERTIFICATE

THIS PLAT WAS FILED FOR RECORD IN THE OFFICE OF THE COUNTY CLERK AND RECORDER OF WELD COUNTY, COLORADO

AT _____ _.M. ON THE DAY OF _____ , A.D. 20__,

IN BOOK _____, PAGE _____, RECEPTION NO. _____

_____
COUNTY CLERK AND RECORDER

_____
DEPUTY

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

REVISIONS

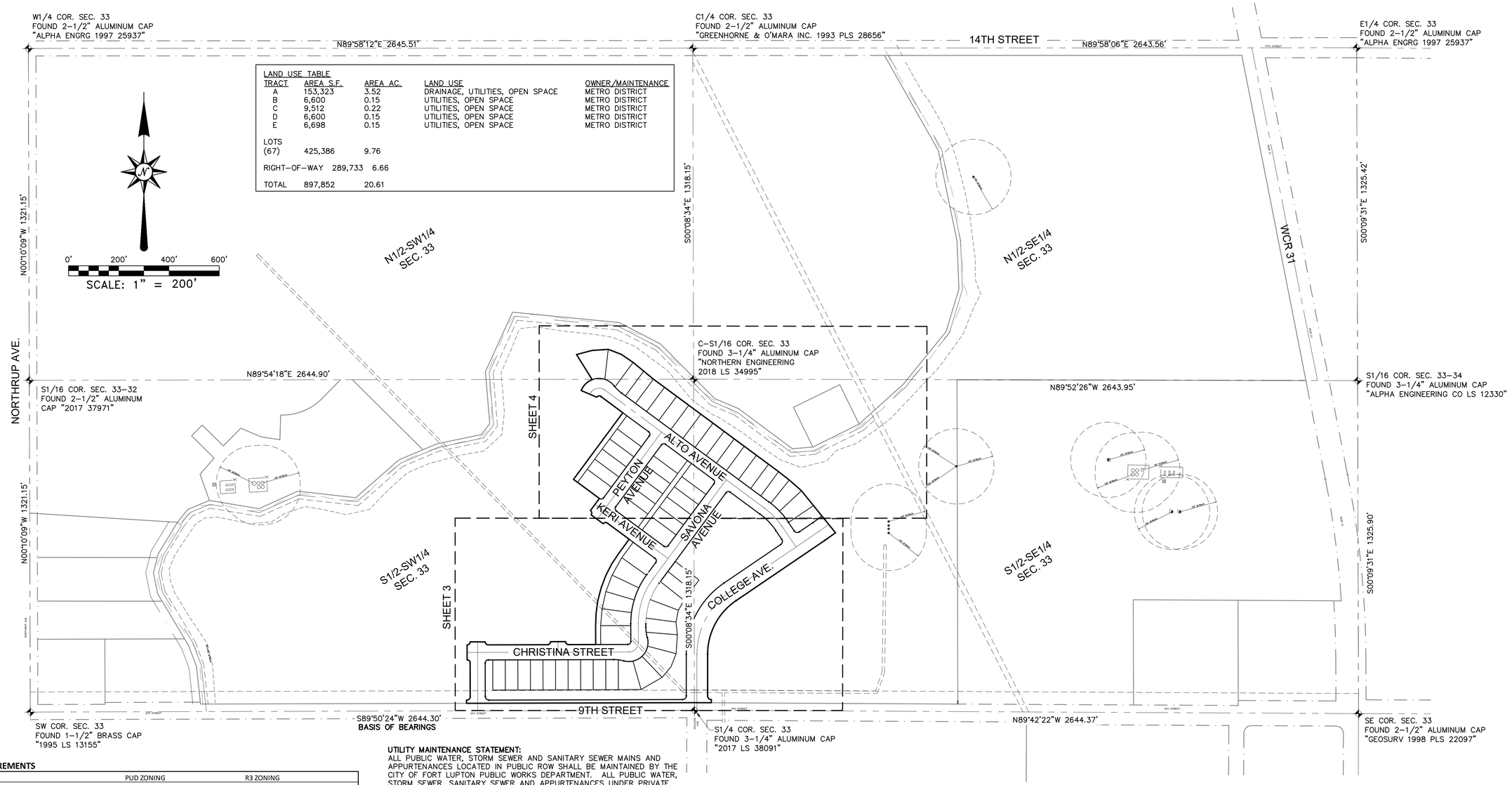
SHEET 1 OF 5

FILE NO.	19003254-FINL PLAT
DATE	03/19/2020
DRAWN BY	TWK
CHECK BY	MLP
JOB NO.	19003254

K:\19003254\DWG\Survey\FILING 1\19003254_FINAL PLAT - FILING 1.dwg, PLAT COVER, 3/12/2020 2:24:55 PM

COTTONWOOD GREENS FILING NO. 1

LOCATED IN THE SOUTH HALF OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH PRINCIPAL MERIDIAN,
CITY OF FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO



LAND USE TABLE				
TRACT	AREA S.F.	AREA AC.	LAND USE	OWNER/MAINTENANCE
A	153,323	3.52	DRAINAGE, UTILITIES, OPEN SPACE	METRO DISTRICT
B	6,600	0.15	UTILITIES, OPEN SPACE	METRO DISTRICT
C	9,512	0.22	UTILITIES, OPEN SPACE	METRO DISTRICT
D	6,600	0.15	UTILITIES, OPEN SPACE	METRO DISTRICT
E	6,698	0.15	UTILITIES, OPEN SPACE	METRO DISTRICT
LOTS (67)	425,386	9.76		
RIGHT-OF-WAY	289,733	6.66		
TOTAL	897,852	20.61		

PUD ZONING REQUIREMENTS

PARCEL	PUD ZONING	R3 ZONING
ALLOWABLE LAND USE	SFD, MFD	SFD, MFD
MINIMUM LOT SIZE (SF)	5,000 SF	5,000 SF
MINIMUM LOT WIDTH	30'	30'
MINIMUM LOT COVERAGE	N/A	N/A
PRIMARY USES		
MAXIMUM HEIGHT	35'	35'
MINIMUM FRONT YARD SETBACK (PRINCIPLE STRUCTURE)	15' TO HOUSE/20' TO GARAGE	25'
MINIMU SIDE YARD SETBACK	5'	5'
MINIMUM REAR YARD SETBACK	15'	20'
MINIMUM SIDE YARD (CORNER) SETBACK	15'	20'
MINIMUM DWELLING SIZE (SF)	750 SF (SFD)/ 500 SF (MFD)	750 SF (SFD)/ 500 SF (MFD)
ACCESSORY USE		
HEIGHT	35'	35'
FRONT SETBACK	N/A	N/A
SIDE SETBACK	5'	20'
REAR SETBACK	5'	N/A

UTILITY MAINTENANCE STATEMENT:
ALL PUBLIC WATER, STORM SEWER AND SANITARY SEWER MAINS AND APPURTENANCES LOCATED IN PUBLIC ROW SHALL BE MAINTAINED BY THE CITY OF FORT LUPTON PUBLIC WORKS DEPARTMENT. ALL PUBLIC WATER, STORM SEWER, SANITARY SEWER AND APPURTENANCES UNDER PRIVATE DRIVES ARE LOCATED IN UTILITY EASEMENTS. CITY IS RESPONSIBLE FOR MAINTENANCE OF THESE WATER, STORM SEWER AND SANITARY SEWER FACILITIES. CITY IS NOT RESPONSIBLE FOR REPAIR OR REPLACEMENT OF PRIVATE DRIVE, CURB AND GUTTER OR LANDSCAPING DAMAGED DURING UTILITY REPAIR OR MAINTENANCE.

NOTES:

1. THIS SURVEY DOES NOT CONSTITUTE A TITLE SEARCH BY ATWELL, LLC TO DETERMINE OWNERSHIP OR EASEMENTS OF RECORD. ATWELL, LLC RELIED UPON FIDELITY NATIONAL TITLE INSURANCE COMPANY TITLE COMMITMENT N0019518-030-TH-EG DATED OCTOBER 4, 2018 AND TITLE COMMITMENT NO: N0019440-030-TH-EG DATED SEPTEMBER 25, 2018 IN THE PROCESS OF THIS SURVEY TO AID IN EASEMENT AND OWNERSHIP RESEARCH.
2. GROSS LAND AREA IS 891,446 SQUARE FEET, OR 20.46 ACRES, MORE OR LESS.
3. THE LINEAR UNIT OF MEASUREMENT FOR THIS SURVEY IS U. S. SURVEY FEET.
4. THE BASIS OF BEARINGS IS THE SOUTH LINE OF THE SOUTHWEST QUARTER OF SECTION 33 AS BEARING SOUTH 89°5092431" WEST, AND MONUMENTED AS SHOWN ON DRAWING.
5. CURRENT ZONING: PUD

DEVELOPER/APPLICANT
ARBOR CAPITAL PARTNERS
JIM RIGHEIMER
1021 NIGHTINGALE DRIVE
FORT COLLINS, CO 80525 (970) 685-1575

SITE ENGINEER
ATWELL, LLC
MICHAEL McGOLDRICK, P.E.
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, COLORADO 80228 (303) 462-1100

SURVEYOR
ATWELL, LLC
MICHAEL LLOYD POOL, PLS
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, COLORADO 80228 (303) 462-1100

SECTION CORNER, AS NOTED
SECTION LINE
SHEET MATCH LINE

COLORADO LICENSED
MICHAEL LLOYD POOL
38304
PROFESSIONAL LAND SURVEYOR

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

REVISIONS

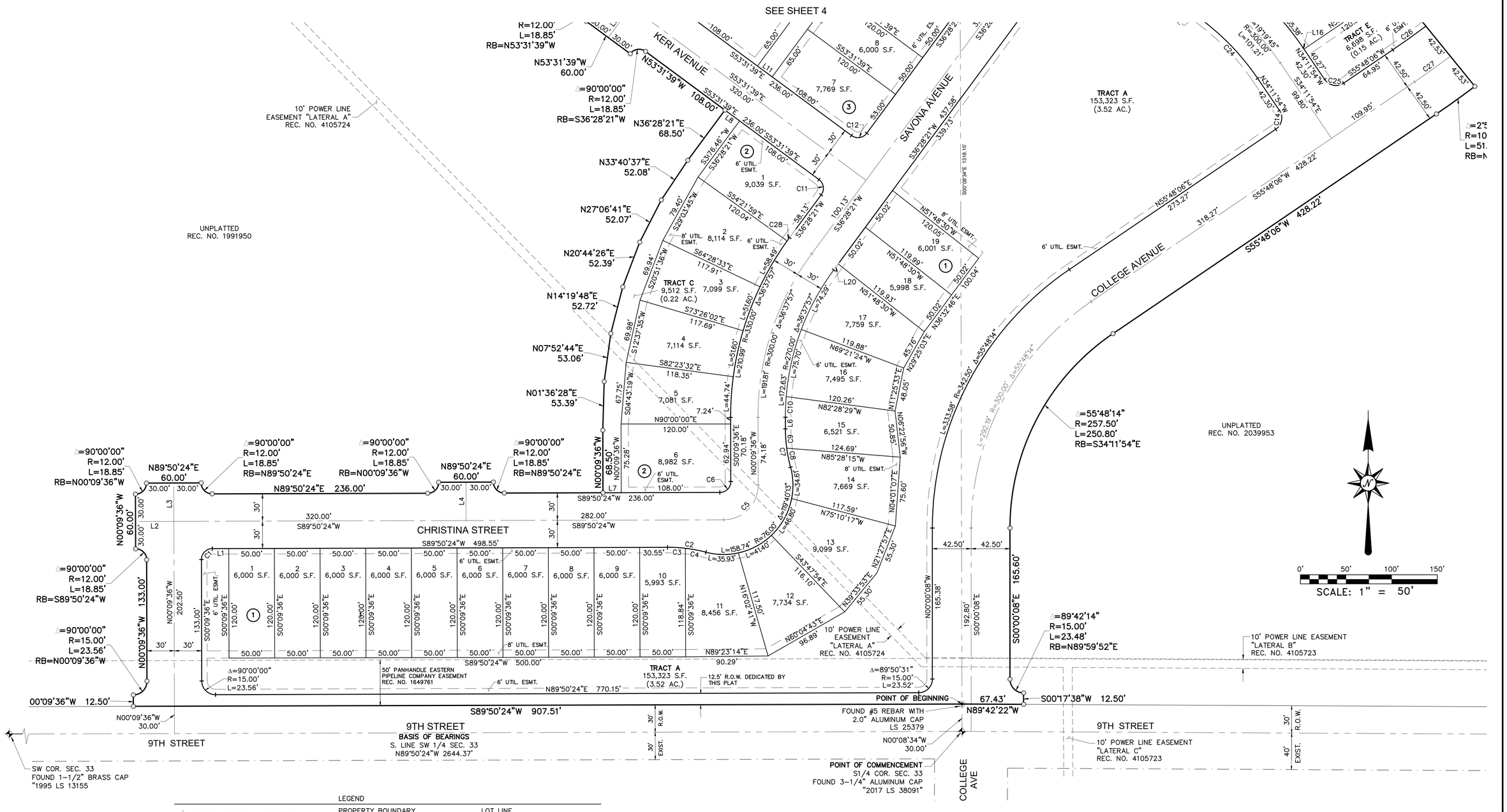
SHEET 2 OF 5

FILE NO.	19003254-FINL PLAT
DATE	03/19/2020
DRAWN BY	TWK
CHECK BY	MLP
JOB NO.	19003254

K:\19003254\DWG\Survey\FILING 1\19003254-FINAL PLAT - FILING 1.dwg PLAT MAP 2, 3/12/2020 2:32:30 PM

COTTONWOOD GREENS FILING NO. 1

LOCATED IN THE SOUTH HALF OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH PRINCIPAL MERIDIAN,
CITY OF FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO



LEGEND

- SECTION CORNER, AS NOTED
- FOUND #5 REBAR WITH 2" ALUMINUM CAP "LS 25379"
- 20.0' REFERENCE MONUMENT FOUND #5 REBAR WITH 2" ALUMINUM CAP "LS 25378 20.0' RM"
- SET 24" #5 REBAR WITH BLUE PLASTIC CAP "ATWELL PLS 38304"

PROPERTY BOUNDARY
SECTION LINE
MATCH LINE
UTILITY EASEMENT LINE
DRAINAGE EASEMENT LINE

(1) BLOCK NUMBER

RB=RADIAL BEARING IN

LOT LINE
R.O.W. CENTER LINE
R.O.W. LINE
WETLAND SETBACK LINE
WETLAND LINE

SEE SHEET 5 FOR LINE AND CURVE TABLES

COLORADO LICENSED
MICHAEL LLOYD POOL
38304
PROFESSIONAL LAND SURVEYOR

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

REVISIONS

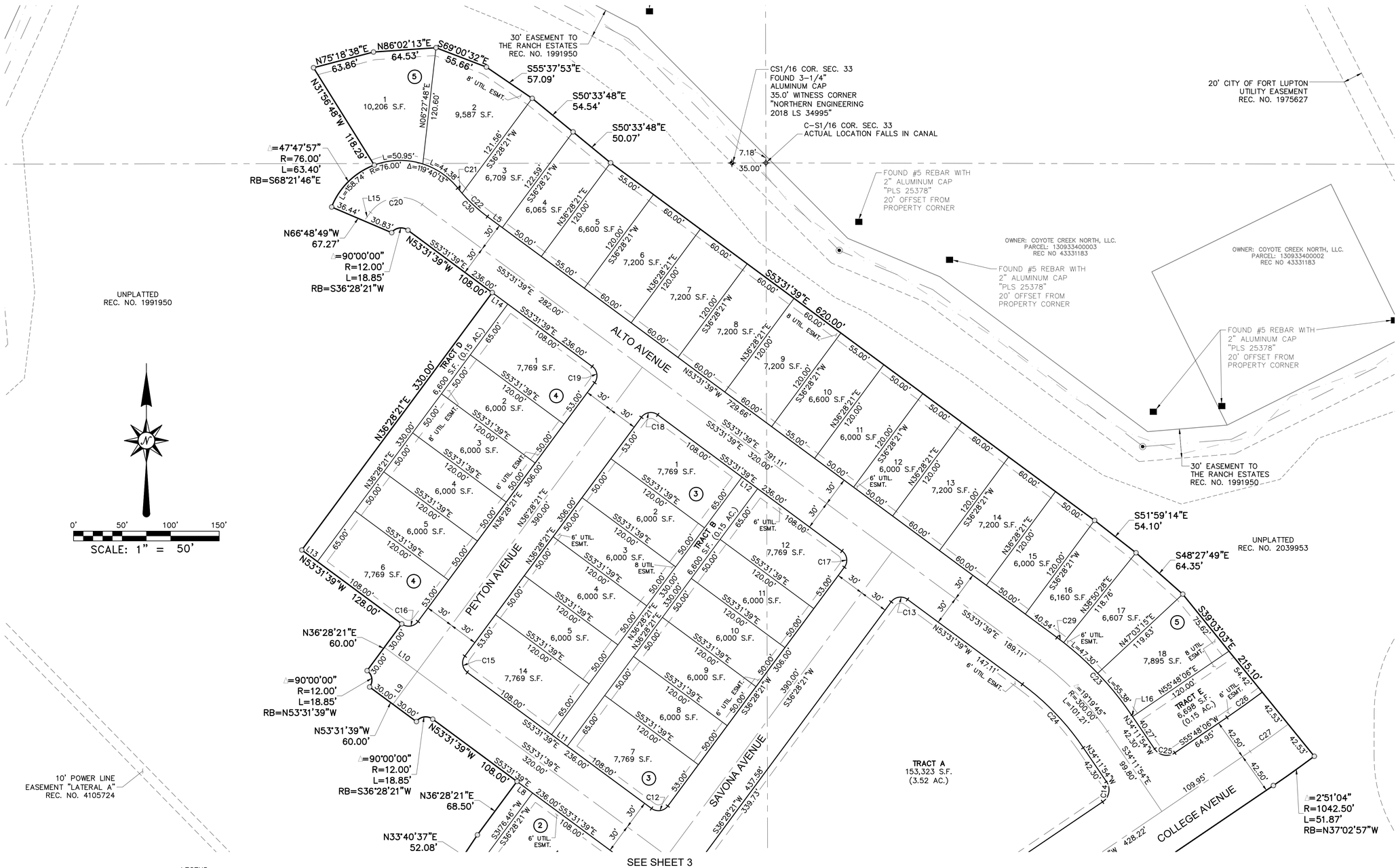
SHEET 3 OF 5

FILE NO.	19003254-FINL PLAT
DATE	03/19/2020
DRAWN BY	TWK
CHECK BY	MLP
JOB NO.	19003254

K:\19003254\DWG\Survey\FILING 1\19003254_FINAL PLAT - FILING 1.dwg PLAT MAP 3, 3/17/2020 2:41:21 PM

COTTONWOOD GREENS FILING NO. 1

LOCATED IN THE SOUTH HALF OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH PRINCIPAL MERIDIAN,
CITY OF FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO



LEGEND

- SECTION CORNER, AS NOTED
- 20.0' REFERENCE MONUMENT FOUND #5 REBAR WITH 2" ALUMINUM CAP "LS 25378 20.0' RM"
- FOUND #4 REBAR
- SET 24" #5 REBAR WITH BLUE PLASTIC CAP "ATWELL PLS 38304"

PROPERTY BOUNDARY
SECTION LINE
MATCH LINE
UTILITY EASEMENT LINE
DRAINAGE EASEMENT LINE

(1) BLOCK NUMBER

RB=RADIAL BEARING IN

LOT LINE
R.O.W. CENTER LINE
R.O.W. LINE
WETLAND SETBACK LINE
WETLAND LINE

SEE SHEET 5 FOR LINE AND CURVE TABLES

COLORADO LICENSED
MICHAEL LLOYD PORTA
38304
PROFESSIONAL LAND SURVEYOR

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

REVISIONS

SHEET 4 OF 5

FILE NO.	19003254-FINAL PLAT
DATE	03/19/2020
DRAWN BY	TWK
CHECK BY	MLP
JOB NO.	19003254

K:\19003254\DWG\Survey\FILING 1\19003254_FINAL PLAT - FILING 1.dwg, PLAT MAP & 3/17/2020 2:41:47 PM

COTTONWOOD GREENS FILING NO. 1

LOCATED IN THE SOUTH HALF OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH PRINCIPAL MERIDIAN,
CITY OF FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO

LINE DATA TABLE

LINE #	DIRECTION	LENGTH
L1	S89°50'24"W	18.00'
L2	S89°50'24"W	38.00'
L3	N0°09'36"W	38.00'
L4	N0°09'36"W	42.00'
L5	N53°31'39"W	19.13'
L6	S0°09'36"E	12.73'
L7	S89°50'24"W	20.00'
L8	S53°31'39"E	20.00'
L9	N36°28'21"E	42.00'
L10	S53°31'39"E	42.00'
L11	N53°31'39"W	20.00'
L12	S53°31'39"E	20.00'
L13	N53°31'39"W	20.00'
L14	S53°31'39"E	20.00'
L15	N36°28'21"E	8.92'
L16	N34°11'54"W	2.03'
L20	S36°28'21"W	8.36'

CURVE DATA TABLE

CURVE #	DELTA	RADIUS	LENGTH
C1	90°00'00"	12.00'	18.85'
C2	14°50'06"	164.00'	42.46'
C3	6°48'39"	164.00'	19.50'
C4	8°01'27"	164.00'	22.97'
C5	90°00'00"	38.00'	59.69'
C6	90°00'00"	12.00'	18.85'
C7	14°50'06"	164.00'	42.46'
C8	7°26'31"	164.00'	21.30'
C9	7°23'35"	164.00'	21.16'
C10	4°50'09"	268.18'	22.63'
C11	90°00'00"	12.00'	18.85'
C12	90°00'00"	12.00'	18.85'
C13	90°00'00"	12.00'	18.85'
C14	90°00'00"	15.00'	23.56'
C15	90°00'00"	12.00'	18.85'
C16	90°00'00"	12.00'	18.85'
C17	90°00'00"	12.00'	18.85'
C18	90°00'00"	12.00'	18.85'
C19	90°00'00"	12.00'	18.85'
C20	90°00'00"	38.00'	59.69'

CURVE DATA TABLE

CURVE #	DELTA	RADIUS	LENGTH
C21	2°23'20"	164.00'	6.84'
C22	12°26'47"	164.00'	35.63'
C23	19°19'39"	330.00'	111.32'
C24	19°19'45"	270.00'	91.09'
C25	90°00'00"	15.00'	23.56'
C26	2°40'24"	957.50'	44.67'
C27	2°45'57"	1000.00'	48.27'
C28	0°47'37"	330.00'	4.57'
C29	1°30'02"	330.00'	8.64'
C30	14°50'06"	164.00'	42.46'

COLORADO LICENSED
MICHAEL LLOYD POOL
38304
PROFESSIONAL LAND SURVEYOR

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

REVISIONS

SHEET
5
OF 5

FILE NO.	19003254-FINL PLAT
DATE	03/19/2020
DRAWN BY	TWK
CHECK BY	MLP
JOB NO.	19003254

K:\19003254\DWG\Survey\FILING 1\19003254-FINAL PLAT - FILING 1.dwg PLAT MAP 5, 3/17/2020 2:42:09 PM

COTTONWOOD GREENS FILING NO. 2

LOCATED IN THE SOUTHWEST QUARTER OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH PRINCIPAL MERIDIAN, CITY OF FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO

12.53 ACRES

LEGAL DESCRIPTION:

A PLAT OF A PORTION OF THE SOUTHWEST QUARTER OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE SIXTH PRINCIPAL MERIDIAN, CITY OF FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO, BEING MORE PARTICULARLY DESCRIBED AS FOLLOWS:

BASIS OF BEARINGS: BEARINGS ARE BASED ON THE SOUTH LINE OF THE SOUTHWEST QUARTER OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE SIXTH PRINCIPAL MERIDIAN, MONUMENTED AT THE EAST END BY A FOUND 2–1/2" ALUMINUM CAP STAMPED "PETROLEUM FIELD SERVICES 2003 PLS 36073" AND AT THE WEST END BY A FOUND 1–1/2" BRASS CAP STAMPED "1995 LS 13155". SAID SOUTH LINE BEARS SOUTH 89°50'24" WEST, WITH ALL BEARINGS CONTAINED HEREIN RELATIVE THERETO;

COMMENCING AT THE SOUTH QUARTER CORNER OF SAID SECTION 33;

THENCE NORTH 77°29'11" WEST 922.98 FEET TO A POINT ON THE WESTERLY LINE OF COTTONWOOD GREENS FILING NO. 1, RECORDED AT RECEPTION NO. _____, WELD COUNTY RECORDS, AND THE POINT OF BEGINNING;

THENCE DEPARTING SAID WESTERLY LINE SOUTH 89°50'24" WEST A DISTANCE OF 108.00 FEET;

THENCE NORTH 00°09'36" WEST A DISTANCE OF 133.02 FEET;

THENCE NORTH 00°55'24" EAST A DISTANCE OF 58.79 FEET;

THENCE NORTH 04°00'10" EAST A DISTANCE OF 59.75 FEET;

THENCE NORTH 04°16'06" EAST A DISTANCE OF 77.73 FEET TO A POINT OF NON–TANGENT CURVATURE;

THENCE ALONG THE ARC OF A CURVE TO THE LEFT WHOSE CENTER BEARS SOUTH 04°16'06" WEST HAVING A RADIUS OF 370.00 FEET, A CENTRAL ANGLE OF 02°00'04" AND AN ARC LENGTH OF 12.92 FEET;

THENCE NORTH 02°16'02" EAST A DISTANCE OF 180.00 FEET;

THENCE NORTH 54°03'43" EAST A DISTANCE OF 98.51 FEET;

THENCE NORTH 24°31'55" EAST A DISTANCE OF 67.20 FEET;

THENCE NORTH 28°03'41" EAST A DISTANCE OF 67.07 FEET;

THENCE NORTH 31°35'03" EAST A DISTANCE OF 66.94 FEET;

THENCE NORTH 35°14'51" EAST A DISTANCE OF 64.38 FEET;

THENCE NORTH 36°22'01" EAST A DISTANCE OF 340.00 FEET;

THENCE NORTH 32°31'16" EAST A DISTANCE OF 50.12 FEET;

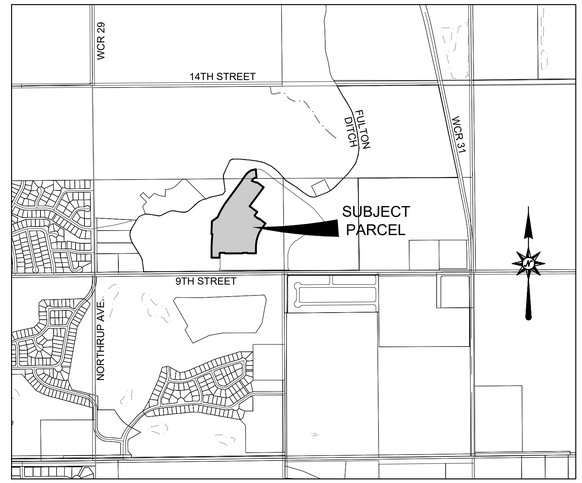
THENCE NORTH 36°45'23" EAST A DISTANCE OF 50.00 FEET;

THENCE NORTH 47°34'20" EAST A DISTANCE OF 93.61 FEET TO SAID WESTERLY LINE OF COTTONWOOD GREENS FILING NO. 1;

THENCE ALONG SAID WESTERLY LINE THE FOLLOWING TWENTY–NINE (29) COURSES:

1. SOUTH 31°56'48" EAST A DISTANCE OF 118.29 FEET TO A POINT OF NON–TANGENT CURVATURE;
2. ALONG THE ARC OF A CURVE TO THE LEFT WHOSE CENTER BEARS SOUTH 20°33'48" EAST HAVING A RADIUS OF 76.00 FEET, A CENTRAL ANGLE OF 47°47'57" AND AN ARC LENGTH OF 63.40 FEET;
3. SOUTH 66°48'49" EAST A DISTANCE OF 67.27 FEET TO A POINT OF NON–TANGENT CURVATURE;
4. ALONG THE ARC OF A CURVE TO THE RIGHT WHOSE CENTER BEARS SOUTH 53°31'39" EAST HAVING A RADIUS OF 12.00 FEET, A CENTRAL ANGLE OF 90°00'00" AND AN ARC LENGTH OF 18.85 FEET;
5. SOUTH 53°31'39" EAST A DISTANCE OF 108.00 FEET;
6. SOUTH 36°28'21" WEST A DISTANCE OF 330.00 FEET;
7. SOUTH 53°31'39" EAST A DISTANCE OF 128.00 FEET;
8. SOUTH 36°28'21" WEST A DISTANCE OF 60.00 FEET TO A POINT OF NON–TANGENT CURVATURE;
9. ALONG THE ARC OF A CURVE TO THE RIGHT WHOSE CENTER BEARS SOUTH 36°28'21" WEST HAVING A RADIUS OF 12.00 FEET, A CENTRAL ANGLE OF 90°00'00" AND AN ARC LENGTH OF 18.85 FEET;
10. SOUTH 53°31'39" EAST A DISTANCE OF 60.00 FEET TO A POINT OF NON–TANGENT CURVATURE;
11. ALONG THE ARC OF A CURVE TO THE RIGHT WHOSE CENTER BEARS SOUTH 53°31'39" EAST HAVING A RADIUS OF 12.00 FEET, A CENTRAL ANGLE OF 90°00'00" AND AN ARC LENGTH OF 18.85 FEET;
12. SOUTH 53°31'39" EAST A DISTANCE OF 108.00 FEET;
13. SOUTH 36°28'21" WEST A DISTANCE OF 68.50 FEET;
14. SOUTH 33°40'37" WEST A DISTANCE OF 52.08 FEET;
15. SOUTH 27°06'41" WEST A DISTANCE OF 52.07 FEET;
16. SOUTH 20°44'26" WEST A DISTANCE OF 52.39 FEET;
17. SOUTH 14°19'48" WEST A DISTANCE OF 52.72 FEET;
18. SOUTH 07°52'44" WEST A DISTANCE OF 53.06 FEET;
19. SOUTH 01°36'28" WEST A DISTANCE OF 53.39 FEET;
20. SOUTH 00°09'36" EAST A DISTANCE OF 68.50 FEET;
21. SOUTH 89°50'24" WEST A DISTANCE OF 108.00 FEET TO A POINT OF CURVATURE;
22. ALONG THE ARC OF A CURVE TO THE RIGHT WHOSE CENTER BEARS NORTH 00°09'36" WEST HAVING A RADIUS OF 12.00 FEET, A CENTRAL ANGLE OF 90°00'00" AND AN ARC LENGTH OF 18.85 FEET;
23. SOUTH 89°50'24" WEST A DISTANCE OF 60.00 FEET TO A POINT OF NON–TANGENT CURVATURE;
24. ALONG THE ARC OF A CURVE TO THE RIGHT WHOSE CENTER BEARS SOUTH 89°50'24" WEST HAVING A RADIUS OF 12.00 FEET, A CENTRAL ANGLE OF 90°00'00" AND AN ARC LENGTH OF 18.85 FEET;
25. SOUTH 89°50'24" WEST A DISTANCE OF 236.00 FEET TO A POINT OF CURVATURE;
26. ALONG THE ARC OF A CURVE TO THE RIGHT WHOSE CENTER BEARS NORTH 00°09'36" WEST HAVING A RADIUS OF 12.00 FEET, A CENTRAL ANGLE OF 90°00'00" AND AN ARC LENGTH OF 18.85 FEET;
27. SOUTH 89°50'24" WEST A DISTANCE OF 60.00 FEET TO A POINT OF NON–TANGENT CURVATURE;
28. ALONG THE ARC OF A CURVE TO THE RIGHT WHOSE CENTER BEARS SOUTH 89°50'24" WEST HAVING A RADIUS OF 12.00 FEET, A CENTRAL ANGLE OF 90°00'00" AND AN ARC LENGTH OF 18.85 FEET;
29. SOUTH 00°09'36" EAST A DISTANCE OF 60.00 FEET TO THE POINT OF BEGINNING;

CONTAINING AN AREA OF 546,012 SQUARE FEET OR 12.53 ACRES, MORE OR LESS..



VICINITY MAP
SCALE: 1"=1000'

DEDICATION:

KNOW ALL MEN BY THESE PRESENTS THAT WE, AIMS I, A GENERAL PARTNERSHIP, AND THE RANCH ESTATES GENERAL PARTNERSHIP, LLC, A COLORADO LIMITED LIABILITY COMPANY, BEING THE SOLE OWNERS OF THE LAND DESCRIBED HEREIN, HAVE CAUSED SAID LAND TO BE LAID OUT AND PLATTED UNDER THE NAME OF COTTONWOOD GREENS FILING NO. 2, AND DO HEREBY DEDICATE TO THE CITY OF FORT LUPTON AND ITS LICENSEES FOR PUBLIC USE FOREVER ALL STREETS, ALLEYS AND UTILITY EASEMENTS AS INDICATED HEREON. IN COMPLIANCE WITH THE CITY OF FORT LUPTON SUBDIVISION REGULATIONS AND BY CONTRACTUAL AGREEMENT, THE LANDOWNERS SHALL BEAR ALL EXPENSES INVOLVED IN IMPROVEMENTS.

IN WITNESS WHEREOF, WE HAVE HEREUNTO SET OUT HANDS AND SEALS THIS _____ DAY OF

_____ 20_____.

AIMS I, A GENERAL PARTNERSHIP

BY: _____ AS: _____

NOTARY CERTIFICATE:

STATE OF COLORADO)
)SS
COUNTY OF WELD)

THE FOREGOING INSTRUMENT WAS ACKNOWLEDGED BEFORE ME BY AIMS I, A GENERAL PARTNERSHIP

THIS _____ DAY OF _____ 20_____.

MY COMMISSION EXPIRES: _____

_____
NOTARY PUBLIC

THE RANCH ESTATES, GENERAL PARTNERSHIP LLP, A COLORADO LIMITED LIABILITY COMPANY.

BY: _____ AS: _____

NOTARY CERTIFICATE:

STATE OF COLORADO)
)SS
COUNTY OF WELD)

THE FOREGOING INSTRUMENT WAS ACKNOWLEDGED BEFORE ME BY THE RANCH ESTATES, A GENERAL PARTNERSHIP, LLP, A COLORADO LIMITED LIABILITY COMPANY.

THIS _____ DAY OF _____ 20_____.

MY COMMISSION EXPIRES: _____

_____
NOTARY PUBLIC

SURVEY CERTIFICATE:

I, MICHAEL LLOYD POOL, A DULY REGISTERED LAND SURVEYOR IN THE STATE OF COLORADO, DO HEREBY CERTIFY THAT THIS PLAT OF COTTONWOOD GREENS FILING NO. 2 WAS PERFORMED BY ME OR UNDER MY DIRECT SUPERVISION, AND THAT THIS PLAT HAS BEEN PREPARED IN COMPLIANCE WITH ALL APPLICABLE LAWS OF THE STATE OF COLORADO AT THE TIME OF THIS SURVEY AND WITHIN MY CONTROL, AND IS ACCURATE TO THE BEST OF MY KNOWLEDGE, INFORMATION AND BELIEF.

COLORADO LICENSED
MICHAEL LLOYD POOL
38304
PROFESSIONAL LAND SURVEYOR

_____
MICHAEL LLOYD POOL, PLS
COLORADO REG. NO. 38304
FOR AND ON BEHALF OF ATWELL, LLC

NOTICE: ACCORDING TO COLORADO LAW YOU MUST COMMENCE ANY LEGAL ACTION BASED UPON ANY DEFECT IN THIS SURVEY WITHIN THREE YEARS AFTER YOU FIRST DISCOVER SUCH DEFECT. IN NO EVENT MAY ANY ACTION BASED UPON ANY DEFECT IN THIS SURVEY BE COMMENCED MORE THAN TEN YEARS FROM THE DATE OF THE CERTIFICATE SHOWN HEREON.

WATER CERTIFICATE:

I HEREBY CERTIFY THAT ALL REQUIRED WATER RIGHTS HAVE BEEN TRANSFERRED TO THE CITY OF FORT LUPTON.

_____
CITY ADMINISTRATOR

CITY ENGINEER'S APPROVAL:

APPROVED THIS _____ DAY OF _____, 20_____.

_____
CITY ENGINEER

PLANNING COMMISSION RECOMMENDATION:

RECOMMENDED THIS _____ DAY OF _____, 20_____, BY RESOLUTION NO. _____.

_____
CHAIRPERSON, FORT LUPTON PLANNING COMMISSION

MAYOR'S CERTIFICATE:

THIS IS TO CERTIFY THAT A PLAT OF THE ABOVE–DESCRIBED PROPERTY WAS APPROVED BY RESOLUTION NO. _____

OF THE CITY OF FORT LUPTON PASSED AND ADOPTED ON THE _____ DAY OF _____, A.D. 20____ AND THAT THE MAYOR OF THE CITY OF FORT LUPTON, AS AUTHORIZED BY SAID RESOLUTION ON BEHALF OF THE CITY OF FORT LUPTON, HEREBY ACKNOWLEDGES AND ADOPTS THE SAID PLAT UPON WHICH THIS CERTIFICATE IS ENDORSED FOR ALL PURPOSES INDICATED THEREON.

ATTEST:

_____
MAYOR

_____
CITY CLERK

CITY ADMINISTRATOR'S APPROVAL:

APPROVED THIS _____ DAY OF _____, 20_____.

_____
CITY ADMINISTRATOR

CITY WATER AND SEWER DEPARTMENT APPROVAL:

APPROVED THIS _____ DAY OF _____, 20_____.

_____
DIRECTOR OF PUBLIC WORKS

RECORDER'S CERTIFICATE

THIS PLAT WAS FILED FOR RECORD IN THE OFFICE OF THE COUNTY CLERK AND RECORDER OF WELD COUNTY, COLORADO

AT _____ _.M. ON THE DAY OF _____ , A.D. 20__,

IN BOOK _____, PAGE _____, RECEPTION NO. _____

_____
COUNTY CLERK AND RECORDER

_____
DEPUTY

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

REVISIONS

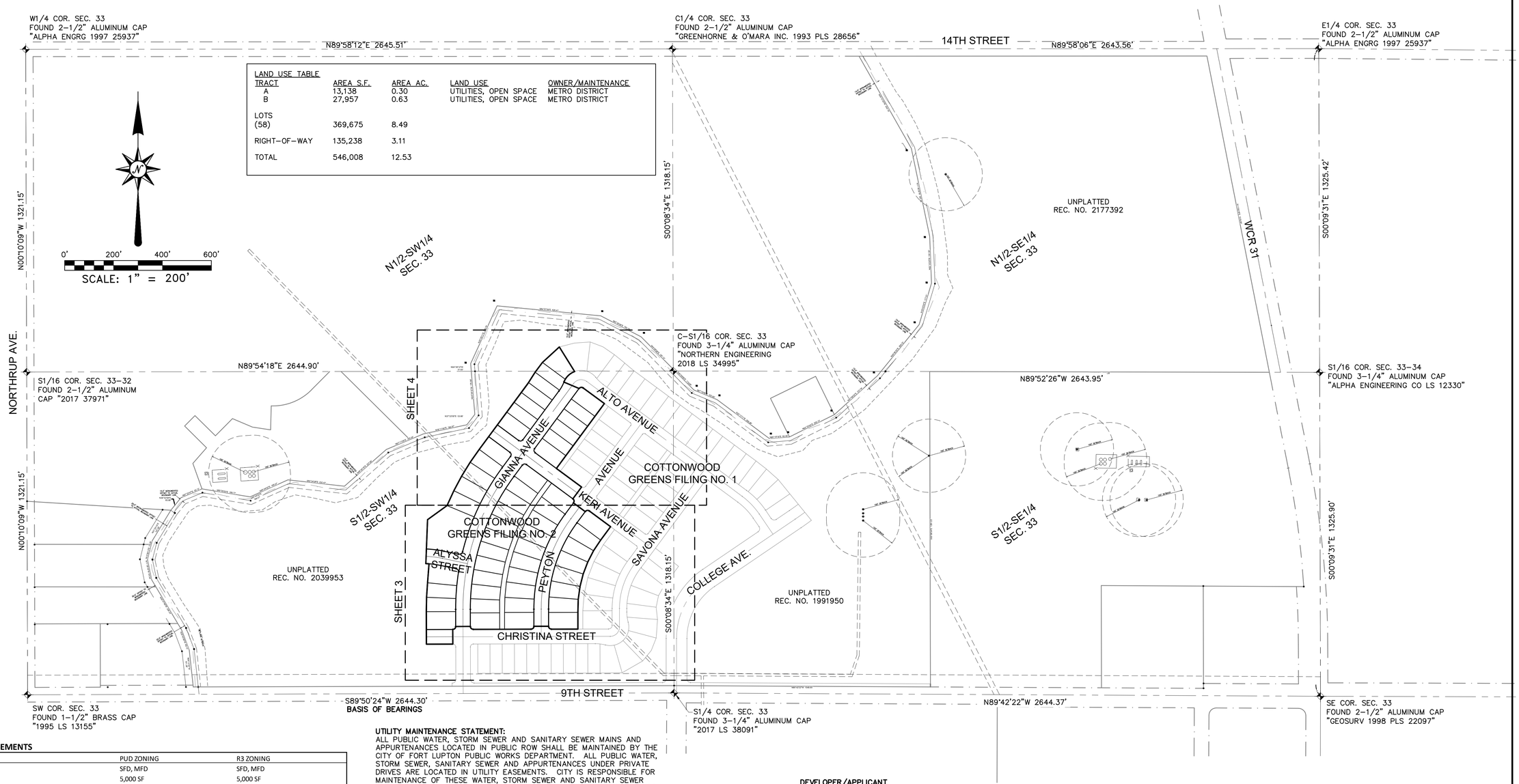
SHEET 1 OF 4

FILE NO.	19003254-FINAL PLAT
DATE	03/19/2020
DRAWN BY	TWK
CHECK BY	MLP
JOB NO.	19003254

K:\19003254\DWG\Survey\FILING 2\19003254_FINAL PLAT - FILING 2.dwg, PLAT COVER, 3/18/2020 7:07:58 AM

COTTONWOOD GREENS FILING NO. 2

LOCATED IN THE SOUTHWEST QUARTER OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH PRINCIPAL MERIDIAN,
CITY OF FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO



LAND USE TABLE				
TRACT	AREA S.F.	AREA AC.	LAND USE	OWNER/MAINTENANCE
A	13,138	0.30	UTILITIES, OPEN SPACE	METRO DISTRICT
B	27,957	0.63	UTILITIES, OPEN SPACE	METRO DISTRICT
LOTS (58)	369,675	8.49		
RIGHT-OF-WAY	135,238	3.11		
TOTAL	546,008	12.53		

PUD ZONING REQUIREMENTS

PARCEL	PUD ZONING	R3 ZONING
ALLOWABLE LAND USE	SFD, MFD	SFD, MFD
MINIMUM LOT SIZE (SF)	5,000 SF	5,000 SF
MINIMUM LOT WIDTH	30'	30'
MINIMUM LOT COVERAGE	N/A	N/A
PRIMARY USES		
MAXIMUM HEIGHT	35'	35'
MINIMUM FRONT YARD SETBACK (PRINCIPLE STRUCTURE)	15' TO HOUSE/20' TO GARAGE	25'
MINIMU SIDE YARD SETBACK	5'	5'
MINIMUM REAR YARD SETBACK	15'	20'
MINIMUM SIDE YARD (CORNER) SETBACK	15'	20'
MINIMUM DWELLING SIZE (SF)	750 SF (SFD)/ 500 SF (MFD)	750 SF (SFD)/ 500 SF (MFD)
ACCESSORY USE		
HEIGHT	35'	35'
FRONT SETBACK	N/A	N/A
SIDE SETBACK	5'	20'
REAR SETBACK	5'	N/A

UTILITY MAINTENANCE STATEMENT:
ALL PUBLIC WATER, STORM SEWER AND SANITARY SEWER MAINS AND APPURTENANCES LOCATED IN PUBLIC ROW SHALL BE MAINTAINED BY THE CITY OF FORT LUPTON PUBLIC WORKS DEPARTMENT. ALL PUBLIC WATER, STORM SEWER, SANITARY SEWER AND APPURTENANCES UNDER PRIVATE DRIVES ARE LOCATED IN UTILITY EASEMENTS. CITY IS RESPONSIBLE FOR MAINTENANCE OF THESE WATER, STORM SEWER AND SANITARY SEWER FACILITIES. CITY IS NOT RESPONSIBLE FOR REPAIR OR REPLACEMENT OF PRIVATE DRIVE, CURB AND GUTTER OR LANDSCAPING DAMAGED DURING UTILITY REPAIR OR MAINTENANCE.

NOTES:

1. THIS SURVEY DOES NOT CONSTITUTE A TITLE SEARCH BY ATWELL, LLC TO DETERMINE OWNERSHIP OR EASEMENTS OF RECORD. ATWELL, LLC RELIED UPON FIDELITY NATIONAL TITLE INSURANCE COMPANY TITLE COMMITMENT N0019518-030-TH-EG DATED OCTOBER 4, 2018 IN THE PROCESS OF THIS SURVEY TO AID IN EASEMENT AND OWNERSHIP RESEARCH.
2. GROSS LAND AREA IS 553,425 SQUARE FEET, OR 12.71 ACRES, MORE OR LESS.
3. THE LINEAR UNIT OF MEASUREMENT FOR THIS SURVEY IS U. S. SURVEY FEET.
4. THE BASIS OF BEARINGS IS THE SOUTH LINE OF THE SOUTHWEST QUARTER OF SECTION 33 AS BEARING SOUTH 89°5092431" WEST, AND MONUMENTED AS SHOWN ON DRAWING.
5. CURRENT ZONING: PUD

DEVELOPER/APPLICANT
ARBOR CAPITAL PARTNERS
JIM RIGHEIMER
1021 NIGHTINGALE DRIVE
FORT COLLINS, CO 80525 (970) 685-1575

SITE ENGINEER
ATWELL, LLC
MICHAEL McGOLDRICK, P.E.
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, COLORADO 80228 (303) 462-1100

SURVEYOR
ATWELL, LLC
MICHAEL LLOYD POOL, PLS
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, COLORADO 80228 (303) 462-1100

SECTION CORNER, AS NOTED
SECTION LINE
SHEET MATCH LINE

COLORADO LICENSED
MICHAEL LLOYD POOL
38304
PROFESSIONAL LAND SURVEYOR

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

REVISIONS

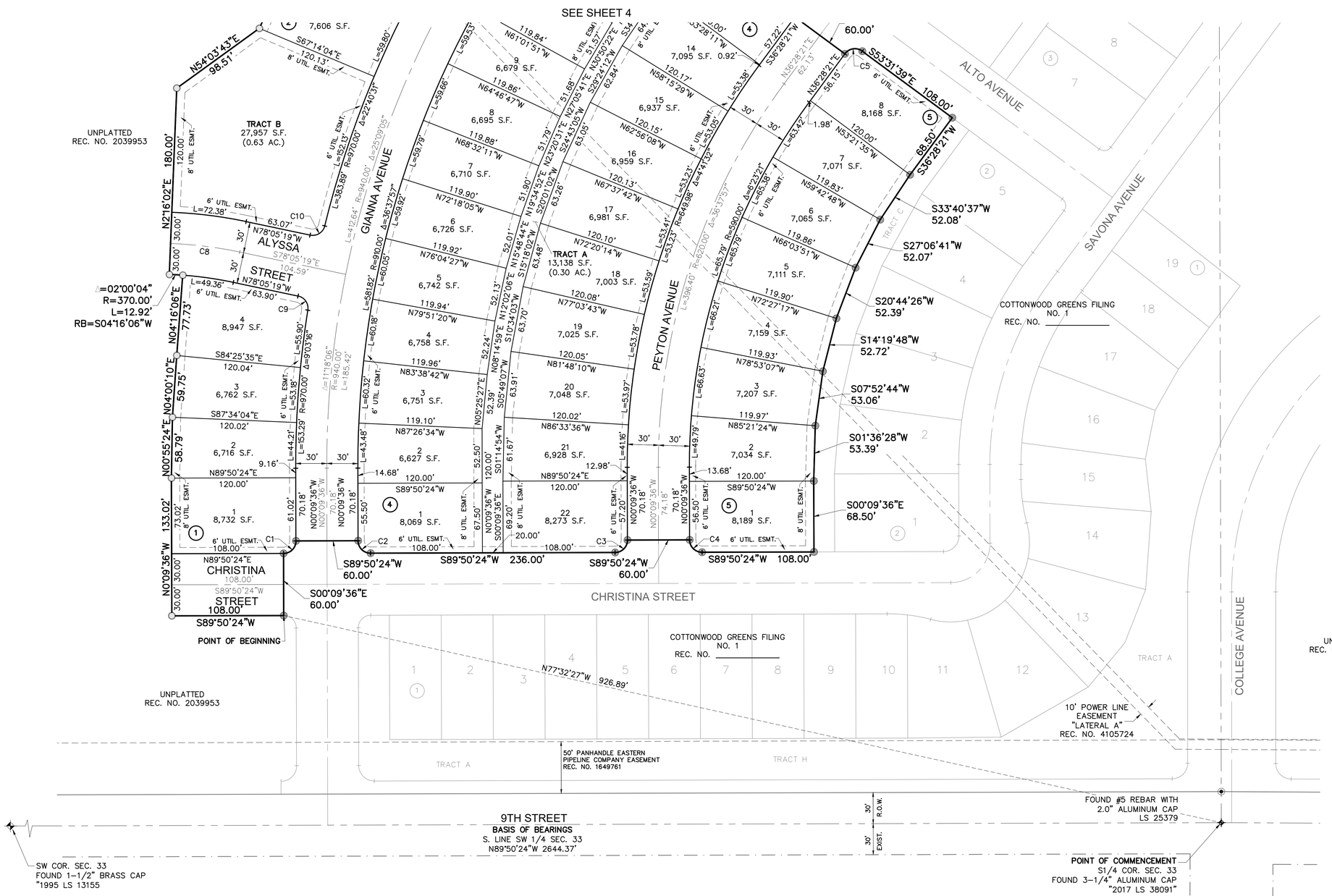
SHEET 2 OF 4

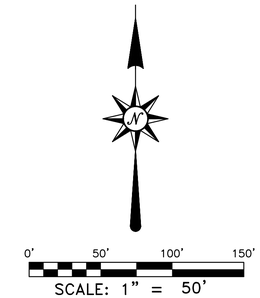
FILE NO.	19003254-FINAL PLAT
DATE	03/19/2020
DRAWN BY	TWK
CHECK BY	MLP
JOB NO.	19003254

K:\19003254\DWG\Survey\FILING 2\19003254_FINAL PLAT - FILING 2.dwg PLAT MAP 2, 3/13/2020 10:21:06 AM

COTTONWOOD GREENS FILING NO. 2

LOCATED IN THE SOUTHWEST QUARTER OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH PRINCIPAL MERIDIAN,
CITY OF FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO





CURVE DATA TABLE				PROPERTY BOUNDARY RADIAL BEARING IN
CURVE #	DELTA	RADIUS	LENGTH	
C1	90°00'00"	12.00'	18.85'	S89°50'24"W
C2	90°00'00"	12.00'	18.85'	N00°09'36"W
C3	90°00'00"	12.00'	18.85'	S89°50'24"W
C4	90°00'00"	12.00'	18.85'	N00°09'36"W
C5	90°00'00"	12.00'	18.85'	S53°31'39"E
C6	89°59'58"	12.00'	18.85'	S36°28'21"W
C7	90°00'00"	12.00'	18.85'	S53°31'39"E
C8	9°38'38"	400.00'	67.33'	
C9	87°11'13"	11.98'	18.23'	
C10	88°45'48"	11.93'	18.48'	
C11	90°00'00"	12.00'	18.85'	
C12	90°00'00"	12.00'	18.85'	
C13	90°00'00"	12.00'	18.85'	
C18	90°00'00"	12.00'	18.85'	
C19	1°33'16"	164.00'	4.45'	
C20	13°16'50"	164.00'	38.01'	
C21	9°33'01"	76.00'	12.67'	
C22	14°50'06"	164.00'	42.46'	

LEGEND

- SECTION CORNER, AS NOTED
- FOUND #5 REBAR WITH 2" ALUMINUM CAP "LS 25379"
- 20.0' REFERENCE MONUMENT FOUND #5 REBAR WITH 2" ALUMINUM CAP "LS 25378 20.0' RM"
- SET 24" #5 REBAR WITH BLUE PLASTIC CAP "ATWELL PLS 38304"
- FOUND BLUE PLASTIC CAP "ATWELL PLS 38304"

PROPERTY BOUNDARY
SECTION LINE
MATCH LINE
UTILITY EASEMENT LINE
DRAINAGE EASEMENT LINE

LOT LINE
R.O.W. CENTER LINE
R.O.W. LINE
WETLAND SETBACK LINE
WETLAND LINE

(1) BLOCK NUMBER
RB = RADIAL BEARING IN

COLORADO LICENSED
MICHAEL LLOYD POOL
38304
PROFESSIONAL LAND SURVEYOR

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

REVISIONS

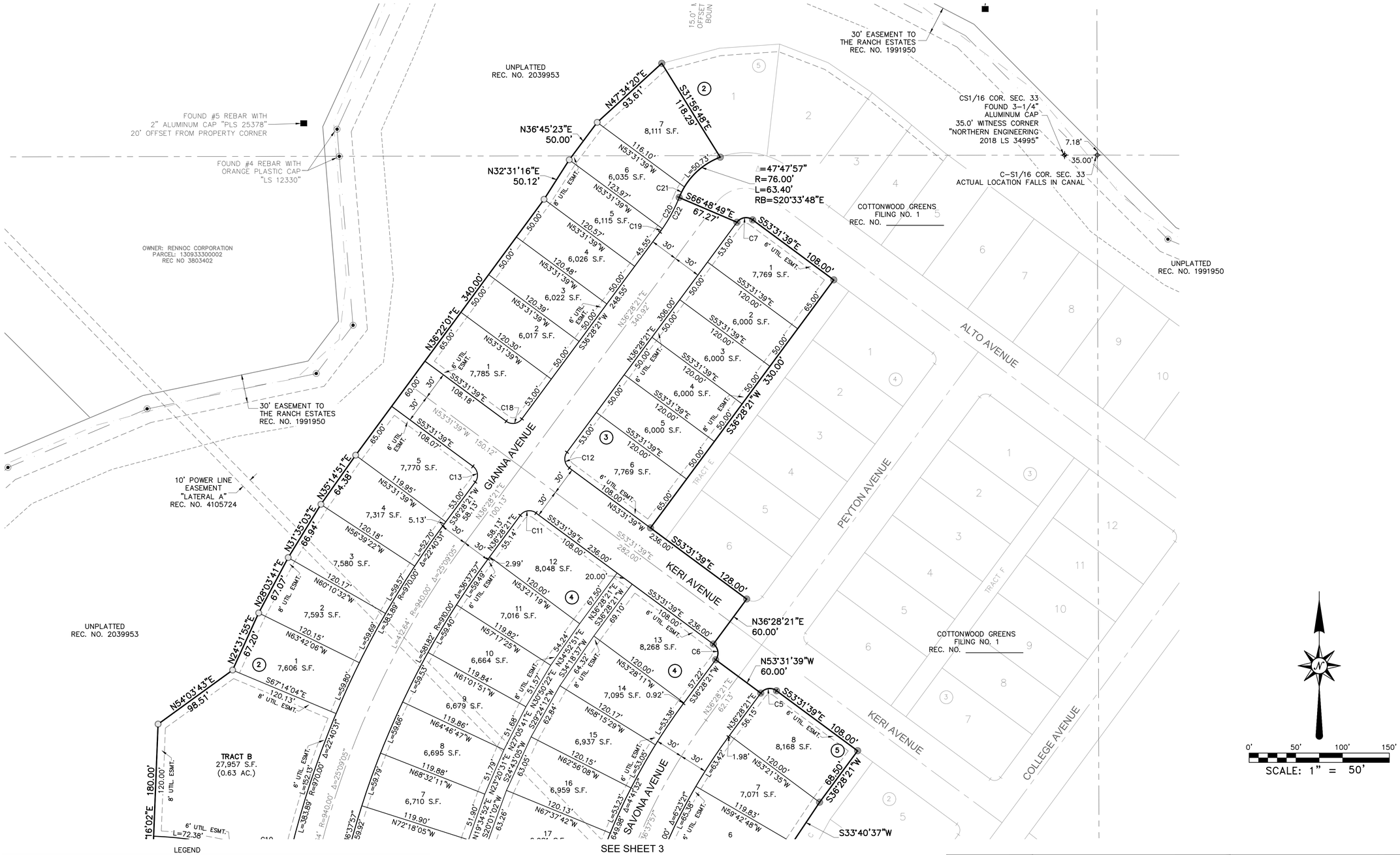
SHEET 3 OF 4

FILE NO.	19003254-FINAL PLAT
DATE	03/19/2020
DRAWN BY	TWK
CHECK BY	MLP
JOB NO.	19003254

K:\19003254\DWG\Survey\FILING 2\19003254 FINAL PLAT - FILING 2.dwg PLAT MAP 3, 3/17/2020 3:12:18 PM

COTTONWOOD GREENS FILING NO. 2

LOCATED IN THE SOUTH HALF OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH PRINCIPAL MERIDIAN,
CITY OF FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO



LEGEND

- SECTION CORNER, AS NOTED
- 20.0' REFERENCE MONUMENT FOUND #5 REBAR WITH 2" ALUMINUM CAP "LS 25378 20.0' RM"
- FOUND #4 REBAR
- SET 24" #5 REBAR WITH BLUE PLASTIC CAP "ATWELL PLS 38304"
- FOUND BLUE PLASTIC CAP "ATWELL PLS 38304"

PROPERTY BOUNDARY
SECTION LINE
MATCH LINE
UTILITY EASEMENT LINE
DRAINAGE EASEMENT LINE

LOT LINE
R.O.W. CENTER LINE
R.O.W. LINE
WETLAND SETBACK LINE
WETLAND LINE

(1) BLOCK NUMBER
RB = RADIAL BEARING IN

COLORADO LICENSED
MICHAEL LLOYD PONT
38304
PROFESSIONAL LAND SURVEYOR

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

REVISIONS

SHEET 4 OF 4

FILE NO.	19003254-FINL PLAT
DATE	03/19/2020
DRAWN BY	TWK
CHECK BY	MLP
JOB NO.	19003254

K:\19003254\DWG\Survey\FILING 2\19003254-FINAL PLAT - FILING 2.dwg PLAT MAP 4, 3/19/2020 7:09:28 AM

COTTONWOOD GREENS FILING NO. 3

LOCATED IN THE SOUTH HALF OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH PRINCIPAL MERIDIAN, CITY OF FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO

47.98 ACRES

LEGAL DESCRIPTION:

A PLAT OF A PORTION OF THE SOUTH HALF OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE SIXTH PRINCIPAL MERIDIAN, CITY OF FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO, BEING MORE PARTICULARLY DESCRIBED AS FOLLOWS:

BASIS OF BEARINGS: BEARINGS ARE BASED ON THE SOUTH LINE OF THE SOUTHWEST QUARTER OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE SIXTH PRINCIPAL MERIDIAN, MONUMENTED AT THE EAST END BY A FOUND 2-1/2" ALUMINUM CAP STAMPED "2017 LS 38091" AND AT THE WEST END BY A FOUND 1-1/2" BRASS CAP STAMPED "1995 LS 13155". SAID SOUTH LINE BEARS SOUTH 89°50'24" WEST, WITH ALL BEARINGS CONTAINED HEREIN RELATIVE THERETO;

COMMENCING AT THE SOUTH QUARTER CORNER OF SAID SECTION 33;

THENCE NORTH 88°16'00" WEST 907.99 FEET TO A POINT ON THE WESTERLY LINE OF COTTONWOOD GREENS FILING NO. 1, RECORDED AT RECEPTION NO. _____, WELD COUNTY RECORDS, ALSO BEING A POINT ON THE NORTH RIGHT-OF-WAY LINE OF 9TH STREET, AND THE POINT OF BEGINNING;

THENCE ALONG SAID NORTH RIGHT-OF-WAY LINE SOUTH 89°50'24" WEST 1058.97 FEET;
THENCE DEPARTING SAID NORTH RIGHT-OF-WAY LINE NORTH 6°12'34" WEST 151.28 FEET;
THENCE NORTH 20°43'56" WEST 88.12 FEET;
THENCE NORTH 30°47'46" WEST 240.23 FEET;
THENCE NORTH 11°35'19" WEST 84.39 FEET;
THENCE NORTH 13°59'13" EAST 78.29 FEET;
THENCE NORTH 31°25'15" EAST 147.40 FEET;
THENCE NORTH 38°52'08" EAST 65.88 FEET;
THENCE NORTH 67°22'47" EAST 93.12 FEET;
THENCE SOUTH 80°35'03" EAST 199.77 FEET;
THENCE NORTH 65°44'52" EAST 169.57 FEET;
THENCE SOUTH 83°34'28" EAST 232.47 FEET;
THENCE NORTH 48°40'18" EAST 227.84 FEET;
THENCE NORTH 67°11'05" EAST 165.39 FEET;
THENCE NORTH 78°11'40" EAST 180.87 FEET;
THENCE NORTH 37°22'05" EAST 53.66 FEET;
THENCE NORTH 4°39'12" WEST 208.78 FEET;
THENCE NORTH 24°35'11" EAST 259.79 FEET;
THENCE SOUTH 84°27'39" EAST 426.41 FEET;
THENCE SOUTH 62°30'49" EAST 185.28 FEET;
THENCE SOUTH 44°49'06" EAST 187.12 FEET;
THENCE SOUTH 44°49'06" EAST 119.68 FEET;
THENCE SOUTH 67°19'06" EAST 102.80 FEET;
THENCE SOUTH 53°17'11" EAST 266.98 FEET;
THENCE NORTH 85°19'19" EAST 82.20 FEET;
THENCE NORTH 63°33'42" EAST 205.14 FEET;
THENCE NORTH 47°56'22" EAST 237.78 FEET;
THENCE NORTH 39°06'23" EAST 22.89 FEET TO THE NORTH LINE OF THE SOUTH HALF OF THE SOUTHEAST QUARTER OF SAID SECTION 33;
THENCE ALONG SAID NORTH LINE SOUTH 89°52'26" EAST 199.03 FEET;
THENCE DEPARTING SAID NORTH LINE SOUTH 00°08'34" EAST 1291.22 FEET TO THE NORTH RIGHT-OF-WAY LINE OF 9TH STREET;
THENCE ALONG SAID NORTH RIGHT-OF-WAY LINE NORTH 89°42'22" WEST 981.42 FEET TO THE NORTHEASTERLY LINE OF SAID COTTONWOOD GREENS FILING NO. 1;
THENCE ALONG THE EASTERLY LINE OF SAID COTTONWOOD GREENS FILING NO. 1 THE FOLLOWING FIFTEEN (15) COURSES:

1. NORTH 00°17'38" EAST 12.50 FEET TO A POINT OF NON-TANGENT CURVATURE;
2. ALONG THE ARC OF A CURVE TO THE RIGHT WHOSE CENTER BEARS NORTH 00°17'38" EAST HAVING A RADIUS OF 15.00 FEET, A CENTRAL ANGLE OF 89°42'14" AND AN ARC LENGTH OF 23.48 FEET;
3. NORTH 00°00'08" WEST 165.60 FEET TO A POINT OF CURVATURE;
4. ALONG THE ARC OF A CURVE TO THE RIGHT WHOSE CENTER BEARS NORTH 89°59'52" EAST HAVING A RADIUS OF 257.50 FEET, A CENTRAL ANGLE OF 55°48'14" AND AN ARC LENGTH OF 250.80 FEET;
5. NORTH 55°48'06" EAST 428.22 FEET TO A POINT OF CURVATURE;
6. ALONG THE ARC OF A CURVE TO THE LEFT WHOSE CENTER BEARS NORTH 34°11'54" WEST HAVING A RADIUS OF 1042.50 FEET, A CENTRAL ANGLE OF 2°51'04" AND AN ARC LENGTH OF 51.87 FEET;
7. NORTH 39°03'03" WEST 215.10 FEET;
8. NORTH 48°27'49" WEST 64.35 FEET;
9. NORTH 51°59'14" WEST 54.10 FEET;
10. NORTH 53°31'39" WEST 620.00 FEET;
11. NORTH 50°33'48" WEST 104.61 FEET;
12. NORTH 55°37'53" WEST 57.09 FEET;
13. NORTH 69°00'32" WEST 55.66 FEET;
14. SOUTH 86°02'13" WEST 64.53 FEET;
15. SOUTH 75°18'38" WEST 63.86 FEET TO THE WESTERLY LINE OF COTTONWOOD GREENS FILING NO. 2, RECORDED AT RECEPTION NO. _____, WELD COUNTY RECORDS;

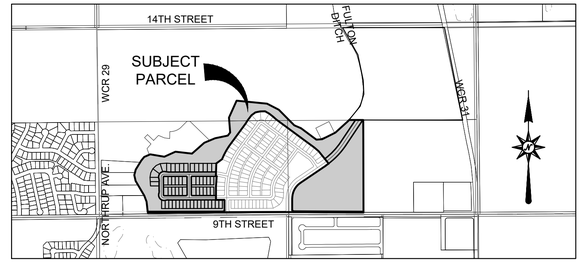
THENCE ALONG SAID WESTERLY LINE THE FOLLOWING SIXTEEN (16) COURSES:

1. SOUTH 47°34'20" WEST 93.61 FEET;
2. SOUTH 36°45'23" WEST 50.00 FEET;
3. SOUTH 32°31'16" WEST 50.12 FEET;
4. SOUTH 36°22'01" WEST 340.00 FEET;
5. SOUTH 35°14'51" WEST 64.38 FEET;
6. SOUTH 31°35'03" WEST 66.94 FEET;
7. SOUTH 28°03'41" WEST 67.07 FEET;
8. SOUTH 24°31'55" WEST 67.20 FEET;
9. SOUTH 54°03'43" WEST 98.51 FEET;
10. SOUTH 02°16'02" WEST 180.00 FEET TO A POINT OF NON-TANGENT CURVATURE;
11. ALONG THE ARC OF A CURVE TO THE RIGHT WHOSE CENTER BEARS SOUTH 02°16'02" WEST HAVING A RADIUS OF 370.00 FEET, A CENTRAL ANGLE OF 2°00'04" AND AN ARC LENGTH OF 12.92 FEET;
12. SOUTH 04°16'06" WEST 77.73 FEET;
13. SOUTH 04°00'10" WEST 59.75 FEET;
14. SOUTH 00°55'24" WEST 58.79 FEET;
15. SOUTH 00°09'36" EAST 133.02 FEET;
16. NORTH 89°50'24" EAST 108.00 FEET TO THE WESTERLY LINE OF SAID COTTONWOOD GREENS FILING NO. 1 AND A POINT OF CURVATURE;

THENCE ALONG SAID WESTERLY LINE OF COTTONWOOD GREENS FILING NO. 1 THE FOLLOWING FOUR (4) COURSES:

1. ALONG THE ARC OF A CURVE TO THE RIGHT WHOSE CENTER BEARS SOUTH 00°09'36" EAST HAVING A RADIUS OF 12.00 FEET, A CENTRAL ANGLE OF 90°00'00" AND AN ARC LENGTH OF 18.58 FEET;
2. SOUTH 0°09'36" EAST 133.00 FEET TO A POINT OF CURVATURE;
3. ALONG THE ARC OF A CURVE TO THE RIGHT WHOSE CENTER BEARS SOUTH 89°50'24" WEST HAVING A RADIUS OF 15.00 FEET, A CENTRAL ANGLE OF 90°00'00" AND AN ARC LENGTH OF 23.56 FEET;
4. SOUTH 00°09'36" EAST 12.50 FEET TO THE POINT OF BEGINNING;

CONTAINING AN AREA OF 2,089,910 SQUARE FEET OR 47.98 ACRES, MORE OR LESS.



VICINITY MAP
SCALE: 1"=1000'

DEDICATION:

KNOW ALL MEN BY THESE PRESENTS THAT WE, AIMS I, A GENERAL PARTNERSHIP, AND THE RANCH ESTATES GENERAL PARTNERSHIP, LLC, A COLORADO LIMITED LIABILITY COMPANY, BEING THE SOLE OWNERS OF THE LAND DESCRIBED HEREIN, HAVE CAUSED SAID LAND TO BE LAID OUT AND PLATTED UNDER THE NAME OF COTTONWOOD GREENS FILING NO. 3, AND DO HEREBY DEDICATE TO THE CITY OF FORT LUPTON AND ITS LICENSEES FOR PUBLIC USE FOREVER ALL STREETS, ALLEYS AND UTILITY EASEMENTS AS INDICATED HEREON. IN COMPLIANCE WITH THE CITY OF FORT LUPTON SUBDIVISION REGULATIONS AND BY CONTRACTUAL AGREEMENT, THE LANDOWNERS SHALL BEAR ALL EXPENSES INVOLVED IN IMPROVEMENTS.

IN WITNESS WHEREOF, WE HAVE HEREUNTO SET OUT HANDS AND SEALS THIS _____ DAY OF _____ 20_____.

AIMS I, A GENERAL PARTNERSHIP

BY: _____ AS: _____

NOTARY CERTIFICATE:

STATE OF COLORADO)
)SS
COUNTY OF WELD)

THE FOREGOING INSTRUMENT WAS ACKNOWLEDGED BEFORE ME BY AIMS I, A GENERAL PARTNERSHIP

THIS _____ DAY OF _____ 20_____.

MY COMMISSION EXPIRES: _____

_____
NOTARY PUBLIC

THE RANCH ESTATES, GENERAL PARTNERSHIP LLC, A COLORADO LIMITED LIABILITY COMPANY

BY: _____ AS: _____

NOTARY CERTIFICATE:

STATE OF COLORADO)
)SS
COUNTY OF WELD)

THE FOREGOING INSTRUMENT WAS ACKNOWLEDGED BEFORE ME BY THE RANCH ESTATES, LLC, A COLORADO LIMITED LIABILITY COMPANY

THIS _____ DAY OF _____ 20_____.

MY COMMISSION EXPIRES: _____

_____
NOTARY PUBLIC

SURVEY CERTIFICATE:

I, MICHAEL LLOYD POOL, A DULY REGISTERED LAND SURVEYOR IN THE STATE OF COLORADO, DO HEREBY CERTIFY THAT THIS PLAT OF COTTONWOOD GREENS FILING NO. 3 WAS PERFORMED BY ME OR UNDER MY DIRECT SUPERVISION, AND THAT THIS PLAT HAS BEEN PREPARED IN COMPLIANCE WITH ALL APPLICABLE LAWS OF THE STATE OF COLORADO AT THE TIME OF THIS SURVEY AND WITHIN MY CONTROL, AND IS ACCURATE TO THE BEST OF MY KNOWLEDGE, INFORMATION AND BELIEF.

COLORADO LICENSED
MICHAEL LLOYD POOL
38304
PROFESSIONAL LAND SURVEYOR

_____
MICHAEL LLOYD POOL, PLS
COLORADO REG. NO. 38304
FOR AND ON BEHALF OF ATWELL, LLC

NOTICE: ACCORDING TO COLORADO LAW YOU MUST COMMENCE ANY LEGAL ACTION BASED UPON ANY DEFECT IN THIS SURVEY WITHIN THREE YEARS AFTER YOU FIRST DISCOVER SUCH DEFECT. IN NO EVENT MAY ANY ACTION BASED UPON ANY DEFECT IN THIS SURVEY BE COMMENCED MORE THAN TEN YEARS FROM THE DATE OF THE CERTIFICATE SHOWN HEREON.

WATER CERTIFICATE:

I HEREBY CERTIFY THAT ALL REQUIRED WATER RIGHTS HAVE BEEN TRANSFERRED TO THE CITY OF FORT LUPTON.

_____
CITY ADMINISTRATOR

CITY ENGINEER'S APPROVAL:

APPROVED THIS _____ DAY OF _____, 20_____.

_____
CITY ENGINEER

PLANNING COMMISSION RECOMMENDATION:

RECOMMENDED THIS _____ DAY OF _____, 20_____, BY RESOLUTION NO. _____.

_____
CHAIRPERSON, FORT LUPTON PLANNING COMMISSION

MAYOR'S CERTIFICATE:

THIS IS TO CERTIFY THAT A PLAT OF THE ABOVE-DESCRIBED PROPERTY WAS APPROVED BY RESOLUTION NO. _____

OF THE CITY OF FORT LUPTON PASSED AND ADOPTED ON THE _____ DAY OF _____, A.D. 20___ AND THAT THE MAYOR OF THE CITY OF FORT LUPTON, AS AUTHORIZED BY SAID RESOLUTION ON BEHALF OF THE CITY OF FORT LUPTON, HEREBY ACKNOWLEDGES AND ADOPTS THE SAID PLAT UPON WHICH THIS CERTIFICATE IS ENDORSED FOR ALL PURPOSES INDICATED THEREON.

ATTEST:

_____
MAYOR

_____
CITY CLERK

CITY ADMINISTRATOR'S APPROVAL:

APPROVED THIS _____ DAY OF _____, 20_____.

_____
CITY ADMINISTRATOR

CITY WATER AND SEWER DEPARTMENT APPROVAL:

APPROVED THIS _____ DAY OF _____, 20_____.

_____
DIRECTOR OF PUBLIC WORKS

RECORDER'S CERTIFICATE

THIS PLAT WAS FILED FOR RECORD IN THE OFFICE OF THE COUNTY CLERK AND RECORDER OF WELD COUNTY, COLORADO

AT _____ _.M. ON THE DAY OF _____ , A.D. 20__.

IN BOOK _____, PAGE _____, RECEPTION NO. _____

_____
COUNTY CLERK AND RECORDER

_____
DEPUTY

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

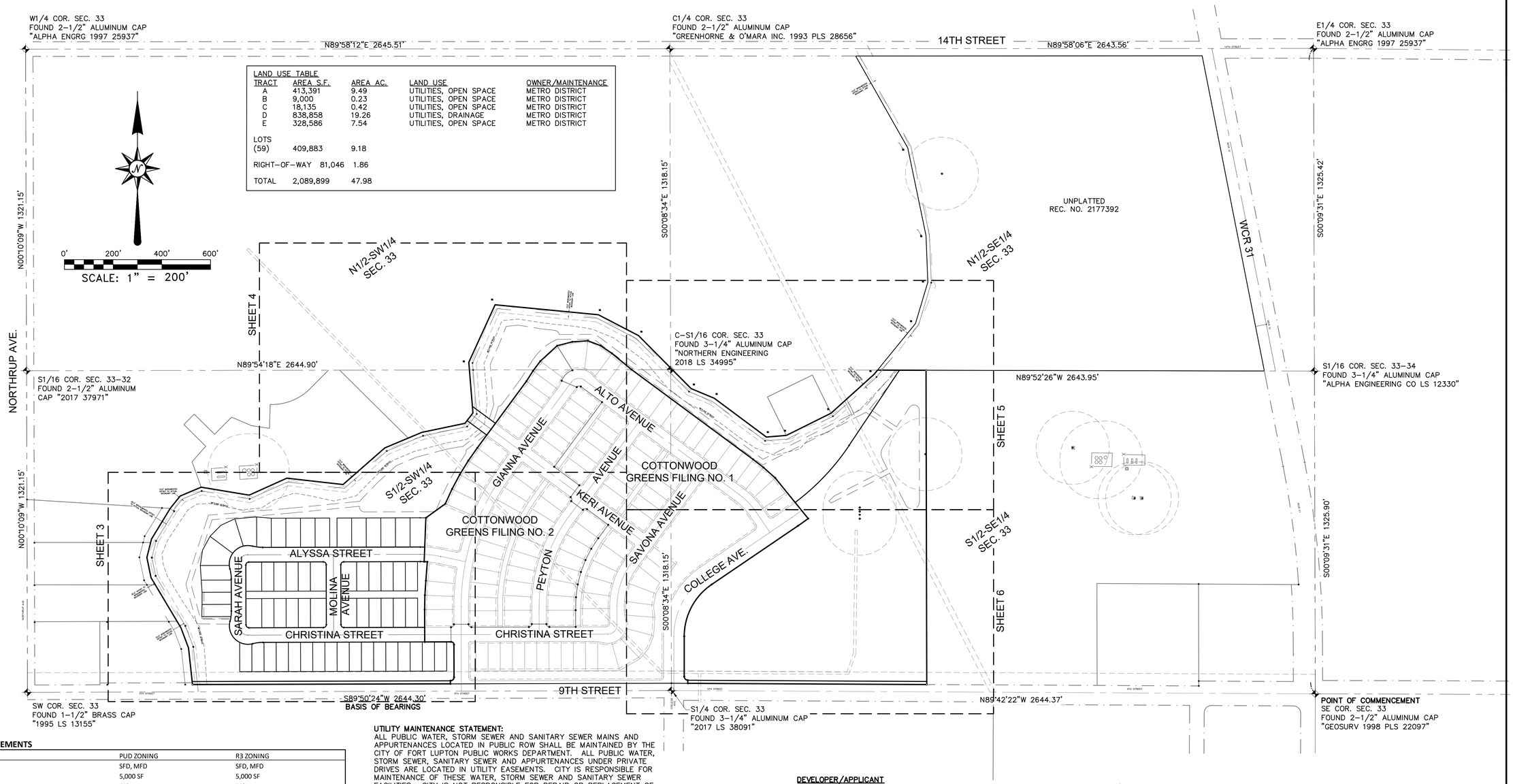
REVISIONS

SHEET 1 OF 6

FILE NO.	19003254-FINL PLAT
DATE	05/08/2020
DRAWN BY	TWK
CHECK BY	MLP
JOB NO.	19003254

COTTONWOOD GREENS FILING NO. 3

LOCATED IN THE SOUTH HALF OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH PRINCIPAL MERIDIAN,
CITY OF FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO



LAND USE TABLE				
TRACT	AREA S.F.	AREA AC.	LAND USE	OWNER/MAINTENANCE
A	413,391	9.49	UTILITIES, OPEN SPACE	METRO DISTRICT
B	9,000	0.23	UTILITIES, OPEN SPACE	METRO DISTRICT
C	18,135	0.42	UTILITIES, OPEN SPACE	METRO DISTRICT
D	838,858	19.26	UTILITIES, DRAINAGE	METRO DISTRICT
E	328,586	7.54	UTILITIES, OPEN SPACE	METRO DISTRICT
LOTS (59)	409,883	9.18		
RIGHT-OF-WAY	81,046	1.86		
TOTAL	2,089,899	47.98		

PUD ZONING REQUIREMENTS

PARCEL	PUD ZONING	R3 ZONING
ALLOWABLE LAND USE	SFD, MFD	SFD, MFD
MINIMUM LOT SIZE (SF)	5,000 SF	5,000 SF
MINIMUM LOT WIDTH	30'	30'
MINIMUM LOT COVERAGE	N/A	N/A
PRIMARY USES		
MAXIMUM HEIGHT	35'	35'
MINIMUM FRONT YARD SETBACK (PRINCIPLE STRUCTURE)	15' TO HOUSE/20' TO GARAGE	25'
MINIMU SIDE YARD SETBACK	5'	5'
MINIMUM REAR YARD SETBACK	15'	20'
MINIMUM SIDE YARD (CORNER) SETBACK	15'	20'
MINIMUM DWELLING SIZE (SF)	750 SF (SFD)/ 500 SF (MFD)	750 SF (SFD)/ 500 SF (MFD)
ACCESSORY USE		
HEIGHT	35'	35'
FRONT SETBACK	N/A	N/A
SIDE SETBACK	5'	20'
REAR SETBACK	5'	N/A

UTILITY MAINTENANCE STATEMENT:
ALL PUBLIC WATER, STORM SEWER AND SANITARY SEWER MAINS AND APPURTENANCES LOCATED IN PUBLIC ROW SHALL BE MAINTAINED BY THE CITY OF FORT LUPTON PUBLIC WORKS DEPARTMENT. ALL PUBLIC WATER, STORM SEWER, SANITARY SEWER AND APPURTENANCES UNDER PRIVATE DRIVES ARE LOCATED IN UTILITY EASEMENTS. CITY IS RESPONSIBLE FOR MAINTENANCE OF THESE WATER, STORM SEWER AND SANITARY SEWER FACILITIES. CITY IS NOT RESPONSIBLE FOR REPAIR OR REPLACEMENT OF PRIVATE DRIVE, CURB AND GUTTER OR LANDSCAPING DAMAGED DURING UTILITY REPAIR OR MAINTENANCE.

NOTES:

1. THIS SURVEY DOES NOT CONSTITUTE A TITLE SEARCH BY ATWELL, LLC TO DETERMINE OWNERSHIP OR EASEMENTS OF RECORD. ATWELL, LLC RELIED UPON FIDELITY NATIONAL TITLE INSURANCE COMPANY TITLE COMMITMENT N0019518-030-TH-EG DATED OCTOBER 4, 2018 AND N0019440-030-TH-EG DATED SEPTEMBER 25, 2018 IN THE PROCESS OF THIS SURVEY TO AID IN EASEMENT AND OWNERSHIP RESEARCH.
2. GROSS LAND AREA IS 2,089,910 SQUARE FEET, OR 47.98 ACRES, MORE OR LESS.
3. THE LINEAR UNIT OF MEASUREMENT FOR THIS SURVEY IS U. S. SURVEY FEET.
4. THE BASIS OF BEARINGS IS THE SOUTH LINE OF THE SOUTHWEST QUARTER OF SECTION 33 AS BEARING SOUTH 89°50'24"" WEST, AND MONUMENTED AS SHOWN ON DRAWING.
5. CURRENT ZONING: PUD

DEVELOPER/APPLICANT
ARBOR CAPITAL PARTNERS
JIM RIGHEIMER
1021 NIGHTINGALE DRIVE
FORT COLLINS, CO 80525 (970) 685-1575

SITE ENGINEER
ATWELL, LLC
MICHAEL McGOLDRICK, P.E.
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, COLORADO 80228 (303) 462-1100

SURVEYOR
ATWELL, LLC
MICHAEL LLOYD POOL, PLS
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, COLORADO 80228 (303) 462-1100

SECTION CORNER, AS NOTED
SECTION LINE
SHEET MATCH LINE

COLORADO LICENSED
MICHAEL LLOYD POOL
38304
PROFESSIONAL LAND SURVEYOR

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

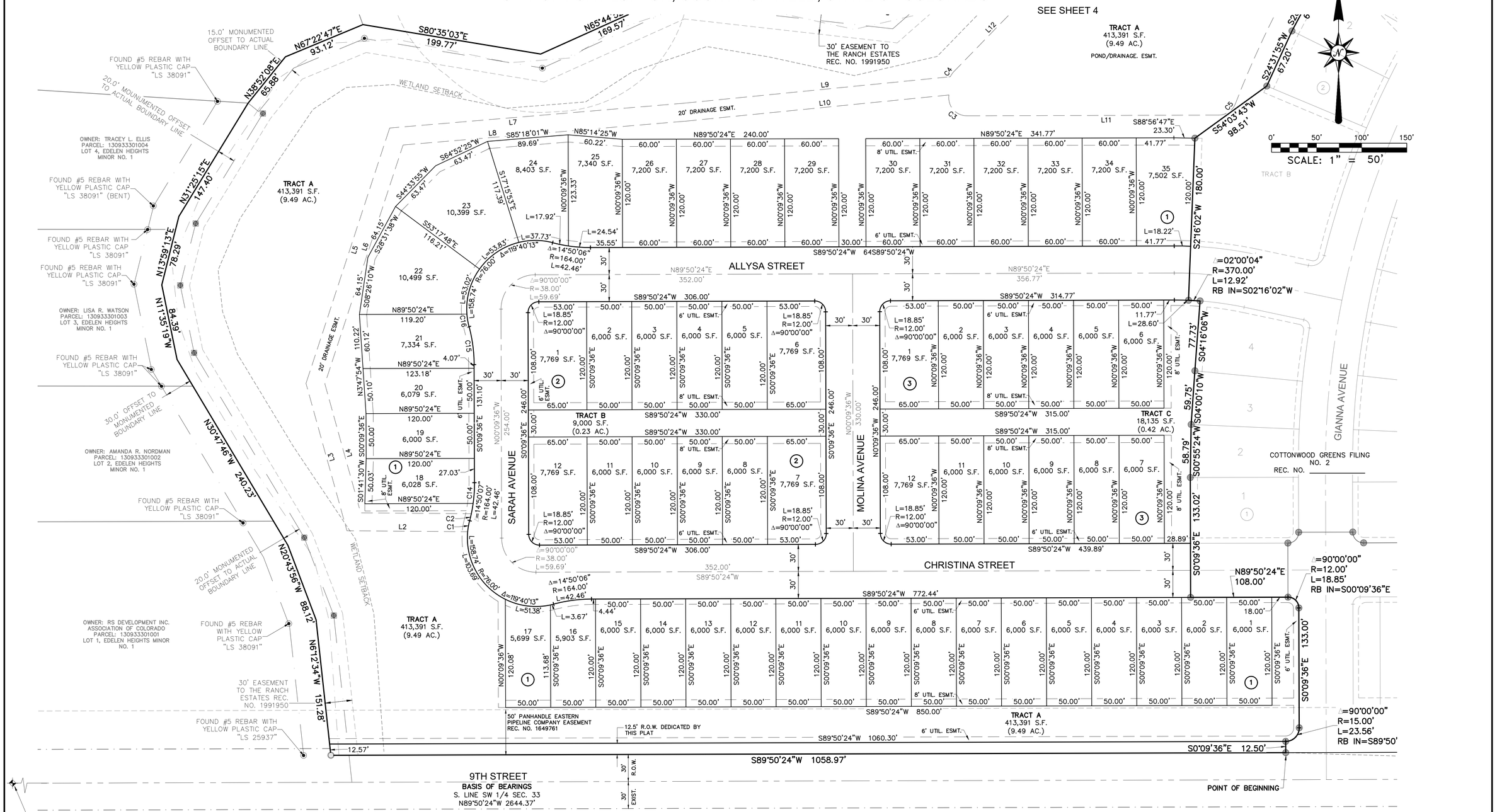
REVISIONS

SHEET 2 OF 6

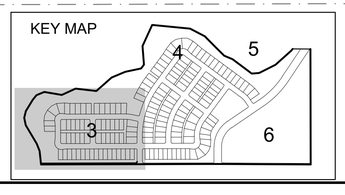
FILE NO.	19003254-FNL PUD
DATE	05/08/2020
DRAWN BY	TWK
CHECK BY	MLP
JOB NO.	19003254

COTTONWOOD GREENS FILING NO. 3

LOCATED IN THE SOUTH HALF OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH PRINCIPAL MERIDIAN,
CITY OF FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO



KEY MAP



LEGEND

- SECTION CORNER, AS NOTED
- FOUND #5 REBAR WITH 2" ALUMINUM CAP "LS 25379"
- 20.0' REFERENCE MONUMENT FOUND #5 REBAR WITH 2" ALUMINUM CAP "LS 25378 20.0' RM"
- SET 24" #5 REBAR WITH BLUE PLASTIC CAP "ATWELL PLS 38304"
- PROPERTY BOUNDARY
- SECTION LINE
- MATCH LINE
- UTILITY EASEMENT LINE
- DRAINAGE EASEMENT LINE
- FOUND BLUE PLASTIC CAP "ATWELL PLS 38304" UNLESS OTHERWISE NOTED
- LOT LINE
- R.O.W. CENTER LINE
- R.O.W. LINE
- WETLAND SETBACK LINE
- WETLAND LINE
- (1) BLOCK NUMBER

COLORADO LICENSED
MICHAEL LLOYD PUCL
38304
PROFESSIONAL LAND SURVEYOR

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

REVISIONS

SHEET 3 OF 6

FILE NO.	19003254-FINL PLAT
DATE	05/08/2020
DRAWN BY	TWK
CHECK BY	MLP
JOB NO.	19003254

COTTONWOOD GREENS FILING NO. 3

LOCATED IN THE SOUTH HALF OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH PRINCIPAL MERIDIAN,
CITY OF FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO

LINE DATA TABLE

LINE #	DIRECTION	LENGTH
L1	S89°33'22"E	122.65'
L2	S89°33'22"E	133.91'
L3	S15°30'17"E	169.64'
L4	S15°30'17"E	148.50'
L5	S18°07'40"W	298.15'
L6	S18°07'39"W	278.86'
L7	S85°10'40"W	327.20'
L8	N85°10'39"E	314.17'
L9	N84°19'22"E	297.28'
L10	N84°19'22"E	293.77'
L11	S89°50'24"W	279.27'
L12	N44°10'42"E	104.70'
L13	N47°58'46"E	98.00'
L14	N66°51'11"E	87.33'
L15	N75°08'19"E	133.84'
L16	N80°07'57"E	54.59'
L17	N52°03'50"E	101.44'
L18	S52°03'50"W	104.59'
L19	N33°36'47"E	96.21'
L21	S0°08'34"E	374.56'
L22	N17°55'44"E	67.71'
L23	N17°54'51"E	63.86'
L24	S53°31'39"E	21.10'

LINE DATA TABLE

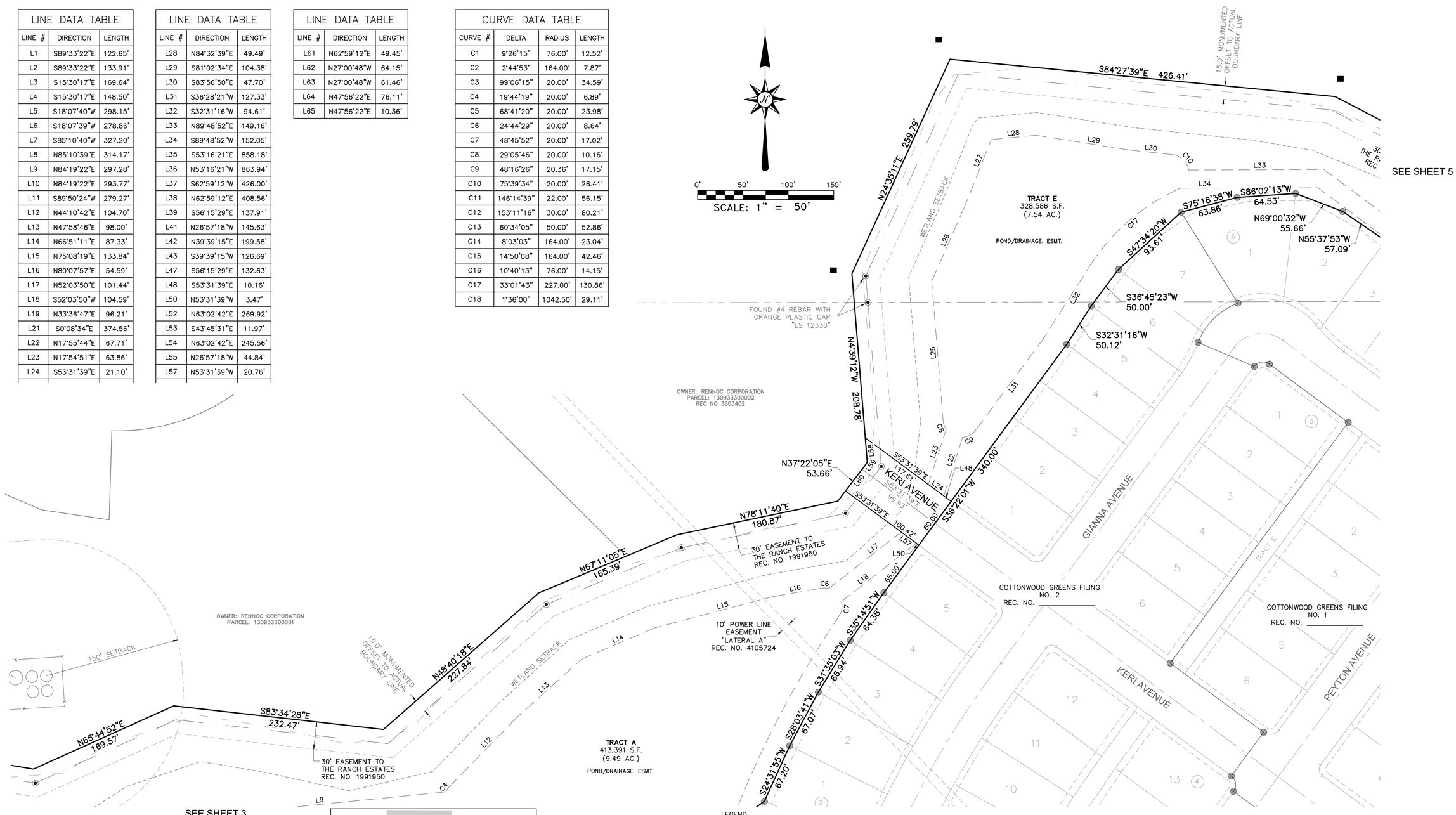
LINE #	DIRECTION	LENGTH
L28	N84°32'39"E	49.49'
L29	S81°02'34"E	104.38'
L30	S83°56'50"E	47.70'
L31	S36°28'21"W	127.33'
L32	S32°31'16"W	94.61'
L33	N89°48'52"E	149.16'
L34	S89°48'52"W	152.05'
L35	S53°16'21"E	858.18'
L36	N53°16'21"W	863.94'
L37	S62°59'12"W	426.00'
L38	N62°59'12"E	408.56'
L39	S56°15'29"E	137.91'
L41	N26°57'18"W	145.63'
L42	N39°39'15"E	199.58'
L43	S39°39'15"W	126.69'
L47	S56°15'29"E	132.63'
L48	S53°31'39"E	10.16'
L50	N53°31'39"W	3.47'
L52	N63°02'42"E	269.92'
L53	S43°45'31"E	11.97'
L54	N63°02'42"E	245.56'
L55	N26°57'18"W	44.84'
L57	N53°31'39"W	20.76'

LINE DATA TABLE

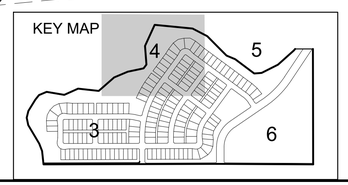
LINE #	DIRECTION	LENGTH
L61	N62°59'12"E	49.45'
L62	N27°00'48"W	64.15'
L63	N27°00'48"W	61.46'
L64	N47°56'22"E	76.11'
L65	N47°56'22"E	10.36'

CURVE DATA TABLE

CURVE #	DELTA	RADIUS	LENGTH
C1	9°26'15"	76.00'	12.52'
C2	2°44'53"	164.00'	7.87'
C3	99°06'15"	20.00'	34.59'
C4	19°44'19"	20.00'	6.89'
C5	68°41'20"	20.00'	23.98'
C6	24°44'29"	20.00'	8.64'
C7	48°45'52"	20.00'	17.02'
C8	29°05'46"	20.00'	10.16'
C9	48°16'26"	20.36'	17.15'
C10	75°39'34"	20.00'	26.41'
C11	146°14'39"	22.00'	56.15'
C12	153°11'16"	30.00'	80.21'
C13	60°34'05"	50.00'	52.86'
C14	8°03'03"	164.00'	23.04'
C15	14°50'08"	164.00'	42.46'
C16	10°40'13"	76.00'	14.15'
C17	33°01'43"	227.00'	130.86'
C18	1°36'00"	1042.50'	29.11'



KEY MAP



LEGEND

- SECTION CORNER, AS NOTED
- FOUND #5 REBAR WITH 2" ALUMINUM CAP "LS 25379"
- 20.0' REFERENCE MONUMENT FOUND #5 REBAR WITH 2" ALUMINUM CAP "LS 25378 20.0' RM"
- SET 24" #5 REBAR WITH BLUE PLASTIC CAP "ATWELL PLS 38304"
- PROPERTY BOUNDARY
- SECTION LINE
- MATCH LINE
- UTILITY EASEMENT LINE
- DRAINAGE EASEMENT LINE
- FOUND BLUE PLASTIC CAP "ATWELL PLS 38304" UNLESS OTHERWISE NOTED
- LOT LINE
- R.O.W. CENTER LINE
- R.O.W. LINE
- WETLAND SETBACK LINE
- WETLAND LINE
- (1) BLOCK NUMBER

COLORADO LICENSED
MICHAEL LLOYD PAUL
38304
PROFESSIONAL LAND SURVEYOR

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

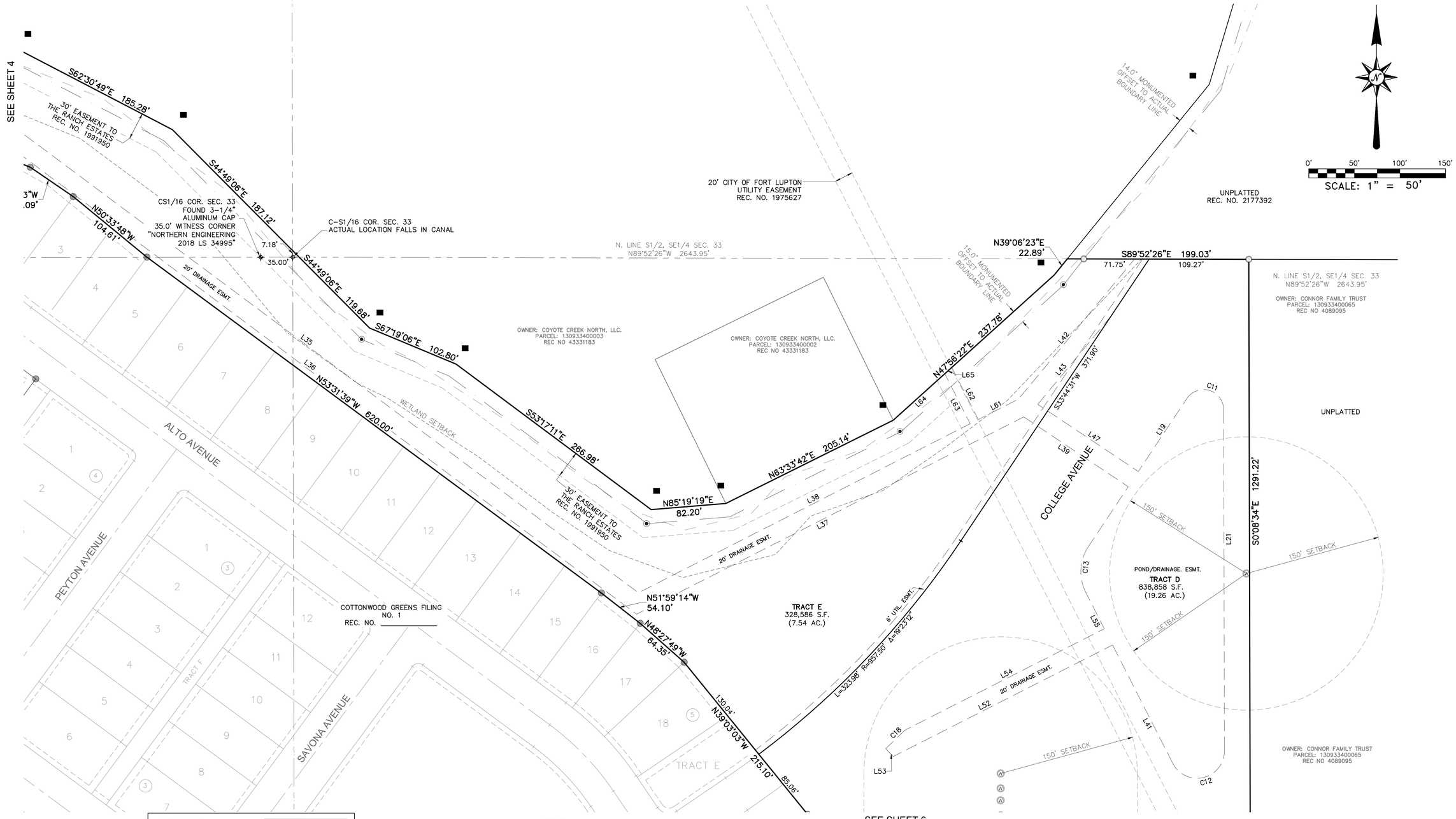
REVISIONS

SHEET 4 OF 6

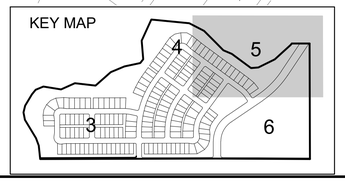
FILE NO.	19003254-FINL PLAT
DATE	05/08/2020
DRAWN BY	TWK
CHECK BY	MLP
JOB NO.	19003254

COTTONWOOD GREENS FILING NO. 3

LOCATED IN THE SOUTH HALF OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH PRINCIPAL MERIDIAN,
CITY OF FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO



KEY MAP



LEGEND

- SECTION CORNER, AS NOTED
- FOUND #5 REBAR WITH 2" ALUMINUM CAP "LS 25379"
- 20.0' REFERENCE MONUMENT FOUND #5 REBAR WITH 2" ALUMINUM CAP "LS 25378 20.0' RM"
- SET 24" #5 REBAR WITH BLUE PLASTIC CAP "ATWELL PLS 38304"
- PROPERTY BOUNDARY
- SECTION LINE
- MATCH LINE
- UTILITY EASEMENT LINE
- DRAINAGE EASEMENT LINE
- FOUND BLUE PLASTIC CAP "ATWELL PLS 38304" UNLESS OTHERWISE NOTED
- LOT LINE
- R.O.W. CENTER LINE
- R.O.W. LINE
- WETLAND SETBACK LINE
- WETLAND LINE
- (1) BLOCK NUMBER

COLORADO LICENSED MICHAEL LLOYD POOL 38304 PROFESSIONAL LAND SURVEYOR

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

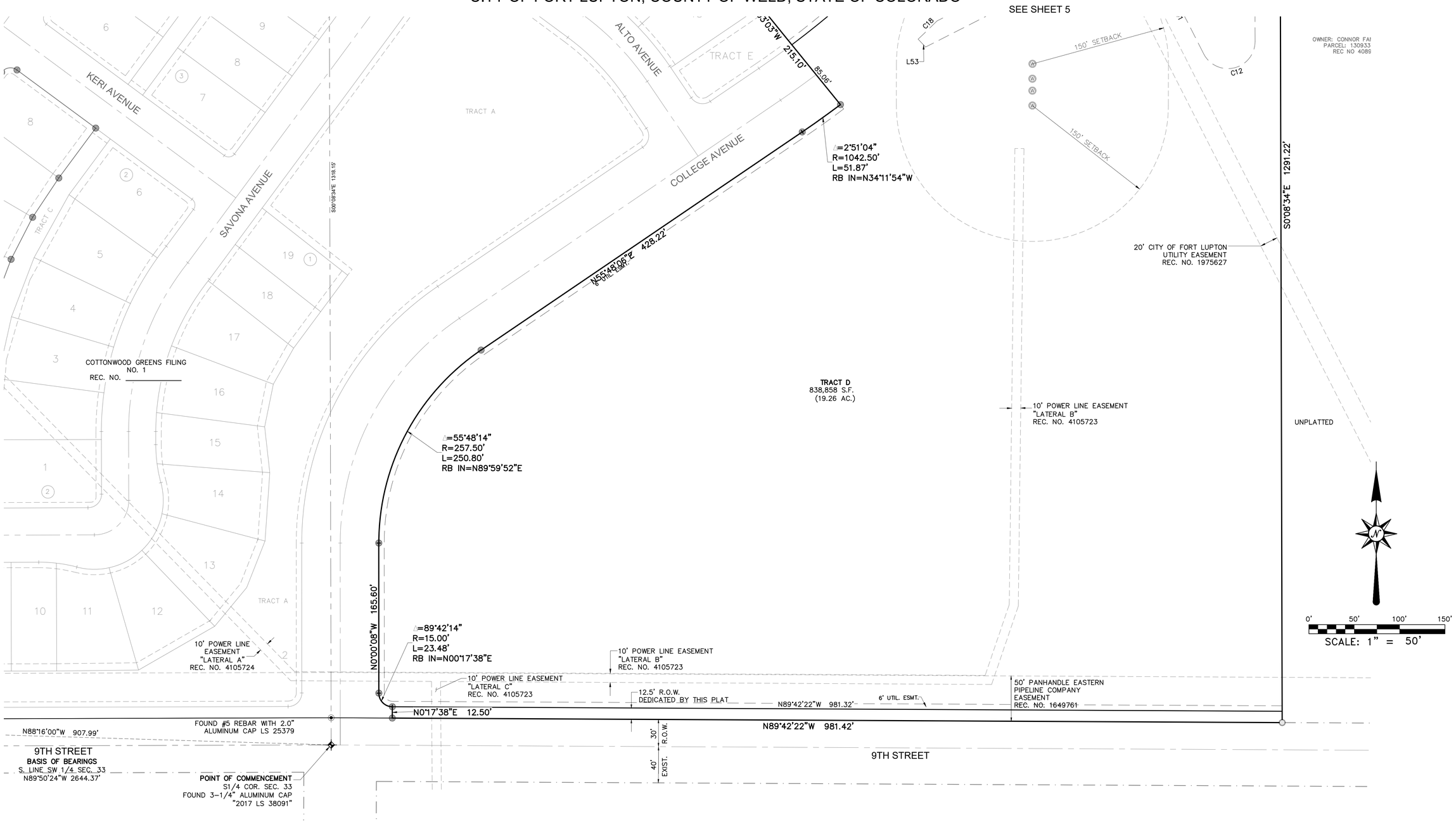
REVISIONS

SHEET 5 OF 6

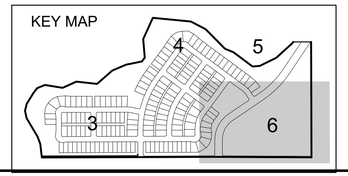
FILE NO.	19003254-FINAL PLAT
DATE	05/08/2020
DRAWN BY	TWK
CHECK BY	MLP
JOB NO.	19003254

COTTONWOOD GREENS FILING NO. 3

LOCATED IN THE SOUTH HALF OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH PRINCIPAL MERIDIAN,
CITY OF FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO



KEY MAP



LEGEND

- SECTION CORNER, AS NOTED
- FOUND #5 REBAR WITH 2" ALUMINUM CAP "LS 25379"
- 20.0' REFERENCE MONUMENT FOUND #5 REBAR WITH 2" ALUMINUM CAP "LS 25378 20.0' RM"
- SET 24" #5 REBAR WITH BLUE PLASTIC CAP "ATWELL PLS 38304"
- PROPERTY BOUNDARY
- SECTION LINE
- MATCH LINE
- UTILITY EASEMENT LINE
- DRAINAGE EASEMENT LINE
- FOUND BLUE PLASTIC CAP "ATWELL PLS 38304" UNLESS OTHERWISE NOTED
- LOT LINE
- R.O.W. CENTER LINE
- R.O.W. LINE
- WETLAND SETBACK LINE
- WETLAND LINE
- (1) BLOCK NUMBER

COLORADO LICENSED
MICHAEL LLOYD POOL
38304
PROFESSIONAL LAND SURVEYOR

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

REVISIONS

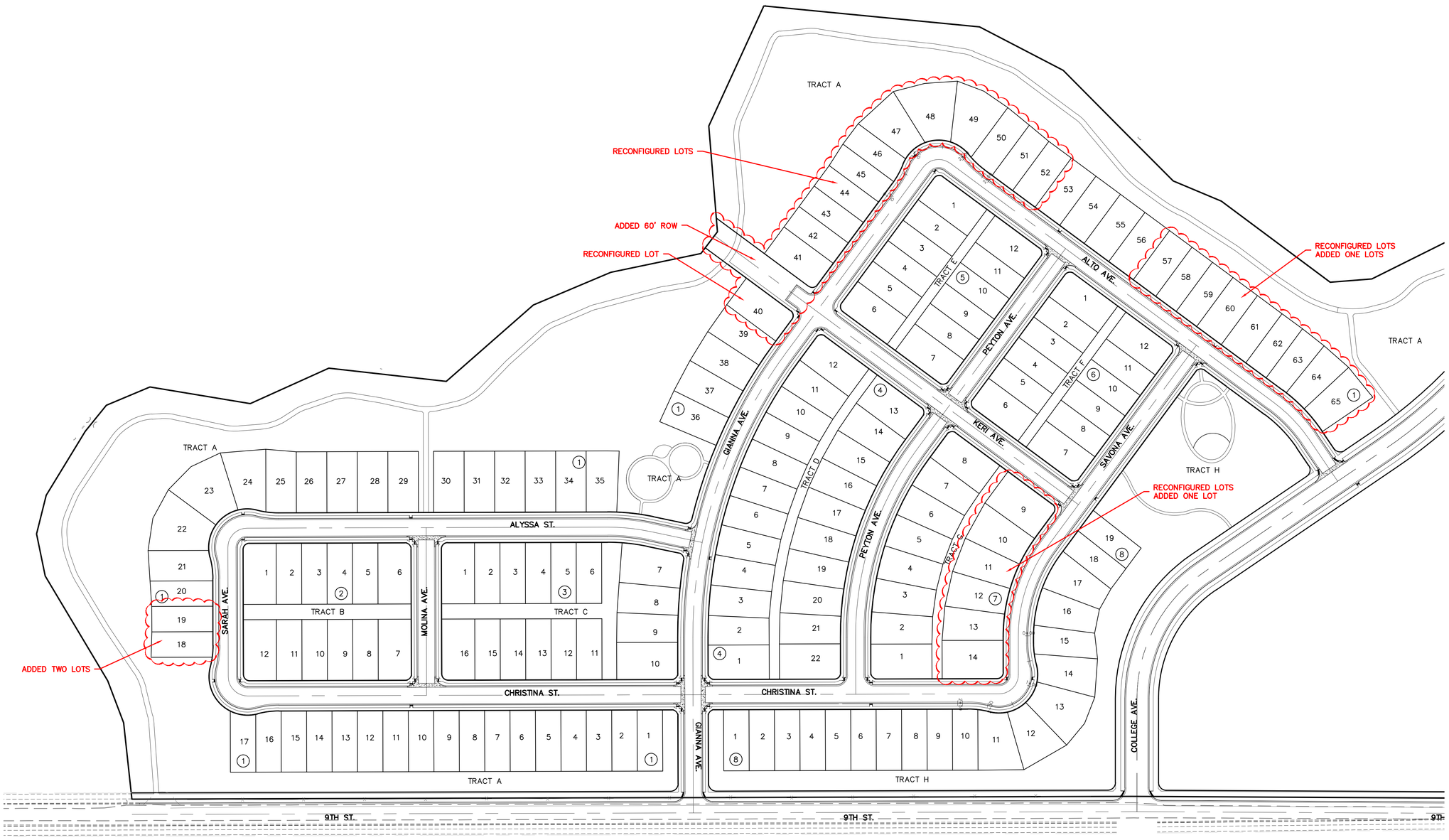
SHEET 6 OF 6

FILE NO.	19003254-FINAL PLAT
DATE	05/08/2020
DRAWN BY	TWK
CHECK BY	MLP
JOB NO.	19003254

COTTONWOOD GREENS

LAYOUT REVISIONS EXHIBIT

SHEET 1 OF 1



200 0 200 400

(IN FEET)
1 inch = 200 ft.

PROJECT NO.:19003254
DATE: 03/18/2020

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100
CONTACT: JEFF FRENCH
JFRENCH@ATWELL-GROUP.COM

CAD FILE: 19003254-LAYOUT REVISIONS EXHIBIT.DWG

Legend

SYMBOL	DESCRIPTION	QTY	DETAIL
	TURF	473,583 sf	IRRIGATED TURF DURA TURF SOD
	NATIVE SEED MIX	1,262,164 sf	NON-IRRIGATED NATIVE FOOTHILLS GRASS MIX ARKANSAS SEED MIX OR APPROVED EQUAL
	WOOD MULCH	20,813 sf	SHREDDED CEDAR MULCH ALL SHRUB BEDS TO RECEIVE A MINIMUM 4"-6" DEPTH SHREDDED CEDAR WOOD MULCH

50' DITCH BUFFER FROM TOP OF BANK

EXISTING TREES

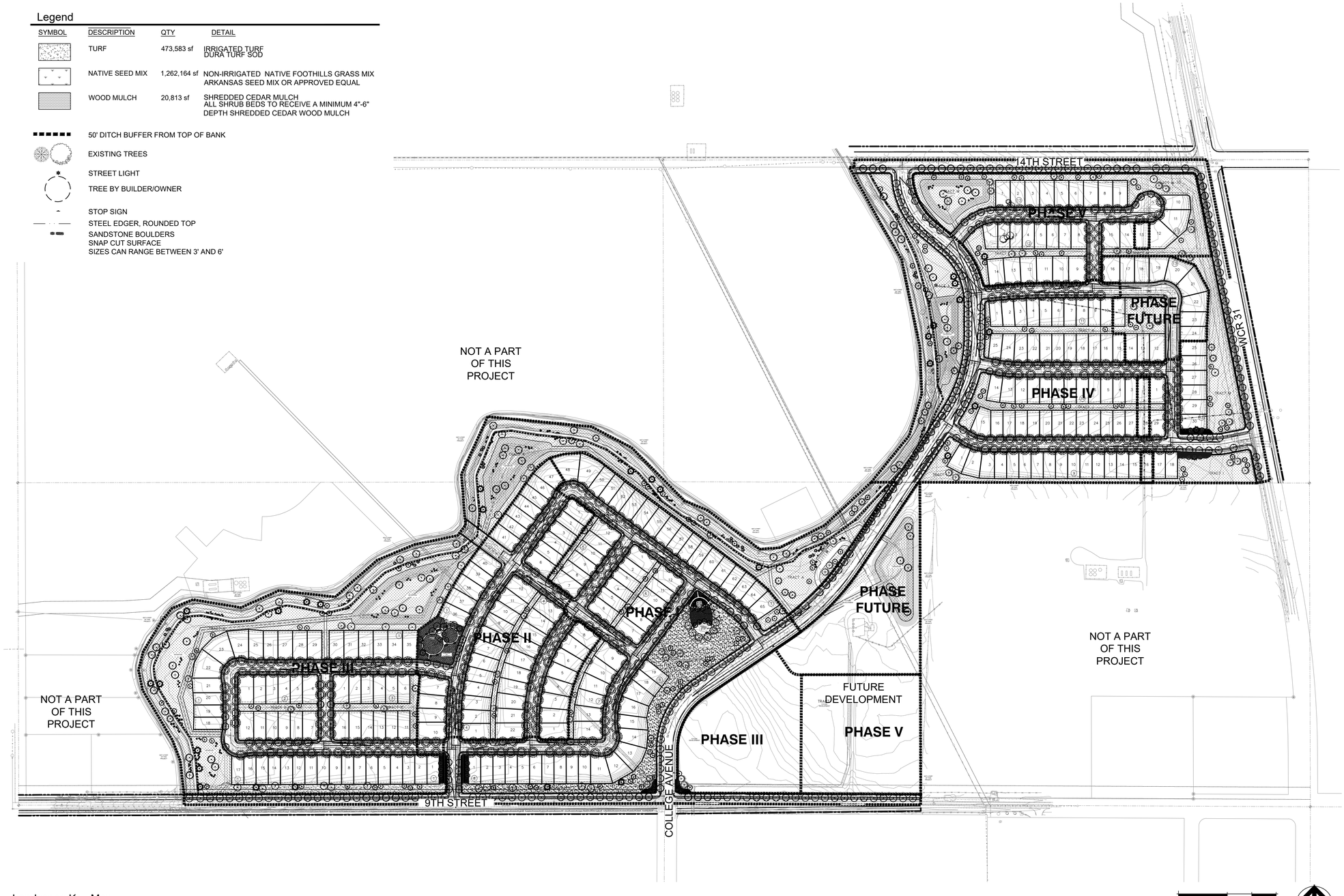
STREET LIGHT

TREE BY BUILDER/OWNER

STOP SIGN

STEEL EDGER, ROUNDED TOP

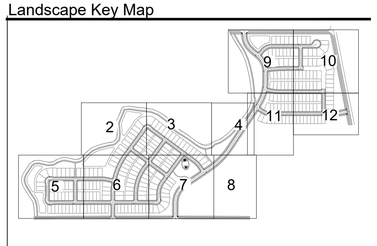
SANDSTONE BOULDERS
SNAP CUT SURFACE
SIZES CAN RANGE BETWEEN 3' AND 6'



0 200' 300' 400'

SCALE 1" = 200'-0"

Landscape Key Map



Sheet Index:

OVERALL LANDSCAPE & PHASING PLAN	1
LANDSCAPE PLAN	2
LANDSCAPE PLAN	3
LANDSCAPE PLAN	4
LANDSCAPE PLAN	5
LANDSCAPE PLAN	6
LANDSCAPE PLAN	7
LANDSCAPE PLAN	8
LANDSCAPE PLAN	9
LANDSCAPE PLAN	10
LANDSCAPE PLAN	11
LANDSCAPE PLAN	12
LANDSCAPE NOTES, DETAILS & SCHEDULES	13
NEIGHBORHOOD PARK ENLARGEMENT	14
POCKET PARK & TRAIL HEAD ENLARGMENT	15
SITE DETAILS	16

TB GROUP
landscape architecture | planning | illustration

444 Mountain Ave.
Berthoud,CO 80513

TEL 970.532.5891
WEB TBGroup.us

SEAL

PROJECT TITLE

COTTONWOOD GREENS

FINAL PLAT

PROJECT NO: LUP2019-0033
PLAN NO: PPL2019-0002

FORT LUPTON, COLORADO

PREPARED FOR

ARBOR CAPITAL PARTNERS LLC
4040 MACARTHUR BLVD.,
STE. 250
NEWPORT BEACH, CA 92660

REVISIONS	DATE
Revisions	3.19.2020
Revisions	5.11.2020

DATE

February 6, 2020

SHEET TITLE

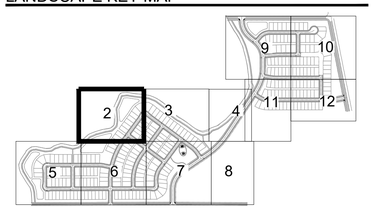
Overall Landscape & Phasing Plan

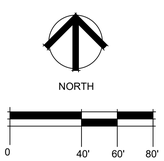
SHEET INFORMATION

Sheet Number: 1

Of: 16

LANDSCAPE KEY MAP





PLANT LIST

EVERGREEN TREES	QTY	BOTANICAL / COMMON NAME
	25	Juniperus scopulorum Rocky Mountain Juniper
	34	Picea pungens Colorado Spruce
	32	Pinus ponderosa Ponderosa Pine
	47	Pinus strobiformis Southwestern White Pine

ORNAMENTAL TREES	QTY	BOTANICAL / COMMON NAME
	40	Acer glabrum Rocky Mountain Maple
	37	Amelanchier x grandiflora `Autumn Brilliance' `Autumn Brilliance' Serviceberry
	48	Malus x `Spring Snow' Spring Snow Crab Apple
	43	Pyrus calleryana `Chanticleer' Chanticleer Pear

SHADE TREES	QTY	BOTANICAL / COMMON NAME
	103	Celtis occidentalis Western Hackberry
	98	Gleditsia triacanthos `Skyline' Skyline Honey Locust
	96	Gymnocladus dioica `Espresso' Seedless Kentucky Coffeetree
	31	Populus deltoides monilifera Plains Cottonwood
	41	Populus x acuminata Lanceleaf Cottonwood
	121	Quercus buckleyi Texas Red Oak
	100	Quercus macrocarpa Burr Oak
	116	Tilia americana `Redmond' Redmond American Linden
	91	Ulmus x `Accolade' Accolade Elm

DECIDUOUS SHRUBS	QTY	BOTANICAL / COMMON NAME
	74	Amelanchier alnifolia `Regent' Regent Serviceberry
	78	Aronia arbutifolia `Brilliantissima' Brilliant Red Chokeberry/Red Chokeberry
	129	Caryopteris x clandonensis `Dark Knight' Blue Mist Spirea
	22	Cornus sericea `Arctic Fire' Arctic Fire Dogwood
	20	Philadelphus x `Snowbell' Snowbell Mock Orange
	37	Physocarpus monogynus Mountain Ninebark
	35	Rhus trilobata Three-Leaf Sumac
	56	Ribes aureum Golden Currant
	108	Salix purpurea `Nana' Dwarf Arctic Willow

GRASSES	QTY	BOTANICAL / COMMON NAME
	147	Bouteloua gracilis `Blonde Ambition' Blonde Ambition Grama Grass
	88	Calamagrostis x acutiflora `Karl Foerster' Feather Reed Grass
	303	Panicum virgatum `Heavy Metal' Heavy Metal Blue Switch Grass

PERENNIALS	QTY	BOTANICAL / COMMON NAME
	99	Agastache rupestris `Sunset' Sunset Hyssop
	100	Echinacea purpurea Purple Coneflower
	7	Hemerocallis x `Red' Red Daylily
	321	Rudbeckia fulgida sullivantii `Goldsturm' Black-eyed Susan

NOTE: IN ANY INSTANCE WHERE THE PLANT LIST OR LANDSCAPE QUANTITIES DO NOT MATCH THE PLAN, REQUIRED PLANTS/QUANTITIES SHALL BE PER THE PLAN. CONTRACTOR TO VERIFY QUANTITIES.

TB GROUP
landscape architecture | planning | illustration

444 Mountain Ave.
Berthoud,CO 80513

TEL 970.532.5891
WEB TBGroup.us

SEAL

PROJECT TITLE

COTTONWOOD GREENS

FINAL PLAT

PROJECT NO: LUP2019-0033
PLAN NO: PPL2019-0002

FORT LUPTON, COLORADO

PREPARED FOR

ARBOR CAPITAL PARTNERS LLC
4040 MACARTHUR BLVD.,
STE. 250
NEWPORT BEACH, CA 92660

REVISIONS	DATE
Revisions	3.19.2020
Revisions	5.11.2020

DATE

February 6, 2020

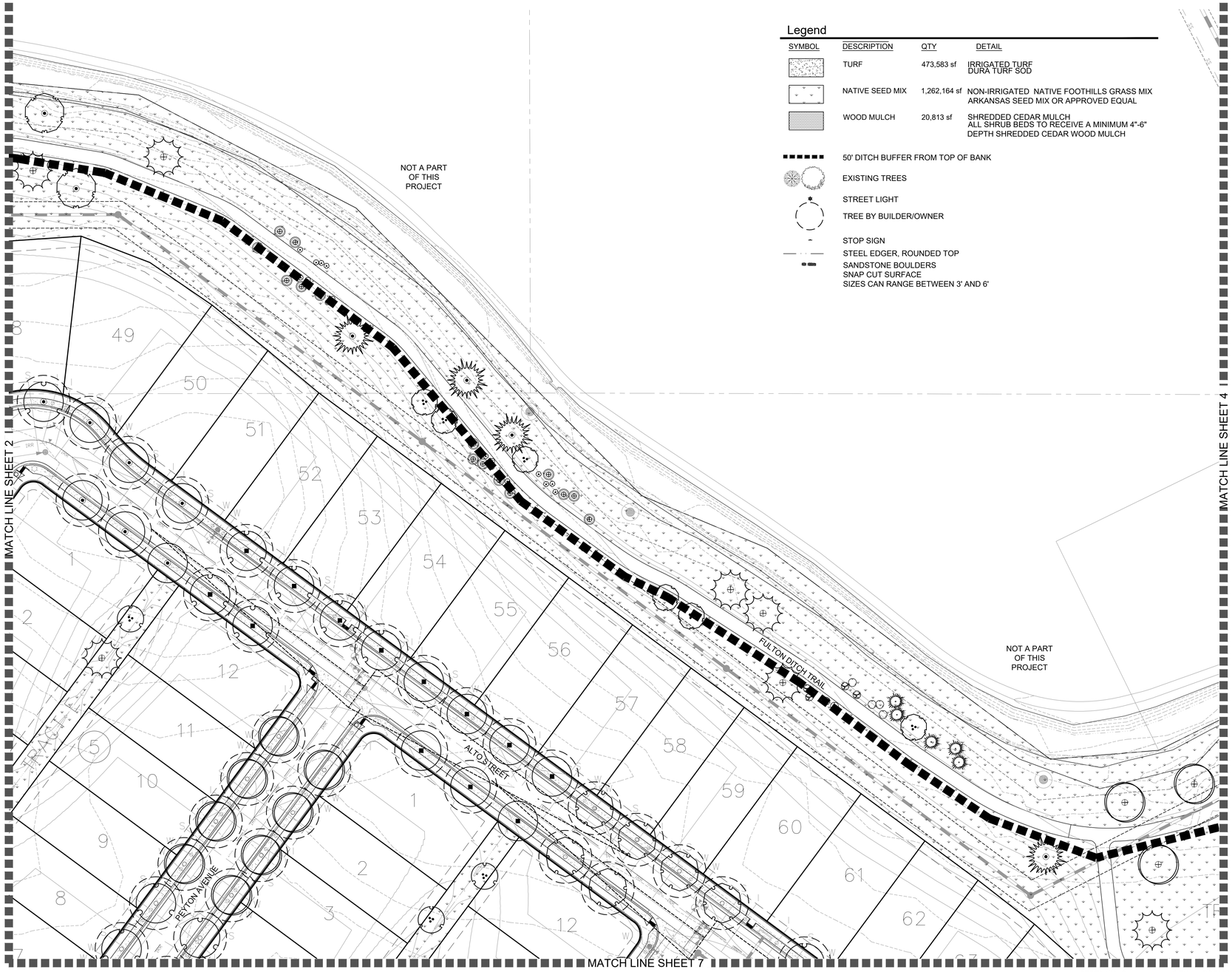
SHEET TITLE

LANDSCAPE PLAN

SHEET INFORMATION

Sheet Number: 2

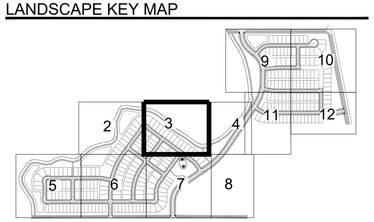
Of: 16



Legend

SYMBOL	DESCRIPTION	QTY	DETAIL
	TURF	473,583 sf	IRRIGATED TURF DURA TURF SOD
	NATIVE SEED MIX	1,262,164 sf	NON-IRRIGATED NATIVE FOOTHILLS GRASS MIX ARKANSAS SEED MIX OR APPROVED EQUAL
	WOOD MULCH	20,813 sf	SHREDDED CEDAR MULCH ALL SHRUB BEDS TO RECEIVE A MINIMUM 4"-6" DEPTH SHREDDED CEDAR WOOD MULCH
	50' DITCH BUFFER FROM TOP OF BANK		
	EXISTING TREES		
	STREET LIGHT		
	TREE BY BUILDER/OWNER		
	STOP SIGN		
	STEEL EDGER, ROUNDED TOP		
	SANDSTONE BOULDERS SNAP CUT SURFACE SIZES CAN RANGE BETWEEN 3' AND 6'		

LANDSCAPE KEY MAP



NORTH

0 40' 60' 80'

SCALE 1" = 40'-0"

PLANT LIST

EVERGREEN TREES	QTY	BOTANICAL / COMMON NAME
	25	Juniperus scopulorum Rocky Mountain Juniper
	34	Picea pungens Colorado Spruce
	32	Pinus ponderosa Ponderosa Pine
	47	Pinus strobiformis Southwestern White Pine

ORNAMENTAL TREES	QTY	BOTANICAL / COMMON NAME
	40	Acer glabrum Rocky Mountain Maple
	37	Amelanchier x grandiflora `Autumn Brilliance` `Autumn Brilliance` Serviceberry
	48	Malus x `Spring Snow` Spring Snow Crab Apple
	43	Pyrus calleryana `Chanticleer` Chanticleer Pear

SHADE TREES	QTY	BOTANICAL / COMMON NAME
	103	Celtis occidentalis Western Hackberry
	98	Gleditsia triacanthos `Skyline` Skyline Honey Locust
	96	Gymnocladus dioica `Espresso` Seedless Kentucky Coffeetree
	31	Populus deltoides monilifera Plains Cottonwood
	41	Populus x acuminata Lanceleaf Cottonwood
	121	Quercus buckleyi Texas Red Oak
	100	Quercus macrocarpa Burr Oak
	116	Tilia americana `Redmond` Redmond American Linden
	91	Ulmus x `Accolade` Accolade Elm

DECIDUOUS SHRUBS	QTY	BOTANICAL / COMMON NAME
	74	Amelanchier alnifolia `Regent` Regent Serviceberry
	78	Aronia arbutifolia `Brilliantissima` Brilliant Red Chokeberry/Red Chokeberry
	129	Caryopteris x clandonensis `Dark Knight` Blue Mist Spirea
	22	Cornus sericea `Arctic Fire` Arctic Fire Dogwood
	20	Philadelphus x `Snowbell` Snowbell Mock Orange
	37	Physocarpus monogynus Mountain Ninebark
	35	Rhus trilobata Three-Leaf Sumac
	56	Ribes aureum Golden Currant
	108	Salix purpurea `Nana` Dwarf Arctic Willow

GRASSES	QTY	BOTANICAL / COMMON NAME
	147	Bouteloua gracilis `Blonde Ambition` Blonde Ambition Grama Grass
	88	Calamagrostis x acutiflora `Karl Foerster` Feather Reed Grass
	303	Panicum virgatum `Heavy Metal` Heavy Metal Blue Switch Grass

PERENNIALS	QTY	BOTANICAL / COMMON NAME
	99	Agastache rupestris `Sunset` Sunset Hyssop
	100	Echinacea purpurea Purple Coneflower
	7	Hemerocallis x `Red` Red Daylily
	321	Rudbeckia fulgida sullivantii `Goldsturm` Black-eyed Susan

NOTE: IN ANY INSTANCE WHERE THE PLANT LIST OR LANDSCAPE QUANTITIES DO NOT MATCH THE PLAN, REQUIRED PLANTS/QUANTITIES SHALL BE PER THE PLAN. CONTRACTOR TO VERIFY QUANTITIES.

TB GROUP
landscape architecture | planning | illustration
444 Mountain Ave.
Berthoud, CO 80513
TEL 970.532.5891
WEB TBGroup.us

SEAL

PROJECT TITLE

COTTONWOOD GREENS

FINAL PLAT

PROJECT NO: LUP2019-0033
PLAN NO: PPL2019-0002

FORT LUPTON, COLORADO

PREPARED FOR

ARBOR CAPITAL PARTNERS LLC
4040 MACARTHUR BLVD.,
STE. 250
NEWPORT BEACH, CA 92660

REVISIONS	DATE
Revisions	3.19.2020
Revisions	5.11.2020

DATE

February 6, 2020

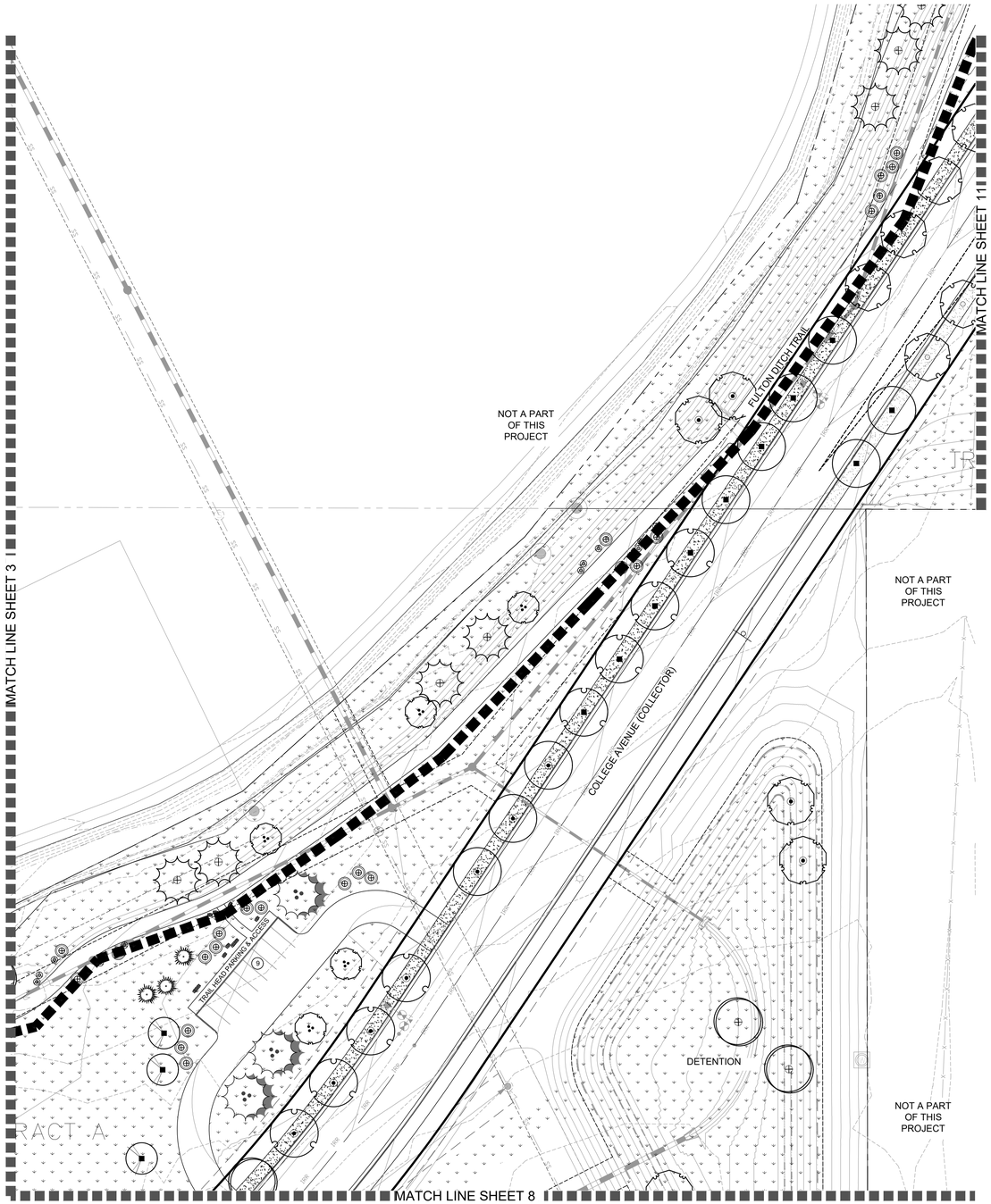
SHEET TITLE

LANDSCAPE PLAN

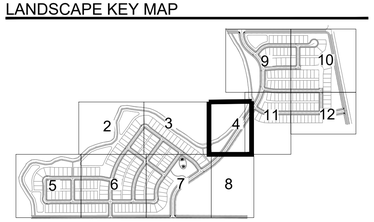
SHEET INFORMATION

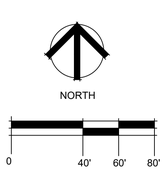
Sheet Number: 3

Of: 16



LANDSCAPE KEY MAP





Legend

SYMBOL	DESCRIPTION	QTY	DETAIL
	TURF	473,583 sf	IRRIGATED TURF DURA TURF SOD
	NATIVE SEED MIX	1,262,164 sf	NON-IRRIGATED NATIVE FOOTHILLS GRASS MIX ARKANSAS SEED MIX OR APPROVED EQUAL
	WOOD MULCH	20,813 sf	SHREDDED CEDAR MULCH ALL SHRUB BEDS TO RECEIVE A MINIMUM 4"-6" DEPTH SHREDDED CEDAR WOOD MULCH
	50' DITCH BUFFER FROM TOP OF BANK		
	EXISTING TREES		
	STREET LIGHT		
	TREE BY BUILDER/OWNER		
	STOP SIGN		
	STEEL EDGER, ROUNDED TOP		
	SANDSTONE BOULDERS SNAP CUT SURFACE SIZES CAN RANGE BETWEEN 3' AND 6'		

PERENNIALS	QTY	BOTANICAL / COMMON NAME
	99	Agastache rupestris `Sunset` Sunset Hyssop
	100	Echinacea purpurea Purple Coneflower
	7	Hemerocallis x `Red` Red Daylily
	321	Rudbeckia fulgida sullivantii `Goldsturm` Black-eyed Susan

NOTE: IN ANY INSTANCE WHERE THE PLANT LIST OR LANDSCAPE QUANTITIES DO NOT MATCH THE PLAN, REQUIRED PLANTS/QUANTITIES SHALL BE PER THE PLAN. CONTRACTOR TO VERIFY QUANTITIES.

PLANT LIST

EVERGREEN TREES	QTY	BOTANICAL / COMMON NAME
	25	Juniperus scopulorum Rocky Mountain Juniper
	34	Picea pungens Colorado Spruce
	32	Pinus ponderosa Ponderosa Pine
	47	Pinus strobiformis Southwestern White Pine

ORNAMENTAL TREES	QTY	BOTANICAL / COMMON NAME
	40	Acer glabrum Rocky Mountain Maple
	37	Amelanchier x grandiflora `Autumn Brilliance` `Autumn Brilliance` Serviceberry
	48	Malus x `Spring Snow` Spring Snow Crab Apple
	43	Pyrus calleryana `Chanticleer` Chanticleer Pear

SHADE TREES	QTY	BOTANICAL / COMMON NAME
	103	Celtis occidentalis Western Hackberry
	98	Gleditsia triacanthos `Skyline` Skyline Honey Locust
	96	Gymnocladus dioica `Espresso` Seedless Kentucky Coffeetree
	31	Populus deltoides monilifera Plains Cottonwood
	41	Populus x acuminata Lanceleaf Cottonwood
	121	Quercus buckleyi Texas Red Oak
	100	Quercus macrocarpa Burr Oak
	116	Tilia americana `Redmond` Redmond American Linden
	91	Ulmus x `Accolade` Accolade Elm

DECIDUOUS SHRUBS	QTY	BOTANICAL / COMMON NAME
	74	Amelanchier alnifolia `Regent` Regent Serviceberry
	78	Aronia arbutifolia `Brilliantissima` Brilliant Red Chokeberry/Red Chokeberry
	129	Caryopteris x clandonensis `Dark Knight` Blue Mist Spirea
	22	Cornus sericea `Arctic Fire` Arctic Fire Dogwood
	20	Philadelphus x `Snowbell` Snowbell Mock Orange
	37	Physocarpus monogynus Mountain Ninebark
	35	Rhus trilobata Three-Leaf Sumac
	56	Ribes aureum Golden Currant
	108	Salix purpurea `Nana` Dwarf Arctic Willow

GRASSES	QTY	BOTANICAL / COMMON NAME
	147	Bouteloua gracilis `Blonde Ambition` Blonde Ambition Grama Grass
	88	Calamagrostis x acutiflora `Karl Foerster` Feather Reed Grass
	303	Panicum virgatum `Heavy Metal` Heavy Metal Blue Switch Grass

TB GROUP
landscape architecture | planning | illustration

444 Mountain Ave.
Berthoud,CO 80513

TEL 970.532.5891
WEB TBGroup.us

SEAL

PROJECT TITLE

COTTONWOOD GREENS

FINAL PLAT

PROJECT NO: LUP2019-0033
PLAN NO: PPL2019-0002

FORT LUPTON, COLORADO

PREPARED FOR

ARBOR CAPITAL PARTNERS LLC
4040 MACARTHUR BLVD.,
STE. 250
NEWPORT BEACH, CA 92660

REVISIONS	DATE
Revisions	3.19 2020
Revisions	5.11 2020

DATE

February 6, 2020

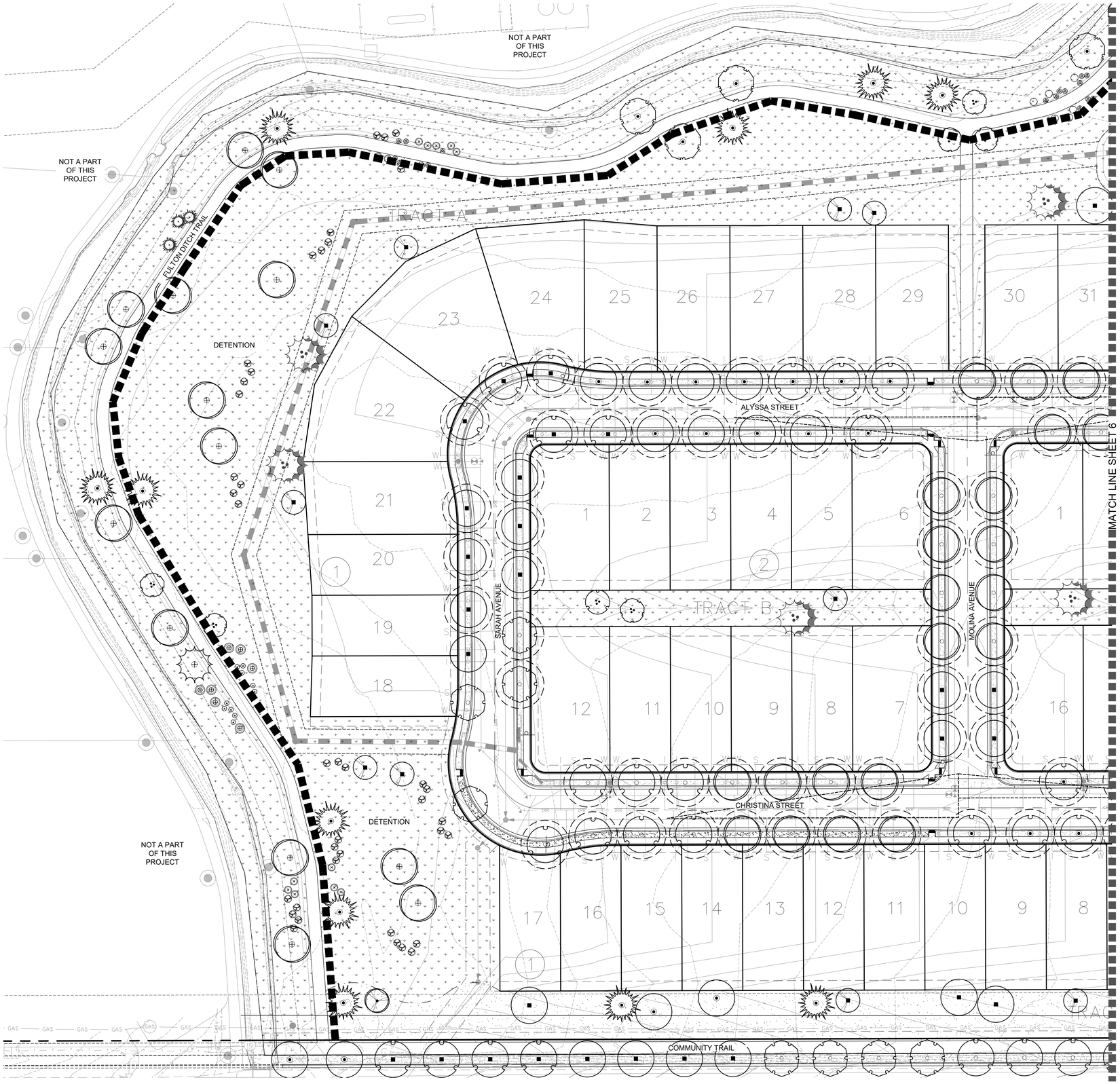
SHEET TITLE

LANDSCAPE PLAN

SHEET INFORMATION

Sheet Number: 4

Of: 16



Legend

SYMBOL	DESCRIPTION	QTY	DETAIL
	TURF	473,583 sf	IRRIGATED TURF DURA TURF SOD
	NATIVE SEED MIX	1,262,164 sf	NON-IRRIGATED NATIVE FOOTHILLS GRASS MIX ARKANSAS SEED MIX OR APPROVED EQUAL
	WOOD MULCH	20,813 sf	SHREDDED CEDAR MULCH ALL SHRUB BEDS TO RECEIVE A MINIMUM 4"-6" DEPTH SHREDDED CEDAR WOOD MULCH

50' DITCH BUFFER FROM TOP OF BANK

EXISTING TREES

STREET LIGHT

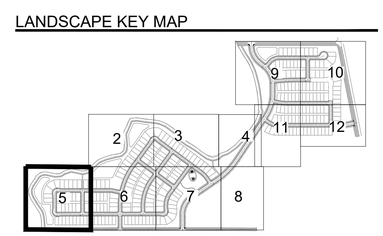
TREE BY BUILDER/OWNER

STOP SIGN

STEEL EDGER, ROUNDED TOP

SANDSTONE BOULDERS
SNAP CUT SURFACE
SIZES CAN RANGE BETWEEN 3' AND 6'

LANDSCAPE KEY MAP



NORTH

0 40' 60' 80'

SCALE 1" = 40'-0"

TB GROUP
landscape architecture | planning | illustration

444 Mountain Ave.
Berthoud, CO 80513

TEL 970.532.5891
WEB TBGroup.us

SEAL

PROJECT TITLE

COTTONWOOD GREENS

FINAL PLAT

PROJECT NO: LUP2019-0033
PLAN NO: PPL2019-0002

FORT LUPTON, COLORADO

PREPARED FOR

ARBOR CAPITAL PARTNERS LLC
4040 MACARTHUR BLVD.,
STE. 250
NEWPORT BEACH, CA 92660

REVISIONS	DATE
Revisions	3.19.2020
Revisions	5.11.2020

DATE

February 6, 2020

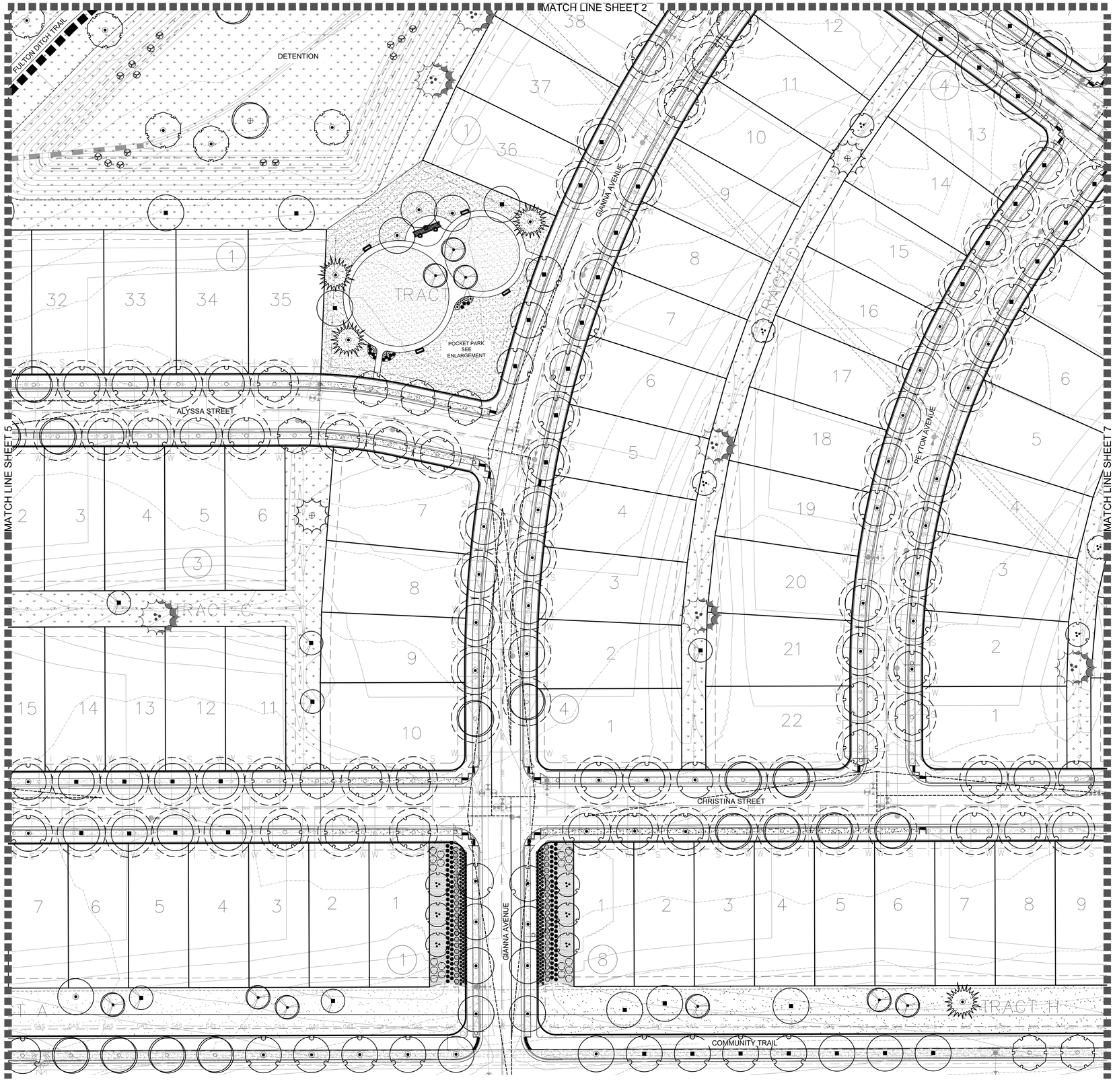
SHEET TITLE

LANDSCAPE PLAN

SHEET INFORMATION

Sheet Number: 5

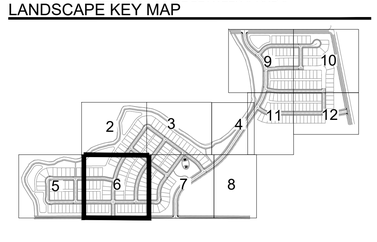
Of: 16



Legend

SYMBOL	DESCRIPTION	QTY	DETAIL
	TURF	473,583 sf	IRRIGATED TURF DURA TURF SOD
	NATIVE SEED MIX	1,262,164 sf	NON-IRRIGATED NATIVE FOOTHILLS GRASS MIX ARKANSAS SEED MIX OR APPROVED EQUAL
	WOOD MULCH	20,813 sf	SHREDDED CEDAR MULCH ALL SHRUB BEDS TO RECEIVE A MINIMUM 4"-6" DEPTH SHREDDED CEDAR WOOD MULCH
	50' DITCH BUFFER FROM TOP OF BANK		
	EXISTING TREES		
	STREET LIGHT		
	TREE BY BUILDER/OWNER		
	STOP SIGN		
	STEEL EDGER, ROUNDED TOP		
	SANDSTONE BOULDERS SNAP CUT SURFACE SIZES CAN RANGE BETWEEN 3' AND 6'		

LANDSCAPE KEY MAP



NORTH

0 40' 60' 80'

SCALE 1" = 40'-0"

TB GROUP
landscape architecture | planning | illustration
444 Mountain Ave.
Berthoud, CO 80513
TEL 970.532.5891
WEB TBGroup.us

SEAL

PROJECT TITLE

COTTONWOOD GREENS

FINAL PLAT

PROJECT NO: LUP2019-0033
PLAN NO: PPL2019-0002

FORT LUPTON, COLORADO

PREPARED FOR

ARBOR CAPITAL PARTNERS LLC
4040 MACARTHUR BLVD.,
STE. 250
NEWPORT BEACH, CA 92660

REVISIONS	DATE
Revisions	3.19.2020
Revisions	5.11.2020

DATE

February 6, 2020

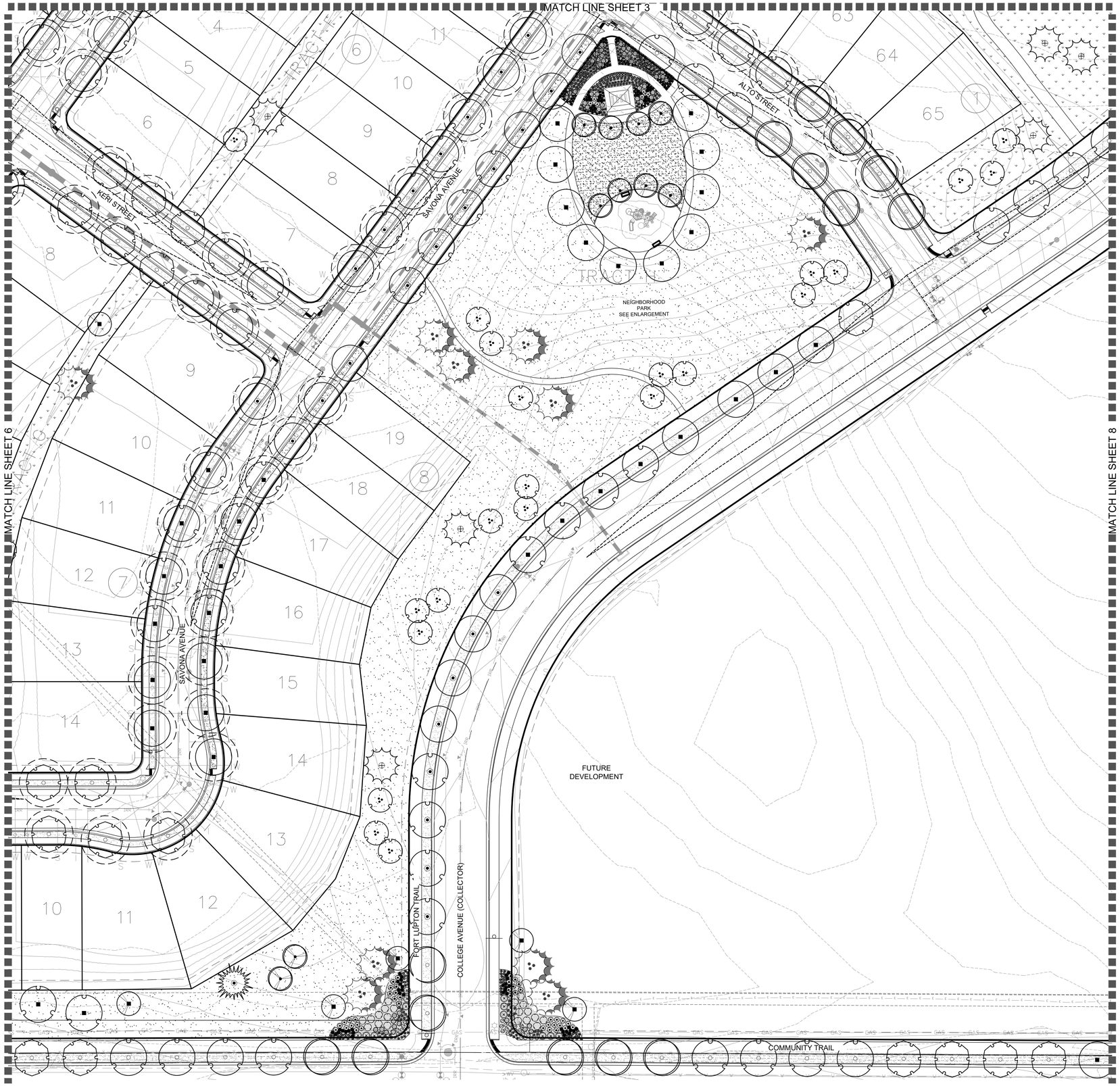
SHEET TITLE

LANDSCAPE PLAN

SHEET INFORMATION

Sheet Number: 6

Of: 16



Legend

SYMBOL	DESCRIPTION	QTY	DETAIL
	TURF	473,583 sf	IRRIGATED TURF DURA TURF SOD
	NATIVE SEED MIX	1,262,164 sf	NON-IRRIGATED NATIVE FOOTHILLS GRASS MIX ARKANSAS SEED MIX OR APPROVED EQUAL
	WOOD MULCH	20,813 sf	SHREDDED CEDAR MULCH ALL SHRUB BEDS TO RECEIVE A MINIMUM 4"-6" DEPTH SHREDDED CEDAR WOOD MULCH

50' DITCH BUFFER FROM TOP OF BANK

EXISTING TREES

STREET LIGHT

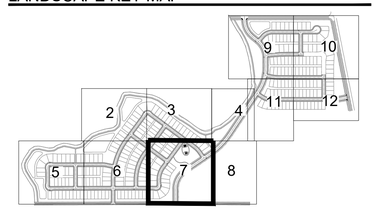
TREE BY BUILDER/OWNER

STOP SIGN

STEEL EDGER, ROUNDED TOP

SANDSTONE BOULDERS
SNAP CUT SURFACE
SIZES CAN RANGE BETWEEN 3' AND 6'

LANDSCAPE KEY MAP



NORTH

0 40' 60' 80'

SCALE 1" = 40'-0"

TB GROUP
landscape architecture | planning | illustration
444 Mountain Ave.
Berthoud,CO 80513
TEL 970.532.5891
WEB TBGroup.us

SEAL

PROJECT TITLE

COTTONWOOD GREENS

FINAL PLAT

PROJECT NO: LUP2019-0033
PLAN NO: PPL2019-0002

FORT LUPTON, COLORADO

PREPARED FOR

ARBOR CAPITAL PARTNERS LLC
4040 MACARTHUR BLVD.,
STE. 250
NEWPORT BEACH, CA 92660

REVISIONS	DATE
Revisions	3.19.2020
Revisions	5.11.2020

DATE

February 6, 2020

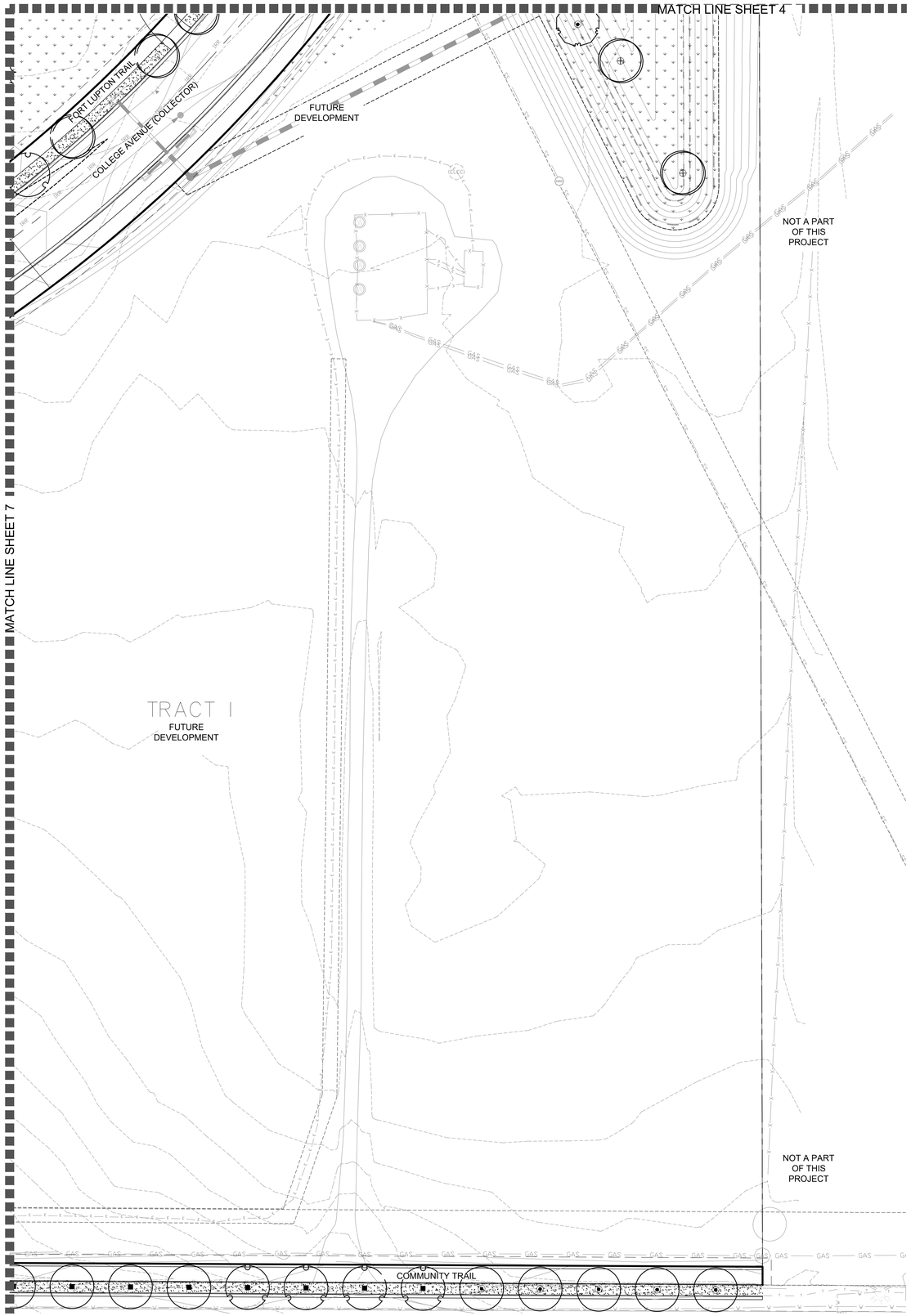
SHEET TITLE

LANDSCAPE PLAN

SHEET INFORMATION

Sheet Number: 7

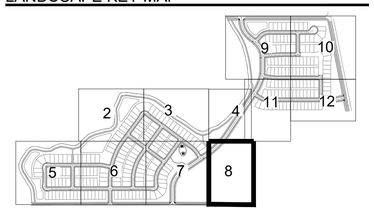
Of: 16



Legend

SYMBOL	DESCRIPTION	QTY	DETAIL
	TURF	473,583 sf	IRRIGATED TURF DURA TURF SOD
	NATIVE SEED MIX	1,262,164 sf	NON-IRRIGATED NATIVE FOOTHILLS GRASS MIX ARKANSAS SEED MIX OR APPROVED EQUAL
	WOOD MULCH	20,813 sf	SHREDDED CEDAR MULCH ALL SHRUB BEDS TO RECEIVE A MINIMUM 4"-6" DEPTH SHREDDED CEDAR WOOD MULCH
	50' DITCH BUFFER FROM TOP OF BANK		
	EXISTING TREES		
	STREET LIGHT		
	TREE BY BUILDER/OWNER		
	STOP SIGN		
	STEEL EDGER, ROUNDED TOP		
	SANDSTONE BOULDERS SNAP CUT SURFACE SIZES CAN RANGE BETWEEN 3' AND 6'		

LANDSCAPE KEY MAP



NORTH

0 40' 60' 80'

SCALE 1" = 40'-0"

PLANT LIST

EVERGREEN TREES	QTY	BOTANICAL / COMMON NAME
	25	Juniperus scopulorum Rocky Mountain Juniper
	34	Picea pungens Colorado Spruce
	32	Pinus ponderosa Ponderosa Pine
	47	Pinus strobiformis Southwestern White Pine

ORNAMENTAL TREES	QTY	BOTANICAL / COMMON NAME
	40	Acer glabrum Rocky Mountain Maple
	37	Amelanchier x grandiflora `Autumn Brilliance` `Autumn Brilliance` Serviceberry
	48	Malus x `Spring Snow` Spring Snow Crab Apple
	43	Pyrus calleryana `Chanticleer` Chanticleer Pear

SHADE TREES	QTY	BOTANICAL / COMMON NAME
	103	Celtis occidentalis Western Hackberry
	98	Gleditsia triacanthos `Skyline` Skyline Honey Locust
	96	Gymnocladus dioica `Espresso` Seedless Kentucky Coffeetree
	31	Populus deltoides monilifera Plains Cottonwood
	41	Populus x acuminata Lanceleaf Cottonwood
	121	Quercus buckleyi Texas Red Oak
	100	Quercus macrocarpa Burr Oak
	116	Tilia americana `Redmond` Redmond American Linden
	91	Ulmus x `Accolade` Accolade Elm

DECIDUOUS SHRUBS	QTY	BOTANICAL / COMMON NAME
	74	Amelanchier alnifolia `Regent` Regent Serviceberry
	78	Aronia arbutifolia `Brilliantissima` Brilliant Red Chokeberry/Red Chokeberry
	129	Caryopteris x clandonensis `Dark Knight` Blue Mist Spirea
	22	Cornus sericea `Arctic Fire` Arctic Fire Dogwood
	20	Philadelphus x `Snowbell` Snowbell Mock Orange
	37	Physocarpus monogynus Mountain Ninebark
	35	Rhus trilobata Three-Leaf Sumac
	56	Ribes aureum Golden Currant
	108	Salix purpurea `Nana` Dwarf Arctic Willow

GRASSES	QTY	BOTANICAL / COMMON NAME
	147	Bouteloua gracilis `Blonde Ambition` Blonde Ambition Grama Grass
	88	Calamagrostis x acutiflora `Karl Foerster` Feather Reed Grass
	303	Panicum virgatum `Heavy Metal` Heavy Metal Blue Switch Grass

PERENNIALS	QTY	BOTANICAL / COMMON NAME
	99	Agastache rupestris `Sunset` Sunset Hyssop
	100	Echinacea purpurea Purple Coneflower
	7	Hemerocallis x `Red` Red Daylily
	321	Rudbeckia fulgida sullivantii `Goldsturm` Black-eyed Susan

NOTE: IN ANY INSTANCE WHERE THE PLANT LIST OR LANDSCAPE QUANTITIES DO NOT MATCH THE PLAN, REQUIRED PLANTS/QUANTITIES SHALL BE PER THE PLAN. CONTRACTOR TO VERIFY QUANTITIES.

TB GROUP
landscape architecture | planning | illustration
444 Mountain Ave.
Berthoud,CO 80513
TEL 970.532.5891
WEB TBGroup.us

SEAL

PROJECT TITLE

COTTONWOOD GREENS

FINAL PLAT

PROJECT NO: LUP2019-0033
PLAN NO: PPL2019-0002

FORT LUPTON, COLORADO

PREPARED FOR

ARBOR CAPITAL PARTNERS LLC
4040 MACARTHUR BLVD.,
STE. 250
NEWPORT BEACH, CA 92660

REVISIONS	DATE
Revisions	3.19.2020
Revisions	5.11.2020

DATE

February 6, 2020

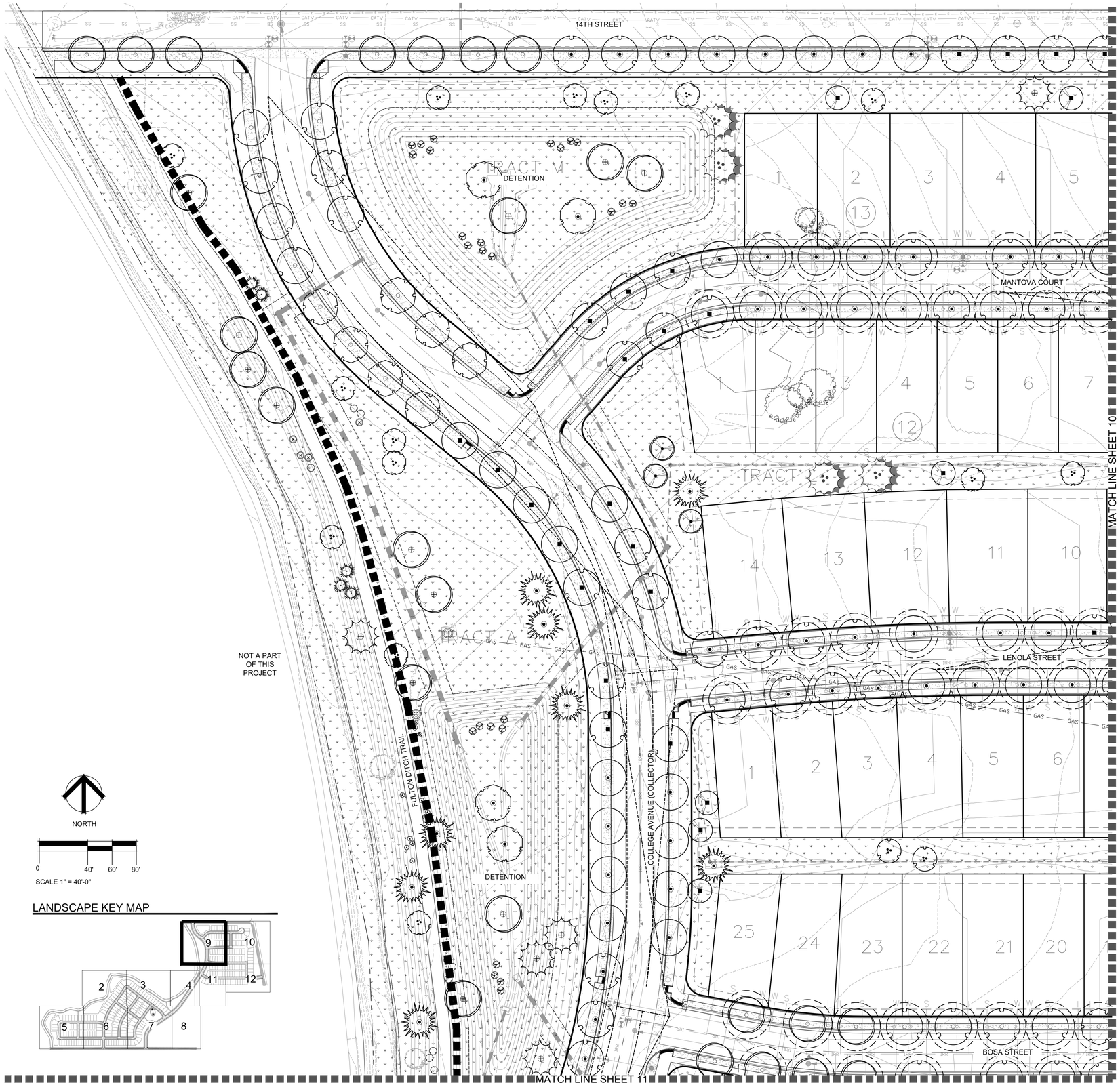
SHEET TITLE

LANDSCAPE PLAN

SHEET INFORMATION

Sheet Number: 8

Of: 16



NORTH

0 40' 60' 80'

SCALE 1" = 40'-0"

LANDSCAPE KEY MAP

PLANT LIST

EVERGREEN TREES	QTY	BOTANICAL / COMMON NAME
	25	Juniperus scopulorum Rocky Mountain Juniper
	34	Picea pungens Colorado Spruce
	32	Pinus ponderosa Ponderosa Pine
	47	Pinus strobiformis Southwestern White Pine

ORNAMENTAL TREES	QTY	BOTANICAL / COMMON NAME
	40	Acer glabrum Rocky Mountain Maple
	37	Amelanchier x grandiflora `Autumn Brilliance` `Autumn Brilliance` Serviceberry
	48	Malus x `Spring Snow` Spring Snow Crab Apple
	43	Pyrus calleryana `Chanticleer` Chanticleer Pear

SHADE TREES	QTY	BOTANICAL / COMMON NAME
	103	Celtis occidentalis Western Hackberry
	98	Gleditsia triacanthos `Skyline` Skyline Honey Locust
	96	Gymnocladus dioica `Espresso` Seedless Kentucky Coffeetree
	31	Populus deltoides monilifera Plains Cottonwood
	41	Populus x acuminata Lanceleaf Cottonwood
	121	Quercus buckleyi Texas Red Oak
	100	Quercus macrocarpa Burr Oak
	116	Tilia americana `Redmond` Redmond American Linden
	91	Ulmus x `Accolade` Accolade Elm

DECIDUOUS SHRUBS	QTY	BOTANICAL / COMMON NAME
	74	Amelanchier alnifolia `Regent` Regent Serviceberry
	78	Aronia arbutifolia `Brilliantissima` Brilliant Red Chokeberry/Red Chokeberry
	129	Caryopteris x clandonensis `Dark Knight` Blue Mist Spirea
	22	Cornus sericea `Arctic Fire` Arctic Fire Dogwood
	20	Philadelphus x `Snowbell` Snowbell Mock Orange
	37	Physocarpus monogynus Mountain Ninebark
	35	Rhus trilobata Three-Leaf Sumac
	56	Ribes aureum Golden Currant
	108	Salix purpurea `Nana` Dwarf Arctic Willow

GRASSES	QTY	BOTANICAL / COMMON NAME
	147	Bouteloua gracilis `Blonde Ambition` Blonde Ambition Grama Grass
	88	Calamagrostis x acutiflora `Karl Foerster` Feather Reed Grass
	303	Panicum virgatum `Heavy Metal` Heavy Metal Blue Switch Grass

TB GROUP
landscape architecture | planning | illustration
444 Mountain Ave.
Berthoud, CO 80513
TEL 970.532.5891
WEB TBGroup.us

SEAL

PROJECT TITLE

COTTONWOOD GREENS

FINAL PLAT

PROJECT NO: LUP2019-0033
PLAN NO: PPL2019-0002

FORT LUPTON, COLORADO

PREPARED FOR

ARBOR CAPITAL PARTNERS LLC
4040 MACARTHUR BLVD.,
STE. 250
NEWPORT BEACH, CA 92660

REVISIONS	DATE
Revisions	3.19.2020
Revisions	5.11.2020

DATE

February 6, 2020

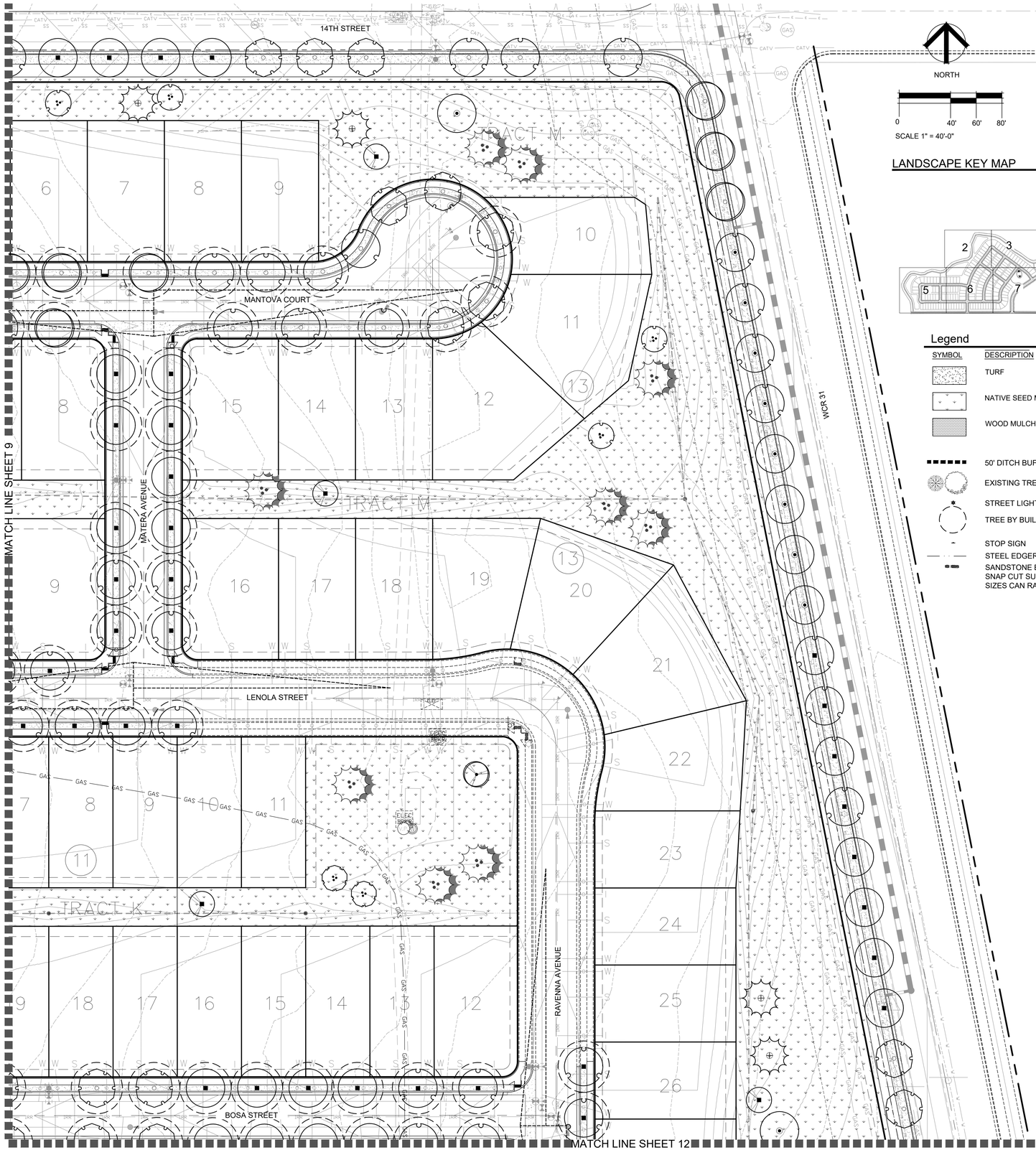
SHEET TITLE

LANDSCAPE PLAN

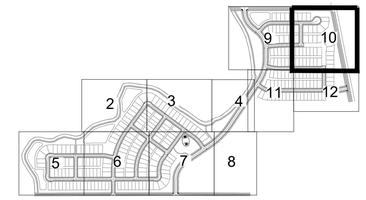
SHEET INFORMATION

Sheet Number: 9

Of: 16



LANDSCAPE KEY MAP



Legend

SYMBOL	DESCRIPTION	QTY	DETAIL
	TURF	473,583 sf	IRRIGATED TURF DURA TURF SOD
	NATIVE SEED MIX	1,262,164 sf	NON-IRRIGATED NATIVE FOOTHILLS GRASS MIX ARKANSAS SEED MIX OR APPROVED EQUAL
	WOOD MULCH	20,813 sf	SHREDDED CEDAR MULCH ALL SHRUB BEDS TO RECEIVE A MINIMUM 4"-6" DEPTH SHREDDED CEDAR WOOD MULCH
	50' DITCH BUFFER FROM TOP OF BANK		
	EXISTING TREES		
	STREET LIGHT		
	TREE BY BUILDER/OWNER		
	STOP SIGN		
	STEEL EDGER, ROUNDED TOP		
	SANDSTONE BOULDERS SNAP CUT SURFACE SIZES CAN RANGE BETWEEN 3' AND 6'		

PLANT LIST

EVERGREEN TREES	QTY	BOTANICAL / COMMON NAME
	25	Juniperus scopulorum Rocky Mountain Juniper
	34	Picea pungens Colorado Spruce
	32	Pinus ponderosa Ponderosa Pine
	47	Pinus strobiformis Southwestern White Pine

ORNAMENTAL TREES	QTY	BOTANICAL / COMMON NAME
	40	Acer glabrum Rocky Mountain Maple
	37	Amelanchier x grandiflora `Autumn Brilliance` `Autumn Brilliance` Serviceberry
	48	Malus x `Spring Snow` Spring Snow Crab Apple
	43	Pyrus calleryana `Chanticleer` Chanticleer Pear

SHADE TREES	QTY	BOTANICAL / COMMON NAME
	103	Celtis occidentalis Western Hackberry
	98	Gleditsia triacanthos `Skyline` Skyline Honey Locust
	96	Gymnocladus dioica `Espresso` Seedless Kentucky Coffeetree
	31	Populus deltoides monilifera Plains Cottonwood
	41	Populus x acuminata Lanceleaf Cottonwood
	121	Quercus buckleyi Texas Red Oak
	100	Quercus macrocarpa Burr Oak
	116	Tilia americana `Redmond` Redmond American Linden
	91	Ulmus x `Accolade` Accolade Elm

DECIDUOUS SHRUBS	QTY	BOTANICAL / COMMON NAME
	74	Amelanchier alnifolia `Regent` Regent Serviceberry
	78	Aronia arbutifolia `Brilliantissima` Brilliant Red Chokeberry/Red Chokeberry
	129	Caryopteris x clandonensis `Dark Knight` Blue Mist Spirea
	22	Cornus sericea `Arctic Fire` Arctic Fire Dogwood
	20	Philadelphus x `Snowbell` Snowbell Mock Orange
	37	Physocarpus monogynus Mountain Ninebark
	35	Rhus trilobata Three-Leaf Sumac
	56	Ribes aureum Golden Currant
	108	Salix purpurea `Nana` Dwarf Arctic Willow

GRASSES	QTY	BOTANICAL / COMMON NAME
	147	Bouteloua gracilis `Blonde Ambition` Blonde Ambition Grama Grass
	88	Calamagrostis x acutiflora `Karl Foerster` Feather Reed Grass
	303	Panicum virgatum `Heavy Metal` Heavy Metal Blue Switch Grass

PERENNIALS	QTY	BOTANICAL / COMMON NAME
	99	Agastache rupestris `Sunset` Sunset Hyssop
	100	Echinacea purpurea Purple Coneflower
	7	Hemerocallis x `Red` Red Daylily
	321	Rudbeckia fulgida sullivantii `Goldsturm` Black-eyed Susan

NOTE: IN ANY INSTANCE WHERE THE PLANT LIST OR LANDSCAPE QUANTITIES DO NOT MATCH THE PLAN, REQUIRED PLANTS/QUANTITIES SHALL BE PER THE PLAN. CONTRACTOR TO VERIFY QUANTITIES.

TB GROUP
landscape architecture | planning | illustration
444 Mountain Ave.
Berthoud, CO 80513
TEL 970.532.5891
WEB TBGroup.us

SEAL

PROJECT TITLE

COTTONWOOD GREENS

FINAL PLAT

PROJECT NO: LUP2019-0033
PLAN NO: PPL2019-0002

FORT LUPTON, COLORADO

PREPARED FOR

ARBOR CAPITAL PARTNERS LLC
4040 MACARTHUR BLVD.,
STE. 250
NEWPORT BEACH, CA 92660

REVISIONS	DATE
Revisions	3.19 2020
Revisions	5.11 2020

DATE

February 6, 2020

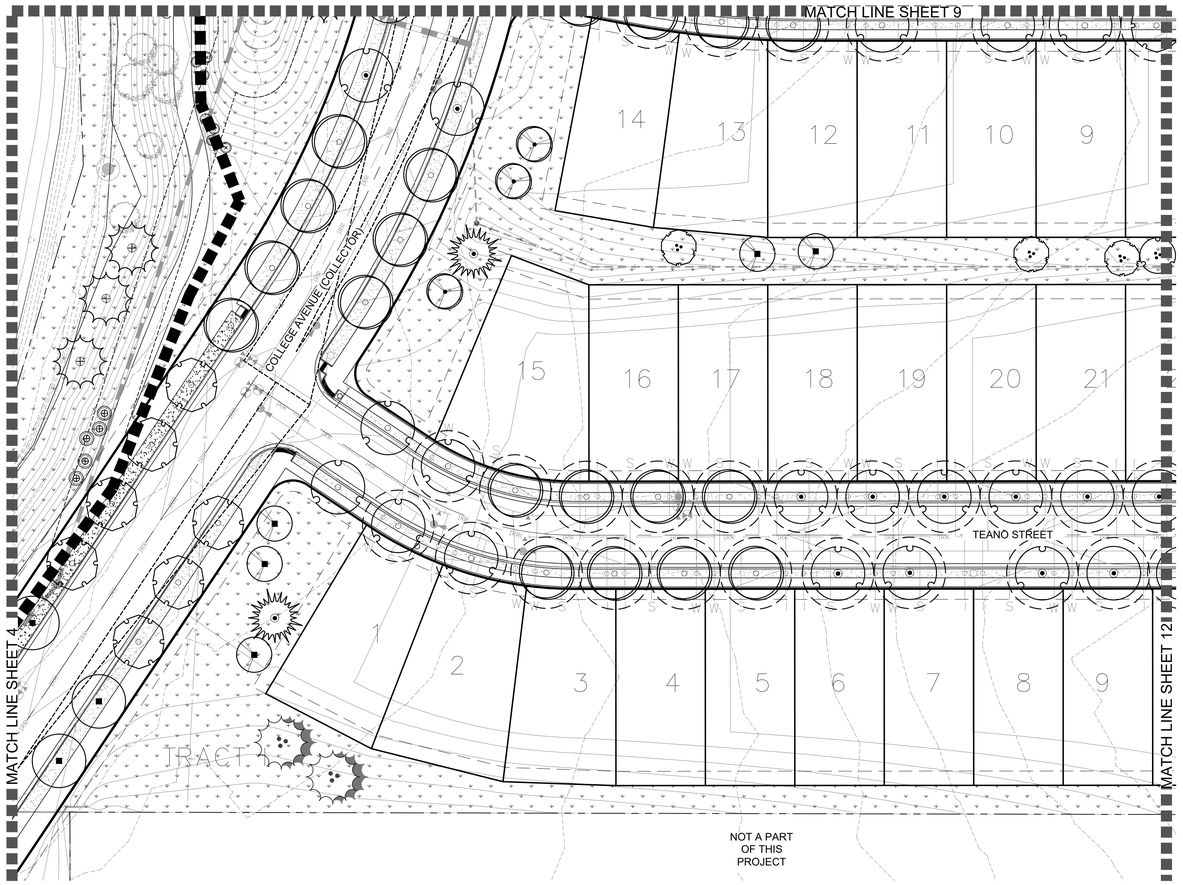
SHEET TITLE

LANDSCAPE PLAN

SHEET INFORMATION

Sheet Number: 10

Of: 16

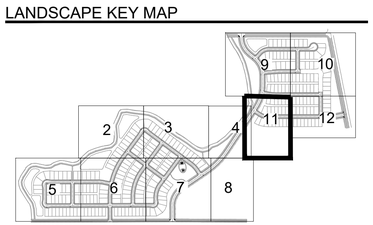


NORTH

0 40' 60' 80'

SCALE 1" = 40'-0"

LANDSCAPE KEY MAP



Legend

SYMBOL	DESCRIPTION	QTY	DETAIL
	TURF	473,583 sf	IRRIGATED TURF DURA TURF SOD
	NATIVE SEED MIX	1,262,164 sf	NON-IRRIGATED NATIVE FOOTHILLS GRASS MIX ARKANSAS SEED MIX OR APPROVED EQUAL
	WOOD MULCH	20,813 sf	SHREDDED CEDAR MULCH ALL SHRUB BEDS TO RECEIVE A MINIMUM 4"-6" DEPTH SHREDDED CEDAR WOOD MULCH

50' DITCH BUFFER FROM TOP OF BANK

EXISTING TREES

STREET LIGHT

TREE BY BUILDER/OWNER

STOP SIGN

STEEL EDGER, ROUNDED TOP

SANDSTONE BOULDERS
SNAP CUT SURFACE
SIZES CAN RANGE BETWEEN 3' AND 6'

PLANT LIST

EVERGREEN TREES	QTY	BOTANICAL / COMMON NAME
	25	Juniperus scopulorum Rocky Mountain Juniper
	34	Picea pungens Colorado Spruce
	32	Pinus ponderosa Ponderosa Pine
	47	Pinus strobiformis Southwestern White Pine

ORNAMENTAL TREES	QTY	BOTANICAL / COMMON NAME
	40	Acer glabrum Rocky Mountain Maple
	37	Amelanchier x grandiflora `Autumn Brilliance' `Autumn Brilliance' Serviceberry
	48	Malus x `Spring Snow' Spring Snow Crab Apple
	43	Pyrus calleryana `Chanticleer' Chanticleer Pear

SHADE TREES	QTY	BOTANICAL / COMMON NAME
	103	Celtis occidentalis Western Hackberry
	98	Gleditsia triacanthos `Skyline' Skyline Honey Locust
	96	Gymnocladus dioica `Espresso' Seedless Kentucky Coffeetree
	31	Populus deltoides monilifera Plains Cottonwood
	41	Populus x acuminata Lanceleaf Cottonwood
	121	Quercus buckleyi Texas Red Oak
	100	Quercus macrocarpa Burr Oak
	116	Tilia americana `Redmond' Redmond American Linden
	91	Ulmus x `Accolade' Accolade Elm

DECIDUOUS SHRUBS	QTY	BOTANICAL / COMMON NAME
	74	Amelanchier alnifolia `Regent' Regent Serviceberry
	78	Aronia arbutifolia `Brilliantissima' Brilliant Red Chokeberry/Red Chokeberry
	129	Caryopteris x clandonensis `Dark Knight' Blue Mist Spirea
	22	Cornus sericea `Arctic Fire' Arctic Fire Dogwood
	20	Philadelphus x `Snowbell' Snowbell Mock Orange
	37	Physocarpus monogynus Mountain Ninebark
	35	Rhus trilobata Three-Leaf Sumac
	56	Ribes aureum Golden Currant
	108	Salix purpurea `Nana' Dwarf Arctic Willow

GRASSES	QTY	BOTANICAL / COMMON NAME
	147	Bouteloua gracilis `Blonde Ambition' Blonde Ambition Grama Grass
	88	Calamagrostis x acutiflora `Karl Foerster' Feather Reed Grass
	303	Panicum virgatum `Heavy Metal' Heavy Metal Blue Switch Grass

PERENNIALS	QTY	BOTANICAL / COMMON NAME
	99	Agastache rupestris `Sunset' Sunset Hyssop
	100	Echinacea purpurea Purple Coneflower
	7	Hemerocallis x `Red' Red Daylily
	321	Rudbeckia fulgida sullivantii `Goldsturm' Black-eyed Susan

NOTE: IN ANY INSTANCE WHERE THE PLANT LIST OR LANDSCAPE QUANTITIES DO NOT MATCH THE PLAN, REQUIRED PLANTS/QUANTITIES SHALL BE PER THE PLAN. CONTRACTOR TO VERIFY QUANTITIES.

TB GROUP
landscape architecture | planning | illustration

444 Mountain Ave.
Berthoud,CO 80513

TEL 970.532.5891
WEB TBGroup.us

SEAL

PROJECT TITLE

COTTONWOOD GREENS

FINAL PLAT

PROJECT NO: LUP2019-0033
PLAN NO: PPL2019-0002

FORT LUPTON, COLORADO

PREPARED FOR

ARBOR CAPITAL PARTNERS LLC
4040 MACARTHUR BLVD.,
STE. 250
NEWPORT BEACH, CA 92660

REVISIONS	DATE
Revisions	3.19.2020
Revisions	5.11.2020

DATE

February 6, 2020

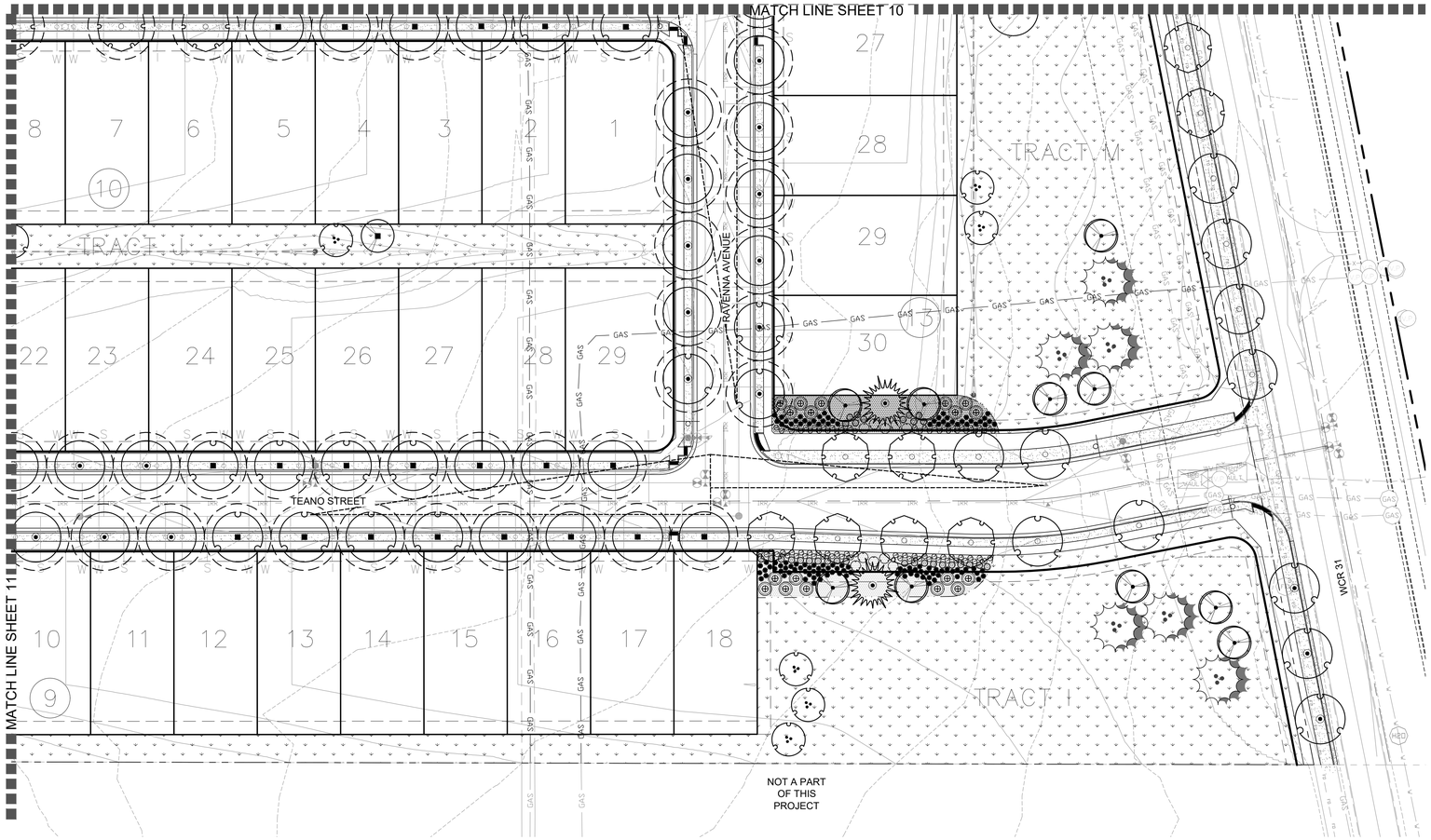
SHEET TITLE

LANDSCAPE PLAN

SHEET INFORMATION

Sheet Number: 11

Of: 16

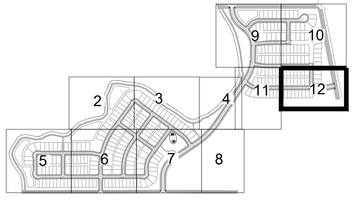


NORTH

0 40' 60' 80'

SCALE 1" = 40'-0"

LANDSCAPE KEY MAP



Legend

SYMBOL	DESCRIPTION	QTY	DETAIL
	TURF	473,583 sf	IRRIGATED TURF DURA TURF SOD
	NATIVE SEED MIX	1,262,164 sf	NON-IRRIGATED NATIVE FOOTHILLS GRASS MIX ARKANSAS SEED MIX OR APPROVED EQUAL
	WOOD MULCH	20,813 sf	SHREDDED CEDAR MULCH ALL SHRUB BEDS TO RECEIVE A MINIMUM 4"-6" DEPTH SHREDDED CEDAR WOOD MULCH

50' DITCH BUFFER FROM TOP OF BANK

EXISTING TREES

STREET LIGHT

TREE BY BUILDER/OWNER

STOP SIGN

STEEL EDGER, ROUNDED TOP

SANDSTONE BOULDERS
SNAP CUT SURFACE
SIZES CAN RANGE BETWEEN 3' AND 6'

PLANT LIST

EVERGREEN TREES	QTY	BOTANICAL / COMMON NAME
	25	Juniperus scopulorum Rocky Mountain Juniper
	34	Picea pungens Colorado Spruce
	32	Pinus ponderosa Ponderosa Pine
	47	Pinus strobiformis Southwestern White Pine

ORNAMENTAL TREES	QTY	BOTANICAL / COMMON NAME
	40	Acer glabrum Rocky Mountain Maple
	37	Amelanchier x grandiflora `Autumn Brilliance` `Autumn Brilliance` Serviceberry
	48	Malus x `Spring Snow` Spring Snow Crab Apple
	43	Pyrus calleryana `Chanticleer` Chanticleer Pear

SHADE TREES	QTY	BOTANICAL / COMMON NAME
	103	Celtis occidentalis Western Hackberry
	98	Gleditsia triacanthos `Skyline` Skyline Honey Locust
	96	Gymnocladus dioica `Espresso` Seedless Kentucky Coffeetree
	31	Populus deltoides monilifera Plains Cottonwood
	41	Populus x acuminata Lanceleaf Cottonwood
	121	Quercus buckleyi Texas Red Oak
	100	Quercus macrocarpa Burr Oak
	116	Tilia americana `Redmond` Redmond American Linden
	91	Ulmus x `Accolade` Accolade Elm

DECIDUOUS SHRUBS	QTY	BOTANICAL / COMMON NAME
	74	Amelanchier alnifolia `Regent` Regent Serviceberry
	78	Aronia arbutifolia `Brilliantissima` Brilliant Red Chokeberry/Red Chokeberry
	129	Caryopteris x clandonensis `Dark Knight` Blue Mist Spirea
	22	Cornus sericea `Arctic Fire` Arctic Fire Dogwood
	20	Philadelphus x `Snowbell` Snowbell Mock Orange
	37	Physocarpus monogynus Mountain Ninebark
	35	Rhus trilobata Three-Leaf Sumac
	56	Ribes aureum Golden Currant
	108	Salix purpurea `Nana` Dwarf Arctic Willow

GRASSES	QTY	BOTANICAL / COMMON NAME
	147	Bouteloua gracilis `Blonde Ambition` Blonde Ambition Grama Grass
	88	Calamagrostis x acutiflora `Karl Foerster` Feather Reed Grass
	303	Panicum virgatum `Heavy Metal` Heavy Metal Blue Switch Grass

PERENNIALS	QTY	BOTANICAL / COMMON NAME
	99	Agastache rupestris `Sunset` Sunset Hyssop
	100	Echinacea purpurea Purple Coneflower
	7	Hemerocallis x `Red` Red Daylily
	321	Rudbeckia fulgida sullivantii `Goldsturm` Black-eyed Susan

NOTE: IN ANY INSTANCE WHERE THE PLANT LIST OR LANDSCAPE QUANTITIES DO NOT MATCH THE PLAN, REQUIRED PLANTS/QUANTITIES SHALL BE PER THE PLAN. CONTRACTOR TO VERIFY QUANTITIES.

TB GROUP
landscape architecture | planning | illustration

444 Mountain Ave.
Berthoud,CO 80513

TEL 970.532.5891
WEB TBGroup.us

SEAL

PROJECT TITLE

COTTONWOOD GREENS

FINAL PLAT

PROJECT NO: LUP2019-0033
PLAN NO: PPL2019-0002

FORT LUPTON, COLORADO

PREPARED FOR

ARBOR CAPITAL PARTNERS LLC
4040 MACARTHUR BLVD.,
STE. 250
NEWPORT BEACH, CA 92660

REVISIONS	DATE
Revisions	3.19 2020
Revisions	5.11 2020

DATE

February 6, 2020

SHEET TITLE

LANDSCAPE PLAN

SHEET INFORMATION

Sheet Number: 12

Of: 16

Landscape Notes

1. LANDSCAPE AREAS SHALL BE MAINTAINED, INCLUDING MOWING, WATERING AND FERTILIZING BY CONTRACTOR, UP TO FINAL ACCEPTANCE. AT SUCH TIME OWNER WILL BE RESPONSIBLE FOR ALL MAINTENANCE. LANDSCAPE AND IRRIGATION WILL BE WARRANTED FOR ONE (1) FULL YEAR AFTER FINAL ACCEPTANCE.
2. ANY DISCREPANCIES WITH THE DRAWINGS AND SITE CONDITIONS SHALL BE BROUGHT TO THE ATTENTION OF THE OWNER'S REPRESENTATIVE PRIOR TO PROCEEDING WITH CONSTRUCTION.
3. CONTRACTOR TO VERIFY ALL FIELD CONDITIONS, EASEMENTS, PROPERTY LINES, ETC. PRIOR TO STARTING WORK. SHOULD ANY DISCREPANCIES, OMISSIONS, OR ERRORS OCCUR, NOTIFY THE OWNER'S REPRESENTATIVE IMMEDIATELY.
4. CONTRACTOR IS RESPONSIBLE FOR LOCATING ALL UTILITIES 48 HRS. PRIOR TO ANY EXCAVATION OR PLANTING.
5. LANDSCAPE CONTRACTOR SHALL BE RESPONSIBLE FOR ANY COORDINATION WITH SUBCONTRACTORS AS REQUIRED TO ACCOMPLISH PLANTING OPERATIONS.1 - NO TREES OR SHRUBS SHALL BE PLANTED WITHIN 10' FROM WATER AND SEWER LINES, 4' FROM GAS, TELEPHONE AND ELECTRIC UTILITY LINES.
6. NO SHRUBS SHALL BE PLANTED WITHIN FIVE (5) FEET OR TREES WITHIN TEN (10) FEET OF POTABLE AND NON-POTABLE WATER METERS, FIRE HYDRANTS, SANITARY SEWER MANHOLES, POTABLE WATER, SANITARY SEWER, STORM SEWER, OR NON-POTABLE IRRIGATION MAINS.
7. MINIMUM CLEARANCE OF THREE (3) FEET ON EACH SIDE OF FIRE DEPARTMENT CONNECTION (FDC). NO VEGETATION OTHER THAN TURF OR GROUND COVERS PLANTED IN FRONT OF FDC.
8. TREES SHALL BE LIMBED TO A HEIGHT OF NOT LESS THAN EIGHT (8) FEET ABOVE ANY PUBLIC STREET OR SIDEWALK. SHRUBS AND OTHER PLANT MATERIALS SHALL BE MAINTAINED AT A HEIGHT OF NOT MORE THAN THIRTY (30) INCHES, AND SAID MAINTENANCE SHALL BE CONDUCTED IN PERPETUITY.
9. IF TREES OR SHRUBS ARE LOCATED ON TOP OF FIELD VERIFIED UTILITIES, CONTRACTOR SHALL NOTIFY OWNER BEFORE ANY DIGGING HAS COMMENCED. VERIFY WITH OWNER IF AND WHICH SHRUBS/TREES SHALL BE TAKEN OUT OF PROJECT/CONTRACT.
10. TO THE MAXIMUM EXTENT FEASIBLE, TOPSOIL THAT IS REMOVED DURING CONSTRUCTION ACTIVITY SHALL BE CONSERVED FOR LATER USE ON AREAS REQUIRING REVEGETATION AND LANDSCAPING.
11. EXCAVATED MATERIAL TO BE USED AS FILL WILL HAVE ALL ROCKS, DEBRIS, WASTE MATERIAL, FROZEN MATERIAL, AND VEGETATION LARGER THAN 3" IN ANY DIMENSION REMOVED BEFORE PLACEMENT AND COMPACTION OF SOIL.
12. PROVIDE POSITIVE DRAINAGE AWAY FROM BUILDING FOUNDATIONS AND A SMOOTH TRANSITION BETWEEN ALL ADJACENT EXISTING GRADES AND PROPOSED GRADES.
13. PRIOR TO FINE GRADING, SOD AREAS AND PLANTING BEDS SHALL BE THOROUGHLY LOOSENED AND TILLED TO A 6" DEPTH. REMOVE ALL UNSUITABLE TOPSOIL, INCLUDING ALL ROCKS OR OTHER MATERIAL LARGER THAN 1 INCHES IN ANY DIRECTION, ALL CONCRETE, TRASH, DEBRIS, WEEDS, ROOTS AND OTHER WASTE MATERIALS. AFTER THAT TIME ORGANIC AMENDMENTS SHALL THEN BE THOROUGHLY TILLED AND INCORPORATED TO A MINIMUM 6" DEPTH IN THESE AREAS AT THE MINIMUM OF RATE OF 3 CU. YDS. / 1,000 SQ.FT.
14. UNIFORMLY COMPACT AND FINE GRADE THESE SOD AREAS AND PLANTING BEDS TO A SMOOTH SURFACE, FREE FROM IRREGULAR SURFACE CHANGES. CUT OUT SOFT SPOTS, FILL IN LOW SPOTS AND TRIM HIGH SPOTS TO COMPLY WITH REQUIRED GRADE TOLERANCES.
15. ONCE COMPACTED AND FINE GRADED, ALL ROCKS, DEBRIS, WASTE MATERIAL AND VEGETATION MATERIAL LARGER THAN 1/2" WILL BE RAKED FROM THE SURFACE AND REMOVED FROM SITE.
16. SOD TO BE 100% COLORADO GROWN DURA-TURF TALL FESCUE BLEND SPECIFICALLY GROWN FOR LOW WATER LAWN APPLICATIONS WITH MINIMUM THREE (3) IMPROVED VARIETIES, HAVING A HEALTHY VIGOROUS ROOT SYSTEM. ONCE TURF IS LAID IT SHALL BE PROPERLY ROLLED, COMPACTED AND PUSHED TOGETHER TO ELIMINATE ANY GAPS BETWEEN ROLL EDGES. APPLY FERTILIZER IN THESE AREAS PER SOD FARM'S RECOMMENDATIONS.
17. ALL PLANT MATERIALS ARE SIZED AND OUTLINED IN PLANT LIST. ALL PLANTS TO BE PLANTED IN AMENDED SOIL AND STAKED AS SHOWN IN DETAILS. ALL PLANT MATERIAL SHALL MEET OR EXCEED THE CODE OF STANDARDS CURRENTLY RECOMMENDED BY THE COLORADO NURSERY ACT FOR NUMBER ONE GRADE.
18. IF PLANTS ARE IN NEED OF REPLACEMENT DUE TO DECLINING HEALTH, DISEASE, OR DEATH, THE PLANTS MUST BE REPLACED WITH THE ORIGINAL SPECIES UNLESS APPROVED BY THE CITY.
19. CHANGES IN PLANT SPECIES OF PLANT LOCATIONS FROM WHAT IS LISTED ON THE LANDSCAPE PLAN WILL REQUIRE THE APPROVAL OF THE CITY PRIOR TO INSTALLATION OF REPLACEMENT. OVERALL QUANTITY AND QUALITY TO BE CONSISTENT WITH THE APPROVED PLANS. IN THE EVENT OF CONFLICT WITH THE QUANTITIES INCLUDED IN THE PLANT LIST, SPECIES AND QUANTITIES SHALL BE PROVIDED.
20. ALL TREES AND SHRUBS TO BE BALLED AND BURLAPPED, OR CONTAINERIZED.
21. ALL PLANT MATERIAL SHALL HAVE ALL WIRE, TWINE, BASKETS, BURLAP, AND ALL OTHER NON-BIODEGRADABLE CONTAINMENT MATERIAL REMOVED FROM THE TRUNK AND/OR ROOT BALL OF THE PLANT, PRIOR TO PLANTING.
22. ALL SHRUB BEDS SHALL HAVE MINIMUM 4" DEPTH SHREDDED CEDAR MULCH OR NATURAL COLOR AND/OR WASHED SMOOTH RIVER ROCK. A CONTINUOUS LAYER OF TYPAR LANDSCAPE FABRIC OR APPROVED EQUAL SHALL BE INSTALLED IN ALL SHRUB BEDS WITH 6" OVERLAP AT SEAMS WITH 4" STAPLES 4' O.C. IN ALL DIRECTIONS.
23. EDGING BETWEEN GRASS TYPES AND SHRUB BEDS / ROCK COBBLE AND CRUSHER FINES SHALL BE 14 GA HEAVY DUTY STEEL EDGER MIN. $\frac{1}{4}$" x 4" WITH ROLLED TOP AND SHALL BE SET LEVEL WITH THE TOP OF THE ADJACENT SOD.

General Notes:

1. ALL SIGNS SHALL BE REQUIRED TO APPLY FOR A SIGN PERMIT.
2. PROPOSED GRADES SHALL MATCH OR IMPROVE EXISTING GRADES TO PROVIDE POSITIVE DRAINAGE AWAY FROM BUILDING WHILE PROVIDING A SMOOTH TRANSITION BETWEEN ALL ADJACENT UNDISTURBED GRADES AND PROPOSED GRADES.
3. JOB SITE TO BE KEPT CLEAN AT ALL TIMES AND CONSTRUCTION AREAS ARE TO BE MAINTAINED FOR SAFETY.
4. SOILS DISTURBED ADJACENT TO WORK AREA, INCLUDING AREAS OUTSIDE OF CONSTRUCTION LIMITS, DUE TO NEW CONSTRUCTION ARE TO BE REGRADED AND SURFACE CONDITIONS REPAIRED EQUIVALENT TO THAT CONDITION PRIOR TO START OF WORK.
5. PROTECT EXISTING SURFACES AND SOILS, BOTH INSIDE AND OUTSIDE OF CONSTRUCTION LIMITS, DURING CONSTRUCTION. IF GRADES, CONCRETE OR ASPHALT ARE DAMAGED DUE TO CONSTRUCTION OPERATIONS OR WEATHER THE CONTRACTOR IS RESPONSIBLE FOR REPAIR TO THAT EQUIVALENT TO EXISTING CONDITIONS AT NO EXPENSE TO THE OWNER / CITY.
6. CONTRACTOR IS RESPONSIBLE FOR SETUP OF BARRICADES, WARNING SIGNAGE, OR OTHER PROTECTIVE DEVICES IF ANY EXCAVATIONS ARE LEFT EXPOSED AFTER ON-SITE WORK HOURS.
7. THE CONTRACTOR SHALL NOT PURPOSEFULLY PROCEED WITH ANY CONSTRUCTION PER PLANS PROVIDED WHEN OBSTRUCTIONS AND/OR GRADE DIFFERENCES EXIST THAT WERE NOT CONSIDERED OR CHANGED AFTER PLANS WERE SUBMITTED. CONTRACTOR SHALL NOTIFY OWNER OR OWNER'S REPRESENTATIVE AND THE CITY OF LOVELAND IF SITUATION ARISES AND REVISIONS ARE NECESSARY.
8. THE CONTRACTOR SHALL PREVENT SEDIMENT, DEBRIS AND OTHER POLLUTANTS FROM ENTERING ANY STORM WATER SEWER SYSTEM OR, ADJACENT WATER WAYS, ETC., DURING THE DEMOLITION OR CONSTRUCTION OPERATIONS THAT ARE PART OF THIS PROJECT. THE CONTRACTOR SHALL BE HELD RESPONSIBLE AND EXPENSE FOR THE CORRECTION OF ANY ADVERSE IMPACTS TO THE STORM WATER SEWER SYSTEM OR, ADJACENT WATER WAYS, WETLANDS ETC., RESULTING FROM THE WORK DONE AS PART OF THIS PROJECT/CONTRACT.
9. THE CONTRACTOR SHALL BE RESPONSIBLE PRIOR TO BIDDING AND CONSTRUCTION, OF BECOMING AWARE OF ALL EXISTING AND PROPOSED UTILITIES, PIPES, STRUCTURES, ETC. CALL UNCC THREE DAYS BEFORE SCHEDULED WORK AT 811 OR 1-800-922-1987.

Irrigation Notes

1. IRRIGATION CONTRACTOR SHALL VERIFY AVAILABLE P.S.I. AND GPM. THIS SYSTEM SHALL THEN BE VERIFIED TO MEET THE AVAILABLE P.S.I. AND GPM AND THE PROPOSED IRRIGATION SYSTEM. IF NECESSARY CONTACT THE WATER DEPARTMENT PRIOR TO BEGINNING DESIGN TO OBTAIN AVAILABLE PRESSURES.
2. ALL INDICATED SOD GRASS AREAS ARE TO BE IRRIGATED BY A PERMANENT UNDERGROUND AUTOMATIC IRRIGATION SYSTEM. TURF AREAS LESS THAN 25 FEET IN WIDTH ARE TO BE IRRIGATED WITH POP-UP SPRAY HEADS, AND AREAS GREATER THAN 25 FEET SHALL USE A ROTOR POP-UP SPRAY SYSTEM. ALL IRRIGATION SYSTEMS SHALL BE DESIGNED TO MINIMIZE OVERSPRAY.
3. ALL TREES, SHRUBS AND PERENNIALS OUTSIDE OF IRRIGATED SOD AREAS ARE TO BE IRRIGATED WITH A PERMANENT DRIP IRRIGATION SYSTEM. IRRIGATION SYSTEMS SHALL BE DESIGNED TO AVOID OVERSPRAY ONTO NON-PLANTED AND IMPERVIOUS SURFACES. IRRIGATION SYSTEMS SHALL BE MAINTAINED IN GOOD WORKING ORDER AND CHECKED TO ENSURE THAT OVERSPRAY DOES NOT OCCUR.
4. FINAL LOCATION OF IRRIGATION HEADS MUST BE APPROVED BY OWNER'S REPRESENTATIVE PRIOR TO PLANTING. HEAD LOCATION SHALL BE COORDINATED IN THE FIELD WITH EXISTING SITE CONDITIONS AND PLANT MATERIAL.
5. ALL IRRIGATION TRENCHES SHALL BE PROPERLY WATERED AND COMPACTED TO AVOID FUTURE SETTLING. ANY SETTLING DURING WARRANTY PERIOD WILL BE REPAIRED BY THE CONTRACTOR AT NO COST TO THE OWNER.
6. COORDINATE ALL IRRIGATION WORK WITH EXISTING UTILITIES AND RESPECTIVE TRADES.
7. ALL IRRIGATION SLEEVING SHALL BE PROVIDED AND INSTALLED BY GENERAL CONTRACTOR. IRRIGATION CONTRACTOR SHALL COORDINATE SLEEVING LOCATIONS WITH GENERAL CONTRACTOR. ALL IRRIGATION SLEEVING TO BE STAKED IN THE FIELD OR LOCATED ON DIMENSIONED "AS-BUILT" DRAWING BY THE GENERAL CONTRACTOR TO ALLOW FUTURE USE AND LOCATION.

Tree Protection Notes

1. HEAVY EQUIPMENT SHOULD NOT BE ALLOWED TO COMPACT OVER THE SOIL OVER THE ROOT ZONE OF PROTECTED EXISTING TREES.
2. AVOID CUTTING SURFACE ROOTS WHEREVER POSSIBLE. SIDEWALKS AND PAVING LEVELS SHOULD BE CONTOURED SUFFICIENTLY TO AVOID DAMAGE.
3. ROOT CUTS FROM EXCAVATION SHOULD BE DONE RAPIDLY. SMOOTH FLUSH CUTS SHOULD BE MADE. BACKFILL BEFORE THE ROOTS HAVE A CHANCE TO DRY OUT AND WATER THE TREE IMMEDIATELY.
4. PRIOR TO CONSTRUCTION, ALL PROTECTED TREES SHALL HAVE ORANGE PROTECTION BARRIER FENCING ERECTED, WHICH AS A MINIMUM ARE SUPPORTED BY I" X I" OR SIMILAR STURDY STOCK, FOR SHIELDING OF PROTECTED TREES, NO CLOSER THAN SIX (6) FEET FROM THE TRUNK OR ONE HALF (I /2) OF THE DRIP LINE, WHICH EVER IS GREATER. WITHIN THIS PROTECTION ZONE THERE SHALL BE NO MOVEMENT OF EQUIPMENT OR STORAGE OF EQUIPMENT, MATERIALS, DEBRIS, FILL OR CUT UNLESS APPROVED BY THE CITY FORESTER.
5. WITHIN THE DRIP LINE OF ANY PROTECTED EXISTING TREE, THERE SHALL BE NO CUT OR FILL OVER A FOUR INCH DEPTH UNLESS A QUALIFIED ARBORIST OR FORESTER HAS EVALUATED AND APPROVED THE DISTURBANCE.
6. DURING THE CONSTRUCTION STAGE OF DEVELOPMENT, THE APPLICANT SHALL PREVENT THE CLEANING OF EQUIPMENT OR MATERIAL OR THE STORAGE OR DISPOSAL OF WASTE MATERIAL SUCH AS PAINTS, OILS, SOLVENTS, ASPHALT, CONCRETE, MOTOR OIL OR ANY OTHER MATERIAL HARMFUL TO THE LIFE OF A TREE, WITHIN THE DRIP LINE OF ANY PROTECTED TREE OR GROUP OF TREES.
7. NO DAMAGING ATTACHMENT, WIRES, SIGNS OR PERMITS MAY BE FASTENED TO ANY PROTECTED TREE.

Native Grass Seed Mix

NATIVE GRASS - NATIVE PRAIRIE MEADOW GRASS MIX:

1. SEED SHALL BE AS MANUFACTURED BY ARKANSAS VALLEY SEED SOLUTIONS, 4625 COLORADO BOULEVARD, DENVER, CO 80216, (877) 957-3337.
2. SEED SHALL BE A MIXTURE THAT MATCHES THE FOLLOWING:

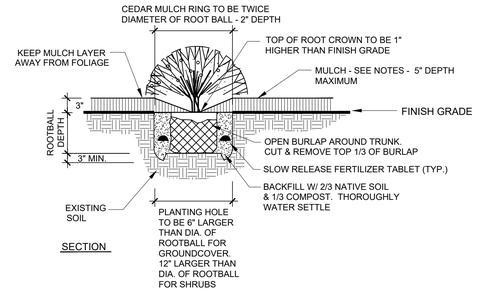
NON-IRRIGATED FOOTHILLS MIX

COMMON NAME	%
ANNUAL RYEGRASS	20%
SLENDER WHEATGRASS	15%
CRESTED WHEATGRASS	12%
MOUNTAIN BROME	10%
HARD FESCUE	10%
CANADA BLUEGRASS	10%
SIDEOATS GRAMA	6%
BIG BLUESTEM	5%
BLUE GRAMA (COATED)	5%
SAND DROPSEED	1%

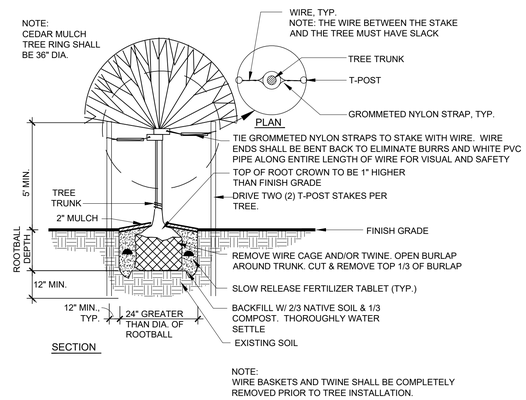
3. DRILLED APPLICATION RATE: 25.0 LBS (PLS) PER ACRE (0.57 LBS / 1000 SF
4. NATIVE SEED AREAS: ADEQUATE TEMPORARY IRRIGATION OR BY WATER TRUCK WILL BE PROVIDED FOR THE ESTABLISHMENT AND MAINTENANCE FOR THESE SEEDED AREAS, AND THAT NATIVE GRASSES SHALL BE MAINTAINED IN A CONDITION OF ACCEPTABLE HEIGHT, FREE OF WEEDS, TRASH AND DEBRIS, AND SHALL NOT REPRESENT A FIRE HAZARD NOR BECOME A NUISANCE SITE FOR WATER OR WIND EROSION.

MULCH IN ALL NATIVE SEED AREAS:

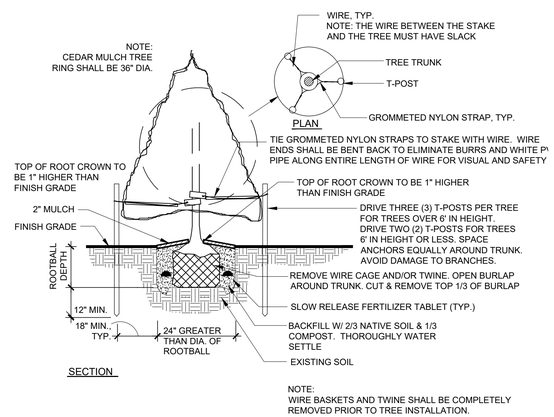
1. IMMEDIATELY FOLLOWING THE RAKING OPERATION, ADD STRAW MULCH TO THE SEEDED AREAS.
2. APPLY STRAW MULCH AT A MINIMUM OF 1.5 TONS PER ACRE OF AIR DRY MATERIAL. SPREAD STRAW MULCH UNIFORMLY OVER THE AREA WITH MECHANICAL MULCH SPREADER / CRIMPER. DO NOT MULCH WHEN WIND VELOCITY EXCEEDS 10 MPH.
3. WHEREVER THE USE OF CRIMPING EQUIPMENT IS PRACTICAL, PLACE MULCH IN THE MANNER NOTED ABOVE AND ANCHOR IT INTO THE SOIL. USE A DISC SUCH AS A MULCH TILLER, WITH A FLAT SERRATED DISC AT LEAS ½ INCH IN THICKNESS, HAVING DULL EDGES, AND SPACE NO MORE THAN 9 INCHES APART, WITH DISCS OF SUFFICIENT DIAMETER TO PREVENT THE FRAME OF THE EQUIPMENT FROM DRAGGING THE MULCH. ANCHOR MULCH A MINIMUM DEPTH OF 2 INCHES AND ACROSS THE SLOPE WHERE PRACTICAL WITH NO MORE THAN TWO PASSES OF THE ANCHORING EQUIPMENT.
4. IMMEDIATELY UPON COMPLETION OF THE MULCHING AND BINDING OPERATION, THE SEEDED AREAS SHALL BE IRRIGATED, KEEPING THE TOP 2 INCHES OF SOIL EVENLY MOIST UNTIL SEED HAS UNIFORMLY GERMINATED AND GROWN TO A HEIGHT OF 2-INCHES.
5. WATERING APPLICATION SHALL BE DONE IN A MANNER WHICH WILL PROVIDE UNIFORM COVERAGE BUT WHICH WILL NOT CAUSE EROSION, MOVEMENT, OR DAMAGE TO THE FINISHED SURFACE.



GROUND COVER & SHRUB PLANTING DETAIL



DECIDUOUS TREE PLANTING DETAIL



CONIFER TREE PLANTING DETAIL

Plant List

EVERGREEN TREES	QTY	BOTANICAL / COMMON NAME	SIZE	HEIGHT	WIDTH	REMARKS
	25	Juniperus scopulorum Rocky Mountain Juniper	6`, BB	30`	12`	FULL SPECIMEN, EVENLY AND WELL BRANCHED
	34	Picea pungens Colorado Spruce	6`, BB	50`	30`	FULL SPECIMEN, EVENLY AND WELL BRANCHED
	32	Pinus ponderosa Ponderosa Pine	6`, BB	80`	40`	FULL SPECIMEN, EVENLY AND WELL BRANCHED
	47	Pinus strobiformis Southwestern White Pine	6`, BB	50`	30`	FULL SPECIMEN, EVENLY AND WELL BRANCHED

ORNAMENTAL TREES	QTY	BOTANICAL / COMMON NAME	SIZE	HEIGHT	WIDTH	REMARKS
	40	Acer glabrum Rocky Mountain Maple	1.5" cal. BB	20`	15`	WELL BRANCHED W/ STRAIGHT TRUNK AND CENTRAL LEADER
	37	Amelanchier x grandiflora `Autumn Brilliance` `Autumn Brilliance` Serviceberry	1.5" cal. BB	25`	20`	WELL BRANCHED W/ STRAIGHT TRUNK & CENTRAL LEADER
	48	Malus x `Spring Snow` Spring Snow Crab Apple	1.5" cal. BB	25`	20`	WELL BRANCHED W/ STRAIGHT TRUNK & CENTRAL LEADER
	43	Pyrus calleryana `Chanticleer` Chanticleer Pear	1.5" cal. BB	35`	25`	WELL BRANCHED W/ STRAIGHT TRUNK & CENTRAL LEADER

SHADE TREES	QTY	BOTANICAL / COMMON NAME	SIZE	HEIGHT	WIDTH	REMARKS
	103	Celtis occidentalis Western Hackberry	2.0" cal. BB	60`	40`	WELL BRANCHED W/ STRAIGHT TRUNK AND CENTRAL LEADER
	98	Gleditsia triacanthos `Skyline` Skyline Honey Locust	2.0" cal. BB	50`	30`	WELL BRANCHED W/ STRAIGHT TRUNK AND CENTRAL LEADER
	96	Gymnocladus dioica `Espresso` Seedless Kentucky Coffeetree	2.0" cal. BB	60`	40`	WELL BRANCHED W/ STRAIGHT TRUNK AND CENTRAL LEADER
	31	Populus deltoides monilifera Plains Cottonwood	2.0" cal. BB	80`	50`	WELL BRANCHED W/ STRAIGHT TRUNK AND CENTRAL LEADER
	41	Populus x acuminata Lanceleaf Cottonwood	2.0" cal. BB	60`	40`	WELL BRANCHED W/ STRAIGHT TRUNK AND CENTRAL LEADER
	121	Quercus buckleyi Texas Red Oak	2.0" cal. BB	40`	30`	WELL BRANCHED W/ STRAIGHT TRUNK AND CENTRAL LEADER
	100	Quercus macrocarpa Burr Oak	2.0" cal. BB	80`	70`	WELL BRANCHED W/ STRAIGHT TRUNK AND CENTRAL LEADER
	116	Tilia americana `Redmond` Redmond American Linden	2.0" cal. BB	50`	40`	WELL BRANCHED W/ STRAIGHT TRUNK AND CENTRAL LEADER
	91	Ulmus x `Accolade` Accolade Elm	2.0" cal. BB	60`	40`	WELL BRANCHED W/ STRAIGHT TRUNK AND CENTRAL LEADER

DECIDUOUS SHRUBS	QTY	BOTANICAL / COMMON NAME	SIZE	HEIGHT	WIDTH	REMARKS
	74	Amelanchier alnifolia `Regent` Regent Serviceberry	5 gal.	6`	6`	24" (h) FULL SPECIMEN, EVENLY AND WELL BRANCHED
	78	Aronia arbutifolia `Brilliantissima` Brilliant Red Chokeberry/Red Chokeberry	5 gal.	8`	6`	24" (h) FULL SPECIMEN, EVENLY AND WELL BRANCHED
	129	Caryopteris x clandonensis `Dark Knight` Blue Mist Spirea	5 gal.	4`	4`	24" (h) FULL SPECIMEN, EVENLY AND WELL BRANCHED
	22	Cornus sericea `Arctic Fire` Arctic Fire Dogwood	5 gal.	4`	4`	24" (h) FULL SPECIMEN, EVENLY AND WELL BRANCHED
	20	Philadelphus x `Snowbell` Snowbell Mock Orange	5 gal.	3`	3`	24" (h) FULL SPECIMEN, EVENLY AND WELL BRANCHED
	37	Physocarpus monogynus Mountain Ninebark	5 gal.	4`	4`	24" (h) FULL SPECIMEN, EVENLY AND WELL BRANCHED
	35	Rhus trilobata Three-Leaf Sumac	5 gal.	6`	6`	24" (h) FULL SPECIMEN, EVENLY AND WELL BRANCHED
	56	Ribes aureum Golden Currant	5 gal.	4`	4`	24" (h) FULL SPECIMEN, EVENLY AND WELL BRANCHED
	108	Salix purpurea `Nana` Dwarf Arctic Willow	5 gal.	6`	6`	24" (h) FULL SPECIMEN, EVENLY AND WELL BRANCHED

GRASSES	QTY	BOTANICAL / COMMON NAME	SIZE	HEIGHT	WIDTH	REMARKS
	147	Bouteloua gracilis `Blonde Ambition` Blonde Ambition Grama Grass	1 gal.	3`	2`	WELL ROOTED AND ESTABLISHED
	88	Calamagrostis x acutiflora `Karl Foerster` Feather Reed Grass	1 gal.	5`	2.5`	WELL ROOTED AND ESTABLISHED
	303	Panicum virgatum `Heavy Metal` Heavy Metal Blue Switch Grass	1 gal.	4`	2`	WELL ROOTED AND ESTABLISHED

PERENNIALS	QTY	BOTANICAL / COMMON NAME	SIZE	HEIGHT	WIDTH	REMARKS
	99	Agastache rupestris `Sunset` Sunset Hyssop	1 gal.	3`	3`	WELL ROOTED AND ESTABLISHED
	100	Echinacea purpurea Purple Coneflower	1 gal.	3`	2`	WELL ROOTED AND ESTABLISHED
	7	Hemerocallis x `Red` Red Daylily	1 gal.	2`	2`	WELL ROOTED AND ESTABLISHED
	321	Rudbeckia fulgida sullivantii `Goldsturm` Black-eyed Susan	1 gal.	2`	2`	WELL ROOTED AND ESTABLISHED

NOTE: IN ANY INSTANCE WHERE THE PLANT LIST OR LANDSCAPE QUANTITIES DO NOT MATCH THE PLAN, REQUIRED PLANTS/QUANTITIES SHALL BE PER THE PLAN. CONTRACTOR TO VERIFY QUANTITIES.

TB GROUP
landscape architecture | planning | illustration
444 Mountain Ave.
Berthoud,CO 80513
TEL 970.532.5891
WEB TBGroup.us

SEAL

PROJECT TITLE:

COTTONWOOD GREENS

FINAL PLAT

PROJECT NO: LUP2019-0033
PLAN NO: PPL2019-0002

FORT LUPTON, COLORADO

PREPARED FOR:

ARBOR CAPITAL PARTNERS LLC
4040 MACARTHUR BLVD.,
STE. 250
NEWPORT BEACH, CA 92660

REVISIONS	DATE
Revisions	3.19.2020
Revisions	5.11.2020

DATE:

February 6, 2020

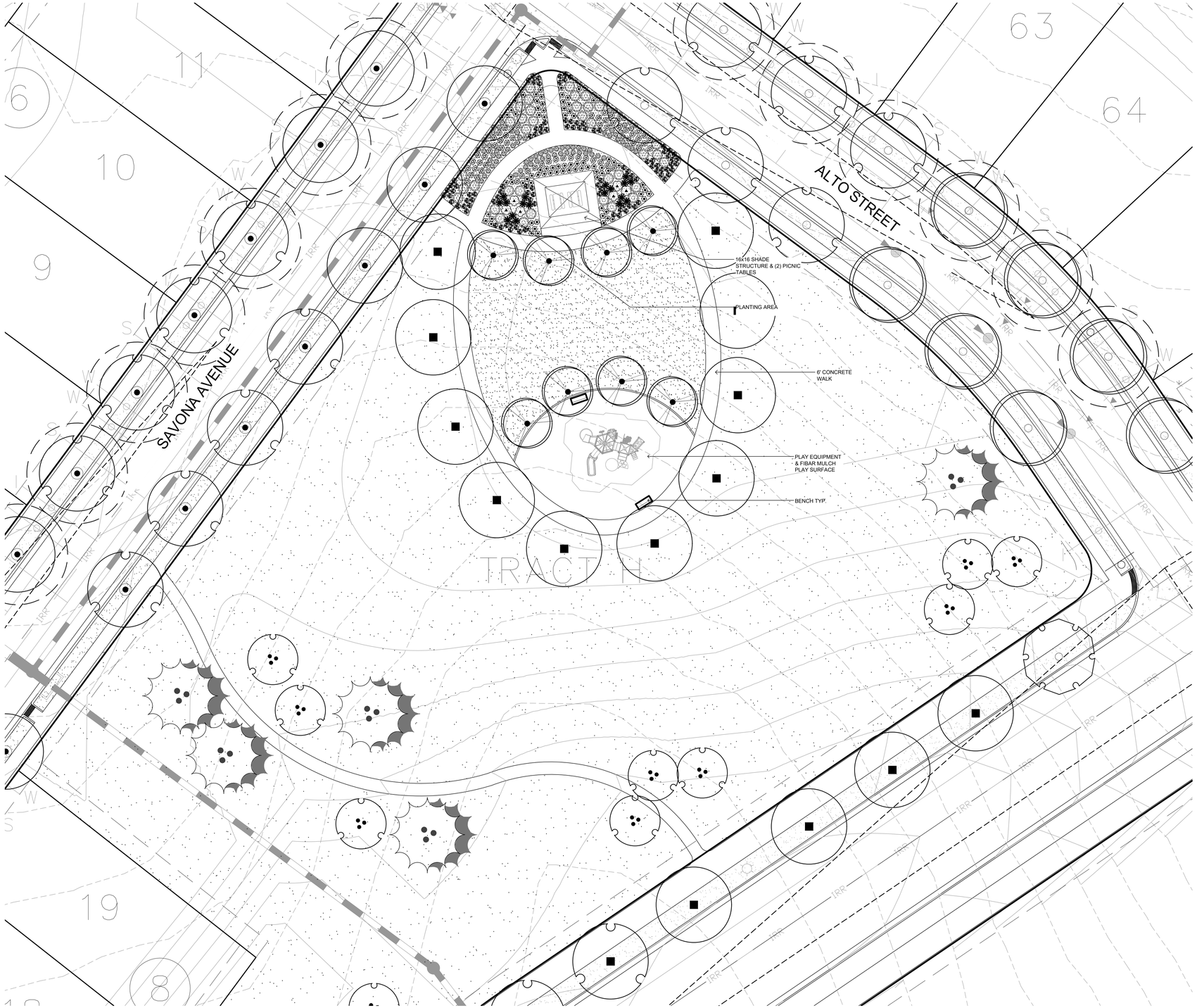
SHEET TITLE:

Landscape Notes, Details & Schedules

SHEET INFORMATION

Sheet Number: 13

Of: 16



Neighborhood Park Enlargement

0 20' 30' 40'
SCALE 1" = 20'-0"

NORTH

TB GROUP
landscape architecture | planning | illustration

444 Mountain Ave.
Berthoud, CO 80513

TEL 970.532.5891
WEB TBGroup.us

SEAL

PROJECT TITLE

COTTONWOOD GREENS

FINAL PLAT

PROJECT NO: LUP2019-0033
PLAN NO: PPL2019-0002

FORT LUPTON, COLORADO

PREPARED FOR

ARBOR CAPITAL PARTNERS LLC
4040 MACARTHUR BLVD.,
STE. 250
NEWPORT BEACH, CA 92660

REVISIONS	DATE
Revisions	3.19.2020
Revisions	5.11.2020

DATE

February 6, 2020

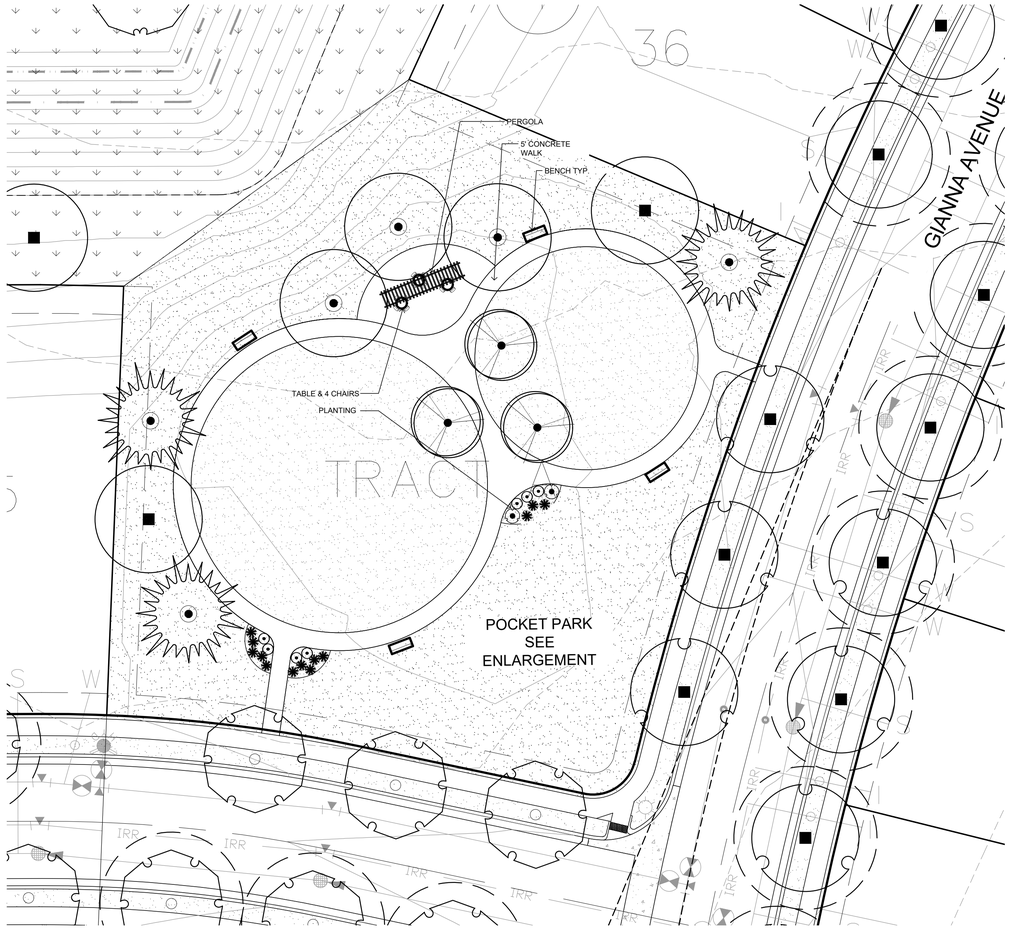
SHEET TITLE

Neighborhood Park Enlargement

SHEET INFORMATION

Sheet Number: 14

Of: 16



Pocket Park Enlargement

0 20' 30' 40'
SCALE 1" = 20'-0"
NORTH

Site Furnishings Schedule

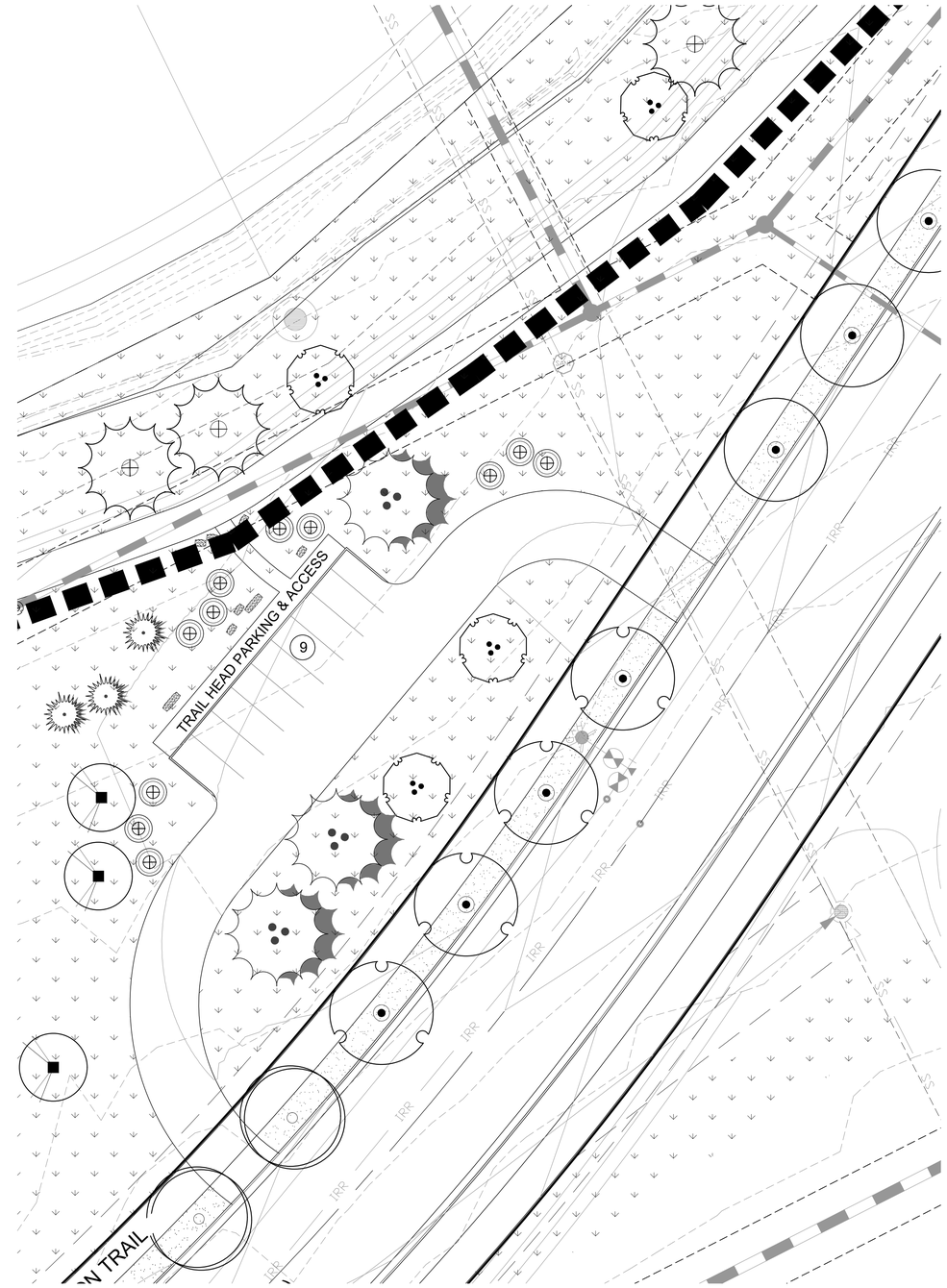
DESCRIPTION	MANUFACTURER	MODEL	QUANTITY	COLOR	MOUNT TYPE
MAX PLAY SWING	LITTLE TIKES COMMERCIAL	MULTIPLE	1	STANDARD	IN-GROUND
SLO SCRAMBLE	LITTLE TIKES COMMERCIAL	200203588	1	STANDARD	IN-GROUND
FOUR TIKES OF STEEL CLIMBER	LITTLE TIKES COMMERCIAL	200200103	1	STANDARD	IN-GROUND
PICNIC TABLE	WABASH VALLEY	SG106P	2	BLACK	SURFACE
BENCH	WABASH VALLEY	DE1136	6	BLACK	SURFACE
TRASH RECEPTABLE	WABASH VALLEY	TI3F33P	3	BLACK	SURFACE
TABLE & 4 CHAIRS	WABASH VALLEY	GV2V72P/GV9112	3		NONE
16' X 16' SQUARE HIP SHELTER	ICON SHELTER SYSTEMS		1		IN-GROUND
NOTE: ALL PARK EQUIPMENT AS SPECIFIED OR APPROVED EQUAL					

AFD Cornus sericea `Arctic Fire` Arctic Fire Dogwood 5 gal.
24" (h) FULL SPECIMEN, EVENLY AND WELL BRANCHED

SMO Philadelphus x Snowbell Mock Orange 5 gal.
24" (h) FULL SPECIMEN, EVENLY AND WELL BRANCHED

PM Physocarpus opulifolius Mountain Ninebark 5 gal.
24" (h) FULL SPECIMEN, EVENLY AND WELL BRANCHED

TLS Rhus trilobata Three Leaf Sumac 5 gal.
24" (h) FULL SPECIMEN, EVENLY AND WELL BRANCHED



Trail Head Enlargement

0 20' 30' 40'
SCALE 1" = 20'-0"
NORTH

TB GROUP
landscape architecture | planning | illustration

444 Mountain Ave.
Berthoud, CO 80513
TEL 970.532.5891
WEB TBGroup.us

SEAL

PROJECT TITLE

COTTONWOOD GREENS

FINAL PLAT

PROJECT NO: LUP2019-0033
PLAN NO: PPL2019-0002

FORT LUPTON, COLORADO

PREPARED FOR

ARBOR CAPITAL PARTNERS LLC
4040 MACARTHUR BLVD.,
STE. 250
NEWPORT BEACH, CA 92660

REVISIONS	DATE
Revisions	3.19.2020
Revisions	5.11.2020

DATE

February 6, 2020

SHEET TITLE

Pocket Park & Trail Head Enlarments

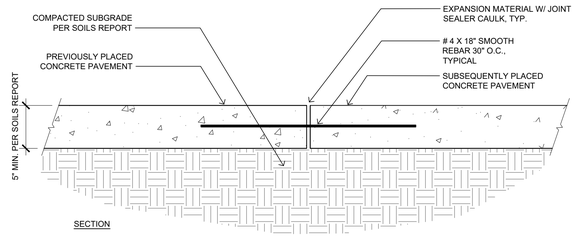
SHEET INFORMATION

Sheet Number: 15

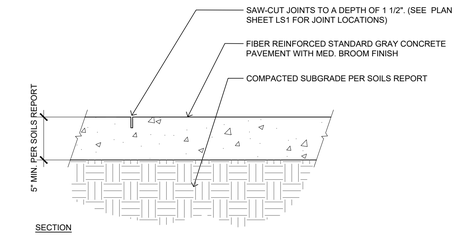
Of: 16

GENERAL CONCRETE NOTES:

1. ALL CONCRETE TO BE FORMED-IN-PLACE TO CREATE CONSISTENT SLOPE TOWARDS GENERAL DIRECTION OF EXISTING GRADES, SLOPES AND DRAINAGE PATTERNS / SYSTEMS.
2. CONCRETE TO BE AT A MINIMUM 4500 PSI AT 28 DAYS WITH AIR ENTRAINMENT AT 5% TO 7% (ABSOLUTE 8% MAX) FOR MINIMUM ¾" AGGREGATE WITH FIBER REINFORCEMENT OF100 PERCENT VIRGIN HOMOPOLYMER POLYPROPYLENE MULTIFILAMENT FIBERS, CONTAINING NO REPROCESSED OLEFIN MATERIALS, COMPLYING WITH ASTM C 1116 - TYPE III AT 1.5 POUNDS PER CUBIC YARD (0.90 KG/M3) OF CONCRETE.
3. ALL NEW CONCRETE POURS ADJACENT TO EXISTING CONCRETE SHALL BE DOWELED, HAVE EXPANSION MATERIAL AND CAULKED ALONG THESE TRANSITIONS.
4. EXPANSION JOINTS SHALL BE CAULKED AND LOCATED AT ALL NEW POURS OR EVERY 100'.
5. ALL CONCRETE EDGES TO BE TOOLED ROUND UNLESS OTHERWISE NOTED DIFFERENTLY.
6. ALL CONCRETE SUB-GRADES ARE TO BE PROPERLY BACKFILLED AND COMPACTED. EXPOSED SOILS TO BE SCARIFIED TO A MINIMUM DEPTH OF 9 INCHES, ADJUSTED IN MOISTURE CONTENT TO WITHIN -1 TO +3% OF STANDARD PROCTOR OPTIMUM MOISTURE CONTENT AND COMPACTED TO BETWEEN 94 TO 98% OF THE MATERIAL'S STANDARD PROCTOR MAXIMUM DRY DENSITY AS DETERMINED IN ACCORDANCE WITH ASTM SPECIFICATION D698
7. CONTRACTOR TO SURVEY OR VERIFY POSITIVE DRAINAGE OF ALL FORMED IN PLACE CONCRETE PER NOTE 1 ABOVE PRIOR TO POURING OR BACKFILLING.
8. CONTRACTOR TO PROPERLY DISPOSE OF ALL EXCAVATED AND WASTE MATERIALS OFF-SITE PER LOCAL REGULATIONS AND CODES.
9. ALL CONCRETE FLATWORK TO BE MINIMUM 6" THICK W/ MEDIUM BROOM PERPENDICULAR TO GENERAL PEDESTRIAN MOVEMENT.
10. IF NOT SHOWN PROVIDE CONTROL JOINTS IN A GENERAL SQUARE AND EQUAL (MAX. 8' x 8') PATTERN STARTING AT POINTS OF GREATEST PROBABILITY OF CRACKING.
11. CONCRETE TO BE UNDER FULL WARRANTY FOR 2 YEARS.



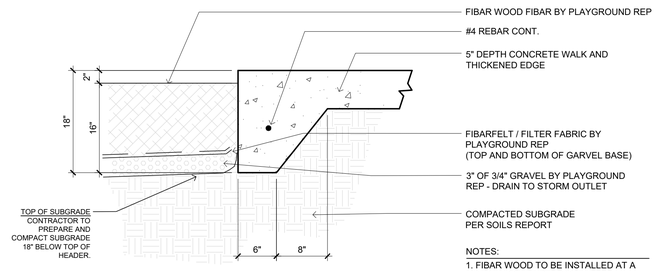
1 TYPICAL CONCRETE COLD JOINT



NOTES

1. APPLY MEDIUM BROOM FINISH PERPENDICULAR TO DIRECTION OF WALKS.
2. PROVIDE 1/4" RADIUS EDGE AT OUTSIDE EDGES
3. APPLY BROOM FINISH SO THAT NO TROWEL LINES REMAIN AT OUTSIDE EDGES
4. MATERIAL IS STANDARD GRAY CONCRETE PER SITE PLAN
5. CONCRETE PAVEMENT SHALL SLOPE TO DRAIN(S) UNLESS OTHERWISE NOTED. PROVIDE 2% CROSS SLOPE IN DIRECTION OF DRAINAGE, UNLESS OTHERWISE NOTED, TYP.

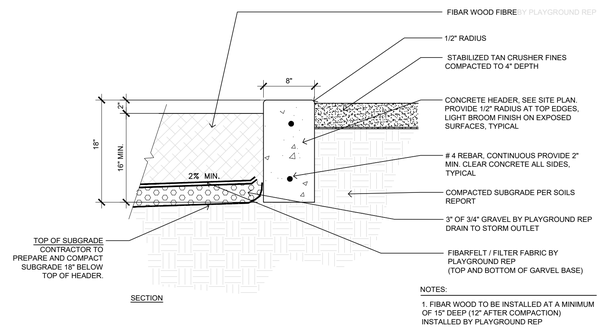
2 TYPICAL CONCRETE SAW CUT



NOTES:

1. FIBAR WOOD TO BE INSTALLED AT A MINIMUM OF 15" DEEP (12" AFTER COMPACTION) INSTALLED BY PLAYGROUND REP

3 TYPICAL CONCRETE PLAYGROUND THICKENED EDGE



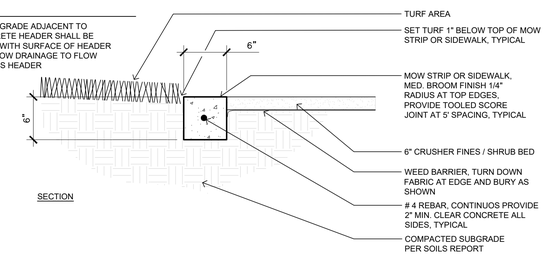
NOTES:

1. FIBAR WOOD TO BE INSTALLED AT A MINIMUM OF 15" DEEP (12" AFTER COMPACTION) INSTALLED BY PLAYGROUND REP

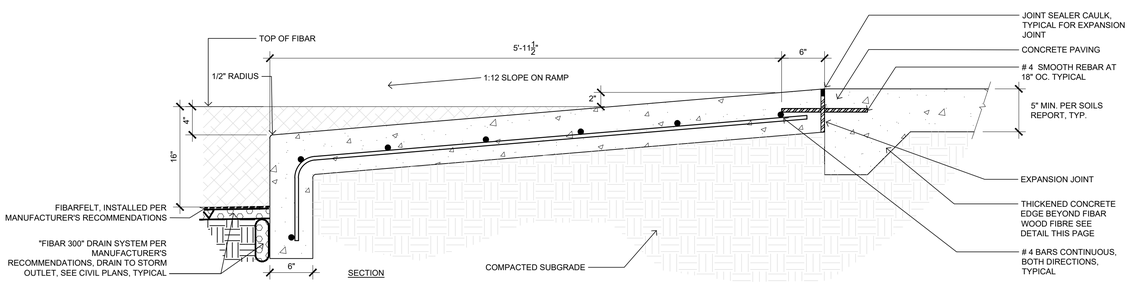
4 TYPICAL CONCRETE PLAYGROUND HEADER

NOTES:

1. FINISH GRADE ADJACENT TO CONCRETE HEADER SHALL BE FLUSH WITH SURFACE OF HEADER TO ALLOW DRAINAGE TO FLOW ACROSS HEADER



5 TYPICAL CONCRETE BAND



6 TYPICAL CONCRETE RAMP ALONG PLAYGROUND CURB

General Notes:

1. ANY PARK SIGNS SHALL BE REQUIRED TO APPLY FOR SIGN PERMIT.
2. PROPOSED GRADES SHALL MATCH OR IMPROVE EXISTING GRADES TO PROVIDE POSITIVE DRAINAGE AWAY FROM PLAYGROUNDS AND AMENITIES WHILE PROVIDING A SMOOTH TRANSITION BETWEEN ALL ADJACENT UNDISTURBED GRADES AND PROPOSED GRADES.
3. THE CONTRACTOR SHALL BE RESPONSIBLE PRIOR TO BIDDING AND CONSTRUCTION, OF BECOMING AWARE OF ALL EXISTING AND PROPOSED UTILITIES, PIPES, STRUCTURES, ETC. CALL UNCC THREE DAYS BEFORE SCHEDULED WORK AT 811 OR 1-800-922-1987.
4. PICNIC SHELTERS TO BE INSTALLED PER MANUFACTURER'S ENGINEERED DRAWINGS AND SPECIFICATIONS. EXACT MODEL AND COLORS TO BE APPROVED BY OWNER.
5. PLAYGROUND EQUIPMENT AND FIBAR DRAINAGE SYSTEM TO BE INSTALLED PER MANUFACTURER'S DRAWINGS AND SPECIFICATIONS. EXACT MODEL(S) AND COLORS TO BE APPROVED BY OWNER.
6. PARK BENCH, BIKE RACK, PICNIC TABLE AND BBQ AMENITIES TO BE INSTALLED PER MANUFACTURER'S DRAWINGS AND SPECIFICATIONS. EXACT MODEL AND COLORS TO BE APPROVED BY OWNER.

TB GROUP
landscape architecture | planning | illustration
444 Mountain Ave.
Berthoud, CO 80513
TEL 970.532.5891
WEB TBGroup.us

SEAL

PROJECT TITLE

COTTONWOOD GREENS

FINAL PLAT

PROJECT NO: LUP2019-0033
PLAN NO: PPL2019-0002

FORT LUPTON, COLORADO

PREPARED FOR

ARBOR CAPITAL PARTNERS LLC
4040 MACARTHUR BLVD.,
STE. 250
NEWPORT BEACH, CA 92660

REVISIONS	DATE
Revisions	3.19.2020
Revisions	5.11.2020

DATE

February 6, 2020

SHEET TITLE

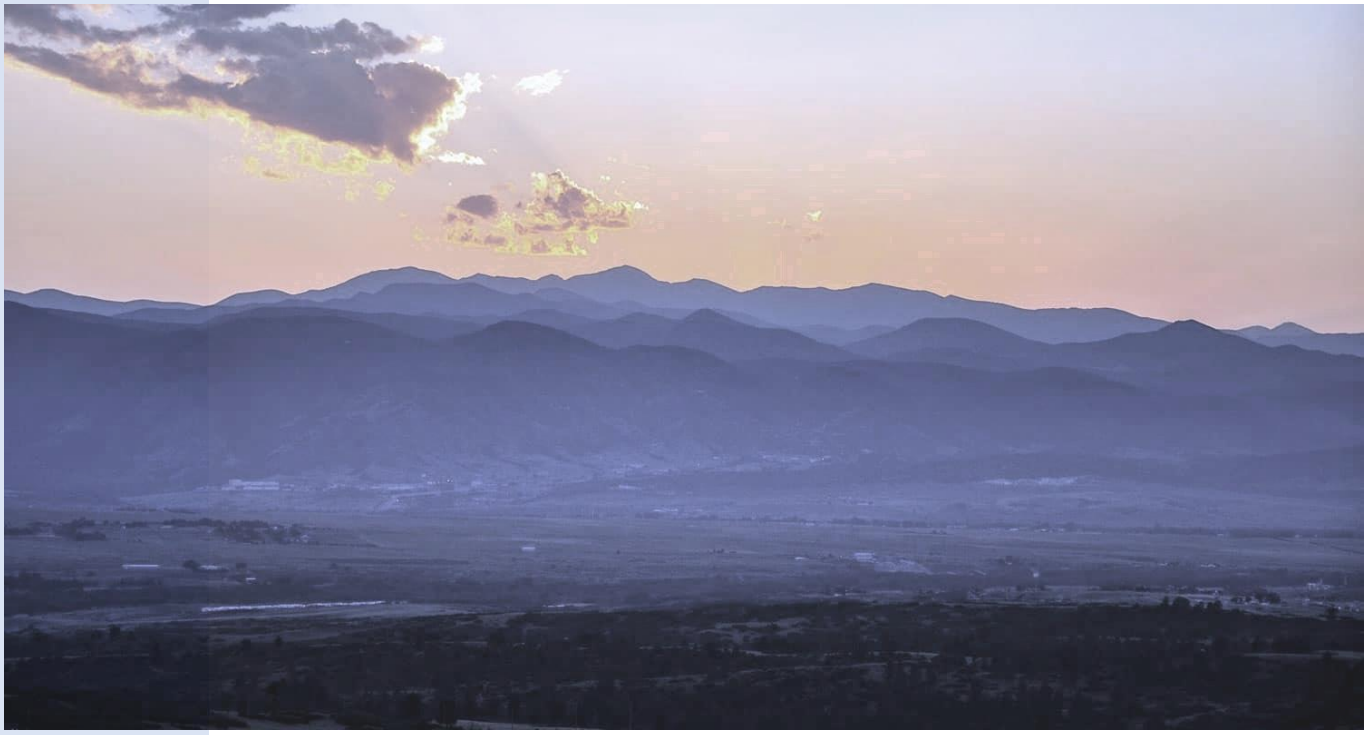
Site Details

SHEET INFORMATION

Sheet Number: 16

Of: 16

DEVELOPMENT GUIDE



COTTONWOOD GREENS
Fort Lupton, Colorado

A. RESIDENTIAL LOT DESIGN

1. Design Standards

a) No more than 80% of any one size lot, unless agreed to otherwise by the City.
b) An effort shall be made to distribute the lost sizes throughout the subdivision rather than cluster them in one area.

B. RESIDENTIAL GARAGE PLACEMENT & DESIGN

1. Deviation.

At the time of building permit application, builders in residential developments with lots that average 10,000 square feet or more may obtain a deviation(s) from these Residential Garage Placement and Design Standards, provided that the applicant demonstrates that the proposed deviation will not detract from the variety of the streetscape, in part due to the large lot nature of the development.

2. Design Standards for Front-Loading Garages.

a) At least 50% of all street-facing garage doors on garages attached to the principal dwelling structure shall be recessed a minimum of four (4) feet behind the front façade of the dwelling portion of the structure or, if applicable, a minimum of four (4) feet behind a covered front porch meeting the minimum dimensions of section IV.E.3.(b) below.
b) Garage doors shall not comprise more than forty-five (45) percent of the front façade of the principal dwelling structure for two-car garages nor more than fifty (50) percent for three-car garages.
c) Garages that are adjacent to the street but that have side-facing garage doors (perpendicular to the street) shall have architectural details or windows that mimic the features of the living portion of the dwelling on the side of the garage facing the street.
d) It is strongly encouraged that dwellings on corner lots be built with garages (either attached or detached) that face the side lot line (as opposed to facing the designated front lot line of the corner lot).

3. Building Setback Reductions Allowed.

a) Front-Loaded Garages with Side-Facing Garage Doors. The front building minimum setback for the garage may be reduced to ten (10) feet only for the garage sidewall containing no garage doors.

C. MIX OF DIFFERENT HOUSING MODELS REQUIRED

1. General Requirement.

a) All subject developments shall offer the following home model variations (with distinctly different floor plans).

Subdivisions containing between 1-100 units.	Builder shall use no less than four (4) Models.
Subdivisions containing between 101 – 250 units.	Builder shall use no less than five (5) Models.
Subdivisions containing between 251 and 500 units.	Builder shall use no less than six (6) models.
Subdivisions greater than 501 units.	Builder shall use no less than seven (7) models.

b) No home model elevation shall be repeated more than once every four (4) lots on the same side of the street (e.g., the first and fifth lots in a row may contain the same model elevation, but the second, third, and fourth lots must contain three (3) different model elevations).
See subsection E.3. below for exceptions to this provision when the different home model elevations incorporate twenty-five percent (25%) brick or other stone or masonry exterior materials or when different home model elevations incorporate a front porch.
c) No home model elevation shall be repeated directly across any street from the same home model elevation.
d) For purposes of this subsection, each home model elevation used to satisfy this requirement shall substantially and distinctly differ from other home model elevations in at least four (4) of the following areas:
    1) The placement of all windows and doors on the front facade elevation (at least a two (2) foot vertical or horizontal variation in size or location is required).
    2) The use of different materials on the front façade elevation.
    3) Substantial variation in the location and/or proportion of garages and garage doors.
    4) The width of the front facade elevation must differ more than two (2) feet.
    5) Variation in the location and proportion of front porches. Front porches shall comply with the minimum standards in Section IV.E.3.(b)(2) below.
    6) Substantial variations in rooflines and/or in the angle of roof runs. Roofs shall have a minimum pitch of 4:12 except for dormers, porch roofs, or other extensions.
    7) Use of roof dormers.
    8) A variation of building types: ranch, two-story, and split-level.
    9) Window shapes that are substantially different.
    10) Other distinct and substantial design variations approved by the City.
e) The number of required models and or elevations required can be reduced by one (2) if four (4) or more exterior color schemes are utilized.
f) Incorporation of Front Porches.
    1) When at least 2 of the 4 required home models in the development or in each subdivision filing incorporate a qualified front porch, as defined in

paragraph (2) below, said porches may extend ten (10) feet into the required front yard setback and the developer shall be allowed to repeat the same home model elevation no more than once every *three (3)* lots on the same side of the street (i.e., the first and fourth lots in a row may contain the same model elevation, but the second and third lots must contain a different model elevation).

2) A "qualified front porch" shall mean a covered front porch with a minimum size of sixty (60) square feet of floor area, excluding the stoop and any projections (e.g., bay window), with a minimum depth of six (6) feet. Qualified front porches shall not be enclosed to provide additional living space.

D. MIX OF ROOF COLORS

1. Mix of Roof Colors Required.

Where asphalt shingles are used, each development or subdivision filing with between 20 and 50 homes shall use at least 4 visibly distinct colors of roof materials distributed in roughly equal proportions throughout the development; and each subdivision filing with more than 50 homes shall use at least 3 visibly distinct colors of roof materials with a minimum of 20% of each roof type.

E. REAR ELEVATIONS

1. Variation in Rear Elevations.

A horizontal or vertical offset, projection, or recess of twelve (12) inches greater is required on all rear elevations.

F. MULTI-FAMILY BUILDING DESIGN

1. Applicability/Purpose.

This subsection's multi-family building design standards shall apply to subdivisions and developments containing single-family attached dwellings (other than duplexes) or multi-family dwellings. Unless otherwise expressly stated, the term "multi-family" shall include single-family attached dwellings (except duplexes incorporated into a single family detached development). The purpose of these standards is to provide a distinctive architectural character in new multi- family residential developments that avoids featureless design and repetition of façades.

2. Building Connections & Orientation.

a) Vehicle Connections.
   1) Multi-family developments between five (5) and fifteen (15) acres shall include a minimum of one public street or private drive, with detached sidewalks and landscaped planting strips and connections shall me fire requirements.
   1) The design of all through-access drives shall be consistent with, and aligned with, local streets in adjacent existing development sites.

2) Street connections and design shall meet fire code requirements.

b) Building Amenities. Amenities Provided. Such common areas should contain at least three (3) of the following features:
   1) Seasonal planting areas;
   2) Large, flowering trees;
   3) Seating;
   4) Pedestrian-scaled lighting;
   5) Gazebos or other decorative structures;
   6) Play structures for children; or
   7) Natural environmental features.

3. Multi-Family Building Design Standards.

a) Building Height.
   1) The maximum building height for all multi-family buildings including town home buildings shall be thirty-five (35) feet or three (3) stories. (how is height measured – see Bob's notes re: garden level/walkout basement
   2) When measured in feet, building height shall be measured from the average of the finished ground level at the center of all walls of a building or structure to the highest point of the roof surface or structure (excluding chimneys).
   3) Height 2 stories and all setbacks

b) Maximum Building Length.
   1) The maximum length of any multi-family residential building shall not exceed two-hundred (200) feet.
   2) The maximum number of units for any multi-family buildings is thirty (30)

c) Exterior Wall Materials.
   1) For multi-family and town home buildings, the total exterior wall area of each building elevation shall be composed of one of the following:
      i. At least thirty-five percent (35%) full-width brick or stone (not including window and door areas and related trim areas), with the balance being any type of lap siding and/or stucco.
      ii. At least thirty percent (30%) full-width brick or stone, with the balance being stucco and/or a "cementitious" lap siding. (A "cementitious" lap siding product is defined as a manufactured strip siding composed of cement-based materials rather than wood fiber-based or plastic-based materials. For example, masonite or vinyl lap siding would not be allowed under this option.)
      iii. All stucco, provided there are unique design features in the elevations of the buildings. Add exterior color variation and landscape treatments per Bob's comments.

d) Roofing Materials. All sloped roof areas shall be clad with either high profile composition shingles such as slate, tile, or dimensional asphalt shingles, concrete or clay tiles, or seamed architectural metals.

e) Roof Shapes.
   1) All one-story multi-family buildings shall have a pitched roof with a minimum slope of at least 4:12. Some accent roofs may have a shallower pitch.
   2) On buildings where sloping roofs are the predominant roof type, each

building roof shall have at least three (3) distinct roof ridgelines.

3) On buildings where flat roofs are the predominant roof type, parapet walls shall vary in height and/or shape at least once in every forty (40) feet of building wall length.

f) Requirement for Four-Sided Design. A building's special architectural features and treatments shall not be restricted to a single façade. All sides of a building open to view by the public, whether viewed from public or private property, shall display a similar level of quality and architectural interest.

g) Windows. All elevations on town home and multi-family buildings shall contain windows.

h) Exposed HVAC Units and Grilles. When through-wall heating, venting, or air conditioning units appear on exterior building walls, such units shall be covered by an architectural grille, and shall be designed in such a manner as to blend in with surrounding wall surfaces. When such units are adjacent to building windows, they shall be designed to appear to be part of the building's window pattern by matching window dimensions, colors, or trim. Such units shall not overhang surrounding wall planes, but shall be set flush with the façade or be placed inconspicuously in façade recesses.

i) Architectural Elements.

1) All multi-family and town home buildings shall employ at least two (2) of the following design items applied consistently along each facade:
   i. Projections
   ii. Recesses
   iii. Shadow lines
   iv. Window patterns
   v. Overhangs
   vi. Reveals
   vii. Changes in parapet height.
2) Stairways in multi-family buildings shall not be located outside of the building envelope.
3) Entrances to multi-family buildings should be identifiable by an architectural treatment such as a covered portico or a different roofline treatment.

j) Recreational Amenities. All multi-family developments with less than fifty dwelling units shall incorporate at least one (1) of the following recreational amenities and multi-family developments with fifty (50) or more dwelling units shall incorporate two (2) of the following recreational amenities:

1) Swimming pool.
2) Resident clubhouse.
3) Two (2) playgrounds with playground equipment and a minimum size of five hundred (500) square feet per playground.
4) Sport court.
5) Two (2) picnic areas.
6) Trail
7) Seating/Gathering area

4. Quality Enhancement Standards.

a) Menu of Quality Enhancement Elements for Single-Family Attached Dwellings

(Including Town Homes). In addition to any other applicable standard set forth in this section, each individual town home or other single-family attached building (e.g., triplexes or other clustered homes) shall incorporate at least five (5) of the following features:

1) A minimum habitable floor area (excluding unfinished garage, attic, or unfinished basement space) of at least 1,100 square feet.
2) A first-floor front facade elevation that is 100% masonry.
3) A primary roof slope of at least 6:12.
4) A garage door with windows.
5) Transom windows on at least one-quarter (1/4) of the windows facing public or private streets.
6) At least one bay window.
7) A front door containing two sidelights or one transom over the front door.
8) An outdoor private enclosed area of at least one hundred (100) square feet.
9) A covered front porch at least five (5) feet x eight (8) feet.
10) A functional or simulated chimney appearing on an exterior wall, faced with masonry or stucco.
11) At least one hundred (100) square feet of patterned paving materials used in driveways or walks open to public view.
12) At least one roof dormer containing a window.
13) A unit designed so that the unit's garage door or doors and its "front entry" appear on different sides of a building.
14) A unit located in an attached town home row or attached cluster containing no more than three (3) units.
15) A unit located in an attached townhouse row or attached cluster where no single elevation of the entire row or cluster contains more than four (4) garage doors (if garages are provided).
16) The distance between residential structures is a minimum of 30 feet.
17) Front elevation of the building contains at least three distinct roof breaks.
18) Adjacent units in a building are different elevations.
19) The City may approve other substantial architectural features.

b) Menu of Design Elements for Multi-Family Buildings (Not Including Town Home Buildings). In additional to other applicable standards required in this section, each multi-family building shall incorporate at least five (5) of the following architectural features:

1) The average rentable living area of all units in the building is at least 900 square feet.
2) The total wall area of exterior walls of the building, excluding windows and doors, is at least 50% brick or at least 25% stone in combination with brick or stucco.
3) The building's main roof is clad with clay or concrete tiles.
4) The building's main roof is pitched with at least a 6:12 slope.
5) The building's main roof is pitched with at least five (5) distinct ridgelines, at least two (2) of which are at least two (2) feet apart in height, and two (2) of which are at right angles to the others.
6) At least two ends of the building step down one story or more in height.
7) All building elevations contain at least three (3) distinct wall planes

separated from each other by at least two (2) feet.

8) Landscaping along arterial and collector streets is enhanced through the use of berms, larger trees than required by these or other City regulations, and additional numbers of bushes and other screening plants.
9) Residential structures in the project are separated from all other structures by a minimum of 40 feet.
10) The City may approve other substantial architectural features.

G. INCENTIVES FOR MIX OF HOUSING TYPES

The City Council may grant a density bonus of up to twenty-five (25) percent to the density of the underlying base zone district density to any development plan or residential subdivision plat or development plan (including PUD plans) containing a mix of housing types, provided the plat or plan complies with the applicable zoning district restrictions on permitted uses and with the following standards:

1. Housing Types.

The development plat or plan contains a minimum of two (2) different housing types. The following list of housing types shall be used to satisfy this requirement:

a) Single-family detached dwellings on standard lots containing 6,500 square feet or more;
b) Duplex dwellings on standard lots containing 6,000 square feet or more;
c) No more than six (6) single-family attached dwellings (e.g., town homes) on a parcel containing 10,000 square feet or more (individual town home lots shall be a minimum of 1,650 square feet); and
d) Multi-family dwellings (limited to six (6) units per building).

2. Single Housing Type

A single housing type shall not constitute more than fifty (50) percent of the total number of dwelling units.

H. RESIDENTIAL COMPATIBILITY STANDARDS

1. Applicability/Purpose.

These residential compatibility standards shall apply to development of a new residential use, or substantial expansion or alteration of an existing residential use, on a site that is adjacent to or across a street from two or more lots with existing structures. For purposes of this subsection only, "substantial expansion or alteration" shall mean construction that is equal to or greater than twenty-five percent (25%) of the principal dwelling structure's original gross floor area (including attached and detached garages).

2. Compatibility Standards.

Contextual Front Building Setbacks. Notwithstanding the minimum front setback requirements required in the Municipal Code, as amended, for the zoning district in which the subject property is located, the applicant shall use a "contextual" front setback when existing front setbacks on the same block are less than that required by the underlying zoning. In such circumstance, the front setback for the proposed development shall equal the average of the existing front setbacks on the same and facing block faces. Only lots with similar uses to that proposed shall be included

in the average, and vacant lots shall be included using the underlying district standard.

Phase III Drainage Report

Cottonwood Greens Development

A Plat of Multiple Parcels of Land Situated in the South Half of Section 33, Township 2 North, Range 66 West of the Sixth Principal Meridian, City of Fort Lupton, County of Weld, State of Colorado

Owner/Developer
Arbor Capital Partners, LLC
4040 MacArthur Drive, Suite 250
Newport Beach, California 92660
Contact: Mr. Lee Lowrey

Engineer
143 Union Boulevard
Suite 700
Lakewood, CO 80228
Tel: 303.825.7100
Contact: Michael McGoldrick, PE

Atwell Project Number
19003254

City of Fort Lupton Project Number
T.B.D.

Submittal Date
February 6, 2020

Signature Page

Engineer's Statement:

"I affirm that this Phase I Drainage Report and Construction Plans for Cottonwood Greens Subdivision was prepared by me (or under my direct supervision) in accordance with the provisions of the City of Fort Lupton Storm Drainage Design and Technical Criteria for the owners thereof. I understand that the City of Fort Lupton does not and will not assume liability for facilities designed by others."

SEAL & SIGNATURE:_____

Michael McGoldrick, PE Date

Registered Professional Engineer State of Colorado No. 30960

Developer's Statement:

Arbor Capital Partners, LLC hereby certifies that the drainage facilities for Cottonwood Greens Subdivision shall be constructed according to the design presented in this Phase I Drainage Report and the Construction Plans. I understand that the City of Fort Lupton does not and will not assume liability for the facilities designed and/or certified by my engineer and that are submitted to the City of Fort Lupton.

_____

Name of Developer

_____

Authorized Signature Date

_____

Printed Name

_____

Title

Table of Contents

Signature Page 2
General Location and Description 4
Location 4
Description of Property 4
Drainage Basins 5
Major Basin Description 5
Sub-Basin Description 5
Drainage Design Criteria 6
Hydrological Criteria 6
Hydraulic Criteria 6
Adaptation from Criteria 9
Summary 10
References 10

APPENDIX A – Historic Conditions
APPENDIX B – Proposed Plans
APPENDIX C – Referenced Information
APPENDIX D – Drainage Calculations

General Location and Description

Location

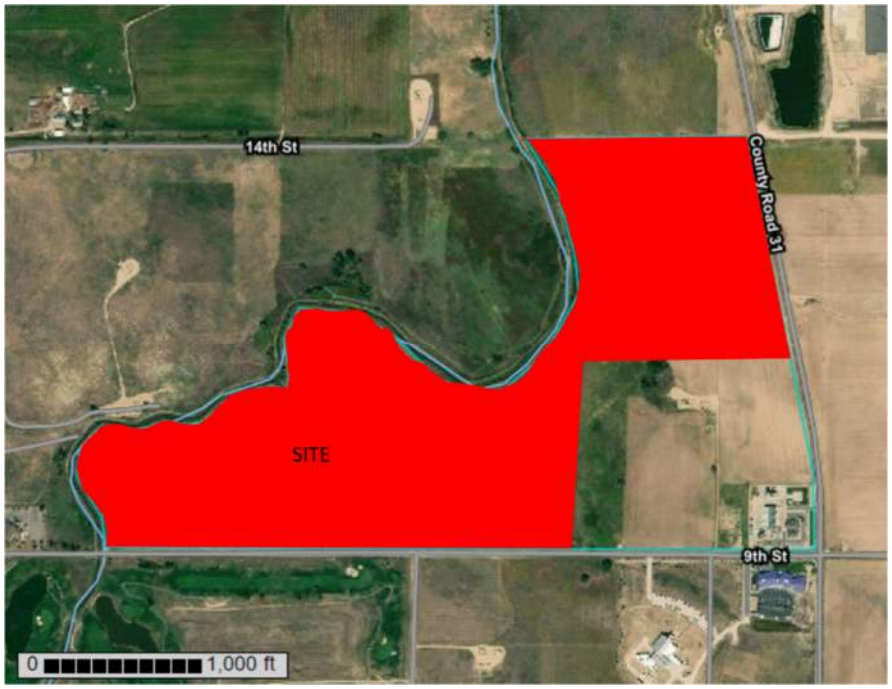


Figure 1 – Project Location

The Cottonwood Greens project site is in a plat of multiple parcels of land situated in the South half of Section 33, Township 2 North, Range 66 West of the Sixth Principal Meridian, City of Fort Lupton, County of Weld, State of Colorado. The site is bounded by Fulton Ditch to the West, 14th Street to the North, 9th Street to the South, and County Road 31 to the East.

To the North, between Fulton Ditch and 14th Street is the rest of the Cottonwood Greens P.U.D., soon to be developed. To the South, across 9th Street, is Coyote Creek Golf Course, a Colorado Army National Guard Station, and a Weld County Facility. The Fort Lupton Fire Department is located at the Northwest corner of 9th Street and County Road 31. To the West is undeveloped land zoned R-1, and to the East (across County Road 31) is also undeveloped land zoned R-1.

Description of Property

The proposed approximately 120-acre development will be a 291-lot subdivision with on-site open spaces and detention. The site is part of the Cottonwood Greens P.U.D., recorded April 13th, 2006, and is currently undeveloped land used for farming, and houses several gas facilities that we will have to build around. The site's topography generally slopes from the southeast to northwest with the slopes ranging between 3 percent and 9 percent.

An onsite soil report for the site is illustrated in the Web Soil Survey from the National Resource Conservation Service (NRCS) website. The soil report indicates that 70% of the site is Valent Sand (69), 22% Olney Fine Sandy Loam (47), with the remainder being various sandy loams. The site consists of mainly Hydrologic Soil Group B soils. Additional information can be found in Appendix A.

Fulton Ditch, an irrigation ditch adjacent to the Cottonwood Greens, outlines the northern boundary of the proposed development location and runs southwest-to-northeast, originating at the nearby South Platte River. Golden's Pond, a regional detention pond for the 14th Street Basin, is located 1 mile to the West on the South side of 14th Street.

Existing condition plans show all easements within and surrounding the subject property and can be found in on sheets 3 through 5 of the construction drawings.

Drainage Basins

Major Basin Description

Per the "Storm Drainage Utility Plan" adopted by the City of Fort Lupton in March 2015, the site is part of the 14th Street Basin, bounded by County Road 29 to the West, County Road 31 to the East, County Road 16 to the North, and Colorado highway 52 to the South. Historic flows for the 14th Street Basin are West-Northwest, with the South Platte River as the ultimate outfall. Half of the 14th Street Basin is undeveloped land used for farming but is zoned mainly for residential development.

The project area is not within a FEMA regulated floodplain as shown on FEMA Map No. 08123C2110E in Appendix C. As illustrated, the project site lies within an area deemed as Zone X - determined to be outside of the FEMA 100 and 500-year floodplains.

Historic flow paths and patterns will be generally maintained, and no irrigation facilities including Fulton Ditch will be impacted by the development of this site.

Sub-Basin Description

For the development area, the existing topography slopes generally southeast to northwest and is bounded by Fulton Ditch to the North and West, County Road 31 to the East, and 9th Street to the South (See Historic Drainage Map in Appendix A). In order to eliminate offsite runoff, a storm system in CR 31 is proposed that will capture all upstream runoff. Additionally, a swale at the low point on 9th Street will convey any runoff to proposed Pond 3 and be passed through the system. Runoff flows west-northwest overland to Golden's Pond (as described in "Storm Drainage Utility Plan") and then on to the South Platte River. Per the Storm Drainage Utility Plan, Golden's Pond "should not be used for detention of runoff from the 14th Street Drainage Basin" (Pg. 17). As such, on-site runoff will be detained and released at the historic 5-year rate specified by the City of Fort Lupton before being routed via underground pipes and/or ditches along 14th Street.

While requirements state that the Sub-Basin must be assumed to be fully developed, land off the subject property (most of Area A) will be undeveloped in calculations. Pond 3 is proposed to be

expanded once the rest of Area A is developed, thus ensuring the entire sub-basin is capable of being stored in the proposed system once fully developed.

Drainage Design Criteria

Hydrological Criteria

Table 1 below shows the hydrological criteria for each sub-basin according to the rational method.

Table 604

Sub-Basin Designation	Sub-Basin Area (ac)	C_5	C_{100}	T_C (min)	Q_5 (cfs)	Q_{100} (cfs)	I_5	I_{100}
A	62.91	0.76	0.89	22.2	128.33	290.91	2.69	5.2
B	5.72	0.48	0.63	6.5	12.37	34.10	4.55	9.48
C	5.99	0.40	0.59	11.4	9.17	25.48	3.8	7.23
D	14.37	0.52	0.66	9.1	30.65	74.52	4.1	7.9
E	8.79	0.66	0.76	9.9	22.22	48.61	3.84	7.32
F	15.37	0.51	0.65	16.2	24.54	73.12	3.1	7.32
G	9.04	0.53	0.66	14.1	16.16	39.62	3.35	6.6
H	25.62	0.56	0.68	17.1	42.83	104.65	3	6
Ha	2.19	0.91	0.95	5.0	9.60	19.79	4.8	9.5
Hb	5.46	0.52	0.66	19.4	8.05	19.88	2.83	5.55
Hc	5.13	0.45	0.60	15.0	7.44	19.44	3.22	6.31
Hd	4.49	0.45	0.60	24.0	5.15	13.22	2.55	4.91
He	8.35	0.71	0.81	18.7	16.82	37.30	2.82	5.55
I	2.81	0.76	0.89	8.9	8.73	19.99	4.1	8

Table 1 – Hydrological Criteria

Hydraulic Criteria

In order to prevent flooding downstream, outlet structures will need to release detained storm water at the 5-Year historic rate, per the following recommendation by J&T Consulting in the Storm Drainage Utility Plan on page 17:

"In order to mitigate the risk of increased flooding within the City, over-detention should be required for all new developments east of the Union Pacific Railroad tracks/embankment … basins must then be designed to contain the excess volume for all storms above the 5 year storm up to the 100 year storm while only releasing at the 5 year rate."

As such, the historic 5-year release rate can be calculated using Table 2 below.

Storm Frequency	Soil Group		
	A	B	C&D
5-Year	0.07	0.13	0.17
100-Year	0.50	0.85	1.00

Table 2 – Historic Runoff Rates (cfs/acre)

With predominantly group B soils and a basin area of 150.61 acres, the maximum release rate for the entire basin is 19.6 CFS. This 5-Year historic release rate necessitates the use of a modified Type 2 outlet with a restrictor plate installed on the outlet pipe with orifices sized to release at 19.6 CFS. Since there are three separate systems, each outlet must be sized according to that systems share of runoff. This results in the combined release rate of 19.6 cfs or less. Using this release rate, downstream drainage facilities will not be impacted for storms up to and including the 100-year storm.

While the entire site is tributary to a detention pond, the empirical equations provided by Fort Lupton cannot be used because those will have accommodated a "normal" 100-Year release rate instead of the modified 5-Year release rate as specified above. As such, the modified FAA method will be used. This method uses a runoff hydrograph calculated using basin characteristics and an outflow hydrograph based on a specified release rate. Then, the required volume is calculated.

Using individual basin time of concentrations, and pipe flow times, the time of concentration for each detention basin system was calculated. For Ponds 1 and 2, area F was the driver, and resulted in a time of concentration of 20 minutes. For Pond 3, Area A is the only contributing basin and therefore the time of concentration is 22 minutes. For Ponds 4 and 5, area Hd was the driver and resulted in a time of concentration of 25 minutes.

Using the calculations shown in Appendix D, the required volumes were calculated and shown below in Table 3:

Pond Information Table			
Pond	**Volume Required (Acre-Feet)**		
	WQCV	5-Year	100-Year
1+2	0.85	2.10	9.13
3	0.57	1.39	6.89 (50-Year)
4+5	0.56	1.40	5.94

Table 3 – Pond Volume Requirements

As shown, Pond 3 is proposed to only detain up to the 50-Year storm instead of the 100-Year. This is an interim condition, because as area A is developed Pond 3 will be expanded to handle developed flows, creating a mini regional detention basin for area A.

For the calculation of the WQCV, the traditional UDFCD method was used, as follows:

WQCV Calculation:

$$WQCV = a(0.91I^3 - 1.19I^2 + 0.78I) \qquad Design\,Volume = 1.2\left(\frac{WQCV}{12}\right)A$$

Where:

a = 0.8 for a 12-hour release rate, per UDFDC Manual Volume 3

The natural drainage path leads to an irrigation ditch that cannot accept any runoff to prevent flooding of land downstream, so most inlets have been sized for the 100-Year Major Storm. While this results in oversized pipes, it will prevent flooding of homes on-site. Inlet calculations can be found in Appendix D in Fort Lupton Table 901 for both the major and minor storm events.

Additionally, Fort Lupton Table 603 (used for sizing pipes) has been modified. Instead of recalculating the rainfall based on upstream time of concentration, weighted C, and rainfall, the inlet capture flows have been used at each design point according to Table 603 in Appendix D. This ensures that the storm pipes can handle the 100-Year Major Storm. When using the original Table 603, increased time of concentration leads to lower rainfall rates, resulting in smaller flows and pipe sizes. This could result in runoff being able to enter the inlets faster than the storm system could handle, resulting in flooding and over spilling into Fulton Ditch.

Using the required detention volumes above, storage elevations for the WQCV, 5-Year and 100-Year storms were found using AutoCAD Civil3D and are shown in Table 4 below.

Pond Information Table									
Pond	**Elevation**			**Volume Required (Acre-Feet)**			**Volume Provided (Acre-Feet)**		
	WQCV Elev.	5-Year Elev.	100-Year Elev.	WQCV	5-Year	100-Year	WQCV	5-Year	100-Year
1+2	4967.80	4970.50	4974.60	0.85	2.10	9.13	0.86	2.17	9.18
3	4967.90	4970.50	4976.30	0.57	1.39	6.89(50-Year	0.61	1.36	6.99 (50-Year
4+5	4967.10	4969.30	4973.20	0.56	1.40	5.94	0.60	1.40	6.06

Table 4 – Pond Information

The site is only allowed to release at the 5-Year rate, so the Type 2 Outlet has been modified. Once the WQCV elevation has been exceeded, the release rate is the same for the 5-Year storm and the 100-Year storm, making appurtenances related to the 5-Year storm unnecessary. The modified detail can be found on sheet 141 of the construction drawings.

Outlet pipe orifice size has been calculated using the 100-Year storage elevation head, and can be found below in Table 5:

Outlet Structure Information												
Outlet	WQCV Elev.	WQCV Orifice Elev.	WQCV Release Rate (1/2 100-Year)	WQCV Orifice Area	Number of 4" Holes	100-Year Elev.	100-Year Orifice Elev.	Allowed 100-Year Release Rate	Theoretical 100-Year Orifice Area	Theoretical 100-Year Orifice Diameter	Specified 100-Year Orifice Diameter	Actual 100-Year Release Rate
	-	-	cfs	Square feet	-		-	cfs	Square feet	Inches	Inches	cfs
1+2	4967.80	4962.55	4.63	0.39	4	4974.60	4962.41	9.27	0.51	9.66	9.5	8.96
3	4967.90	4964.75	3.00	0.32	4	4976.30	4964.65	5.99	0.34	7.85	7.5	5.46
4+5	4967.10	4963.95	2.17	0.23	3	4973.20	4963.83	4.34	0.27	7.06	7.75	5.23

Table 5 – Outlet Structure Information

Designing the outlet in this manner ensures that any storm up to and including the 100-Year major Storm releases at or below the specified 5-Year release rate of 19.6 cfs for the entire system. A check was done, and all outlet structures can be the minimum size of 3 feet by 3 feet, as specified by Fort Lupton.

The final outfall will combine the flows from each outlet and take them under Fulton Ditch, through an easement on the adjacent property to the Northwest, to 14th Street. From there, the outfall will have to be coordinated with the city and the adjacent property developer, as the only place to finally outfall is Golden's Pond; either a system of pipes or a roadside ditch will have to convey flows and will have to be sized for the use of future development within the 14th Street Basin.

Adaptation from Criteria

Per the Storm Drainage Design and Technical Criteria, Section 6.5.2 *Off-site Flow Analysis*, undeveloped land in the project sub-basin must be assumed to be fully developed for the purpose of runoff coefficient calculation. Minor basin A, identified in the Drainage Area Plan in Appendix B, consists of almost entirely offsite runoff, and is also almost entirely undeveloped. Additionally, it is currently proposed only to detain the 50-Year storm in Pond 3, instead of the 100-Year storm.

While the engineer agrees that this off-site flow needs to be accommodated in the Cottonwood Greens development drainage system, we propose that the runoff coefficient for area A be calculated using undeveloped coefficients. This results in a required pond volume of 6.89 acre-feet. When the rest of area A is developed, the pond would be increased in size based on the actual runoff coefficient of off-site developments, straddling the property line and providing detainment for all runoff in area A. Pond 3 would then become a miniature regional pond serving all of area A. This would also help the development of area A, as any future engineers will already have an outfall, only having to enlarge pond 3 to accommodate increased runoff due to development. Increasing the area enough so that the storage elevations stay the same would be ideal so that the outlet structure for Pond 3 can remain untouched.

The effect of urbanization on runoff is mitigated by the fact that area A is currently undeveloped, reducing the need for detention. For this reason, detaining the 50-Year storm until area A is developed

and Pond 3 is expanded to detain the 100-Year storm is enough to protect downstream property from potential flooding.

Additionally, the engineer has sized pipes according to inlet captures in order to ensure that all runoff up to and including the 100-year storm will enter the storm system. Recalculating the basin flows based on the entire upstream basin would result in lower runoff flows, possibly creating a situation where inlets can collect runoff quicker than the storm pipes can convey them to the detention ponds. This is a problem because no runoff may enter Fulton Ditch, in order to prevent flooding of land downstream.

Summary

As shown in this report, adequate detention has been provided, and the combined release rate for rainfall events up to and including the 100-Year storm (50-Year for area A/Pond 3) will be released below the prescribed release rate for this site of 19.6 cfs. Coordination with the Sun Properties development to the North will be necessary, as they will also be looking to convey released stormwater to Golden's Pond via underground storm or a roadside ditch adjacent to 14th Street that Cottonwood Greens Subdivision will also outfall into.

Additionally, should the proposed adaptation be accepted, essentially creating a miniature regional pond, the allocation of volume across the Cottonwood Greens development would be greatly aided, as well as drainage design for future development in area A.

References

1) City of Fort Lupton Storm Drainage Design and Technical Criteria Manual; City of Fort Lupton
2) Drainage Criteria Manual, Volumes 1, 2, &3, Urban Drainage and Flood Control District, Volumes 1 & 2 – Originally Published September 1969, Updated January 2016,; Volume 3 – Originally Published September 1992, Updated November 2010.
3) Flood Insurance Rate Map of Weld County Colorado; Federal Emergency Management Agency, Map No. 08123C2110E, September 30, 2019.
4) USDA – NRCS – Web Soil Survey.

APPENDIX A – Historic Conditions

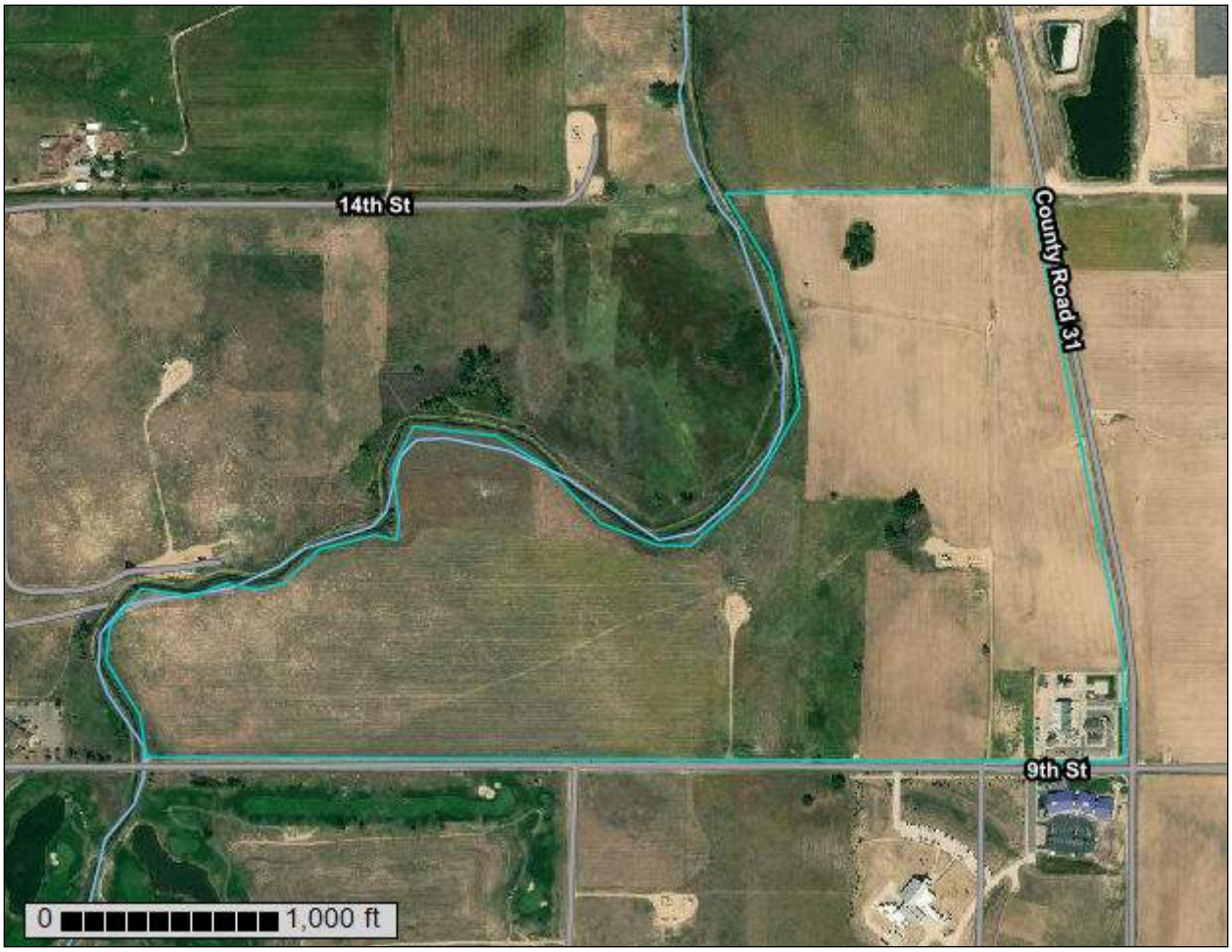
United States Department of Agriculture

Natural Resources Conservation Service

A product of the National Cooperative Soil Survey, a joint effort of the United States Department of Agriculture and other Federal agencies, State agencies including the Agricultural Experiment Stations, and local participants

Custom Soil Resource Report for Weld County, Colorado, Southern Part

Cottonwood Greens Subdivision



October 3, 2019

Preface

Soil surveys contain information that affects land use planning in survey areas. They highlight soil limitations that affect various land uses and provide information about the properties of the soils in the survey areas. Soil surveys are designed for many different users, including farmers, ranchers, foresters, agronomists, urban planners, community officials, engineers, developers, builders, and home buyers. Also, conservationists, teachers, students, and specialists in recreation, waste disposal, and pollution control can use the surveys to help them understand, protect, or enhance the environment.

Various land use regulations of Federal, State, and local governments may impose special restrictions on land use or land treatment. Soil surveys identify soil properties that are used in making various land use or land treatment decisions. The information is intended to help the land users identify and reduce the effects of soil limitations on various land uses. The landowner or user is responsible for identifying and complying with existing laws and regulations.

Although soil survey information can be used for general farm, local, and wider area planning, onsite investigation is needed to supplement this information in some cases. Examples include soil quality assessments (http://www.nrcs.usda.gov/wps/portal/nrcs/main/soils/health/) and certain conservation and engineering applications. For more detailed information, contact your local USDA Service Center (https://offices.sc.egov.usda.gov/locator/app?agency=nrcs) or your NRCS State Soil Scientist (http://www.nrcs.usda.gov/wps/portal/nrcs/detail/soils/contactus/?cid=nrcs142p2_053951).

Great differences in soil properties can occur within short distances. Some soils are seasonally wet or subject to flooding. Some are too unstable to be used as a foundation for buildings or roads. Clayey or wet soils are poorly suited to use as septic tank absorption fields. A high water table makes a soil poorly suited to basements or underground installations.

The National Cooperative Soil Survey is a joint effort of the United States Department of Agriculture and other Federal agencies, State agencies including the Agricultural Experiment Stations, and local agencies. The Natural Resources Conservation Service (NRCS) has leadership for the Federal part of the National Cooperative Soil Survey.

Information about soils is updated periodically. Updated information is available through the NRCS Web Soil Survey, the site for official soil survey information.

The U.S. Department of Agriculture (USDA) prohibits discrimination in all its programs and activities on the basis of race, color, national origin, age, disability, and where applicable, sex, marital status, familial status, parental status, religion, sexual orientation, genetic information, political beliefs, reprisal, or because all or a part of an individual's income is derived from any public assistance program. (Not all prohibited bases apply to all programs.) Persons with disabilities who require

alternative means for communication of program information (Braille, large print, audiotape, etc.) should contact USDA's TARGET Center at (202) 720-2600 (voice and TDD). To file a complaint of discrimination, write to USDA, Director, Office of Civil Rights, 1400 Independence Avenue, S.W., Washington, D.C. 20250-9410 or call (800) 795-3272 (voice) or (202) 720-6382 (TDD). USDA is an equal opportunity provider and employer.

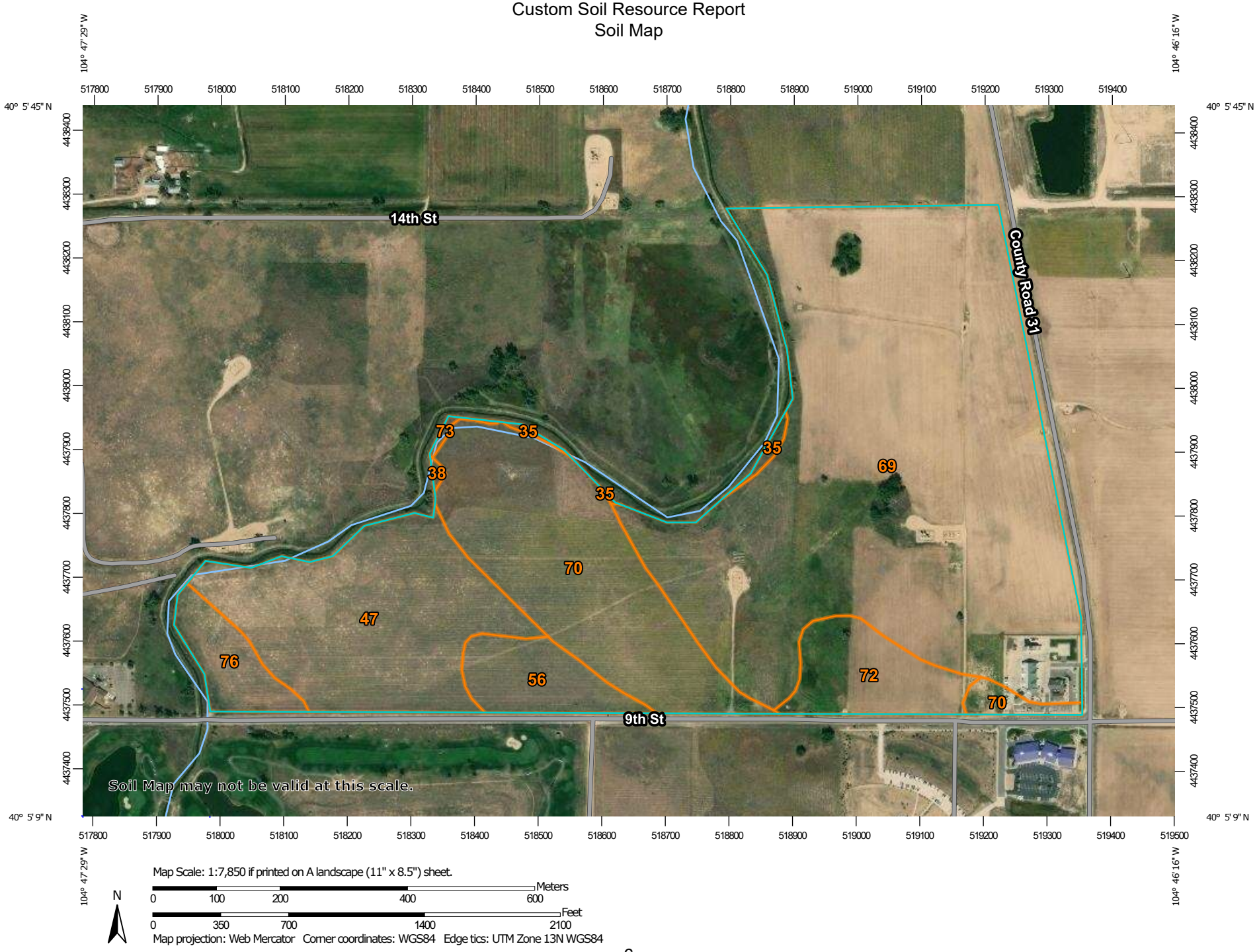
Contents

Preface..... 2
Soil Map..... 5
Soil Map.....6
Legend.....7
Map Unit Legend..... 8
Map Unit Descriptions..... 8
Weld County, Colorado, Southern Part.....10
35—Loup-Boel loamy sands, 0 to 3 percent slopes.....10
38—Nelson fine sandy loam, 3 to 9 percent slopes..... 11
47—Olney fine sandy loam, 1 to 3 percent slopes.....12
56—Renohill clay loam, 0 to 3 percent slopes..... 14
69—Valent sand, 0 to 3 percent slopes.....15
70—Valent sand, 3 to 9 percent slopes.....17
72—Vona loamy sand, 0 to 3 percent slopes.....18
73—Vona loamy sand, 3 to 5 percent slopes.....19
76—Vona sandy loam, 1 to 3 percent slopes.....21
References.....23

Soil Map

The soil map section includes the soil map for the defined area of interest, a list of soil map units on the map and extent of each map unit, and cartographic symbols displayed on the map. Also presented are various metadata about data used to produce the map, and a description of each soil map unit.

Custom Soil Resource Report
Soil Map



Map Scale: 1:7,850 if printed on A landscape (11" x 8.5") sheet.

N

Meters: 0 100 200 400 600

Feet: 0 350 700 1400 2100

Map projection: Web Mercator Corner coordinates: WGS84 Edge tics: UTM Zone 13N WGS84

MAP LEGEND

Area of Interest (AOI)

Area of Interest (AOI)

Soils

Soil Map Unit Polygons

Soil Map Unit Lines

Soil Map Unit Points

Special Point Features

Blowout

Borrow Pit

Clay Spot

Closed Depression

Gravel Pit

Gravelly Spot

Landfill

Lava Flow

Marsh or swamp

Mine or Quarry

Miscellaneous Water

Perennial Water

Rock Outcrop

Saline Spot

Sandy Spot

Severely Eroded Spot

Sinkhole

Slide or Slip

Sodic Spot

Spoil Area

Stony Spot

Very Stony Spot

Wet Spot

Other

Special Line Features

Water Features

Streams and Canals

Transportation

Rails

Interstate Highways

US Routes

Major Roads

Local Roads

Background

Aerial Photography

MAP INFORMATION

The soil surveys that comprise your AOI were mapped at 1:24,000.

Warning: Soil Map may not be valid at this scale.

Enlargement of maps beyond the scale of mapping can cause misunderstanding of the detail of mapping and accuracy of soil line placement. The maps do not show the small areas of contrasting soils that could have been shown at a more detailed scale.

Please rely on the bar scale on each map sheet for map measurements.

Source of Map: Natural Resources Conservation Service
Web Soil Survey URL:
Coordinate System: Web Mercator (EPSG:3857)

Maps from the Web Soil Survey are based on the Web Mercator projection, which preserves direction and shape but distorts distance and area. A projection that preserves area, such as the Albers equal-area conic projection, should be used if more accurate calculations of distance or area are required.

This product is generated from the USDA-NRCS certified data as of the version date(s) listed below.

Soil Survey Area: Weld County, Colorado, Southern Part
Survey Area Data: Version 18, Sep 13, 2019

Soil map units are labeled (as space allows) for map scales 1:50,000 or larger.

Date(s) aerial images were photographed: Sep 20, 2015—Oct 21, 2017

The orthophoto or other base map on which the soil lines were compiled and digitized probably differs from the background imagery displayed on these maps. As a result, some minor shifting of map unit boundaries may be evident.

Map Unit Legend

Map Unit Symbol	Map Unit Name	Acres in AOI	Percent of AOI
35	Loup-Boel loamy sands, 0 to 3 percent slopes	0.6	0.4%
38	Nelson fine sandy loam, 3 to 9 percent slopes	0.2	0.1%
47	Olney fine sandy loam, 1 to 3 percent slopes	25.4	15.8%
56	Renohill clay loam, 0 to 3 percent slopes	6.2	3.8%
69	Valent sand, 0 to 3 percent slopes	88.2	54.9%
70	Valent sand, 3 to 9 percent slopes	27.3	17.0%
72	Vona loamy sand, 0 to 3 percent slopes	7.8	4.9%
73	Vona loamy sand, 3 to 5 percent slopes	0.2	0.1%
76	Vona sandy loam, 1 to 3 percent slopes	4.7	2.9%
Totals for Area of Interest		**160.6**	**100.0%**

Map Unit Descriptions

The map units delineated on the detailed soil maps in a soil survey represent the soils or miscellaneous areas in the survey area. The map unit descriptions, along with the maps, can be used to determine the composition and properties of a unit.

A map unit delineation on a soil map represents an area dominated by one or more major kinds of soil or miscellaneous areas. A map unit is identified and named according to the taxonomic classification of the dominant soils. Within a taxonomic class there are precisely defined limits for the properties of the soils. On the landscape, however, the soils are natural phenomena, and they have the characteristic variability of all natural phenomena. Thus, the range of some observed properties may extend beyond the limits defined for a taxonomic class. Areas of soils of a single taxonomic class rarely, if ever, can be mapped without including areas of other taxonomic classes. Consequently, every map unit is made up of the soils or miscellaneous areas for which it is named and some minor components that belong to taxonomic classes other than those of the major soils.

Most minor soils have properties similar to those of the dominant soil or soils in the map unit, and thus they do not affect use and management. These are called noncontrasting, or similar, components. They may or may not be mentioned in a particular map unit description. Other minor components, however, have properties and behavioral characteristics divergent enough to affect use or to require different management. These are called contrasting, or dissimilar, components. They

generally are in small areas and could not be mapped separately because of the scale used. Some small areas of strongly contrasting soils or miscellaneous areas are identified by a special symbol on the maps. If included in the database for a given area, the contrasting minor components are identified in the map unit descriptions along with some characteristics of each. A few areas of minor components may not have been observed, and consequently they are not mentioned in the descriptions, especially where the pattern was so complex that it was impractical to make enough observations to identify all the soils and miscellaneous areas on the landscape.

The presence of minor components in a map unit in no way diminishes the usefulness or accuracy of the data. The objective of mapping is not to delineate pure taxonomic classes but rather to separate the landscape into landforms or landform segments that have similar use and management requirements. The delineation of such segments on the map provides sufficient information for the development of resource plans. If intensive use of small areas is planned, however, onsite investigation is needed to define and locate the soils and miscellaneous areas.

An identifying symbol precedes the map unit name in the map unit descriptions. Each description includes general facts about the unit and gives important soil properties and qualities.

Soils that have profiles that are almost alike make up a *soil series*. Except for differences in texture of the surface layer, all the soils of a series have major horizons that are similar in composition, thickness, and arrangement.

Soils of one series can differ in texture of the surface layer, slope, stoniness, salinity, degree of erosion, and other characteristics that affect their use. On the basis of such differences, a soil series is divided into *soil phases*. Most of the areas shown on the detailed soil maps are phases of soil series. The name of a soil phase commonly indicates a feature that affects use or management. For example, Alpha silt loam, 0 to 2 percent slopes, is a phase of the Alpha series.

Some map units are made up of two or more major soils or miscellaneous areas. These map units are complexes, associations, or undifferentiated groups.

A *complex* consists of two or more soils or miscellaneous areas in such an intricate pattern or in such small areas that they cannot be shown separately on the maps. The pattern and proportion of the soils or miscellaneous areas are somewhat similar in all areas. Alpha-Beta complex, 0 to 6 percent slopes, is an example.

An *association* is made up of two or more geographically associated soils or miscellaneous areas that are shown as one unit on the maps. Because of present or anticipated uses of the map units in the survey area, it was not considered practical or necessary to map the soils or miscellaneous areas separately. The pattern and relative proportion of the soils or miscellaneous areas are somewhat similar. Alpha-Beta association, 0 to 2 percent slopes, is an example.

An *undifferentiated group* is made up of two or more soils or miscellaneous areas that could be mapped individually but are mapped as one unit because similar interpretations can be made for use and management. The pattern and proportion of the soils or miscellaneous areas in a mapped area are not uniform. An area can be made up of only one of the major soils or miscellaneous areas, or it can be made up of all of them. Alpha and Beta soils, 0 to 2 percent slopes, is an example.

Some surveys include *miscellaneous areas*. Such areas have little or no soil material and support little or no vegetation. Rock outcrop is an example.

Weld County, Colorado, Southern Part

35—Loup-Boel loamy sands, 0 to 3 percent slopes

Map Unit Setting

National map unit symbol: 362f
Elevation: 4,550 to 4,750 feet
Mean annual precipitation: 11 to 15 inches
Mean annual air temperature: 46 to 52 degrees F
Frost-free period: 130 to 180 days
Farmland classification: Not prime farmland

Map Unit Composition

Loup and similar soils: 55 percent
Boel and similar soils: 35 percent
Minor components: 10 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Loup

Setting

Landform: Swales, drainageways, streams
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Sandy alluvium

Typical profile

H1 - 0 to 16 inches: loamy sand
H2 - 16 to 40 inches: loamy sand
H3 - 40 to 60 inches: sandy loam

Properties and qualities

Slope: 0 to 3 percent
Depth to restrictive feature: More than 80 inches
Natural drainage class: Poorly drained
Runoff class: Very high
Capacity of the most limiting layer to transmit water (Ksat): High (2.00 to 6.00 in/hr)
Depth to water table: About 0 to 18 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum in profile: 5 percent
Available water storage in profile: Low (about 5.2 inches)

Interpretive groups

Land capability classification (irrigated): 4w
Land capability classification (nonirrigated): 6w
Hydrologic Soil Group: A/D
Ecological site: Sandy Meadow (R067BY029CO)
Hydric soil rating: Yes

Description of Boel

Setting

Landform: Drainageways, streams, swales
Down-slope shape: Linear

Across-slope shape: Linear
Parent material: Stratified sandy alluvium

Typical profile

H1 - 0 to 14 inches: loamy sand
H2 - 14 to 60 inches: loamy sand

Properties and qualities

Slope: 0 to 3 percent
Depth to restrictive feature: More than 80 inches
Natural drainage class: Somewhat poorly drained
Runoff class: Very low
Capacity of the most limiting layer to transmit water (Ksat): High to very high (5.95 to 19.98 in/hr)
Depth to water table: About 18 to 36 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum in profile: 5 percent
Available water storage in profile: Low (about 4.2 inches)

Interpretive groups

Land capability classification (irrigated): 4w
Land capability classification (nonirrigated): 6w
Hydrologic Soil Group: A
Ecological site: Sandy Meadow (R067BY029CO)
Hydric soil rating: No

Minor Components

Osgood

Percent of map unit: 5 percent
Hydric soil rating: No

Valent

Percent of map unit: 5 percent
Hydric soil rating: No

38—Nelson fine sandy loam, 3 to 9 percent slopes

Map Unit Setting

National map unit symbol: 362j
Elevation: 4,800 to 5,050 feet
Mean annual precipitation: 13 to 15 inches
Mean annual air temperature: 48 to 57 degrees F
Frost-free period: 145 to 190 days
Farmland classification: Farmland of local importance

Map Unit Composition

Nelson and similar soils: 85 percent
Minor components: 15 percent

Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Nelson

Setting

Landform: Plains
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Residuum weathered from sandstone

Typical profile

H1 - 0 to 9 inches: fine sandy loam
H2 - 9 to 30 inches: fine sandy loam
H3 - 30 to 34 inches: weathered bedrock

Properties and qualities

Slope: 3 to 9 percent
Depth to restrictive feature: 20 to 40 inches to paralithic bedrock
Natural drainage class: Well drained
Runoff class: Medium
Capacity of the most limiting layer to transmit water (Ksat): Moderately low to high (0.06 to 2.00 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum in profile: 10 percent
Salinity, maximum in profile: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water storage in profile: Low (about 3.7 inches)

Interpretive groups

Land capability classification (irrigated): 4e
Land capability classification (nonirrigated): 6e
Hydrologic Soil Group: B
Ecological site: Sandy Plains (R067BY024CO)
Hydric soil rating: No

Minor Components

Thedalund

Percent of map unit: 10 percent
Hydric soil rating: No

Terry

Percent of map unit: 5 percent
Hydric soil rating: No

47—Olney fine sandy loam, 1 to 3 percent slopes

Map Unit Setting

National map unit symbol: 362v
Elevation: 4,600 to 5,200 feet

Mean annual precipitation: 11 to 15 inches
Mean annual air temperature: 46 to 54 degrees F
Frost-free period: 125 to 175 days
Farmland classification: Prime farmland if irrigated and the product of I (soil erodibility) x C (climate factor) does not exceed 60

Map Unit Composition

Olney and similar soils: 85 percent
Minor components: 15 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Olney

Setting

Landform: Plains
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Mixed deposit outwash

Typical profile

H1 - 0 to 10 inches: fine sandy loam
H2 - 10 to 20 inches: sandy clay loam
H3 - 20 to 25 inches: sandy clay loam
H4 - 25 to 60 inches: fine sandy loam

Properties and qualities

Slope: 1 to 3 percent
Depth to restrictive feature: More than 80 inches
Natural drainage class: Well drained
Runoff class: Low
Capacity of the most limiting layer to transmit water (Ksat): Moderately high to high (0.57 to 2.00 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum in profile: 15 percent
Salinity, maximum in profile: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water storage in profile: Moderate (about 7.0 inches)

Interpretive groups

Land capability classification (irrigated): 3e
Land capability classification (nonirrigated): 4c
Hydrologic Soil Group: B
Ecological site: Sandy Plains (R067BY024CO)
Hydric soil rating: No

Minor Components

Zigweid

Percent of map unit: 10 percent
Hydric soil rating: No

Vona

Percent of map unit: 5 percent
Hydric soil rating: No

56—Renohill clay loam, 0 to 3 percent slopes

Map Unit Setting

National map unit symbol: 3635
Elevation: 4,850 to 5,200 feet
Mean annual precipitation: 11 to 16 inches
Mean annual air temperature: 46 to 48 degrees F
Frost-free period: 100 to 160 days
Farmland classification: Farmland of statewide importance

Map Unit Composition

Renohill and similar soils: 85 percent
Minor components: 15 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Renohill

Setting

Landform: Plains
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Residuum weathered from shale

Typical profile

H1 - 0 to 9 inches: clay loam
H2 - 9 to 32 inches: clay loam
H3 - 32 to 36 inches: unweathered bedrock

Properties and qualities

Slope: 0 to 3 percent
Depth to restrictive feature: 20 to 40 inches to paralithic bedrock
Natural drainage class: Well drained
Runoff class: Low
Capacity of the most limiting layer to transmit water (Ksat): Moderately low to moderately high (0.06 to 0.20 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum in profile: 5 percent
Available water storage in profile: Low (about 5.6 inches)

Interpretive groups

Land capability classification (irrigated): 3e
Land capability classification (nonirrigated): 4e
Hydrologic Soil Group: D
Ecological site: Clayey Plains (R067BY042CO)
Hydric soil rating: No

Minor Components

Ulm

Percent of map unit: 10 percent
Hydric soil rating: No

Shingle

Percent of map unit: 5 percent
Hydric soil rating: No

69—Valent sand, 0 to 3 percent slopes

Map Unit Setting

National map unit symbol: 2tczd
Elevation: 3,000 to 5,210 feet
Mean annual precipitation: 13 to 20 inches
Mean annual air temperature: 48 to 52 degrees F
Frost-free period: 130 to 166 days
Farmland classification: Farmland of local importance

Map Unit Composition

Valent and similar soils: 85 percent
Minor components: 15 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Valent

Setting

Landform: Interdunes
Landform position (two-dimensional): Footslope, toeslope
Landform position (three-dimensional): Base slope
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Noncalcareous eolian sands

Typical profile

A - 0 to 5 inches: sand
AC - 5 to 12 inches: sand
C1 - 12 to 30 inches: sand
C2 - 30 to 80 inches: sand

Properties and qualities

Slope: 0 to 3 percent
Depth to restrictive feature: More than 80 inches
Natural drainage class: Excessively drained
Runoff class: Negligible
Capacity of the most limiting layer to transmit water (Ksat): High to very high (6.00 to 39.96 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None

Frequency of ponding: None
Calcium carbonate, maximum in profile: 1 percent
Salinity, maximum in profile: Nonsaline (0.1 to 1.9 mmhos/cm)
Available water storage in profile: Very low (about 2.4 inches)

Interpretive groups

Land capability classification (irrigated): 4e
Land capability classification (nonirrigated): 6e
Hydrologic Soil Group: A
Ecological site: Deep Sand (R067BY015CO), Sands (North) (PE 16-20) (R072XA021KS)
Hydric soil rating: No

Minor Components

Julesburg

Percent of map unit: 5 percent
Landform: Interdunes
Landform position (two-dimensional): Toeslope
Landform position (three-dimensional): Base slope
Down-slope shape: Linear
Across-slope shape: Linear
Ecological site: Sandy Plains (R067BY024CO), Sandy (North) Draft (April 2010) (PE 16-20) (R072XA022KS)
Hydric soil rating: No

Vona

Percent of map unit: 5 percent
Landform: Interdunes
Landform position (two-dimensional): Toeslope
Landform position (three-dimensional): Base slope
Down-slope shape: Linear
Across-slope shape: Linear
Ecological site: Sandy Plains (R067BY024CO), Sandy (North) Draft (April 2010) (PE 16-20) (R072XA022KS)
Hydric soil rating: No

Dailey

Percent of map unit: 5 percent
Landform: Interdunes
Landform position (two-dimensional): Toeslope
Landform position (three-dimensional): Base slope
Down-slope shape: Linear
Across-slope shape: Concave
Ecological site: Deep Sand (R067BY015CO), Sandy (North) Draft (April 2010) (PE 16-20) (R072XA022KS)
Hydric soil rating: No

70—Valent sand, 3 to 9 percent slopes

Map Unit Setting

National map unit symbol: 2tczf
Elevation: 3,050 to 5,150 feet
Mean annual precipitation: 12 to 18 inches
Mean annual air temperature: 48 to 55 degrees F
Frost-free period: 130 to 180 days
Farmland classification: Not prime farmland

Map Unit Composition

Valent and similar soils: 80 percent
Minor components: 20 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Valent

Setting

Landform: Dunes, hills
Landform position (two-dimensional): Shoulder, backslope, summit, footslope
Landform position (three-dimensional): Crest, side slope, head slope, nose slope
Down-slope shape: Linear, convex
Across-slope shape: Linear, convex
Parent material: Noncalcareous eolian sands

Typical profile

A - 0 to 5 inches: sand
AC - 5 to 12 inches: sand
C1 - 12 to 30 inches: sand
C2 - 30 to 80 inches: sand

Properties and qualities

Slope: 3 to 9 percent
Depth to restrictive feature: More than 80 inches
Natural drainage class: Excessively drained
Runoff class: Very low
Capacity of the most limiting layer to transmit water (Ksat): High to very high (6.00 to 39.96 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum in profile: 1 percent
Salinity, maximum in profile: Nonsaline (0.0 to 1.9 mmhos/cm)
Available water storage in profile: Very low (about 2.4 inches)

Interpretive groups

Land capability classification (irrigated): 4e
Land capability classification (nonirrigated): 6e
Hydrologic Soil Group: A
Ecological site: Deep Sand (R067BY015CO), Rolling Sands (R072XY109KS)

Hydric soil rating: No

Minor Components

Dailey

Percent of map unit: 10 percent
Landform: Interdunes
Landform position (two-dimensional): Footslope, toeslope
Landform position (three-dimensional): Base slope
Down-slope shape: Linear
Across-slope shape: Concave
Ecological site: Deep Sand (R067BY015CO), Sands (North) (PE 16-20) (R072XA021KS)
Hydric soil rating: No

Vona

Percent of map unit: 5 percent
Landform: Hills
Landform position (two-dimensional): Footslope, backslope, shoulder
Landform position (three-dimensional): Side slope, head slope, nose slope, base slope
Down-slope shape: Linear
Across-slope shape: Linear
Ecological site: Sandy Plains (R067BY024CO), Sandy (North) Draft (April 2010) (PE 16-20) (R072XA022KS)
Hydric soil rating: No

Haxtun

Percent of map unit: 5 percent
Landform: Interdunes
Landform position (two-dimensional): Footslope, toeslope
Landform position (three-dimensional): Base slope
Down-slope shape: Linear
Across-slope shape: Concave
Ecological site: Sandy Plains (R067BY024CO), Sandy Plains (R072XY111KS)
Hydric soil rating: No

72—Vona loamy sand, 0 to 3 percent slopes

Map Unit Setting

National map unit symbol: 363r
Elevation: 4,600 to 5,200 feet
Mean annual precipitation: 13 to 15 inches
Mean annual air temperature: 48 to 55 degrees F
Frost-free period: 130 to 160 days
Farmland classification: Farmland of local importance

Map Unit Composition

Vona and similar soils: 85 percent
Minor components: 15 percent

Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Vona

Setting

Landform: Terraces, plains
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Alluvium and/or eolian deposits

Typical profile

H1 - 0 to 6 inches: loamy sand
H2 - 6 to 28 inches: fine sandy loam
H3 - 28 to 60 inches: sandy loam

Properties and qualities

Slope: 0 to 3 percent
Depth to restrictive feature: More than 80 inches
Natural drainage class: Well drained
Runoff class: Very low
Capacity of the most limiting layer to transmit water (Ksat): High (1.98 to 6.00 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum in profile: 15 percent
Salinity, maximum in profile: Nonsaline to slightly saline (0.0 to 4.0 mmhos/cm)
Available water storage in profile: Moderate (about 6.5 inches)

Interpretive groups

Land capability classification (irrigated): 3e
Land capability classification (nonirrigated): 4e
Hydrologic Soil Group: A
Ecological site: Sandy Plains (R067BY024CO)
Hydric soil rating: No

Minor Components

Remmit

Percent of map unit: 10 percent
Hydric soil rating: No

Valent

Percent of map unit: 5 percent
Hydric soil rating: No

73—Vona loamy sand, 3 to 5 percent slopes

Map Unit Setting

National map unit symbol: 2x0j8
Elevation: 4,100 to 5,200 feet
Mean annual precipitation: 12 to 17 inches

Mean annual air temperature: 46 to 52 degrees F
Frost-free period: 130 to 155 days
Farmland classification: Not prime farmland

Map Unit Composition

Vona and similar soils: 85 percent
Minor components: 15 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Vona

Setting

Landform: Hills, hillslopes
Landform position (two-dimensional): Backslope
Landform position (three-dimensional): Side slope
Down-slope shape: Linear, convex
Across-slope shape: Linear, convex
Parent material: Eolian sands

Typical profile

A - 0 to 7 inches: loamy sand
Bt1 - 7 to 14 inches: sandy loam
Bt2 - 14 to 20 inches: sandy loam
Bk - 20 to 45 inches: sandy loam
C - 45 to 80 inches: loamy sand

Properties and qualities

Slope: 3 to 5 percent
Depth to restrictive feature: More than 80 inches
Natural drainage class: Well drained
Runoff class: Very low
Capacity of the most limiting layer to transmit water (Ksat): High (2.00 to 6.00 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum in profile: 10 percent
Salinity, maximum in profile: Nonsaline (0.1 to 1.0 mmhos/cm)
Available water storage in profile: Moderate (about 6.4 inches)

Interpretive groups

Land capability classification (irrigated): 3e
Land capability classification (nonirrigated): 4s
Hydrologic Soil Group: A
Ecological site: Deep Sand (R067BY015CO)
Hydric soil rating: No

Minor Components

Ascalon

Percent of map unit: 5 percent
Landform: Interfluves
Landform position (three-dimensional): Interfluve
Down-slope shape: Linear
Across-slope shape: Linear
Ecological site: Sandy Plains (R067BY024CO)
Hydric soil rating: No

Manter

Percent of map unit: 5 percent
Landform: Hills, interfluves
Landform position (two-dimensional): Backslope
Landform position (three-dimensional): Side slope, interfluve
Down-slope shape: Convex, linear
Across-slope shape: Convex, linear
Ecological site: Sandy Plains (R067BY024CO)
Hydric soil rating: No

Olnest

Percent of map unit: 3 percent
Landform: Interfluves, hills
Landform position (two-dimensional): Footslope, toeslope
Landform position (three-dimensional): Interfluve, base slope
Down-slope shape: Linear, concave
Across-slope shape: Linear, concave
Ecological site: Sandy Plains (R067BY024CO)
Hydric soil rating: No

Valent

Percent of map unit: 2 percent
Landform: Dunes
Landform position (two-dimensional): Summit, shoulder, backslope
Landform position (three-dimensional): Crest, side slope, nose slope
Down-slope shape: Linear, convex
Across-slope shape: Linear, convex
Ecological site: Deep Sand (R067BY015CO)
Hydric soil rating: No

76—Vona sandy loam, 1 to 3 percent slopes

Map Unit Setting

National map unit symbol: 363w
Elevation: 4,600 to 5,200 feet
Mean annual precipitation: 13 to 15 inches
Mean annual air temperature: 48 to 55 degrees F
Frost-free period: 130 to 160 days
Farmland classification: Farmland of statewide importance

Map Unit Composition

Vona and similar soils: 85 percent
Minor components: 15 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Vona

Setting

Landform: Terraces, plains
Down-slope shape: Linear

Across-slope shape: Linear
Parent material: Alluvium and/or eolian deposits

Typical profile

H1 - 0 to 6 inches: sandy loam
H2 - 6 to 28 inches: fine sandy loam
H3 - 28 to 60 inches: sandy loam

Properties and qualities

Slope: 1 to 3 percent
Depth to restrictive feature: More than 80 inches
Natural drainage class: Well drained
Runoff class: Very low
Capacity of the most limiting layer to transmit water (Ksat): High (1.98 to 6.00 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum in profile: 15 percent
Salinity, maximum in profile: Nonsaline to slightly saline (0.0 to 4.0 mmhos/cm)
Available water storage in profile: Moderate (about 6.8 inches)

Interpretive groups

Land capability classification (irrigated): 3e
Land capability classification (nonirrigated): 4e
Hydrologic Soil Group: A
Ecological site: Sandy Plains (R067BY024CO)
Hydric soil rating: No

Minor Components

Remmit

Percent of map unit: 9 percent
Hydric soil rating: No

Olney

Percent of map unit: 3 percent
Hydric soil rating: No

Julesburg

Percent of map unit: 3 percent
Hydric soil rating: No

References

American Association of State Highway and Transportation Officials (AASHTO). 2004. Standard specifications for transportation materials and methods of sampling and testing. 24th edition.

American Society for Testing and Materials (ASTM). 2005. Standard classification of soils for engineering purposes. ASTM Standard D2487-00.

Cowardin, L.M., V. Carter, F.C. Golet, and E.T. LaRoe. 1979. Classification of wetlands and deep-water habitats of the United States. U.S. Fish and Wildlife Service FWS/OBS-79/31.

Federal Register. July 13, 1994. Changes in hydric soils of the United States.

Federal Register. September 18, 2002. Hydric soils of the United States.

Hurt, G.W., and L.M. Vasilas, editors. Version 6.0, 2006. Field indicators of hydric soils in the United States.

National Research Council. 1995. Wetlands: Characteristics and boundaries.

Soil Survey Division Staff. 1993. Soil survey manual. Soil Conservation Service. U.S. Department of Agriculture Handbook 18. http://www.nrcs.usda.gov/wps/portal/nrcs/detail/national/soils/?cid=nrcs142p2_054262

Soil Survey Staff. 1999. Soil taxonomy: A basic system of soil classification for making and interpreting soil surveys. 2nd edition. Natural Resources Conservation Service, U.S. Department of Agriculture Handbook 436. http://www.nrcs.usda.gov/wps/portal/nrcs/detail/national/soils/?cid=nrcs142p2_053577

Soil Survey Staff. 2010. Keys to soil taxonomy. 11th edition. U.S. Department of Agriculture, Natural Resources Conservation Service. http://www.nrcs.usda.gov/wps/portal/nrcs/detail/national/soils/?cid=nrcs142p2_053580

Tiner, R.W., Jr. 1985. Wetlands of Delaware. U.S. Fish and Wildlife Service and Delaware Department of Natural Resources and Environmental Control, Wetlands Section.

United States Army Corps of Engineers, Environmental Laboratory. 1987. Corps of Engineers wetlands delineation manual. Waterways Experiment Station Technical Report Y-87-1.

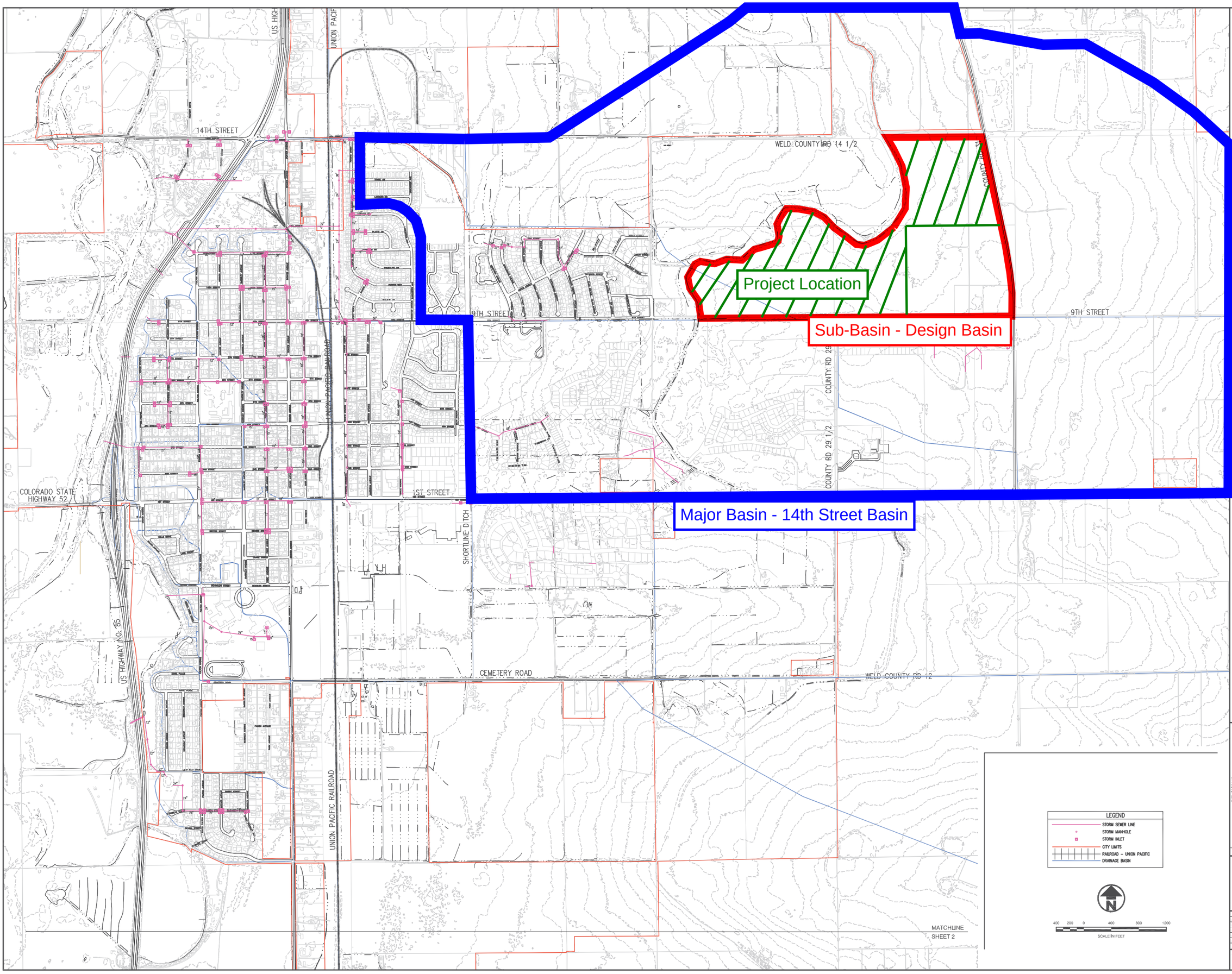
United States Department of Agriculture, Natural Resources Conservation Service. National forestry manual. http://www.nrcs.usda.gov/wps/portal/nrcs/detail/soils/home/?cid=nrcs142p2_053374

United States Department of Agriculture, Natural Resources Conservation Service. National range and pasture handbook. http://www.nrcs.usda.gov/wps/portal/nrcs/detail/national/landuse/rangepasture/?cid=stelprdb1043084

United States Department of Agriculture, Natural Resources Conservation Service. National soil survey handbook, title 430-VI. http://www.nrcs.usda.gov/wps/portal/nrcs/detail/soils/scientists/?cid=nrcs142p2_054242

United States Department of Agriculture, Natural Resources Conservation Service. 2006. Land resource regions and major land resource areas of the United States, the Caribbean, and the Pacific Basin. U.S. Department of Agriculture Handbook 296. http://www.nrcs.usda.gov/wps/portal/nrcs/detail/national/soils/?cid=nrcs142p2_053624

United States Department of Agriculture, Soil Conservation Service. 1961. Land capability classification. U.S. Department of Agriculture Handbook 210. http://www.nrcs.usda.gov/Internet/FSE_DOCUMENTS/nrcs142p2_052290.pdf



J&T Consulting, Inc.
305 Denver Avenue • Suite D
Fort Lupton, CO 80621
Ph: 720-407-0250 Fax: 720-407-0234
www.J4consulting.com

South Utility Extensions

Storm Sewer System Map

City of Ft. Lupton

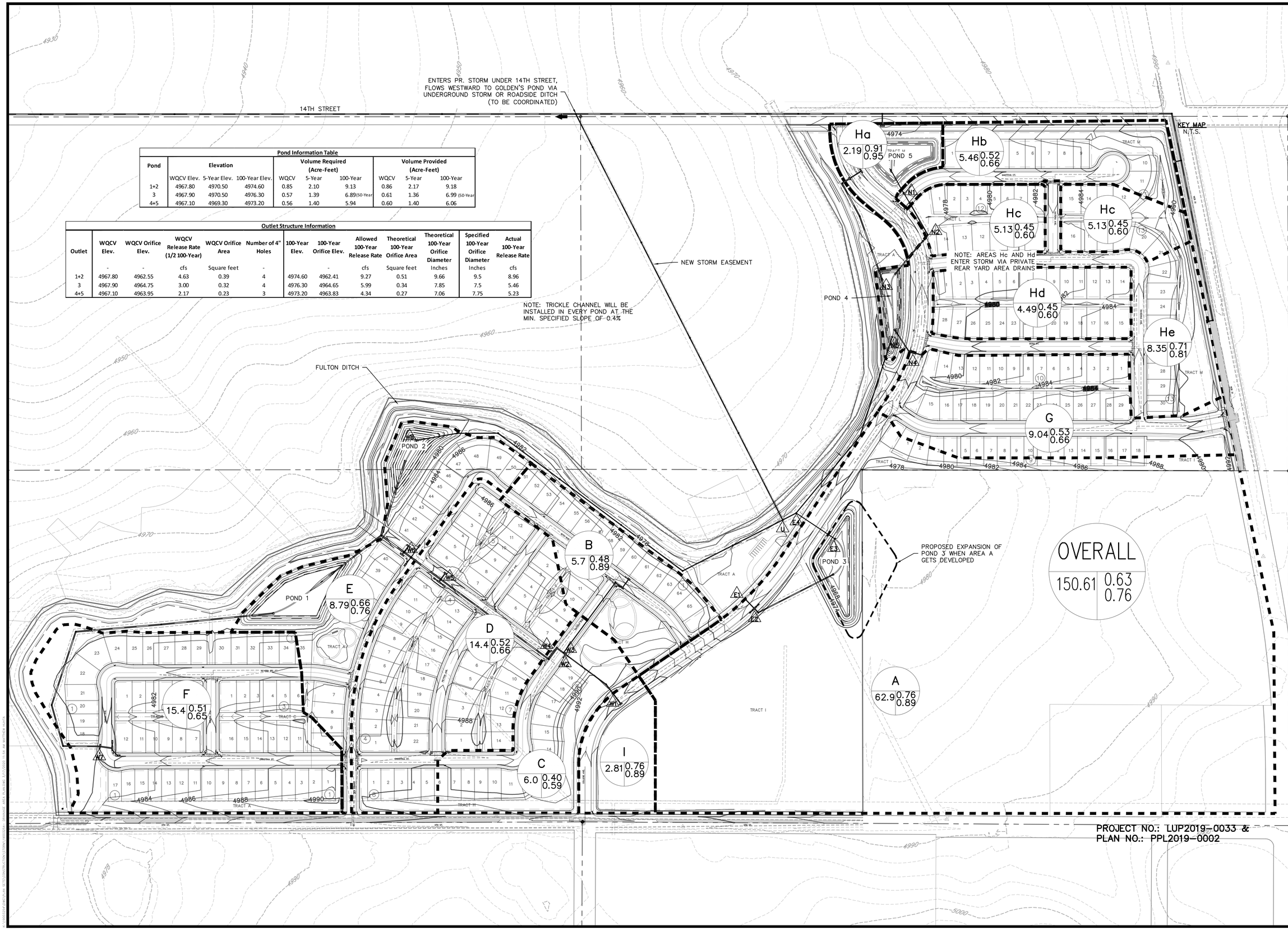
REVISIONS

No.	Date	By	Chk	Description

Job #	10108
Date	6/14/10
Drawn By:	TPY/WSS
Designed By:	TPY
Checked By:	JCY
File:	JT-storm
Scale	1" = 400'

Sheet: 1 Of: 2

APPENDIX B – Proposed Plans



Pond Information Table

Pond	Elevation			Volume Required (Acre-Feet)			Volume Provided (Acre-Feet)		
	WQCV Elev.	5-Year Elev.	100-Year Elev.	WQCV	5-Year	100-Year	WQCV	5-Year	100-Year
1+2	4967.80	4970.50	4974.60	0.85	2.10	9.13	0.86	2.17	9.18
3	4967.90	4970.50	4976.30	0.57	1.39	6.89 (50-Year	0.61	1.36	6.99 (50-Year
4+5	4967.10	4969.30	4973.20	0.56	1.40	5.94	0.60	1.40	6.06

Outlet Structure Information

Outlet	WQCV Elev.	WQCV Orifice Elev.	WQCV Release Rate (1/2 100-Year)	WQCV Orifice Area	Number of 4" Holes	100-Year Elev.	100-Year Orifice Elev.	Allowed 100-Year Release Rate	Theoretical 100-Year Orifice Area	Theoretical 100-Year Orifice Diameter	Specified 100-Year Orifice Diameter	Actual 100-Year Release Rate
	-	-	cfs	Square feet	-		-	cfs	Square feet	Inches	Inches	cfs
1+2	4967.80	4962.55	4.63	0.39	4	4974.60	4962.41	9.27	0.51	9.66	9.5	8.96
3	4967.90	4964.75	3.00	0.32	4	4976.30	4964.65	5.99	0.34	7.85	7.5	5.46
4+5	4967.10	4963.95	2.17	0.23	3	4973.20	4963.83	4.34	0.27	7.06	7.75	5.23

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
DRAINAGE AREA PLAN

DATE 03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 1 OF 1

CAD FILE: 19003254- DRAINAGE AREA PLAN.DWG

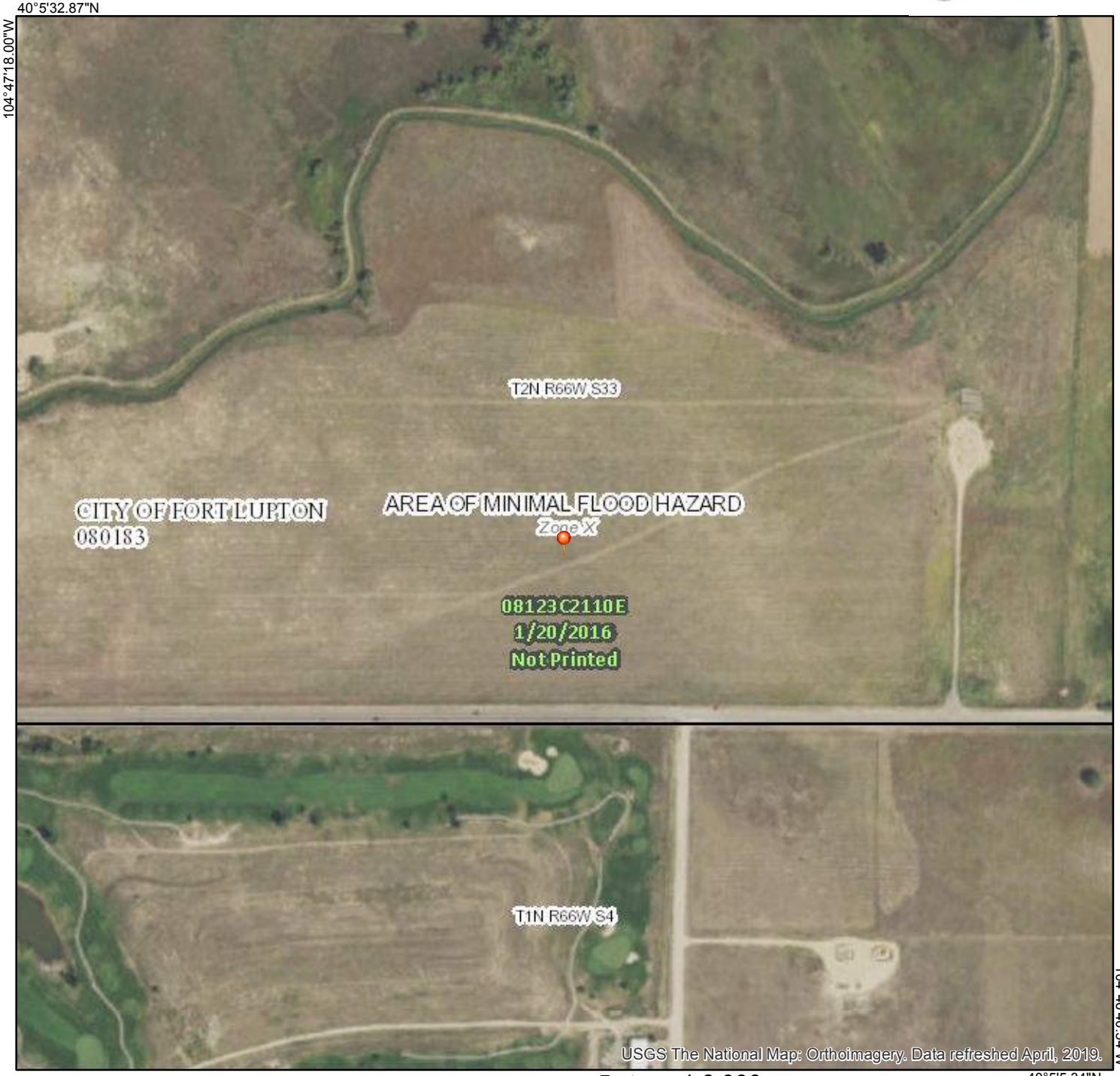
APPENDIX C – Referenced Information

National Flood Hazard Layer FIRMette

FEMA

40°5'32.87"N

104°47'18.00"W



104°46'40.54"W

40°5'5.34"N

Feet 1:6,000

0 250 500 1,000 1,500 2,000

Legend

SEE FIS REPORT FOR DETAILED LEGEND AND INDEX MAP FOR FIRM PANEL LAYOUT

SPECIAL FLOOD HAZARD AREAS
- Without Base Flood Elevation (BFE) *Zone A, V, A99*
- With BFE or Depth *Zone AE, AO, AH, VE, AR*
- Regulatory Floodway

OTHER AREAS OF FLOOD HAZARD
- 0.2% Annual Chance Flood Hazard, Areas of 1% annual chance flood with average depth less than one foot or with drainage areas of less than one square mile *Zone X*
- Future Conditions 1% Annual Chance Flood Hazard *Zone X*
- Area with Reduced Flood Risk due to Levee. See Notes. *Zone X*
- Area with Flood Risk due to Levee *Zone D*

OTHER AREAS
- NO SCREEN Area of Minimal Flood Hazard *Zone X*
- Effective LOMRs
- Area of Undetermined Flood Hazard *Zone D*

GENERAL STRUCTURES
- Channel, Culvert, or Storm Sewer
- Levee, Dike, or Floodwall

OTHER FEATURES
- B 20.2 17.5 Cross Sections with 1% Annual Chance Water Surface Elevation
- 8 Coastal Transect
- 513 Base Flood Elevation Line (BFE)
- Limit of Study
- Jurisdiction Boundary
- Coastal Transect Baseline
- Profile Baseline
- Hydrographic Feature

MAP PANELS
- Digital Data Available
- No Digital Data Available
- Unmapped

N

The pin displayed on the map is an approximate point selected by the user and does not represent an authoritative property location.

This map complies with FEMA's standards for the use of digital flood maps if it is not void as described below. The basemap shown complies with FEMA's basemap accuracy standards

The flood hazard information is derived directly from the authoritative NFHL web services provided by FEMA. This map was exported on 9/24/2019 at 2:38:40 PM and does not reflect changes or amendments subsequent to this date and time. The NFHL and effective information may change or become superseded by new data over time.

This map image is void if the one or more of the following map elements do not appear: basemap imagery, flood zone labels, legend, scale bar, map creation date, community identifiers, FIRM panel number, and FIRM effective date. Map images for unmapped and unmodernized areas cannot be used for regulatory purposes.

APPENDIX D – Drainage Calculations

DETENTION VOLUME BY THE MODIFIED FAA METHOD
(See USDCM Volume 2 Storage Chapter for description of method)

Project: Cottonwood Greens

Basin ID: Ponds 1 & 2

(For catchments less than 160 acres only. For larger catchments, use hydrograph routing method)
(NOTE: for catchments larger than 90 acres, CUHP hydrograph and routing are recommended)

Determination of MINOR Detention Volume Using Modified FAA Method

Design Information (Input):

Catchment Drainage Imperviousness	I_a =	46.93	percent
Catchment Drainage Area	A =	53.100	acres
Predevelopment NRCS Soil Group	Type =	C	A, B, C, or D
Return Period for Detention Control	T =	5	years (2, 5, 10, 25, 50, or 100)
Time of Concentration of Watershed	Tc =	20	minutes
Allowable Unit Release Rate	q =	0.17	cfs/acre
One-hour Precipitation	P_1 =	1.45	inches
Design Rainfall IDF Formula	$i = C_1 * P_1/(C_2+T_c)^{\wedge}C_3$		
Coefficient One	C_1 =	28.50	
Coefficient Two	C_2 =	10	
Coefficient Three	C_3 =	0.789	

Determination of Average Outflow from the Basin (Calculated):

Runoff Coefficient	C =	0.38	
Inflow Peak Runoff	Qp-in =	57.38	cfs
Allowable Peak Outflow Rate	Qp-out =	**9.03**	cfs
Mod. FAA Minor Storage Volume =		91,244	**cubic feet**
Mod. FAA Minor Storage Volume =		**2.095**	**acre-ft**

15 <- Enter Rainfall Duration Incremental Increase Value Here (e.g. 5 for 5-Minutes)

Rainfall Duration minutes (input)	Rainfall Intensity inches / hr (output)	Inflow Volume cubic feet (output)	Adjustment Factor "m" (output)	Average Outflow cfs (output)	Outflow Volume cubic feet (output)	Storage Volume cubic feet (output)
10	3.89	47,068	1.00	9.03	5,416	41,652
25	2.50	75,668	0.89	8.08	12,113	63,555
40	1.89	91,372	0.75	6.74	16,175	75,197
55	1.53	102,145	0.68	6.13	20,238	81,907
70	1.30	110,358	0.64	5.79	24,300	86,058
85	1.14	117,014	0.62	5.56	28,362	88,652
100	1.01	122,626	0.60	5.40	32,424	90,202
115	0.92	127,491	0.59	5.29	36,486	91,004
130	0.84	131,792	0.58	5.20	40,548	91,244
145	0.77	135,656	0.57	5.13	44,611	91,045
160	0.72	139,168	0.56	5.07	48,673	90,495
175	0.67	142,391	0.56	5.02	52,735	89,656
190	0.63	145,373	0.55	4.98	56,797	88,576
205	0.60	148,150	0.55	4.95	60,859	87,291
220	0.57	150,752	0.54	4.92	64,921	85,830
235	0.54	153,200	0.54	4.89	68,983	84,216
250	0.51	155,514	0.54	4.87	73,046	82,468
265	0.49	157,708	0.54	4.85	77,108	80,601
280	0.47	159,797	0.54	4.83	81,170	78,627
295	0.45	161,790	0.53	4.82	85,232	76,558
310	0.44	163,697	0.53	4.80	89,294	74,403
325	0.42	165,526	0.53	4.79	93,356	72,169
340	0.41	167,283	0.53	4.78	97,418	69,864
355	0.39	168,975	0.53	4.76	101,481	67,494
370	0.38	170,606	0.53	4.75	105,543	65,063
385	0.37	172,182	0.53	4.74	109,605	62,577
400	0.36	173,706	0.52	4.74	113,667	60,039
415	0.35	175,183	0.52	4.73	117,729	57,454
430	0.34	176,615	0.52	4.72	121,791	54,823
445	0.33	178,005	0.52	4.71	125,854	52,151
460	0.32	179,356	0.52	4.71	129,916	49,440
475	0.31	180,670	0.52	4.70	133,978	46,692
490	0.31	181,950	0.52	4.70	138,040	43,910
505	0.30	183,197	0.52	4.69	142,102	41,095
520	0.29	184,413	0.52	4.68	146,164	38,249
535	0.29	185,601	0.52	4.68	150,226	35,374
550	0.28	186,760	0.52	4.68	154,289	32,472
565	0.27	187,894	0.52	4.67	158,351	29,543
580	0.27	189,003	0.52	4.67	162,413	26,590
595	0.26	190,088	0.52	4.66	166,475	23,613
610	0.26	191,150	0.52	4.66	170,537	20,613
625	0.25	192,191	0.52	4.66	174,599	17,592
640	0.25	193,212	0.52	4.65	178,661	14,550
655	0.24	194,213	0.52	4.65	182,724	11,489
670	0.24	195,194	0.51	4.65	186,786	8,409
685	0.24	196,158	0.51	4.64	190,848	5,310
700	0.23	197,105	0.51	4.64	194,910	2,195
715	0.23	198,035	0.51	4.64	198,972	-937
730	0.23	198,949	0.51	4.64	203,034	-4,086
745	0.22	199,847	0.51	4.63	207,097	-7,249
760	0.22	200,731	0.51	4.63	211,159	-10,428
775	0.21	201,601	0.51	4.63	215,221	-13,620
790	0.21	202,456	0.51	4.63	219,283	-16,827
805	0.21	203,299	0.51	4.62	223,345	-20,046
820	0.21	204,128	0.51	4.62	227,407	-23,279
835	0.20	204,946	0.51	4.62	231,469	-26,524
850	0.20	205,751	0.51	4.62	235,532	-29,781
865	0.20	206,545	0.51	4.62	239,594	-33,049
880	0.19	207,327	0.51	4.61	243,656	-36,329
895	0.19	208,099	0.51	4.61	247,718	-39,619
910	0.19	208,860	0.51	4.61	251,780	-42,920

Mod. FAA Minor Storage Volume (cubic ft.) = 91,244
Mod. FAA Minor Storage Volume (acre-ft.) = 2.0947

Determination of MAJOR Detention Volume Using Modified FAA Method

Design Information (Input):

Catchment Drainage Imperviousness	I_a =	46.93	percent
Catchment Drainage Area	A =	53.100	acres
Predevelopment NRCS Soil Group	Type =	C	A, B, C, or D
Return Period for Detention Control	T =	100	years (2, 5, 10, 25, 50, or 100)
Time of Concentration of Watershed	Tc =	20	minutes
Allowable Unit Release Rate	q =	0.17	cfs/acre
One-hour Precipitation	P_1 =	2.70	inches
Design Rainfall IDF Formula	$i = C_1 * P_1/(C_2+T_c)^{\wedge}C_3$		
Coefficient One	C_1 =	28.50	
Coefficient Two	C_2 =	10	
Coefficient Three	C_3 =	0.789	

Determination of Average Outflow from the Basin (Calculated):

Runoff Coefficient	C =	0.60	
Inflow Peak Runoff	Qp-in =	168.70	cfs
Allowable Peak Outflow Rate	Qp-out =	**9.03**	cfs
Mod. FAA Major Storage Volume =		397,499	**cubic feet**
Mod. FAA Major Storage Volume =		**9.125**	**acre-ft**

Rainfall Duration minutes (input)	Rainfall Intensity inches / hr (output)	Inflow Volume cubic feet (output)	Adjustment Factor "m" (output)	Average Outflow cfs (output)	Outflow Volume cubic feet (output)	Storage Volume cubic feet (output)
10	7.24	138,386	1.00	9.03	5,416	132,970
25	4.66	222,472	0.89	8.08	12,113	210,359
40	3.51	268,645	0.75	6.74	16,175	252,469
55	2.86	300,317	0.68	6.13	20,238	280,079
70	2.42	324,463	0.64	5.79	24,300	300,164
85	2.12	344,033	0.62	5.56	28,362	315,672
100	1.89	360,534	0.60	5.40	32,424	328,110
115	1.71	374,836	0.59	5.29	36,486	338,350
130	1.56	387,484	0.58	5.20	40,548	346,936
145	1.44	398,843	0.57	5.13	44,611	354,232
160	1.34	409,168	0.56	5.07	48,673	360,495
175	1.25	418,644	0.56	5.02	52,735	365,909
190	1.18	427,412	0.55	4.98	56,797	370,615
205	1.11	435,578	0.55	4.95	60,859	374,718
220	1.05	443,226	0.54	4.92	64,921	378,305
235	1.00	450,424	0.54	4.89	68,983	381,441
250	0.96	457,227	0.54	4.87	73,046	384,181
265	0.92	463,680	0.54	4.85	77,108	386,572
280	0.88	469,820	0.54	4.83	81,170	388,650
295	0.84	475,680	0.53	4.82	85,232	390,448
310	0.81	481,287	0.53	4.80	89,294	391,993
325	0.78	486,663	0.53	4.79	93,356	393,307
340	0.76	491,830	0.53	4.78	97,418	394,411
355	0.73	496,804	0.53	4.76	101,481	395,323
370	0.71	501,601	0.53	4.75	105,543	396,058
385	0.69	506,234	0.53	4.74	109,605	396,629
400	0.67	510,716	0.52	4.74	113,667	397,049
415	0.65	515,057	0.52	4.73	117,729	397,327
430	0.63	519,266	0.52	4.72	121,791	397,475
445	0.62	523,353	0.52	4.71	125,854	397,499
460	0.60	527,325	0.52	4.71	129,916	397,409
475	0.59	531,189	0.52	4.70	133,978	397,211
490	0.57	534,951	0.52	4.70	138,040	396,911
505	0.56	538,618	0.52	4.69	142,102	396,516
520	0.55	542,195	0.52	4.68	146,164	396,030
535	0.53	545,686	0.52	4.68	150,226	395,459
550	0.52	549,096	0.52	4.68	154,289	394,807
565	0.51	552,429	0.52	4.67	158,351	394,078
580	0.50	555,688	0.52	4.67	162,413	393,276
595	0.49	558,879	0.52	4.66	166,475	392,404
610	0.48	562,003	0.52	4.66	170,537	391,466
625	0.47	565,063	0.52	4.66	174,599	390,464
640	0.46	568,064	0.52	4.65	178,661	389,402
655	0.46	571,006	0.52	4.65	182,724	388,282
670	0.45	573,893	0.51	4.65	186,786	387,107
685	0.44	576,727	0.51	4.64	190,848	385,879
700	0.43	579,510	0.51	4.64	194,910	384,600
715	0.43	582,244	0.51	4.64	198,972	383,272
730	0.42	584,931	0.51	4.64	203,034	381,897
745	0.41	587,573	0.51	4.63	207,097	380,476
760	0.41	590,171	0.51	4.63	211,159	379,013
775	0.40	592,728	0.51	4.63	215,221	377,507
790	0.39	595,244	0.51	4.63	219,283	375,961
805	0.39	597,721	0.51	4.62	223,345	374,375
820	0.38	600,160	0.51	4.62	227,407	372,752
835	0.38	602,563	0.51	4.62	231,469	371,093
850	0.37	604,930	0.51	4.62	235,532	369,399
865	0.37	607,264	0.51	4.62	239,594	367,670
880	0.36	609,564	0.51	4.61	243,656	365,909
895	0.36	611,833	0.51	4.61	247,718	364,115
910	0.35	614,071	0.51	4.61	251,780	362,291

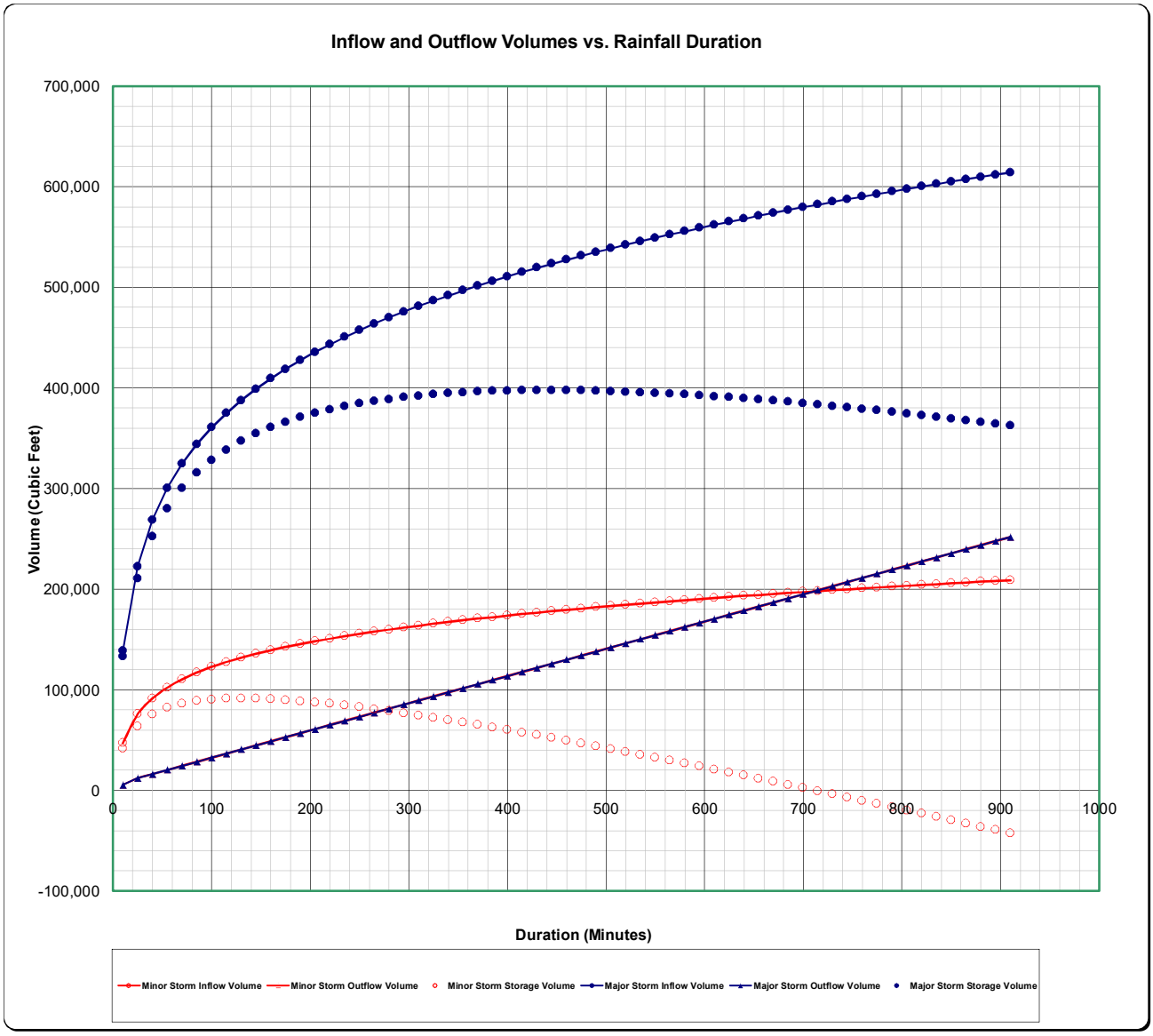
Mod. FAA Major Storage Volume (cubic ft.) = 397,499
Mod. FAA Major Storage Volume (acre-ft.) = 9.1253

UDFCD DETENTION BASIN VOLUME ESTIMATING WORKBOOK Version 2.3, Released March 2012

DETENTION VOLUME BY THE MODIFIED FAA METHOD
(See USDCM Volume 2 Storage Chapter for description of method)

Project: Cottonwood Greens

Basin ID: Ponds 1 & 2



DETENTION VOLUME BY THE MODIFIED FAA METHOD
(See USDCM Volume 2 Storage Chapter for description of method)

Project: Cottonwood Greens

Basin ID: Pond 3

(For catchments less than 160 acres only. For larger catchments, use hydrograph routing method)
(NOTE: for catchments larger than 90 acres, CUHP hydrograph and routing are recommended)

Determination of MINOR Detention Volume Using Modified FAA Method

Design Information (Input):

Catchment Drainage Imperviousness	I_a =	19.65	percent
Catchment Drainage Area	A =	62.910	acres
Predevelopment NRCS Soil Group	Type =	C	A, B, C, or D
Return Period for Detention Control	T =	5	years (2, 5, 10, 25, 50, or 100)
Time of Concentration of Watershed	Tc =	22	minutes
Allowable Unit Release Rate	q =	0.17	cfs/acre
One-hour Precipitation	P_1 =	1.45	inches
Design Rainfall IDF Formula $i = C_1 * P_1/(C_2+T_c)^{\wedge}C_3$			
Coefficient One	C_1 =	28.50	
Coefficient Two	C_2 =	10	
Coefficient Three	C_3 =	0.789	

Determination of Average Outflow from the Basin (Calculated):

Runoff Coefficient	C =	0.26	
Inflow Peak Runoff	Qp-in =	43.89	cfs
Allowable Peak Outflow Rate	Qp-out =	**10.69**	cfs
Mod. FAA Minor Storage Volume =		60,523	**cubic feet**
Mod. FAA Minor Storage Volume =		**1.389**	**acre-ft**

15 <- Enter Rainfall Duration Incremental Increase Value Here (e.g. 5 for 5-Minutes)

Rainfall Duration minutes (input)	Rainfall Intensity inches / hr (output)	Inflow Volume cubic feet (output)	Adjustment Factor "m" (output)	Average Outflow cfs (output)	Outflow Volume cubic feet (output)	Storage Volume cubic feet (output)
10	3.89	38,154	1.00	10.69	6,417	31,738
25	2.50	61,338	0.94	10.05	15,080	46,258
40	1.89	74,068	0.78	8.29	19,892	54,176
55	1.53	82,800	0.70	7.49	24,705	58,095
70	1.30	89,458	0.66	7.03	29,517	59,940
85	1.14	94,853	0.63	6.73	34,330	60,523
100	1.01	99,403	0.61	6.52	39,143	60,260
115	0.92	103,346	0.60	6.37	43,955	59,391
130	0.84	106,833	0.58	6.25	48,768	58,065
145	0.77	109,965	0.58	6.16	53,580	56,384
160	0.72	112,811	0.57	6.08	58,393	54,418
175	0.67	115,424	0.56	6.02	63,206	52,218
190	0.63	117,841	0.56	5.97	68,018	49,823
205	0.60	120,093	0.55	5.92	72,831	47,262
220	0.57	122,202	0.55	5.88	77,644	44,558
235	0.54	124,186	0.55	5.85	82,456	41,730
250	0.51	126,062	0.54	5.82	87,269	38,793
265	0.49	127,841	0.54	5.79	92,081	35,759
280	0.47	129,534	0.54	5.77	96,894	32,640
295	0.45	131,149	0.54	5.75	101,707	29,443
310	0.44	132,695	0.54	5.73	106,519	26,176
325	0.42	134,178	0.53	5.71	111,332	22,846
340	0.41	135,602	0.53	5.69	116,144	19,458
355	0.39	136,973	0.53	5.68	120,957	16,016
370	0.38	138,296	0.53	5.67	125,770	12,526
385	0.37	139,573	0.53	5.65	130,582	8,991
400	0.36	140,809	0.53	5.64	135,395	5,414
415	0.35	142,006	0.53	5.63	140,208	1,798
430	0.34	143,167	0.53	5.62	145,020	-1,854
445	0.33	144,293	0.52	5.61	149,833	-5,539
460	0.32	145,388	0.52	5.60	154,645	-9,257
475	0.31	146,454	0.52	5.60	159,458	-13,004
490	0.31	147,491	0.52	5.59	164,271	-16,779
505	0.30	148,502	0.52	5.58	169,083	-20,581
520	0.29	149,488	0.52	5.57	173,896	-24,408
535	0.29	150,451	0.52	5.57	178,708	-28,258
550	0.28	151,391	0.52	5.56	183,521	-32,130
565	0.27	152,310	0.52	5.56	188,334	-36,024
580	0.27	153,209	0.52	5.55	193,146	-39,938
595	0.26	154,088	0.52	5.55	197,959	-43,871
610	0.26	154,949	0.52	5.54	202,772	-47,822
625	0.25	155,793	0.52	5.54	207,584	-51,791
640	0.25	156,620	0.52	5.53	212,397	-55,776
655	0.24	157,432	0.52	5.53	217,209	-59,778
670	0.24	158,228	0.52	5.52	222,022	-63,794
685	0.24	159,009	0.52	5.52	226,835	-67,826
700	0.23	159,776	0.52	5.52	231,647	-71,871
715	0.23	160,530	0.52	5.51	236,460	-75,930
730	0.23	161,271	0.52	5.51	241,272	-80,001
745	0.22	161,999	0.51	5.51	246,085	-84,086
760	0.22	162,716	0.51	5.50	250,898	-88,182
775	0.21	163,421	0.51	5.50	255,710	-92,290
790	0.21	164,114	0.51	5.50	260,523	-96,409
805	0.21	164,797	0.51	5.49	265,336	-100,538
820	0.21	165,470	0.51	5.49	270,148	-104,678
835	0.20	166,132	0.51	5.49	274,961	-108,829
850	0.20	166,785	0.51	5.49	279,773	-112,988
865	0.20	167,428	0.51	5.48	284,586	-117,158
880	0.19	168,063	0.51	5.48	289,399	-121,336
895	0.19	168,688	0.51	5.48	294,211	-125,523
910	0.19	169,305	0.51	5.48	299,024	-129,719

Mod. FAA Minor Storage Volume (cubic ft.) = 60,523
Mod. FAA Minor Storage Volume (acre-ft.) = 1.3894

Determination of MAJOR Detention Volume Using Modified FAA Method

Design Information (Input):

Catchment Drainage Imperviousness	I_a =	19.65	percent
Catchment Drainage Area	A =	62.910	acres
Predevelopment NRCS Soil Group	Type =	C	A, B, C, or D
Return Period for Detention Control	T =	50	years (2, 5, 10, 25, 50, or 100)
Time of Concentration of Watershed	Tc =	22	minutes
Allowable Unit Release Rate	q =	0.17	cfs/acre
One-hour Precipitation	P_1 =	2.31	inches
Design Rainfall IDF Formula $i = C_1 * P_1/(C_2+T_c)^{\wedge}C_3$			
Coefficient One	C_1 =	28.50	
Coefficient Two	C_2 =	10	
Coefficient Three	C_3 =	0.789	

Determination of Average Outflow from the Basin (Calculated):

Runoff Coefficient	C =	0.50	
Inflow Peak Runoff	Qp-in =	134.46	cfs
Allowable Peak Outflow Rate	Qp-out =	**10.69**	cfs
Mod. FAA Major Storage Volume =		300,091	**cubic feet**
Mod. FAA Major Storage Volume =		**6.889**	**acre-ft**

Rainfall Duration minutes (input)	Rainfall Intensity inches / hr (output)	Inflow Volume cubic feet (output)	Adjustment Factor "m" (output)	Average Outflow cfs (output)	Outflow Volume cubic feet (output)	Storage Volume cubic feet (output)
10	6.19	116,892	1.00	10.69	6,417	110,475
25	3.98	187,918	0.94	10.05	15,080	172,838
40	3.01	226,919	0.78	8.29	19,892	207,027
55	2.44	253,672	0.70	7.49	24,705	228,967
70	2.07	274,068	0.66	7.03	29,517	244,550
85	1.81	290,598	0.63	6.73	34,330	256,268
100	1.61	304,536	0.61	6.52	39,143	265,394
115	1.46	316,617	0.60	6.37	43,955	272,661
130	1.33	327,300	0.58	6.25	48,768	278,532
145	1.23	336,895	0.58	6.16	53,580	283,314
160	1.14	345,616	0.57	6.08	58,393	287,223
175	1.07	353,620	0.56	6.02	63,206	290,415
190	1.01	361,026	0.56	5.97	68,018	293,008
205	0.95	367,924	0.55	5.92	72,831	295,093
220	0.90	374,384	0.55	5.88	77,644	296,740
235	0.86	380,464	0.55	5.85	82,456	298,008
250	0.82	386,210	0.54	5.82	87,269	298,942
265	0.78	391,661	0.54	5.79	92,081	299,579
280	0.75	396,848	0.54	5.77	96,894	299,954
295	0.72	401,797	0.54	5.75	101,707	300,091
310	0.69	406,533	0.54	5.73	106,519	300,014
325	0.67	411,075	0.53	5.71	111,332	299,743
340	0.65	415,439	0.53	5.69	116,144	299,294
355	0.63	419,640	0.53	5.68	120,957	298,683
370	0.61	423,692	0.53	5.67	125,770	297,922
385	0.59	427,606	0.53	5.65	130,582	297,023
400	0.57	431,391	0.53	5.64	135,395	295,996
415	0.56	435,058	0.53	5.63	140,208	294,850
430	0.54	438,614	0.53	5.62	145,020	293,593
445	0.53	442,066	0.52	5.61	149,833	292,233
460	0.51	445,421	0.52	5.60	154,645	290,775
475	0.50	448,685	0.52	5.60	159,458	289,227
490	0.49	451,863	0.52	5.59	164,271	287,592
505	0.48	454,960	0.52	5.58	169,083	285,877
520	0.47	457,981	0.52	5.57	173,896	284,085
535	0.46	460,930	0.52	5.57	178,708	282,221
550	0.45	463,810	0.52	5.56	183,521	280,289
565	0.44	466,625	0.52	5.56	188,334	278,292
580	0.43	469,379	0.52	5.55	193,146	276,233
595	0.42	472,074	0.52	5.55	197,959	274,115
610	0.41	474,712	0.52	5.54	202,772	271,941
625	0.40	477,298	0.52	5.54	207,584	269,714
640	0.40	479,832	0.52	5.53	212,397	267,435
655	0.39	482,317	0.52	5.53	217,209	265,108
670	0.38	484,756	0.52	5.52	222,022	262,734
685	0.38	487,150	0.52	5.52	226,835	260,315
700	0.37	489,500	0.52	5.52	231,647	257,853
715	0.36	491,810	0.52	5.51	236,460	255,350
730	0.36	494,079	0.52	5.51	241,272	252,807
745	0.35	496,311	0.51	5.51	246,085	250,226
760	0.35	498,506	0.51	5.50	250,898	247,608
775	0.34	500,665	0.51	5.50	255,710	244,955
790	0.34	502,790	0.51	5.50	260,523	242,267
805	0.33	504,882	0.51	5.49	265,336	239,547
820	0.33	506,943	0.51	5.49	270,148	236,795
835	0.32	508,972	0.51	5.49	274,961	234,012
850	0.32	510,972	0.51	5.49	279,773	231,199
865	0.31	512,944	0.51	5.48	284,586	228,358
880	0.31	514,887	0.51	5.48	289,399	225,488
895	0.31	516,803	0.51	5.48	294,211	222,592
910	0.30	518,693	0.51	5.48	299,024	219,669

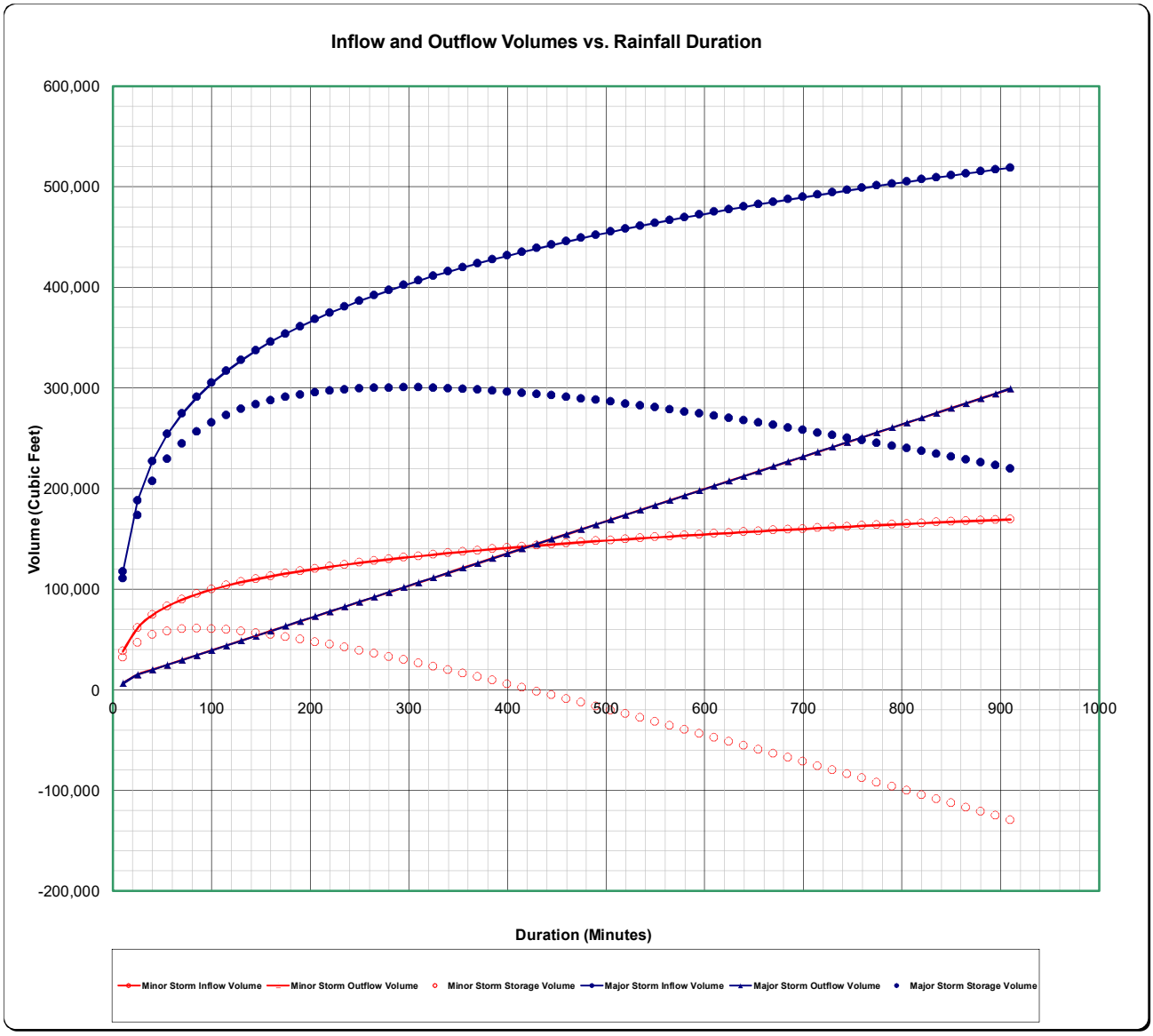
Mod. FAA Major Storage Volume (cubic ft.) = 300,091
Mod. FAA Major Storage Volume (acre-ft.) = 6.8891

UDFCD DETENTION BASIN VOLUME ESTIMATING WORKBOOK Version 2.3, Released March 2012

DETENTION VOLUME BY THE MODIFIED FAA METHOD
(See USDCM Volume 2 Storage Chapter for description of method)

Project: Cottonwood Greens

Basin ID: Pond 3



DETENTION VOLUME BY THE MODIFIED FAA METHOD
(See USDCM Volume 2 Storage Chapter for description of method)

Project: Cottonwood Greens

Basin ID: Ponds 4 & 5

(For catchments less than 160 acres only. For larger catchments, use hydrograph routing method)
(NOTE: for catchments larger than 90 acres, CUHP hydrograph and routing are recommended)

Determination of MINOR Detention Volume Using Modified FAA Method

Design Information (Input):

Catchment Drainage Imperviousness	I_a =	48.47	percent
Catchment Drainage Area	A =	34.655	acres
Predevelopment NRCS Soil Group	Type =	C	A, B, C, or D
Return Period for Detention Control	T =	5	years (2, 5, 10, 25, 50, or 100)
Time of Concentration of Watershed	Tc =	25	minutes
Allowable Unit Release Rate	q =	0.17	cfs/acre
One-hour Precipitation	P_1 =	1.45	inches
Design Rainfall IDF Formula	$i = C_1 * P_1/(C_2+T_c)^{\wedge}C_3$		
Coefficient One	C_1 =	28.50	
Coefficient Two	C_2 =	10	
Coefficient Three	C_3 =	0.789	

Determination of Average Outflow from the Basin (Calculated):

Runoff Coefficient	C =	0.39	
Inflow Peak Runoff	Qp-in =	34.06	cfs
Allowable Peak Outflow Rate	Qp-out =	**5.89**	cfs
Mod. FAA Minor Storage Volume =		60,943	**cubic feet**
Mod. FAA Minor Storage Volume =		**1.399**	**acre-ft**

15 <- Enter Rainfall Duration Incremental Increase Value Here (e.g. 5 for 5-Minutes)

Rainfall Duration minutes (input)	Rainfall Intensity inches / hr (output)	Inflow Volume cubic feet (output)	Adjustment Factor "m" (output)	Average Outflow cfs (output)	Outflow Volume cubic feet (output)	Storage Volume cubic feet (output)
10	3.89	31,527	1.00	5.89	3,535	27,992
25	2.50	50,683	0.99	5.85	8,775	41,908
40	1.89	61,202	0.81	4.76	11,426	49,776
55	1.53	68,418	0.72	4.27	14,077	54,340
70	1.30	73,919	0.68	3.98	16,728	57,190
85	1.14	78,377	0.65	3.80	19,380	58,998
100	1.01	82,136	0.62	3.67	22,031	60,106
115	0.92	85,395	0.61	3.58	24,682	60,713
130	0.84	88,276	0.59	3.50	27,333	60,943
145	0.77	90,864	0.59	3.45	29,984	60,880
160	0.72	93,216	0.58	3.40	32,635	60,581
175	0.67	95,375	0.57	3.36	35,286	60,089
190	0.63	97,372	0.56	3.33	37,937	59,435
205	0.60	99,233	0.56	3.30	40,588	58,644
220	0.57	100,975	0.56	3.28	43,240	57,735
235	0.54	102,615	0.55	3.25	45,891	56,724
250	0.51	104,165	0.55	3.24	48,542	55,623
265	0.49	105,635	0.55	3.22	51,193	54,442
280	0.47	107,034	0.54	3.20	53,844	53,190
295	0.45	108,369	0.54	3.19	56,495	51,874
310	0.44	109,646	0.54	3.18	59,146	50,500
325	0.42	110,871	0.54	3.17	61,797	49,074
340	0.41	112,048	0.54	3.16	64,448	47,600
355	0.39	113,181	0.53	3.15	67,100	46,082
370	0.38	114,274	0.53	3.14	69,751	44,523
385	0.37	115,329	0.53	3.13	72,402	42,928
400	0.36	116,350	0.53	3.13	75,053	41,298
415	0.35	117,339	0.53	3.12	77,704	39,635
430	0.34	118,298	0.53	3.11	80,355	37,943
445	0.33	119,229	0.53	3.11	83,006	36,223
460	0.32	120,134	0.53	3.10	85,657	34,477
475	0.31	121,015	0.53	3.10	88,308	32,706
490	0.31	121,872	0.53	3.09	90,959	30,912
505	0.30	122,707	0.52	3.09	93,611	29,097
520	0.29	123,522	0.52	3.09	96,262	27,260
535	0.29	124,317	0.52	3.08	98,913	25,404
550	0.28	125,094	0.52	3.08	101,564	23,530
565	0.27	125,853	0.52	3.07	104,215	21,638
580	0.27	126,596	0.52	3.07	106,866	19,730
595	0.26	127,323	0.52	3.07	109,517	17,806
610	0.26	128,035	0.52	3.06	112,168	15,866
625	0.25	128,732	0.52	3.06	114,819	13,912
640	0.25	129,415	0.52	3.06	117,471	11,945
655	0.24	130,086	0.52	3.06	120,122	9,964
670	0.24	130,743	0.52	3.05	122,773	7,971
685	0.24	131,389	0.52	3.05	125,424	5,965
700	0.23	132,023	0.52	3.05	128,075	3,948
715	0.23	132,646	0.52	3.05	130,726	1,920
730	0.23	133,258	0.52	3.05	133,377	-119
745	0.22	133,860	0.52	3.04	136,028	-2,168
760	0.22	134,452	0.52	3.04	138,679	-4,228
775	0.21	135,034	0.52	3.04	141,331	-6,296
790	0.21	135,608	0.52	3.04	143,982	-8,374
805	0.21	136,172	0.52	3.04	146,633	-10,461
820	0.21	136,727	0.52	3.03	149,284	-12,556
835	0.20	137,275	0.51	3.03	151,935	-14,660
850	0.20	137,814	0.51	3.03	154,586	-16,772
865	0.20	138,346	0.51	3.03	157,237	-18,891
880	0.19	138,870	0.51	3.03	159,888	-21,018
895	0.19	139,387	0.51	3.03	162,539	-23,153
910	0.19	139,897	0.51	3.03	165,191	-25,294

Mod. FAA Minor Storage Volume (cubic ft.) = 60,943
Mod. FAA Minor Storage Volume (acre-ft.) = 1.3991

Determination of MAJOR Detention Volume Using Modified FAA Method

Design Information (Input):

Catchment Drainage Imperviousness	I_a =	48.47	percent
Catchment Drainage Area	A =	34.655	acres
Predevelopment NRCS Soil Group	Type =	C	A, B, C, or D
Return Period for Detention Control	T =	100	years (2, 5, 10, 25, 50, or 100)
Time of Concentration of Watershed	Tc =	25	minutes
Allowable Unit Release Rate	q =	0.17	cfs/acre
One-hour Precipitation	P_1 =	2.70	inches
Design Rainfall IDF Formula	$i = C_1 * P_1/(C_2+T_c)^{\wedge}C_3$		
Coefficient One	C_1 =	28.50	
Coefficient Two	C_2 =	10	
Coefficient Three	C_3 =	0.789	

Determination of Average Outflow from the Basin (Calculated):

Runoff Coefficient	C =	0.60	
Inflow Peak Runoff	Qp-in =	97.57	cfs
Allowable Peak Outflow Rate	Qp-out =	**5.89**	cfs
Mod. FAA Major Storage Volume =		258,553	**cubic feet**
Mod. FAA Major Storage Volume =		**5.936**	**acre-ft**

Rainfall Duration minutes (input)	Rainfall Intensity inches / hr (output)	Inflow Volume cubic feet (output)	Adjustment Factor "m" (output)	Average Outflow cfs (output)	Outflow Volume cubic feet (output)	Storage Volume cubic feet (output)
10	7.24	90,316	1.00	5.89	3,535	86,781
25	4.66	145,194	0.99	5.85	8,775	136,418
40	3.51	175,327	0.81	4.76	11,426	163,901
55	2.86	195,998	0.72	4.27	14,077	181,920
70	2.42	211,757	0.68	3.98	16,728	195,028
85	2.12	224,529	0.65	3.80	19,380	205,149
100	1.89	235,298	0.62	3.67	22,031	213,267
115	1.71	244,632	0.61	3.58	24,682	219,950
130	1.56	252,886	0.59	3.50	27,333	225,553
145	1.44	260,299	0.59	3.45	29,984	230,315
160	1.34	267,038	0.58	3.40	32,635	234,403
175	1.25	273,223	0.57	3.36	35,286	237,936
190	1.18	278,945	0.56	3.33	37,937	241,007
205	1.11	284,274	0.56	3.30	40,588	243,685
220	1.05	289,265	0.56	3.28	43,240	246,026
235	1.00	293,963	0.55	3.25	45,891	248,072
250	0.96	298,403	0.55	3.24	48,542	249,861
265	0.92	302,614	0.55	3.22	51,193	251,421
280	0.88	306,622	0.54	3.20	53,844	252,778
295	0.84	310,446	0.54	3.19	56,495	253,951
310	0.81	314,105	0.54	3.18	59,146	254,959
325	0.78	317,614	0.54	3.17	61,797	255,817
340	0.76	320,986	0.54	3.16	64,448	256,538
355	0.73	324,232	0.53	3.15	67,100	257,133
370	0.71	327,363	0.53	3.14	69,751	257,612
385	0.69	330,387	0.53	3.13	72,402	257,985
400	0.67	333,312	0.53	3.13	75,053	258,259
415	0.65	336,145	0.53	3.12	77,704	258,441
430	0.63	338,892	0.53	3.11	80,355	258,537
445	0.62	341,559	0.53	3.11	83,006	258,553
460	0.60	344,151	0.53	3.10	85,657	258,494
475	0.59	346,673	0.53	3.10	88,308	258,365
490	0.57	349,129	0.53	3.09	90,959	258,169
505	0.56	351,522	0.52	3.09	93,611	257,911
520	0.55	353,856	0.52	3.09	96,262	257,594
535	0.53	356,134	0.52	3.08	98,913	257,222
550	0.52	358,360	0.52	3.08	101,564	256,796
565	0.51	360,535	0.52	3.07	104,215	256,320
580	0.50	362,663	0.52	3.07	106,866	255,796
595	0.49	364,745	0.52	3.07	109,517	255,227
610	0.48	366,784	0.52	3.06	112,168	254,615
625	0.47	368,781	0.52	3.06	114,819	253,962
640	0.46	370,739	0.52	3.06	117,471	253,269
655	0.46	372,659	0.52	3.06	120,122	252,538
670	0.45	374,544	0.52	3.05	122,773	251,771
685	0.44	376,393	0.52	3.05	125,424	250,969
700	0.43	378,209	0.52	3.05	128,075	250,134
715	0.43	379,994	0.52	3.05	130,726	249,268
730	0.42	381,747	0.52	3.05	133,377	248,370
745	0.41	383,472	0.52	3.04	136,028	247,443
760	0.41	385,167	0.52	3.04	138,679	246,488
775	0.40	386,836	0.52	3.04	141,331	245,505
790	0.39	388,478	0.52	3.04	143,982	244,496
805	0.39	390,094	0.52	3.04	146,633	243,461
820	0.38	391,686	0.52	3.03	149,284	242,402
835	0.38	393,254	0.51	3.03	151,935	241,319
850	0.37	394,800	0.51	3.03	154,586	240,213
865	0.37	396,323	0.51	3.03	157,237	239,085
880	0.36	397,824	0.51	3.03	159,888	237,936
895	0.36	399,305	0.51	3.03	162,539	236,765
910	0.35	400,765	0.51	3.03	165,191	235,575

Mod. FAA Major Storage Volume (cubic ft.) = 258,553
Mod. FAA Major Storage Volume (acre-ft.) = 5.9356

UDFCD DETENTION BASIN VOLUME ESTIMATING WORKBOOK Version 2.3, Released March 2012

DETENTION VOLUME BY THE MODIFIED FAA METHOD
(See USDCM Volume 2 Storage Chapter for description of method)

Project: Cottonwood Greens

Basin ID: Ponds 4 & 5

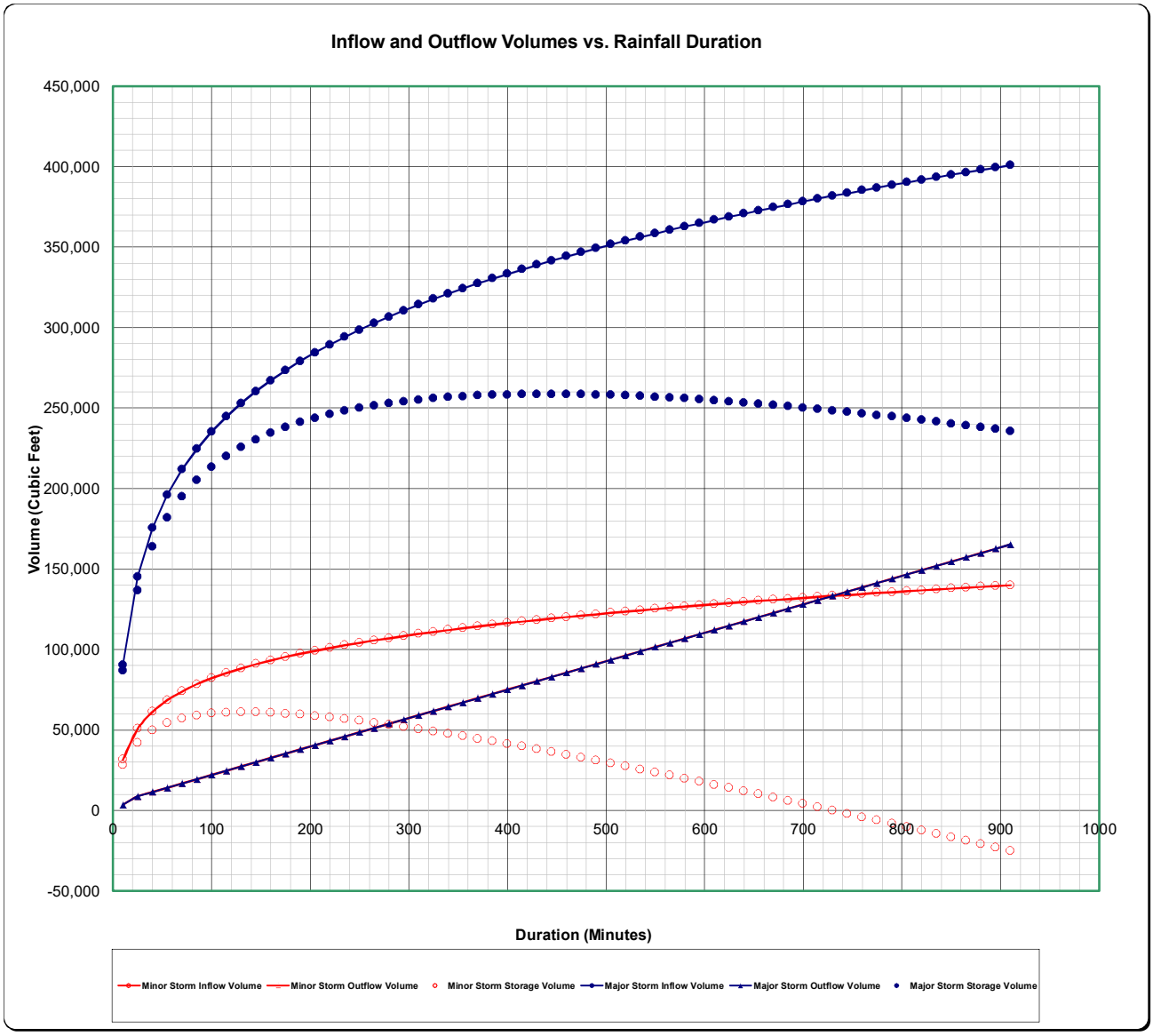


Table 603 - Storm Drainage System Design

	Direct Runoff			Pipe Info			
Design Point	Inlet Designation	Q (From Inlet Sizing) cfs	Q (Cumulative) cfs	Pipe Size in.	Slope %	Pipe Flow cfs	Velocity fps
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
W1	16	17.71	17.71				
				30.00	0.50	29.08	5.92
	17	2.28	19.99				
				30.00	0.50	29.08	5.92
W2	19	22.44	42.43				
				42.00	0.25	50.44	5.24
W3	38,39	34.10	76.53				
				48.00	0.30	78.89	6.28
W4	20	3.04	79.56				
				48.00	0.35	85.21	6.78
W5	49,50,44,43	74.52	154.08				
				60.00	0.35	154.49	7.87
W6	47,48,81,82	35.11	189.19				
				72.00	0.25	212.32	7.51
W7	45,46,1,2	58.45	58.45				
				48.00	0.30	78.89	6.28
W8		**WEST Outlet**	**8.49**				
				24.00	0.30	12.42	3.95
N1	58	26.63	26.63				
				18.00	0.30	5.77	3.26
	59	5.50	32.13				
				24.00	0.25	11.34	3.61
N2	MH24	12.59	44.72				
				30.00	0.35	24.33	4.96
N3	54	4.65	49.37				
				36.00	0.25	33.44	4.73
	55	5.50	54.87				
				36.00	0.25	33.44	4.73
	23	28.18	28.18				
				30.00	0.65	33.16	6.75
	22	33.00	61.18				
				48.00	0.25	72.01	5.73
	28	1.69	1.69				
				36.00	0.25	33.44	4.73
N4	29	33.00	34.69				
				36.00	0.40	42.30	5.98
N5		**NORTH Outlet**	**5.17**				
				24.00	0.25	11.34	3.61
E1	40	33.00	33.00				
				24.00	0.30	12.42	3.95
E2	52,51,41	17.62	50.62				
				42.00	0.35	59.68	6.20
E3		**EAST Outlet**	**5.95**				
				18.00	0.26	5.37	3.04
E4		**NORTH + EAST**	**11.11**				
				24.00	0.30	12.42	3.95
U		**FINAL OUTFALL**	**19.60**				
				30.00	0.25	20.56	4.19

Table 901 - 100-Year Major Storm Drainage System Design

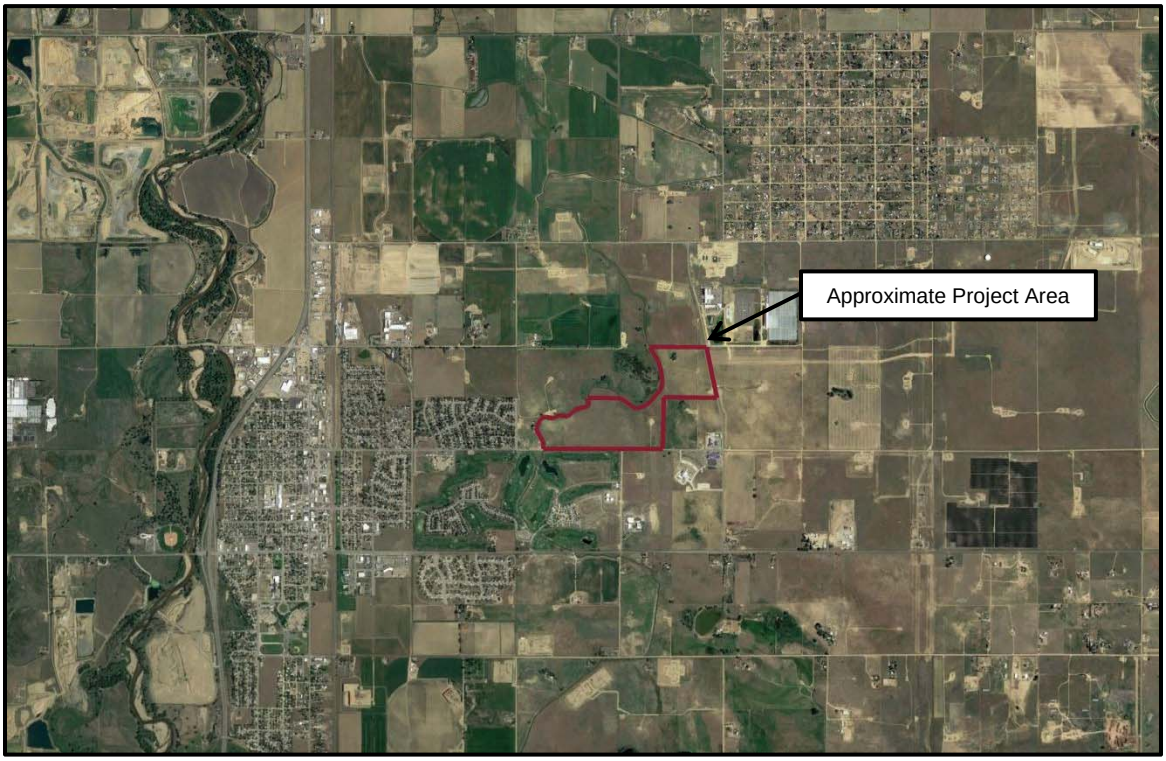
Inlet Designation	Contributing Sub-Basin Designation	Street Slope or Sump	Inlet Size and Type	Street Type (A,B,C)	Maximum Allowable Depth of Flow in Street	Maximum Allowable Inlet Capactiy	Maximum Allowable Gutter Capacity	Q_{CO}	Q_{Street}	Q_{Total}	Inlet Reduction Ratio	Actual Inlet Capacity Q_{Design}	Inlet Capture Q_{Inlet}	Q_{CO}	Inlet Receiving Q_{CO}
					(ft)	(cfs)	(cfs)	(cfs)	(cfs)	(cfs)		(cfs)	(cfs)	(cfs)	
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
16	I	Sump	10	A	1.00	29.00	-	0.0	17.71	17.71	-	-	17.71	0.00	-
17	i	Sump	5	A	1.00	12.00	-	0.0	2.28	2.28	-	-	2.28	0.00	-
39	B	Sump	10	A	1.00	29.00	-	0.0	17.05	17.05	-	-	17.05	0.00	-
39	b	Sump	10	A	1.00	29.00	-	0.0	17.05	17.05	-	-	17.05	0.00	-
19	C	Sump	10	A	1.00	29.00	-	0.0	22.44	22.44	-	-	22.44	0.00	-
20	c	Sump	5	A	1.00	12.00	-	0.0	3.04	3.04	-	-	3.04	0.00	-
49	D1	1.00	5	A	1.00	5.50	175.00	0.0	25.64	25.64	88%	6.25	5.50	20.14	D
50	D2	1.00	10	A	1.00	10.80	175.00	0.0	25.64	25.64	88%	12.27	10.80	14.84	D
44	D	Sump	15	A	1.00	33.00	-	35.0	0.00	34.99	-	-	33.00	1.99	d
43	d	Sump	10	A	1.00	29.00	-	2.0	23.23	25.22	-	-	25.22	0.00	-
47	E1a	1.00	10	A	1.00	10.80	175.00	0.0	24.31	24.31	88%	12.27	10.80	13.51	E1
81	E2a	1.00	10	A	1.00	10.80	175.00	0.0	24.31	24.31	88%	12.27	10.80	13.51	E2
48	E2	1.00	15	A	1.00	15.30	175.00	13.5	0.00	13.51	88%	17.39	13.51	0.00	-
82	E1	1.00	15	A	1.00	15.30	-	13.5	0.00	13.51	88%	17.39	13.51	0.00	-
45	F1	1.00	10	A	1.00	10.80	175.00	0.00	22.47	22.47	88%	12.27	10.80	11.67	F
46	F2	1.00	10	A	1.00	10.80	175.00	0.0	22.47	22.47	88%	12.27	10.80	11.67	F
1	F	Sump	15	A	1.00	33.00	-	23.3	0	23.35	-	-	23.35	0.00	f
2	f	Sump	15	A	1.00	33.00	-	0.0	28.18	28.18	-	-	28.18	0.00	-
23	HA	Sump	15	A	1.00	33.00	-	39.8	14.42	54.26	-	-	33.00	21.26	ha
22	ha	Sump	10	A	1.00	29.00	-	21.3	5.37	26.63	-	-	26.63	0.00	-
58	HB	1	5	A	1.00	5.50	175.00	0.0	15.23	15.23	92%	5.98	5.50	9.73	HA
59	hb	1	5	A	1.00	5.50	175.00	0.0	4.65	4.65	88%	6.25	4.65	0.00	HA
54	HE	1	5	A	1.00	5.50	175.00	0.0	35.61	35.61	95%	5.79	5.50	30.11	HA
55	he	1	5	A	1.00	5.50	175.00	0.0	1.69	1.69	88%	6.25	1.69	0.00	HA
28	G	Sump	15	A	1.00	33.00	-	0.0	39.00	39.00	-	-	33.00	6.00	g
29	g	Sump	5	A	1.00	12.00	-	6.0	0.62	6.62	-	-	6.62	0.00	-
52	A1	1.00	5	A	1.00	5.50	175.00	0.0	25.95	25.95	88%	6.25	5.50	20.45	A
51	A2	1.00	5	A	1.00	5.50	175.00	0.0	25.95	25.95	88%	6.25	5.50	20.45	A
41	A	Sump	15	A	1.00	33.00	-	40.89	0.00	40.89	-	-	33.00	7.89	a
40	a	Sump	10	A	1.00	29.00	-	7.9	3.41	11.31	-	-	11.31	0.00	-

Table 901 - 5-Year Minor Storm Drainage System Design

Inlet Designation	Contributing Sub-Basin Designation	Street Slope or Sump	Inlet Size and Type	Street Type (A,B,C)	Maximum Allowable Depth of Flow in Street	Maximum Allowable Inlet Capactiy	Maximum Allowable Gutter Capacity	Q_{CO}	Q_{Street}	Q_{Total}	Inlet Reduction Ratio	Actual Inlet Capacity Q_{Design}	Inlet Capture Q_{Inlet}	Q_{CO}	Inlet Receiving Q_{CO}
					(ft)	(cfs)	(cfs)	(cfs)	(cfs)	(cfs)		(cfs)	(cfs)	(cfs)	
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
16	I	Sump	10	A	0.50	10.40	-	0.0	7.74	7.74	-	-	7.74	0.00	-
17	i	Sump	5	A	0.50	4.00	-	0.0	0.99	0.99	-	-	0.99	0.00	-
38	B	Sump	10	A	0.50	10.40	-	0.0	6.18	6.18	-	-	6.18	0.00	-
39	b	Sump	10	A	0.50	10.40	-	0.0	6.18	6.18	-	-	6.18	0.00	-
19	C	Sump	10	A	0.50	10.40	-	0.0	8.08	8.08	-	-	8.08	0.00	-
20	c	Sump	5	A	0.50	4.00	-	0.0	1.09	1.09	-	-	1.09	0.00	-
49	D1	1.00	5	A	0.50	3.90	27.56	0.0	10.55	10.55	88%	4.43	3.90	6.65	D
50	D2	1.00	10	A	0.50	7.20	27.56	0.0	10.55	10.55	88%	8.18	7.20	3.35	D
44	D	Sump	15	A	0.50	16.00	-	10.0	0.00	9.99	-	-	9.99	0.00	-
43	d	Sump	10	A	0.50	10.40	-	0.0	9.56	9.56	-	-	9.56	0.00	-
47	E1a	1.00	10	A	0.50	7.20	27.56	0.0	11.11	11.11	88%	8.18	7.20	3.91	
81	E2a	1.00	10	A	0.50	7.20	27.56	0.0	11.11	11.11	88%	8.18	7.20	3.91	E2
48	E2	1.00	15	A	0.50	8.60	27.56	3.9		3.91	88%	9.77	3.91	0.00	E1
82	E1	1.00	15	A	0.50	8.60	27.56	3.9	0.00	3.91	88%	9.77	3.91	0.00	-
45	F1	1.00	10	A	0.50	7.20	27.56	0.00	7.54	7.54	88%	8.18	7.20	0.34	F
46	F2	1.00	10	A	0.50	7.20	27.56	0.0	7.54	7.54	88%	8.18	7.20	0.34	F
1	F	Sump	15	A	0.50	16.00	-	0.7	15.09	15.77	-	-	15.77	0.00	f
2	f	Sump	15	A	0.50	16.00	-	0.0	9.46	9.46	-	-	9.46	0.00	-
23	HA	Sump	15	A	0.50	16.00	-	14.4	7.00	21.42	-	-	16.00	5.42	-
22	ha	Sump	10	A	0.50	10.40	-	5.4	2.61	8.03	-	-	8.03	0.00	-
58	HB	1	5	A	0.50	3.90	27.56	0.0	6.17	6.17	92%	4.24	3.90	2.27	-
59	hb	1	5	A	0.50	3.90	27.56	0.0	1.88	1.88	88%	4.43	1.88	0.00	-
54	HE	1	5	A	0.50	3.90	27.56	0.0	16.06	16.06	95%	4.11	3.90	12.16	HA
55	he	1	5	A	0.50	3.90	27.56	0.0	0.76	0.76	88%	4.43	0.76	0.00	-
28	G	Sump	15	A	0.50	16.00	-	0.0	15.91	15.91	-	-	15.91	0.00	-
29	g	Sump	5	A	0.50	4.00	-	0.0	0.25	0.25	-	-	0.25	0.00	-
52	A1	1.00	5	A	0.50	3.90	27.56	0.0	11.45	11.45	88%	4.43	3.90	7.55	A
51	A2	1.00	5	A	0.50	3.90	27.56	0.0	11.45	11.45	88%	4.43	3.90	7.55	A
41	A	Sump	15	A	0.50	16.00	-	15.09	0.00	15.09	-	-	15.09	0.00	-
40	a	Sump	10	A	0.50	10.40	-	0.0	1.51	1.51	-	-	1.51	0.00	-

GROUND ENGINEERING

Preliminary Geotechnical Evaluation
Cottonwood Greens
Fort Lupton, Colorado



Prepared For:

Arbor Capital Partners, LLC

In care of

Land Asset Strategies of Colorado, LLC

4040 MacArthur Drive, Suite 250
Newport Beach, California 92660

Attention: Mr. Lee Lowrey

Job Number 18-3062 **November 15, 2018**

TABLE OF CONTENTS

	Page
Purpose and Scope of Study	1
Planned Development	1
Site Conditions	2
Initial Subsurface Exploration	2
Laboratory Testing	3
Subsurface Conditions	3
Geologic Hazards	6
Preliminary Geotechnical Evaluation	9
Additional Exploration Requirements	13
Limitations	14
Locations of Test Holes	Figure 1
Logs of Test Holes	Figures 2 and 3
Legend and Notes	Figure 4
Summary of Laboratory Test Results	Table 1
Summary of Soil Corrosion Test Results	Table 2

PURPOSE AND SCOPE OF STUDY

This report presents the results of a preliminary geotechnical evaluation performed by GROUND Engineering Consultants, Inc. (GROUND) to provide in support of planning of the proposed Cottonwood Greens development to be located north of 9th Street and County Road 20 1/2 Fort Lupton, Colorado. Our study was conducted in general accordance with GROUND's Proposal No. 1810-1800, dated October 8, 2018 and associated contract documents.

Field and office studies provided information obtained at the test hole locations regarding surface and subsurface conditions, including the existing site vicinity improvements. Material samples retrieved during the subsurface exploration were tested in our laboratory to assess the engineering characteristics of the site earth materials, and assist in our geotechnical analysis. Results of the field, office, and laboratory studies are presented below.

This report has been prepared to summarize the data obtained and to present our preliminary findings and conclusions based on the proposed development and the subsurface conditions encountered.

<u>The information presented in this report is preliminary, and is not sufficient for final design of buildings or pavements or for assessing depths of remedial earthwork, etc. Additional structure-specific subsurface exploration and testing should be performed in support of development of geotechnical parameters for project design</u>.

PLANNED DEVELOPMENT

We understand that nature of the development has not yet been determined, and that commercial, residential, and mixed-use developments are being considered for the property. Supporting infrastructure, including roadways and underground utilities, likely will be constructed as well. We anticipate that structural loads likely will be low to moderate, typical of this type of development. Additionally, we anticipate that relatively small to moderate cuts and fills, on the order of 5 to 10 feet, may be required to achieve final lines and grades across the site.

If the proposed development differs significantly from that described above, GROUND should be notified to re-evaluate the conclusions and parameters contained herein.

SITE CONDITIONS

At the time of our subsurface exploration program, the site was a largely undeveloped lot that appeared to have been previously used for agriculture and scattered oil and gas production. The site was bordered Fulton Ditch to the west and north, County Road 31 to the east, undeveloped land to the east and south, and 9th Street to the south. Additional undeveloped and agricultural land, commercial development, and single-family residences further surrounded the site.

The project site was largely covered with native grasses, weeds, and other relatively small vegetation. Large, mature trees also were observed at various locations on the project site. The project site generally sloped gently to moderately to the north and west and displayed about 20 feet of relief across the project site.

INITIAL SUBSURFACE EXPLORATION

Subsurface exploration for the project was conducted in October and November of 2018. A total of 10 test holes were drilled using a conventional truck-mounted, drilling rig and a conventional track-mounted drilling rig advancing continuous flight auger equipment to depths of about 23 to 36 feet below existing grades with the limits of the proposed development. Test holes were advanced to their termination depths to evaluate the subsurface conditions as well as to retrieve samples for laboratory testing and analysis. A GROUND engineer directed the subsurface exploration, logged the test holes in the field, and prepared the samples for transport to our laboratory.

Samples of the subsurface materials were retrieved with a 2-inch I.D. California liner sampler. The samplers were driven into the substrata with blows from a 140-pound hammer falling 30 inches, a procedure similar to the Standard Penetration Test described by ASTM Method D1586. Penetration resistance values, when properly evaluated, indicate the relative density or consistency of soils. Depths at which the soil samples were obtained and associated penetration resistance values are shown on the test hole logs.

The approximate locations of the test holes are shown in Figure 1. Logs of the test holes are presented in Figures 2 and 3. Explanatory notes and a legend are provided in Figure 4.

LABORATORY TESTING

Samples retrieved from our test holes were examined and visually classified in the laboratory by the project engineer. Laboratory testing of soil samples included standard property tests, such as natural moisture contents, dry unit weights, grain size analyses, and Atterberg limits. Swell–consolidation, water soluble sulfate, and a suite of corrosivity tests were performed on select samples as well. Laboratory tests were performed in general accordance with applicable ASTM protocols. Results of the preliminary laboratory testing program are summarized in Table 1 and Table 2.

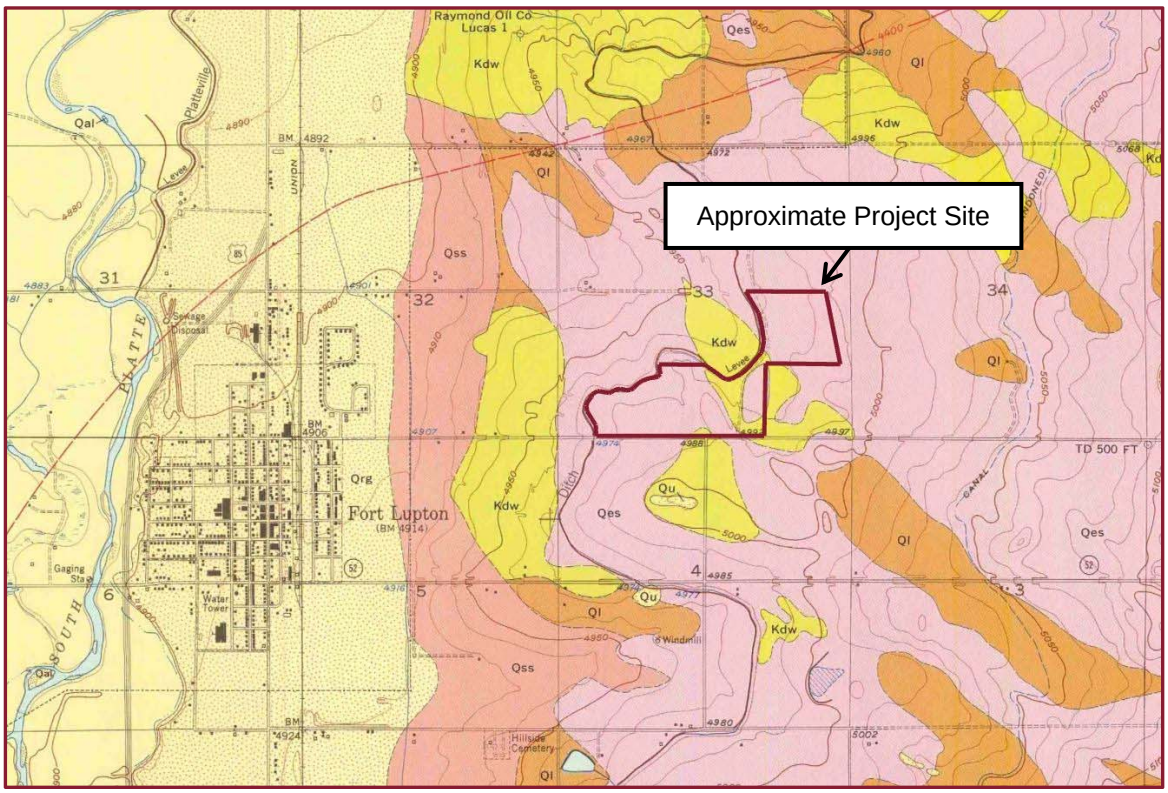
SUBSURFACE CONDITIONS

Site Geology Published geologic maps, e.g., Soister (1965),[1] depict the site as underlain by Holocene Eolian Sand (**Qes**) and by the Upper Cretaceous Dawson Formation (**Kdw**). Alluvial deposits are also mapped in the project area. A portion of the Soister (1965) map is reproduced below.

In the project area, eolian, wind-blown, deposits typically consists of fine to medium sands and silts with varying fractions of clays. Weathering typically increase the clay content of these deposits. Eolian deposits, such as loess, can be susceptible to hydro-consolidation ('collaspe') when loaded and wetted.

[1] Soister, P.E., 1965, *Geologic map of the Fort Lupton quadrangle, Weld and Adams Counties, Colorado*: U.S. Geological Survey, Geologic Quadrangle Map GQ-397, scale 1:24,000

Alluvial deposits, in the project area, generally consist of fine to coarse sands and gravels with varying fractions of silts and clays. Cobble and boulders are present locally as well.



The Dawson Formations, in the project area, typically consists of claystones, sandstones, and siltstone interbedded on various scales. The claystones typically are moderately to highly expansive and the formations include well-cemented beds that can be very hard and can be difficult to excavate.

Local Conditions In general, the test holes penetrated a thin layer of topsoil,[2] typically about 2 to 3 inches in thickness, before penetrating native sands and clays that extended to a depth of 4 to 11 feet below existing grades in the western portion of the site and 14 to 32 feet in the eastern portion of the site. Topsoil, generally was not encountered in the eastern portion of the site. Weathered claystone bedrock was encountered underlying the native sands and clays and extended to depths of 9 to 15 feet in the western portion of the site and 12 to 33 feet in the eastern portion fo the site.

[2] "Topsoil" as used herein is defined geotechnically. The materials so described may or may not be suitable for landscaping or as a growth medium for such plantings as may be proposed for the project.

Relatively unweathered claystone bedrock was encountered beneath the weathered claystone and extended to the depths explored.

We interpret the native sands clays to be heavily weathered eolian deposits with local alluvial deposits. We interpret the underlying bedrock materials to be Dawson Formation materials.

Fill materials were not recognized in the test holes but could likely present elsewhere at the site. However, the delineation of the complete lateral and vertical extents of the fills at the site, and their composition, was beyond our present scope of services. If detailed fill soil compositions at the site are of significance, they should be evaluated using test pits.

Sands and Clays consisted of fine to coarse sands and clays with varying fractions of silts. They were slightly moist to wet, non- to highly plastic, and light brown to brown in color. Caliche and iron staining were encountered locally.

Weathered Claystone consisted of weathered claystone with local weathered siltstone and sandstone beds. They were very moist to wet, moderately to highly plastic, firm medium hard, and brown to gray in color. Iron staining and caliche were noted locally.

Claystone Bedrock consisted of claystone with local siltstone and sandstone beds. They were moist to wet, moderately to highly plastic, hard to very hard, and gray in color. Iron staining was noted locally.

Swell-Consolidation Testing of site materials indicated a consolidations of 3.8 percent and swells up to 4.1 upon wetting under surcharges equal to the approximate overburden loads.

Groundwater was encountered in the test holes at depths between 2½ feet to 7 feet in the eastern portion of the site (Test Holes 6, 7, 8, 9, and 10) at the time of drilling, and at a depth of 22 feet below existing grade in Test Hole 3 when measured approximately 1 day later. The test hole was backfilled in accordance with Code of Colorado Regulations (2 CCR 402-2). Groundwater levels can be expected to fluctuate, however, in response to annual and longer-term cycles of precipitation, irrigation, surface drainage, land use, and the development of transient, perched water conditions. At this site we anticipate that groundwater levels will tend to rise and fall with the Fulton Ditch stage. Additionally,

review of estimate of saturation of the lab samples did not indicate that the shallow site soils had been saturated recently in the western portion of the site.

GEOLOGIC HAZARDS

Expansive Soils Swelling clayey soils and bedrock change volume in response to changes in moisture content that can occur seasonally, or in response to changes in land use, including development. Expansion potentials vary with moisture contents, density, clay chemistry and mineralogy. The swell potential in any particular area can vary markedly both laterally and vertically due to the complex interbedding of the site soil and bedrock materials. Moisture changes also occur erratically, resulting in conditions that cannot always be predicted.

The shallow earth materials underlying the site generally consisted of sands and clays. The plasticity of the site soils ranged from slightly to highly plastic. A swell of approximately 4.1 percent was measured in a sample of site soils (See Table 1), and significant swells have been measured in similar soils and bedrock in the greater project area. Swelling soils beneath a building's foundation or other improvements can cause significant damage. Design-level geotechnical evaluations of individual building sites should include an assessment of the possible presence of swelling materials in the foundation soils, so that appropriate, remedial design and construction remediation methods can be implemented. Project planning should anticipate the use of mitigation efforts, such as remedial excavation and re-compaction of the expansive materials, for moderately swelling soils at relatively shallow depths.

Collapsible Soils Certain surficial deposits in the Colorado Front Range area, typically eolian (wind-blown) materials are known to be susceptible to local hydro-consolidation or "collapse." Hydro-consolidation consists of a significant volume loss due to re-structuring of the constituent grains of the soil to a more compact arrangement upon wetting.

The surficial soils at the project site are mapped as eolian deposits, and the native soils encountered in the test holes have been interpreted to be eolian deposits. Swell and consolidation testing performed on site materials yield consolidations up to 3.8 percent. These are significant consolidation potentials, and design level geotechnical evaluations of individual building sites should include an assessment of the possible presence of

collapsible materials in the foundation soils, so that appropriate remedial design and construction can be implemented, where necessary.

Radon In general, testing for the possible presence of radon gas prior to project development does not yield useful results regarding the potential accumulation of radon in completed structures. Radon accumulations typically are found in basements or other enclosed portions of buildings built in areas underlain at relatively shallow depths by granitic crystalline rock. The likelihood of encountering radon in concentrations exceeding applicable health standards on the subject site, underlain by relatively deep soils and sedimentary bedrock, is significantly lower.

Radon testing should be performed in each building on-site, after construction is completed. Proper ventilation usually is sufficient to mitigate potential radon accumulations. Building designs should accommodate such ventilation for all building areas.

Seismic Activity / Faulting Neither site reconnaissance nor review of available geologic maps indicated the trace of an active or potentially active fault traversing or immediately adjacent to the site. Therefore, the likelihood of surface fault rupture at the site is considered to be relatively low.

The closest extent of a documented active fault to the site is the Rocky Mountain Arsenal Fault, which is located approximately 14 miles to the southwest (Kirkham and Rogers, 1981[3]; Colorado Geological Survey, 2008[4]). This fault is approximately 15 miles in length, trends generally northwest/southeast and is considered to be a right-lateral, strike-slip fault. The most recent significant seismic movements associated with the fault occurred in the 1960's, generating earthquakes up to magnitude 5.5. Research performed by the U.S. Geological Survey concluded that a strong correlation existed between the seismic activity of this fault and pressure injection of liquid waste into a disposal well located at the nearby Rocky Mountain Arsenal. Pressure injection in the disposal well was discontinued in 1966 and only minor seismic activity along the fault has been recorded since. The risk of this fault giving rise to damaging, earthquake-

[3] Kirkham, R.M., and W. P. Rogers, 1981, *Earthquake Potential in Colorado, A Preliminary Evaluation*, Colorado Geological Survey, Bulletin 43.

[4] Colorado Geological Survey, 2008, *Preliminary Quaternary Fault and Fold Database, and Map Server*, http://geosurvey.state.co.us/Default.aspx?tabid=453.

induced ground motions at the site is considered to be relatively low given the low previously recorded seismic magnitudes.

We anticipate that the western portion of the site could qualify as a Seismic Site Class C site, in accordance with 2015 IBC based on extrapolation of available data to depth. However, more information will be required to determine the Seismic Site Class, and that information may indicate that the site should classify as Seismic Site Class D. Similarly the eastern portion of the site will likely classify as Site Class D, but may classify as Site Class C once more information has been gathered. Compared with other regions of Colorado, recorded earthquake frequency in the project area is moderate.

Slope Stability and Erosion Colton and others (1975)[5], as well as larger scale geologic maps providing coverage of the site that were reviewed for this study, did not depict landslide deposits on or adjacent to the subject site.

The site is relatively gently to moderately sloping. During our preliminary reconnaissance of site area, no evidence was noted of mass-wasting processes associated with steep slopes, such as landslides, slumps, or unusual soil creep. Therefore, the likelihood of project developments being affected by existing large scale, unanticipated slope instabilities is considered low. Where significant cuts and fills are planned for the site the risk of slope instability may be increased, especially along the southern portion of the site. Therefore, constructed or modified slopes should be analyzed for stability, as appropriated.

Flooding The subject property abuts the Fulton Ditch to the north, but we assume that flow in that ditch will continue to be controlled. The nearest significant stream appears to be the South Platte River, approximately 1½ miles to the west of the site. Additionally, the subject parcel is mapped as Zone X by FEMA (2017),[6] which indicates a minimal risk of flooding. Significant fluctuation in the flow of streams can be expected during seasonal run periods and after large precipitation events.

The site and any proposed grade changes should be evaluated by a civil engineer with regard to flooding, however.

---

[5] Colton, R.B., J.A. Holligan, and L.W. Anderson, 1975, *Preliminary Map of Landslide Deposits, Denver 1° x 2° Quadrangle, Colorado*, U.S. Geological Survey, Miscellaneous Field Studies Map MF-705.

[6] Federal Emergency Management Administration, 2017, http://fema.maps.arcgis.com/home/webmap/viewer.html?webmap=cbe088e7c8704464aa0fc34eb99e7f30 accessed on 11/01/2018.

Mining Activity and Subsidence Review of U.S. Geological Survey geologic maps covering the site Roberts, Hynes, and Woodward (2001)[7] and Turney and Murray-Williams (1983)[8] and other available, published maps depicting areas of coal extraction, did not indicate past mining activities near the subject parcel. Additionally, no mine shafts, adits, or other structures are depicted as being on the subject parcel, and were not observed on the subject site.

Considering the information above, the risk of surface subsidence associated with consolidation of former mine workings appears low. Further evaluation of former mine workings could be performed to evaluate this risk further and associated magnitudes of potential subsidence.

Published geologic maps do not indicate formations underlying the site at shallow depths that include evaporite (salt, gypsum, etc.) deposits, limestones, or other materials vulnerable to subsurface dissolution. Therefore, the likelihood of subsidence (associated with such rock formation; not coal mine related) or other hazards related to subsurface dissolution also appears to be low.

PRELIMINARY GEOTECHNICAL EVALUATION

Presented below are preliminary considerations and parameters regarding geotechnical aspects of the proposed development, which we have assumed will be relatively lightly loaded structures. The provided considerations and parameters are intended only to assist with preliminary project planning. Additional, structure-specific studies must be performed to develop design-level geotechnical considerations and parameters.

Geotechnical Risk The subsurface materials types encountered in the test holes are known to be susceptible to significant volume change in the project area. Additionally a swell of 4.1 percent and a consolidation of 3.8 percent were measured in the tested samples of site soils. Therefore, project planning should anticipate that mitigation measures for these conditions will be necessary. These conditions likely can be

---

[7] Roberts, S.B., Hynes, J.L., and Woodward, C.L., 2001, *Maps Showing the Extent of Mining, Locations of Mine Shafts, Adits, Air Shafts, Bedrock Faults, and Thickness of Overburden Above Abandoned Coal Mines in the Boulder-Weld Coal Field, Boulder, Weld, and Adams Counties, Colorado.* U.S. Geological Survey, Geological Investigations Series Map I-2735.

[8] Turney, J.E., Murray-Williams L., 1983, *Colorado Front Range Inactive Coal Mine Data and Subsidence, Adams County*, Colorado Geological Survey, Plate 12 of 12.

addressed by remedial earthwork unless movement tolerances of less than 1 inch are anticipated.

Relatively shallow groundwater was encountered in the eastern portion of the site and may complicated construction in that portion of the site, if remedial excavations are required or if below grade levels are added. Depending on the nature of the improvements, it may be beneficial to raise grades in portions of site.

Additional geotechnical evaluation should be performed the potential risks of swelling soils, collapsible soils, and shallow groundwater. Potential measures to address these risks are presented below, and GROUND is available to discuss these and other geotechnical considerations upon request.

Anticipated Foundation and Floor Systems In our opinion, it appears that shallow foundations and slab-on-grade floors will generally be appropriate for site construction provided they bear on a section of properly compacted fill soils. Where structures are more sensitive to movement and where post-construction movements less than 1 inch are desired, deep foundation systems and structural floor system will likely be required.

Deep Foundation Systems Deep foundation systems will need to bear in the bedrock underlying the site. We anticipate that both drilled pier and driven pile foundations will be geotechnically feasible. Drilled pier and driven pile lengths will depend on a variety of geotechnical and structural factors. We anticipate that pier lengths likely will be between 32 and 40 feet in the western portion of the site and 25 and 42 feet in the eastern portion of the site. Driven pile lengths, we anticipate, will be on the order of 15 to 25 feet in the western portion of the site and 20 to 38 feet below existing grade. Allowable end bearing pressures typically will be 30,000 psf or higher in bedrock. Estimated post-construction movements of a properly designed and installed deep foundation likely will be on the order of ½ inch or less.

Shallow Foundation Systems Where improvements are less sensitive to post-construction movement, we anticipate that shallow foundations bearing on a properly compacted, remedial fill section will be geotechnically feasible. Based on the information available and our experience in the project area, the remedial fill section may need to extend to a depth of 8 to 15 feet below existing grade. Due to the presence of shallow groundwater, the fill section likely can be reduced in the eastern portion of the

site. Allowable bearing pressures likely will range from 2,000 to 3,000 psf for properly compacted fill with anticipated post-construction movements of approximately 1 inch for a shallow foundation system bearing on a properly compacted fill section.

Structural Floors Where deep foundations are appropriate for a building, constructing the lowest level floor as a structural floor supported on deep foundations also will be appropriate, generally. Estimated post-construction movements of a properly designed and installed structural floor likely will be on the order of ½ inch or less. A structural floor should be constructed over a well-ventilated crawl space. Hanging the utilities beneath a building with a structural floor from that floor system (rather than installing them in the underlying soils) can limit differential structure / pipe movements on an expansive soil site.

Slab-on-grade Floors Similar to shallow foundation systems, conventional slab-on-grade concrete floors likely will need to bear on a section of properly compacted fill. Like shallow foundations, the remedial fill section may need to extend to a depth of 8 to 15 feet below existing grade. In our experience, estimates of post-construction floor movements bearing such soils will be on the order of 1 inch.

Flatwork It may be beneficial to support critical flatwork, such as flatwork at entrance and exits of buildings, on a fill section like that for a slab-on-grade floor to achieve similar performance. It may be beneficial to perform limited remedial earthwork beneath less critical flatwork fill, in order to reduce post-construction movements. Greater than typical flatwork maintenance, however, should be anticipated for this site.

Preliminary Water-Soluble Sulfates The concentrations of water-soluble sulfates measured in selected samples of site soils were 0.02 and 0.04 percent by weight (See Table 2). Such a concentration of soluble sulfates represents a **negligible** environment for sulfate attack on concrete exposed to these materials. Degrees of attack are based on the scale of 'negligible,' 'moderate,' 'severe' and 'very severe' as described in the "Design and Control of Concrete Mixtures," published by the Portland Cement Association (PCA). Based on these preliminary data, sulfate-resistant cement likely will not be necessary in project concrete. Additional testing for the presence of water-soluble sulfates should be performed as part of design-level geotechnical studies, however.

Preliminary Soil Corrosivity Data were obtained to support an initial assessment of the potential for corrosion of ferrous metals in contact with earth materials at the site, based on the conditions at the time of GROUND's evaluation. The test results are summarized in Table 2.

Reduction-Oxidation testing in selected samples indicated red-ox potentials of -130 and -95 millivolts. Such a low potential typically create a more corrosive environment.

Sulfide Reactivity testing indicated 'negative' and 'trace' results in the local soils. The presence of sulfides in the soils suggests a more corrosive environment.

Soil Resistivity In order to assess the "worst case" for mitigation planning, samples of materials retrieved from the test holes were tested for resistivity in the laboratory, after being saturated with water, rather than in the field. Resistivity also varies inversely with temperature. Therefore, the laboratory measurements were made at a controlled temperature. Measurement of electrical resistivity indicated values of approximately 2,054 and 3,122 ohm-centimeters in selected samples of site soils.

pH Where pH is less than 4.0, soil serves as an electrolyte; the pH range of about 6.5 to 7.5 indicates soil conditions that are optimum for sulfate reduction. In the pH range above 8.5, soils are generally high in dissolved salts, yielding a low soil resistivity.[9] Testing of a selected sample of site soils indicated pH values of about 8.2 and 8.7.

Preliminary Corrosivity Assessment Taken together, the above data suggest a severely corrosive site for ferrous metals. In our experience, however, the local clayey soils and claystones commonly represent a relatively severely corrosive environment. Additional, structure-specific corrosivity assessments should be performed for final design.

Surface and Subsurface Drainage Wetting of the bearing soils can lead to loss of support and greater than anticipated settlements on most sites. Project plans should include establishment and maintenance of effective drainage (both surface and subsurface). Raising grades and the use of granular fill soils (e.g., sands and gravels) appears to be beneficial in this regard.

Underdrains can be a beneficial part of the site drainage program, and given the shallow depths to groundwater, underdrains may be necessary to develop effective drainage

[9] American Water Works Association ANSI/AWWA C105/A21.5-05 Standard.

depending on final grades. Additionally, buildings with below-grade or partially below-grade levels should be provided with underdrains.

Preliminary Pavements Sections *The following initial or preliminary pavement sections are based on current grades and the shallow on-site soils. Final pavement design must be completed once final grades are established.*

Preliminary Pavement Thicknesses Pavement sections supported by the local soils likely will consist of 5 to 6 inches of asphalt (or an equivalent composite section) in parking areas and 5½ to 6½ inches of asphalt (or an equivalent composite section) in the driveways. Areas of heavy truck traffic such as trash collections zones, fire truck lanes, and shipping and receiving routes will likely require 6½ to 7½ inches of concrete pavement, placed over 6 inches of aggregate base course Other roads within the development may require thicker pavement sections, and can be better estimated once roadway classification and projected traffic are known.

Likely Remedial Earthwork Based on CDOT guidelines and the soil conditions encountered during this preliminary evaluation, the subgrade would need to be excavated to a depth of 2 to 3 feet or more (depending on plasticity index of soils / bedrock exposed near final surface grades), moisture-conditioned and replaced as properly re-compacted fill. Greater depths of subgrade preparation may be appropriate in some areas, however, due to the presence of collapsible and swelling native soils.

Subgrade preparation should extend the full width of the pavement from back-of-curb to back-of-curb. The subgrade for sidewalks and other project hardscaping also should be prepared in the same manner.

ADDITIONAL EXPLORATION REQUIREMENTS

The above data and conclusions are based on preliminary subsurface exploration only. Additional geotechnical studies should be performed to evaluate further the site for building-specific parameters and conclusions regarding foundation and floor system, final site grading, and pavement sections.

LIMITATIONS

This preliminary report has been prepared for Arbor Capital Partners, LLC as it pertains to planning of the proposed development of the subject site as described herein. It may not contain sufficient information for other parties or other purposes. If any information referred to herein is not well understood, then Arbor Capital Partners, LLC, or anyone using this report, should contact the author or a GROUND principal immediately. GROUND will be available to meet to discuss the risks and remedial approaches presented in this report, as well as other potential approaches, upon request.

The preliminary geotechnical conclusions in this report relied upon subsurface exploration at a limited number of exploration points, as shown in Figure 1, as well as the means and methods described herein. Subsurface conditions were interpolated between and extrapolated beyond these locations. It is not possible to guarantee the subsurface conditions are as indicated in this report. The conditions exposed during design-level evaluations may differ from those encountered during subsurface exploration for this study.

This report provides the findings of our preliminary geotechnical evaluation of the site. It does not include sufficient geotechnical information or parameters for final design of buildings or other improvements. Additional, structure-specific subsurface exploration and testing shall be performed to provide information for the project design.

This report was prepared in a manner consistent with that degree of care and skill ordinarily exercised by member of the same profession currently practicing under the same or similar circumstances. GROUND makes no warranties, either expressed or implied, as to the professional data, opinions, or conclusions contained herein.

Sincerely,

GROUND Engineering Consultants, Inc.

Ben Fellbaum, P.G.

Reviewed by Brian H. Reck, P.G., C.E.G., P.E.

GOOGLE EARTH AERIAL IMAGE (05/31/2018)

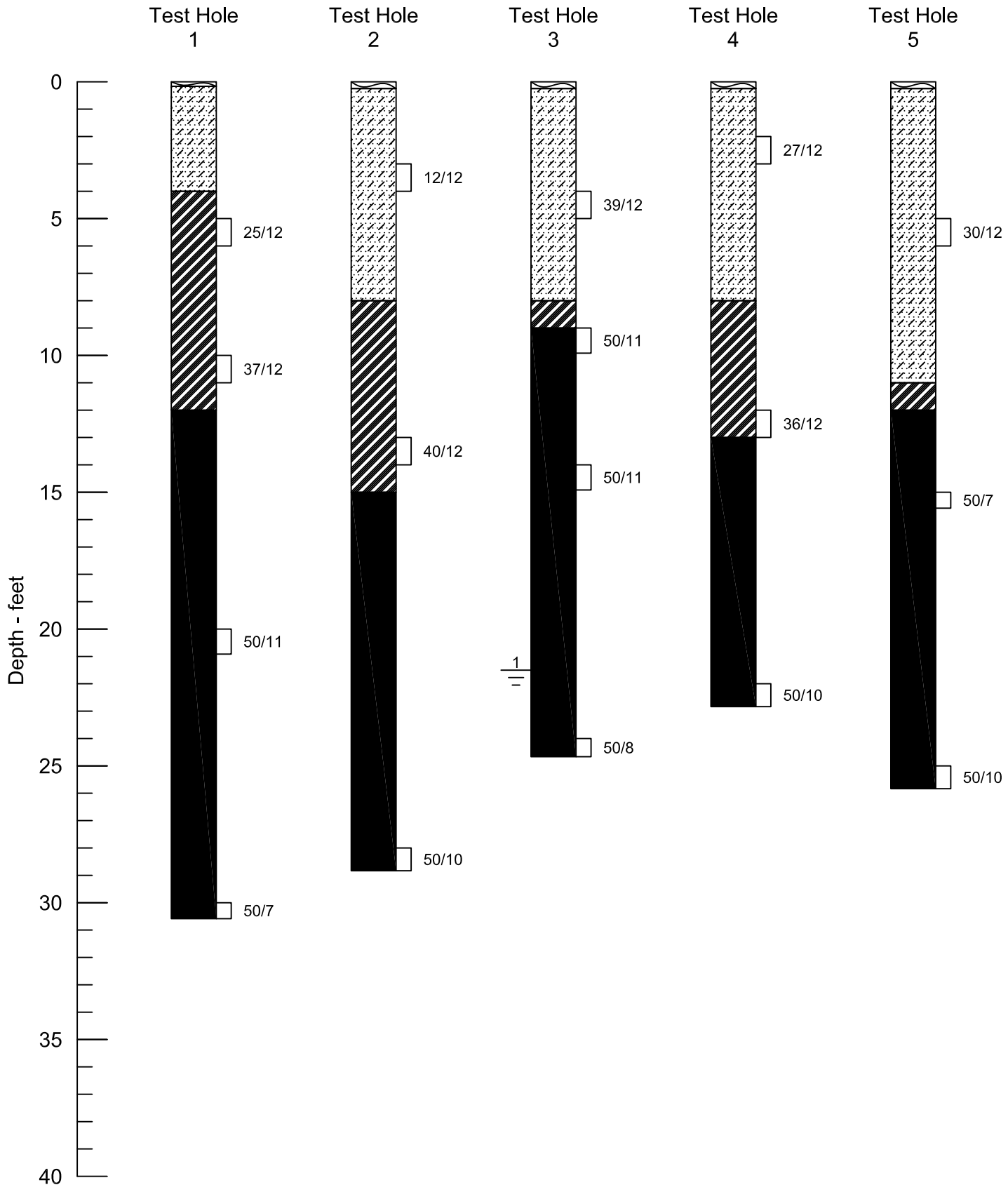
1
Indicates test hole number and approximate location.

(Not to Scale)

GROUND
ENGINEERING CONSULTANTS

LOCATION OF TEST HOLES

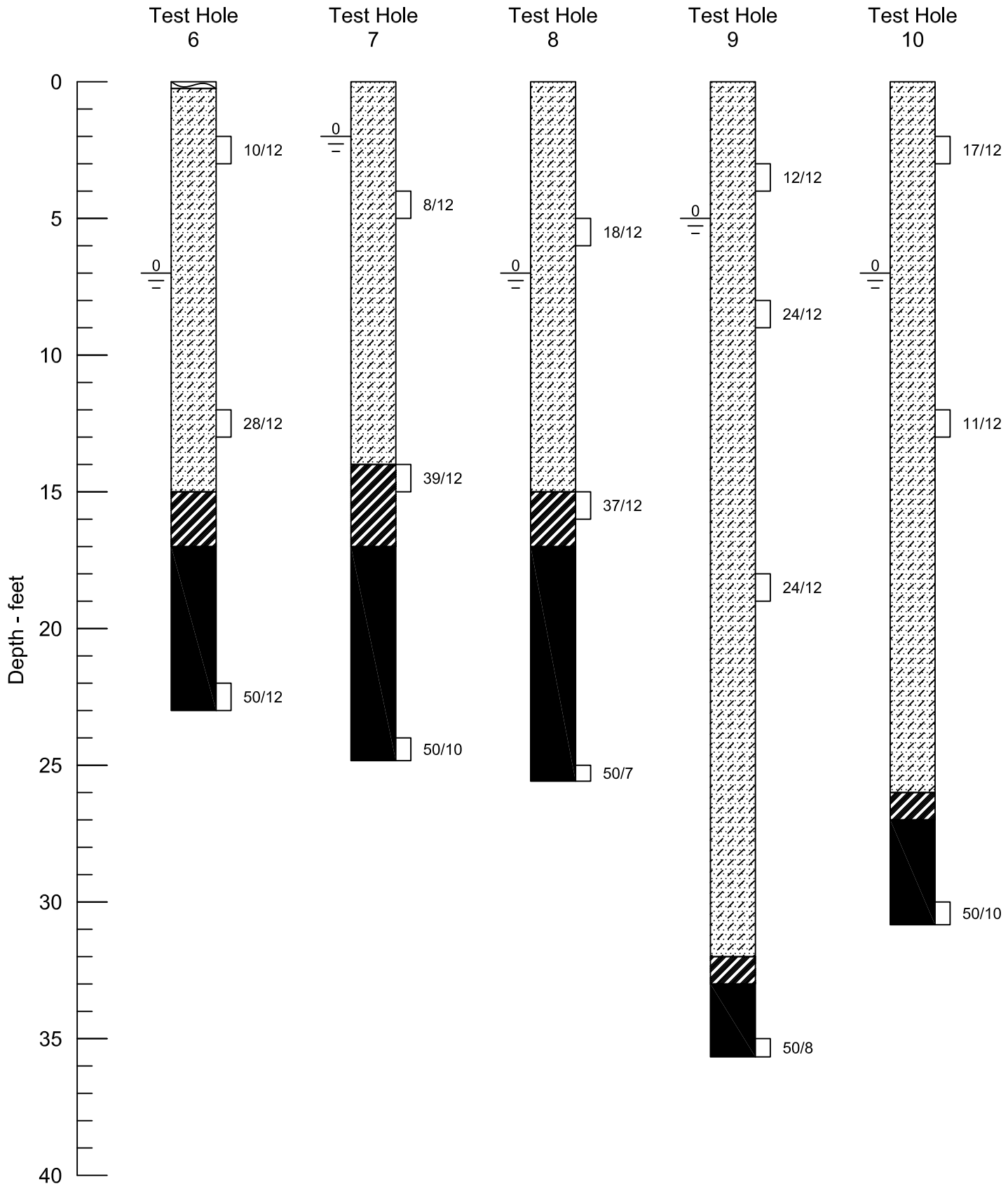
JOB NO.: 18-3062	FIGURE: 1
CADFILE NAME: 3062SITE.DWG	



GROUND
ENGINEERING CONSULTANTS

LOGS OF TEST HOLES

JOB NO.: 18-3062	FIGURE: 2
CADFILE NAME: 3062LOG01.DWG	



GROUND
ENGINEERING CONSULTANTS

LOGS OF TEST HOLES

JOB NO.: 18-3062	FIGURE: 3

CADFILE NAME: 3062LOG02.DWG

LEGEND:

Topsoil

Sands and Clays: Fine to coarse sands and clays with varying fractions of silts. They were slightly moist to wet, non- to highly plastic, and light brown to brown in color. Caliche and iron staining were encountered locally.

Weathered Claystone: Weathered claystone with local weathered siltstone and sandstone beds. They were very moist to wet, moderately to highly plastic, firm medium hard, and brown to gray in color. Iron staining and caliche were noted locally.

Claystone Bedrock: Claystone with local siltstone and sandstone beds. They were moist to wet, moderately to highly plastic, hard to very hard, and gray in color. Iron staining was noted locally.

Drive sample, 2-inch I.D. California liner sample

23/12 Drive sample blow count, indicates 23 blows of a 140-pound hammer falling 30 inches were required to drive the sampler 12 inches.

0 Depth to water level and number of days after drilling that measurement was taken.

NOTES:

1) Test holes were drilled on 10/23, 10/26, and 11/01/2018 with 4-inch diameter continuous flight augers.
2) Locations of the test holes were measured approximately by pacing from features shown on the site plan provided.
3) Elevations of the test holes were not measured and the logs of the test holes are drawn to depth.
4) The test hole locations and elevations should be considered accurate only to the degree implied by the method used.
5) The lines between materials shown on the test hole logs represent the approximate boundaries between material types and the transitions may be gradual.
6) Groundwater level readings shown on the logs were made at the time and under the conditions indicated. Fluctuations in the water level may occur with time.
7) The material descriptions on this legend are for general classification purposes only. See the full text of this report for descriptions of the site materials and related information.
8) All test holes were immediately backfilled upon completion of drilling, unless otherwise specified in this report.

GROUND
ENGINEERING CONSULTANTS

LEGEND AND NOTES

JOB NO.: 18-3062	FIGURE: 4
CADFILE NAME: 3062LEG.DWG	

Cottonwood Greens
Preliminary Evaluation

TABLE 1: SUMMARY OF LABORATORY TEST RESULTS

Sample Location		Natural	Natural	Gradation	Atterberg Limits		Swell/Consolidation		USCS	AASHTO	Sample Description
Test Hole No.	Depth *(feet)*	Moisture Content *(%)*	Dry Density *(pcf)*	Fines *(%)*	Liquid Limit	Plasticity Index	Volume Change *(%)*	Surcharge Pressure *(psf)*	Equivalent Classification	Equivalent Classification (Group Index)	
1	10	22.2	102.3	94.6	52	28	-	-	CH	A-7-6 (30)	Weathered CLAYSTONE
1	20	20.4	109	94.1	58	29	0.3	2500	CH	A-7-6 (32)	CLAYSTONE Bedrock
2	3	2.5	101.3	5.5	NV	NP	-3.8	400	SP-SM	A-2-4 (0)	SAND with Silt
3	4	7.4	108	59.9	24	6	-	-	s(CL-ML)	A-4 (1)	Sandy , Silty CLAY
3	24	16.8	113.8	95.9	59	35	0.1	3000	CH	A-7-6 (38)	CLAYSTONE Bedrock
4	12	24.2	92.4	97.7	75	44	4.1	500	CH	A-7-5 (52)	Weathered CLAYSTONE
5	5	16.7	114.6	64.7	37	16	-	-	s(CL)	A-6 (8)	Sandy CLAY
7	14	18.9	111.3	91	50	27	-	-	CH	A-7-6 (27)	Weathered CLAYSTONE
9	3	12.3	113.3	20.4	21	6	-	-	SC-SM	A-2-4 (0)	Silty, Clayey SAND
10	30	20.7	103.9	85.4	58	32	-	-	CH	A-7-6 (30)	CLAYSTONE Bedrock

*Negative indicates collapse, SD = Sample disturbed, NV = No value, NP = Non-plastic

Cottonwood Greens
Preliminary Evaluation

TABLE 2: SUMMARY OF SOIL CORROSION TEST RESULTS

Sample Location		Water Soluble Sulfates *(%)*	pH	Redox Potential *(mV)*	Sulfide Reactivity*	Resistivity *(ohm-cm)*	USCS Equivalent Classification	AASHTO Equivalent Classification (Group Index)	Sample Description
Test Hole No.	Depth *(feet)*								
1	10	0.02	8.7	-130	Negative	2,054	CH	A-7-6 (30)	Weathered CLAYSTONE
9	3	0.04	8.2	-95	Trace	3,122	SC-SM	A-2-4 (0)	Silty, Clayey SAND

CTL | THOMPSON INCORPORATED

PRELIMINARY GEOTECHNICAL INVESTIGATION
COTTONWOOD GREENS SUBDIVISION
NORTHEAST OF 9TH STREET AND NORTHRUP AVENUE
FORT LUPTON, COLORADO

Prepared For:

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
4040 MacArthur Boulevard, Suite 250
Newport Beach, California 92660

Attention: Don Guerra

Project No. DN50,350-115-R1

January 31, 2020

1971 West 12th Avenue | Denver, Colorado 80204 | Phone: 303-825-0777 | Fax: 303-825-4252

TABLE OF CONTENTS

SCOPE 1
SUMMARY OF CONCLUSIONS 1
SITE CONDITIONS 3
PROPOSED DEVELOPMENT 4
INVESTIGATION 4
SITE GEOLOGY AND GEOLOGIC HAZARDS 5
- Shallow Groundwater 5
- Expansive Soil and Bedrock 6
- Seismicity 6
- Radioactivity 6
- Other Considerations 7

SUBSURFACE CONDITIONS 7
- Clay 7
- Sand 8
- Bedrock 8
- Groundwater 8

ESTIMATED POTENTIAL HEAVE 9
SITE DEVELOPMENT 10
- Excavation 10
- Dewatering 11
- Site Grading 11
- Sub-Excavation 12
- Slopes 14
- Utilities 14
- Underdrain 14
- Pavements 15

BUILDING CONSTRUCTION CONSIDERATIONS 15
- Foundations 15
- Slab-On-Grade Construction 16
- Below-Grade Areas 16
- Surface Drainage 17
- Concrete 17

RECOMMENDED FUTURE INVESTIGATIONS 18
GEOTECHNICAL RISK 18
LIMITATIONS 19

FIG. 1 – LOCATIONS OF EXPLORATORY BORINGS

FIG. 2 – APPROXIMATE ELEVATION AND DEPTH TO BEDROCK

FIG. 3 – APPROXIMATE ELEVATION AND DEPTH TO GROUNDWATER

FIG. 4 – PRELIMINARY RISK ASSESSMENT DUE TO EXPANSIVE SOIL AND BEDROCK

FIG. 5 – CONCEPTUAL SUB-EXCAVATION PROFILE

FIG. 6 – CONEPTUAL SUB-EXCAVATION PROFILE WITH INTERCEPTOR DRAIN

FIG. 7 – SUB-EXCAVATION INTERCEPTOR DRAIN

FIG. 8 – SEWER UNDERDRAIN DETAIL

FIG. 9 – CONCEPTUAL UNDERDRAIN SERVICE PROFILE

FIG. 10 – UNDERDRAIN CUTOFF WALL DETAIL

APPENDIX A – SUMMARY LOGS OF EXPLORATORY BORINGS

APPENDIX B – LABORATORY TEST RESULTS AND TABLE B-I

APPENDIX C – GUIDELINE SITE GRADING SPECIFICATIONS

APPENDIX D – GUIDELINE SUB-EXCAVATION SPECIFICATIONS

SCOPE

This report presents the results of our Preliminary Geotechnical Investigation for the Cottonwood Greens Subdivision planned northeast of 9th Street and Northrup Avenue in Fort Lupton, Colorado (Fig. 1). The purpose of our investigation was to evaluate the subsurface conditions to assist in due diligence and planning of site development and residential construction. The scope was described in a Service Agreement (DN 19-0637) dated November 14, 2019.

This report is based on subsurface conditions found in exploratory borings, results of field and laboratory tests, engineering analysis of field and laboratory data, and our experience. The report contains descriptions of the soil, bedrock and groundwater found in the exploratory borings, site geology and geologic hazards, preliminary discussions of foundation and floor support alternatives, and preliminary design and construction criteria for site development, pavements, and surface and subsurface drainage. The discussions of foundation and floor system alternatives are intended for planning purposes only. Additional investigation will be necessary to better delineate areas of sub-excavation (if selected). Site-specific investigations will be necessary to design structures and improvements. A brief summary of our conclusions and recommendations follows, with more detailed discussion in the report.

SUMMARY OF CONCLUSIONS

1. We found no geologic hazards or geotechnical concerns which will preclude development of the site. The primary geotechnical concerns are shallow groundwater and expansive soil and bedrock.

2. Strata encountered in thirty-nine exploratory borings consisted of 4.5 to 25 feet of sandy clay and slightly silty to clayey sand underlain in thirty-six borings by weathered and comparatively unweathered claystone, sandstone, and interbedded claystone/sandstone bedrock. Claystone is predominant. The clay and claystone are expansive and we judge the sand and sandstone are non-expansive.

3. Groundwater was measured at depths of about 4 to 24 feet below existing grades, or approximate elevations 4957 to 4979 feet (Fig. 3). Groundwater will likely be encountered during deep utility installation and sub-excavation (if selected), and will likely preclude use of basements in the east portion of the development. We recommend providing at least 3 feet, and preferably 5 feet of separation between groundwater and foundation excavations. Groundwater will fluctuate seasonally and may rise in response to irrigation, precipitation, land-use changes, and flow in Fulton Ditch.

4. We estimated total potential ground heave may range from less than 0.5 inch to about 9 inches considering a depth of wetting of 24 feet below proposed grades. The estimates are conservative (high). Footing foundations will likely be suitable where bedrock is deeper and lower swelling soils are present. Drilled piers will be appropriate for about two-thirds of the site unless sub-excavation is performed to allow use of footings. Measures to control groundwater will be needed if sub-excavation is used. Additional investigation is recommended to better delineate sub-excavation extent.

5. Structurally supported floors will be appropriate for non-basement, finished areas and in basements where risk of poor performance is high. Slab-on-grade basement floors can be used where non-expansive or low to moderate swelling soils extend well below the floors. Sub-excavation can be considered to allow wider use of slab-on-grade basement floors.

6. Pavement subgrade will likely consist of non-expansive sand, expansive clay or claystone, or fill derived from these materials. Clay and claystone have poor pavement support characteristics. Sand is considered better subgrade material. Mitigation of expansive subgrade consisting of sub-excavation may be necessary. The Town of Fort Lupton requires full-depth asphalt pavement sections for all public streets. We anticipate a minimum section of 5 to 6 inches of asphalt for local streets and 7 to 8 inches for residential collectors. Thicker asphalt may be necessary. Subgrade investigations should be performed after site grading.

7. Control of surface and subsurface drainage will be critical to the performance of foundations, slabs-on-grade and pavements. Overall surface drainage should be designed to provide rapid run-off of surface water away from structures, pavements and flatwork.

SITE CONDITIONS

The Cottonwood Greens Subdivision is planned northeast of 9th Street and Northrup Avenue in Fort Lupton, Colorado (Fig. 1 and Photo 1). The site contains about 116-acres and is bordered by Fulton Ditch to the north and west, County Road 31 and vacant land to the east, and 9th Street to the south. The ground surface slopes gently to the north-northwest toward Fulton Ditch with overall relief of about 35 feet. Ground cover consists primarily of grasses, weeds, and crop remnants. Some scattered trees are also present. Multiple oil/gas wells are present in the eastern portion. Review of historical aerial photos indicates the property has been used primarily as farmland.

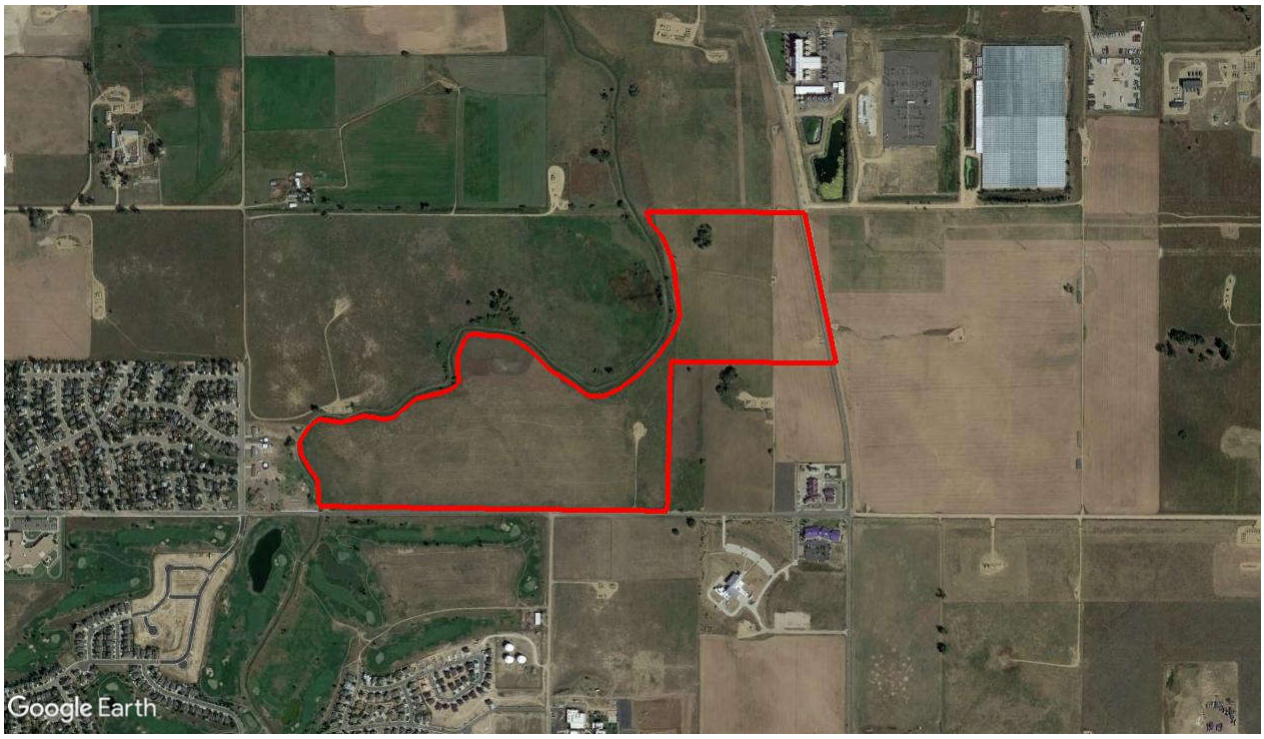


Photo 1 – Google Earth© Aerial Site Photo, September 2019

PROPOSED DEVELOPMENT

Plans prepared by Atwell Group indicate the parcel is planned for single-family and multi-family residences serviced by paved roadways and buried utilities. We anticipate the residences will consist of one or two-story, wood-framed structures with crawl spaces and/or basements. Several pocket parks and detention ponds are also planned. Based on proposed grades at our boring locations, cut and fills of up to about 12 feet are planned to achieve overlot grades. A majority of the cuts and fills are relatively minor (about 5 feet or less).

INVESTIGATION

We investigated subsurface conditions by drilling 39 widely-spaced exploratory borings at the locations shown on Fig. 1. The boring locations were staked and surveyed by Atwell Group. We contacted the Utility Notification Center of Colorado and local sewer and water districts prior to drilling to clear drilling locations for conflicts with buried utilities. The borings were advanced to about 25 feet below the existing ground surface using 4-inch diameter, continuous-flight solid-stem auger and a truck-mounted CME-45 drill rig. Samples of the soil and bedrock were obtained at 5 feet intervals using either 2.5-inch diameter (O.D.) modified California barrel samplers or 2.0-inch diameter (O.D.) split-spoon samplers driven by an automatic 140-pound hammer falling 30 inches. Our representative observed drilling, logged the soil and bedrock encountered, and obtained samples. Summary logs of the exploratory borings are presented in Appendix A.

The samples were returned to our laboratory where they were examined by our engineer. Laboratory tests included dry density, moisture content, percent silt and clay-sized particles (passing the No. 200 sieve), Atterberg limits, swell-consolidation, and water-soluble sulfate concentration. Swell-consolidation tests were performed by wetting the samples under approximate post-grading overburden pressures (i.e. the

pressure exerted by the overlying soil after site grading). Results of laboratory tests are presented in Appendix B.

SITE GEOLOGY AND GEOLOGIC HAZARDS

According to the Geologic Map of the Fort Lupton Quadrangle, Weld and Adams Counties (Soister, P.E.: Map GQ-397, 1965), the site is underlain by windblown deposits of clay, silt, and sand underlain by sedimentary bedrock of the lower portion of the Dawson formation. The soil includes expansive clay. The bedrock includes expansive claystone.

Site geology and geologic hazards were evaluated through review of geologic maps, field observations, conditions found in our exploratory borings, and our experience with similar projects. No geologic hazards were identified which would preclude development of this site. The hazards identified are:

- Shallow groundwater
- Expansive soil and bedrock, and
- Regional issues of seismicity and radioactivity.

These hazards can be mitigated with proper planning, engineering, design and construction.

Shallow Groundwater

Groundwater was measured at depths of about 10 feet or less below existing grades in about half of the borings. Shallow groundwater will likely preclude use of basement residences in the east portion of the site. We recommend at least 3 feet, and preferably 5 feet of separation between foundation excavations and groundwater. Where basements are within 5 feet of groundwater, we advocate use of vapor

retarders over a gravel layer below basement floor slabs. One alternative would be to plan non-basement residences in areas with shallow groundwater.

Shallow groundwater may also complicate site development such as utility installation. Contractors should be prepared to deal with wet soils, flat trench excavation slopes below groundwater, and temporary dewatering.

Expansive Soil and Bedrock

The clay and claystone bedrock encountered in our borings are expansive. There is risk that ground heave will damage pavements, slabs-on-grade and foundations. Engineered design of grading, pavements, foundations, slabs-on-grade, and surface drainage can mitigate, but not eliminate, the potential risk.

Seismicity

Based on available mapping, we found no active faults within or near the site. The soil and bedrock units are not expected to respond unusually to seismic activity. According to the International Residential Code (IRC) for seismic design, we believe the site classifies as Site Class C or D.

Radioactivity

It is normal in the Front Range of Colorado and nearby eastern plains to measure radon gas in poorly ventilated spaces in contact with soil or bedrock. Radon 222 gas is considered a health hazard and is just one of several radioactive products in the chain of the natural decay of uranium into lead. Radioactive nuclides are common in the soil and bedrock underlying the subject site. Because these sources exist or will exist on most sites in the area, there is a potential for radon gas accumulation in poorly ventilated spaces. The amount of soil gas that can accumulate is a function of many factors, including the radionuclide activity of the soil and bedrock,

construction methods and materials, soil gas pathways, and accumulation areas. The only reliable method to determine if a hazard exists is to perform radon testing of completed structures to determine the level of radon gas accumulation. Typical mitigation methods consist of sealing soil gas entry areas and ventilation of below-grade spaces. We recommend provisions for ventilation of foundation drain systems if a radon problem is discovered.

Other Considerations

We observed no evidence of unstable slopes. Erosion potential on the site is considered low due to gentle slopes and existing vegetation. The potential will increase during construction but should return to pre-construction rates or less if proper grading practices, surface drainage design, and re-vegetation efforts are implemented. We did not identify significant economically recoverable, high quality aggregate or rare earth materials in our borings.

SUBSURFACE CONDITIONS

Strata encountered in thirty-nine borings consisted of 4.5 to 25 feet of sandy clay and slightly silty to clayey sand underlain in thirty-six borings by weathered and comparatively unweathered claystone, sandstone, and interbedded claystone/sandstone bedrock. Pertinent engineering characteristics of the soil and bedrock are described in the following paragraphs.

Clay

Sandy, silty clay was encountered from the ground surface or within the sand in fourteen borings. The clay was stiff to very stiff based on field penetration resistance test results. Nine samples swelled 0.1 to 5 percent when wetted. One sample contained 51 percent silt and clay-sized particles and exhibited moderate plasticity.

Sand

At least 4.5 feet of sand was found from the ground surface in thirty-two borings. The sand was loose to medium dense. One sample of clayey sand compressed slightly when wetted. Twenty-seven samples contained 8 to 46 percent silt and clay-sized particles, with two exhibiting low and moderate plasticity. We judge the sand is non-expansive.

Bedrock

Bedrock consisted primarily of weathered and comparatively unweathered claystone, with lesser amounts of sandstone and interbedded claystone/sandstone and was encountered in thirty-six borings at depths of about 4.5 to 22 feet, or approximate elevations 4952 to 4985 feet (Fig. 2). Weathered zones encountered in thirty borings ranged in thickness from about 2 to 17.5 feet. The unweathered bedrock is medium hard to very hard. Two claystone samples compressed slightly, one did not swell, and fifty-five swelled 0.2 to 8.6 percent when wetted. The average swell of the claystone was 3.4 percent. Four samples of claystone contained 91 to 97 percent silt and clay-sized particles and exhibited moderate to high plasticity. One interbedded claystone/sandstone sample contained 32 silt and clay-sized particles and one sample of sandstone contained 30 percent fines.

Groundwater

Groundwater was encountered during drilling in sixteen borings at depths of about 4 to 20 feet. When checked after drilling on January 22, 2020, water was measured in thirty-three holes at depths of about 4 to 24 feet, or approximate elevations 4957 to 4979 feet (Fig. 3). The remaining holes were dry or had been covered and a delayed groundwater measurement could not be obtained. Groundwater was generally shallower in borings adjacent to Fulton Ditch and on the northeastern portion of the site Groundwater will likely be encountered during deep utility installa-

tion and may be encountered during sub-excavation (if selected). We recommend providing at least 3 feet, and preferably 5 feet of separation between groundwater and foundation excavations. Figure 3 includes estimated areas where groundwater is 10 feet or less below proposed grades. Use of basement residences may be precluded in these areas. Groundwater will fluctuate seasonally and may rise in response to irrigation, precipitation, land-use changes, and flow in Fulton Ditch.

ESTIMATED POTENTIAL HEAVE

Based on the subsurface profiles, swell-consolidation test results and our experience, we estimated the potential heave at proposed grade for each test hole as shown in the table below. A depth of wetting of 24 feet below proposed grades was considered for the analysis. We assumed an average swell of 0.5 percent for site grading fill. The estimates are conservative (high) because they assume full wetting and potential heave of material below groundwater. Due to widely spaced borings, variations from our estimates should be anticipated. It is not certain these movements will occur.

TABLE I
ESTIMATED POTENTIAL GROUND HEAVE
BASED ON 24-FEET DEPTH OF WETTING

Boring No.	Estimated Potential Heave at Proposed Grade (inches)	Boring No.	Estimated Potential Heave at Proposed Grade (inches)
TH-1	1.4	TH-21	2.6
TH-2	2.2	TH-22	4.5
TH-3	4.8	TH-23	2.7
TH-4	6.6	TH-24	3.6
TH-5	4.3	TH-25	3.6
TH-6	5.8	TH-26	4.4
TH-7	5.6	TH-27	2.4
TH-8	8.0	TH-28	5.3
TH-9	8.7	TH-29	<0.5
TH-10	5.5	TH-30	<0.5

Boring No.	Estimated Potential Heave at Proposed Grade (inches)	Boring No.	Estimated Potential Heave at Proposed Grade (inches)
TH-11	5.2	TH-31	0.5
TH-12	3.5	TH-32	2.2
TH-13	6.9	TH-33	<0.5
TH-14	6.2	TH-34	1.1
TH-15	1.9	TH-35	2.5
TH-16	9.2	TH-36	0.9
TH-17	5.3	TH-37	1.7
TH-18	4.1	TH-38	2.7
TH-19	4.9	TH-39	3.9
TH-20	1.8		

SITE DEVELOPMENT

The primary geotechnical concerns that we believe will influence development and building construction on this site are shallow groundwater and expansive soil and bedrock. These concerns can be mitigated with proper planning, engineering, design and construction. We believe there are no geologic or geotechnical constraints at this site that would preclude development. The following sections discuss site development recommendations.

Excavation

We believe the soil and bedrock penetrated by our exploratory borings can be excavated with typical heavy-duty equipment. Contractors should be familiar with applicable local, state and federal safety regulations, including the current Occupational Safety and Health Administration (OSHA) Excavation and Trench Safety Standards. Based on our investigation and OSHA standards, we anticipate the sandy clay and bedrock may classify as Type B soil and the sand as Type C. Type B and Type C soils require maximum slope inclinations of 1H:1V (horizontal to vertical) and 1.5H:1V for excavations in dry conditions, respectively. Flatter slopes will be neces-

sary below groundwater. Contractors are required to identify the soils encountered in excavations and refer to OSHA standards to determine appropriate slopes. Excavations deeper than 20 feet should be designed by a professional engineer.

Dewatering

Groundwater may be encountered in utility excavations and during sub-excavation (if selected). Temporary construction dewatering systems will probably be needed to properly install deep utilities for some areas of the site. We believe that dewatering for excavations which penetrate less than 3 to 5 feet below the groundwater surface may be accomplished using conventional sump and pump methods in utility trenches. Deeper excavations may require more elaborate dewatering (such as well points).

The Town of Fort Lupton and/or the Colorado Department of Public Health may require dewatering permits. Our experience indicates periodic environmental testing is usually required with these permits, with reporting. Permitting requirements may also influence the construction schedule.

Site Grading

The on-site soils free of vegetation are suitable for use as site grading fill. Fill should be placed in thin loose lifts (8-inches or less), and be moisture-conditioned and compacted prior to placement of the next lift. Clay fill should be moisture-conditioned between optimum and 3 percent above optimum moisture content and compacted to at least 95 percent of maximum standard Proctor dry density (ASTM D 698). Sand fill should be moisture-conditioned within 2 percent of optimum moisture content and compacted similarly. A representative of our firm should observe and test compaction of the fill during placement. Guidelines for site grading are presented in Appendix C.

Sub-Excavation

Our investigation indicates non-expansive sand and expansive clay and claystone bedrock are present at depths likely to influence performance of shallow foundations and slabs-on-grade. We calculated potential heave could range from less than 0.5 up to about 9 inches for an assumed depth of wetting of 24 feet. Figure 4 presents our interpretation of risk due to expansive soils and bedrock at each boring location. Based on the data and our evaluation, low risk conditions are present at 13 borings. Shallow foundations can likely be used without sub-excavation in low risk areas. We judge there is moderate risk due to expansive soils and bedrock in eight borings and high risk in eighteen borings. If shallow foundations (footings) are desired, deep sub-excavation (10 feet below lowest foundation element) should be anticipated at the moderate and high risk locations. A conceptual sub-excavation profile for basement construction in presented on Fig. 5. Measures to control groundwater will likely be needed if sub-excavation is used. If non-basement residences are used the number of lots that merit sub-excavation may be less. Due to the relatively wide boring spacing, additional investigation will be necessary to better delineate areas that merit sub-excavation.

Many builder/developers choose to perform sub-excavation to reduce potential heave and provide a relatively uniform fill layer that is likely suitable for footings and slab-on-grade basement floors. Deep foundations (drilled piers) and structurally supported basement floor systems are also used on some moderate, and high to very high sites where sub-excavation is impractical.

Sub-excavation has been used in the Front Range area with satisfactory performance for the large majority of the sites where this ground modification method has been completed. We have seen isolated instances where settlement of sub-excavation fill has led to damage to buildings supported on shallow foundations. In most cases, the settlement was caused by wetting associated with poor surface

drainage and/or poorly compacted fill placed at the horizontal limits of excavation. Wetting of the fill may cause softening and settlement.

There can be cases where the sub-excavation limits and depth are not adequate to encompass an entire building footprint including decks, patios and porches. Thus, the residence must be founded on deep foundations. Proper planning of the sub-excavation limits and depth based on the largest plan, and as-built surveying of the limits and depth during the sub-excavation are important to reduce this risk.

The excavation slopes should meet OSHA, state, and local safety standards. The bottom of the sub-excavated area should extend laterally at least 5 feet outside the largest possible foundation footprints to ensure foundations are constructed over moisture-conditioned fill.

The sub-excavation contractors should be chosen carefully to assure they have experience with fill placement at over-optimum moisture and have the necessary equipment. The contractors should provide a construction disc to break down fill materials and anticipate use of push-pull scraper operations and dozer assistance. The operation will be relatively slow. The presence of shallow groundwater will complicate sub-excavation. For areas where groundwater is exposed more than a few feet above the bottom of the cut, installation of an interceptor drain along the base of the sub-excavation will be necessary (Figs. 6 and 7). In order for the procedure to be performed properly, close contractor control of fill placement to specifications is required. Special precautions should be taken for compaction of fill at corners, access ramps, and along the perimeters of the sub-excavation as large compaction equipment cannot easily reach these areas. Clay fill should be moisture-conditioned between optimum and 4 percent above optimum moisture content, with a daily average of 1 percent above optimum or higher. Sand fill should have a moisture content within 2 percent of optimum. Fill should be compacted to at least 95 percent of maximum standard Proctor dry density (ASTM D 698). Guideline specifications are presented in Appendix D. A representative of our firm should observe placement and

test compaction of the fill. The fill should be tested to evaluate swell after placement to verify whether footing or pad-type foundations and slab-on-grade basement floors can be used.

Slopes

We recommend permanent cut and fill slopes be designed with a maximum slope of 3:1 (horizontal to vertical). Use of 4:1 slopes would be better to control erosion. If site constraints (property boundaries and streets) do not permit construction with recommended slopes, we should be contacted to evaluate the subsurface soils and steeper slopes.

Utilities

Water and sewer lines are usually constructed beneath paved roads. Compaction of trench backfill can have a significant effect on the life and serviceability of pavements. Trench backfill should be placed in thin, loose lifts (8 inches or less) and be moisture-conditioned and compacted as described in Site Grading. The placement and compaction of trench backfill should be observed and tested by a representative of our firm during construction.

Underdrain

With long-term development and subsequent irrigation, groundwater could rise. The water could lead to expansive soil related problems and frequent pumping of foundation drains. We advocate use of underdrains incorporated into the design of sanitary sewer systems to provide a means to control water and allow gravity discharge from foundation drains. It may not be practical to use underdrains at this site because a gravity outlet is not close; the operators of Fulton Ditch may also not allow underdrains near the Ditch. Conceptual sewer underdrain details are provided on Figs. 8 through 10. If the underdrains discharge to a detention pond or drainage, the

potential for backflow of water from the discharge point into the underdrain and building foundation drains should be evaluated.

Pavements

Pavement subgrade soils will likely consist of non-expansive sand, expansive clay or claystone, or fill composed of these materials. Clay and claystone have poor pavement support characteristics. Sand is considered better subgrade material. Depending on site grading, mitigation of expansive subgrade through sub-excavation may be necessary. We suggest planning for 3 feet of street sub-excavation in the west two-thirds of the site. The Town of Fort Lupton requires full-depth asphalt pavement sections for all public streets. We anticipate a minimum section of at least 5 to 6 inches of asphalt for local streets and 7 to 8 inches of asphalt for residential collectors. Thicker asphalt may be necessary. Subgrade investigation and pavement designs should be performed after grading is complete.

BUILDING CONSTRUCTION CONSIDERATIONS

The following discussions are preliminary and not intended for design or construction. After grading is completed, design-level investigations should be performed on a building-specific basis.

Foundations

Our investigation indicates non-expansive sand and expansive clay and claystone bedrock are present at depths likely to influence performance of shallow foundations and slabs-on-grade. Footing foundations appear suitable where bedrock is deeper and lower swelling soils are present (about one-third of the site), or if sub-excavation of expansive material is performed. Alternatively, a deep foundation system such as drilled piers can be considered for areas with moderate to high swelling soils or bedrock. Post-tensioned slab-on-grade foundations may also be

considered where basements are not planned. Additional investigation should be conducted to more fully assess soil conditions.

Slab-On-Grade Construction

Structurally supported floors should be anticipated in all non-basement finished living space in residences unless post-tensioned slab-on-grade foundations are used. Slab-on-grade basement floors may be considered on low and moderate risk sites where potential heave is acceptable to builders and home buyers. Structurally-supported basement floors should be used on sites with high or very high risk of poor basement slab performance. Based on our widely-spaced borings, moderate to high risk conditions appear to be present for about two-thirds of the site.

The performance of surface flatwork may be poor at this site where higher swell materials are present, unless sub-excavation is performed below these improvements. The following precautions will be required to reduce the potential for damage due to movement of conventional slab-on-grade floors:

1. Isolation of the slabs from foundation walls, columns or other slab penetrations using a slip-joint;
2. Voiding of interior partition walls at the top or bottom to allow slab movement to occur without transferring movement to the structure; and
3. Flexible water and gas connections to allow for slab movement. A flexible plenum above slab-supported furnaces will be required.

Below-Grade Areas

Surface water can penetrate relatively permeable loose backfill soils located adjacent to structures and collect at the bottom of relatively impermeable excavations causing wet or moist conditions. If basements are not used in residences, crawl space drains should be planned. Below grade walls should be designed for lateral

earth pressures. Foundation drains should ideally be connected to an underdrain system to provide a gravity outlet. The drains can be connected to a sump pit where water is removed by pumping if an underdrain is not provided.

Surface Drainage

The performance of improvements will be influenced by surface drainage. When developing an overall drainage scheme, consideration should be given to drainage around each building. The ground surface around buildings should be sloped to provide positive drainage away from the foundations. We typically recommend a slope of at least 10 percent for the first 10 feet surrounding residences with basements, where practical, and slopes of at least 5 percent around structures without basements. Where possible, drainage swales should slope at least 2 percent. Roof downspouts and other water collection systems should discharge well beyond the limits of backfill around structures.

Proper control of surface runoff is also important to control the erosion of surface soils. Concentrated sheet flow should not be directed over unprotected slopes. Water should not be allowed to pond at the crest of slopes. Permanent slopes should be prepared to reduce erosion.

Attention should be paid to compact the soils behind curb and gutter adjacent to streets and in utility trenches during development. If surface drainage between preliminary development and construction phases is neglected, performance of the roadways, flatwork and foundations may be poor.

Concrete

Concrete in contact with soil can be subject to sulfate attack. We measured water-soluble sulfate concentrations of 0.01 and 0.02 percent in two samples from this site. For this level of sulfate concentration, ACI 332-08 *Code Requirements for*

Residential Concrete indicates there are no special requirements for sulfate resistance. We recommend additional testing during design-level investigations. We suspect higher concentrations may be found in the west portion of the site.

Superficial damage may occur to the exposed surfaces of highly permeable concrete, even though sulfate levels are relatively low. To control this risk and to resist freeze-thaw deterioration, the water-to-cementitious materials ratio should not exceed 0.50 for concrete in contact with soils that are likely to stay moist due to surface drainage or shallow groundwater. Concrete should have a total air content of 6 percent ± 1.5 percent.

RECOMMENDED FUTURE INVESTIGATIONS

We recommend the following investigations and services:

1. Additional investigation to better delineate potential sub-excavation extent (if selected);
2. Construction testing and observation during site development, including compaction testing of grading fill, utility trench backfill, and pavements;
3. Subgrade investigation and pavement designs after grading;
4. Design-level soil investigations for structures; and
5. Foundation installation observations.

GEOTECHNICAL RISK

The concept of risk is an important aspect with any geotechnical evaluation primarily because the methods used to develop geotechnical recommendations do not comprise an exact science. We never have complete knowledge of subsurface conditions. Our analysis must be tempered with engineering judgment and experience. Therefore, the recommendations presented in any geotechnical evaluation

should not be considered risk-free. Our recommendations represent our judgment of those measures that are necessary to increase the chances that the development and structures will perform satisfactorily. It is critical that all recommendations in this report are followed during construction.

LIMITATIONS

Our borings were widely spaced to provide a preliminary picture of subsurface conditions for planning. We believe this investigation was conducted in a manner consistent with the level of care and skill ordinarily used by geotechnical engineers practicing under similar conditions. No warranty, express or implied, is made.

If we can be of further service in discussing either the contents of this report or the analysis of the influence of subsurface conditions on the design of the proposed development, please call.

CTL | THOMPSON, INC.

Chris Fitzsimmons, E.I.T.
Staff Engineer

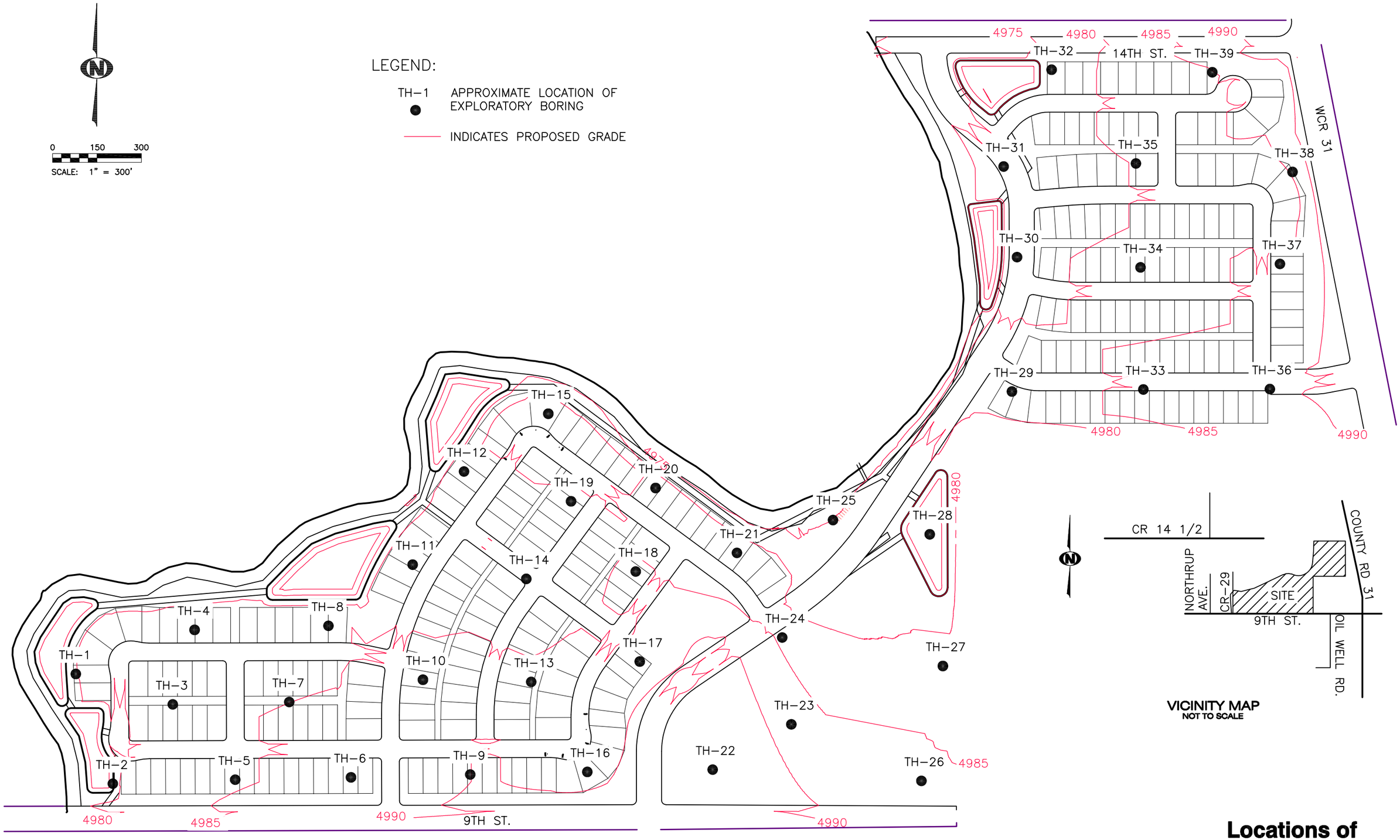
Reviewed by:

Ronald M. McOmber, P.E.
Chairman, Senior Principal

Ronald M. McOmber
Jan 31 2020

CF:RMM/nn

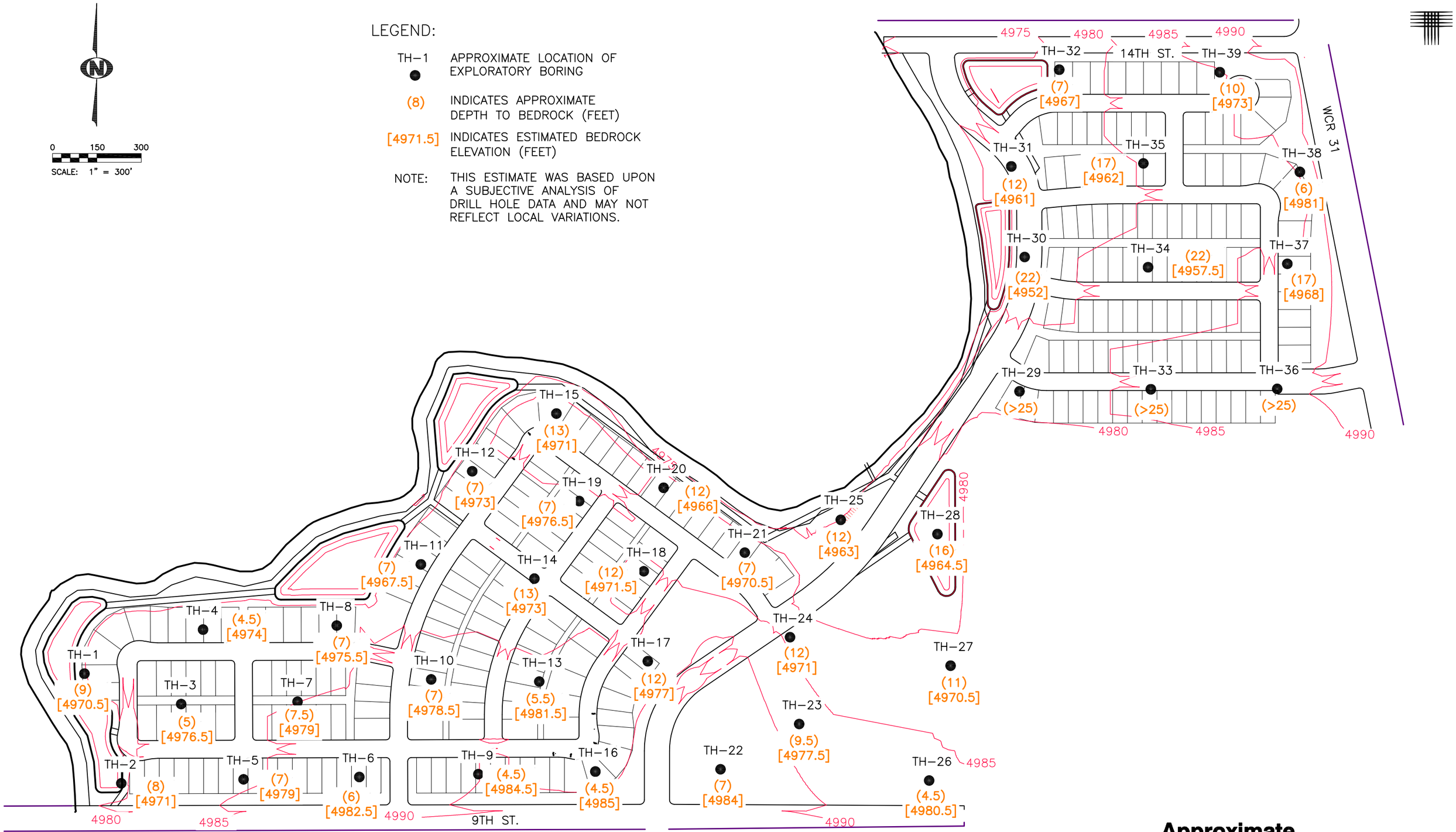
Via e-mail: don.guerra@landassesststrategies.com
mmcgoldrick@atwell-group.com



ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREENS SUBDIVISION
CTL\T Project No. DN50,350-115-R1

Locations of Exploratory Borings

Fig. 1



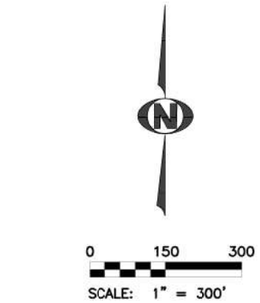
ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREENS SUBDIVISION
CTL\T Project No. DN50,350-115-R1

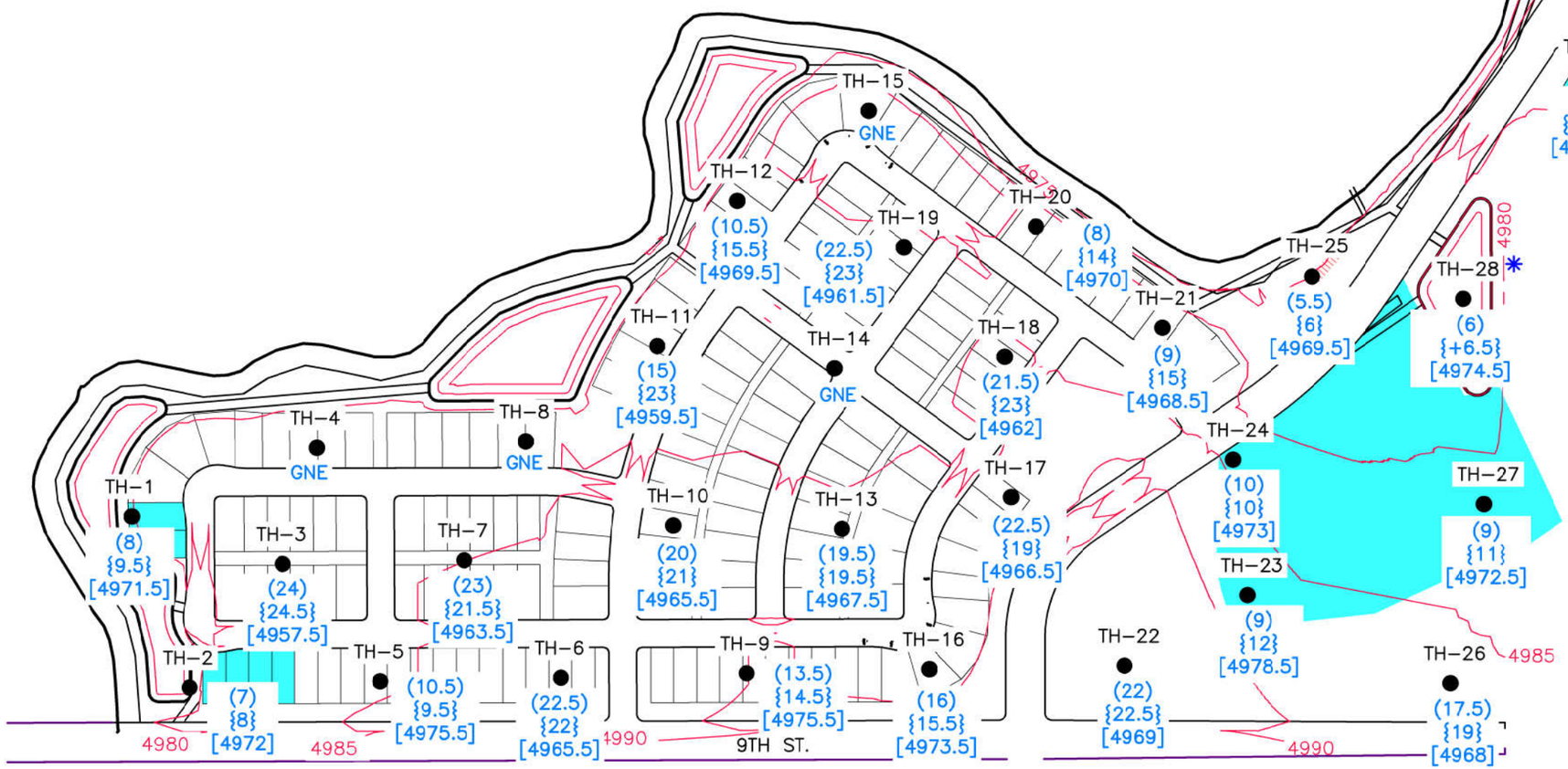
Approximate Elevation and Depth to Bedrock Fig. 2

LEGEND:

TH–1 ●	APPROXIMATE LOCATION OF EXPLORATORY BORING
(8)	INDICATES MEASURED DEPTH TO GROUNDWATER BELOW EXISTING GRADE (FEET)
{9.5}	INDICATES MEASURED DEPTH TO GROUNDWATER BELOW PROPOSED GRADE (FEET)
[4971.5]	INDICATES ESTIMATED GROUNDWATER ELEVATION (FEET)
GNE	GROUNDWATER WAS NOT ENCOUNTERED
*	GROUNDWATER MEASUREMENT REFLECTS READING OBTAINED DURING DRILLING
+	INDICATES GROUNDWATER IS ABOVE PROPOSED GRADE
■	INDICATES ESTIMATED AREA WHERE GROUNDWATER IS 10 FEET OR LESS BELOW PROPOSED GRADES. USE OF BASEMENT RESIDENCES MAY BE PRECLUDED.

NOTE: THIS ESTIMATE WAS BASED UPON A SUBJECTIVE ANALYSIS OF DRILL HOLE DATA AND MAY NOT REFLECT LOCAL VARIATIONS AND SEASONAL FLUCTUATIONS.





ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREENS SUBDIVISION
CTL\T Project No. DN50,350-115-R1

Approximate Elevation and Depth to Groundwater

Fig. 3

LEGEND:

TH–1 APPROXIMATE LOCATION OF EXPLORATORY BORING

LOW RISK; FOOTINGS CAN LIKELY BE USED WITHOUT SUB–EXCAVATION

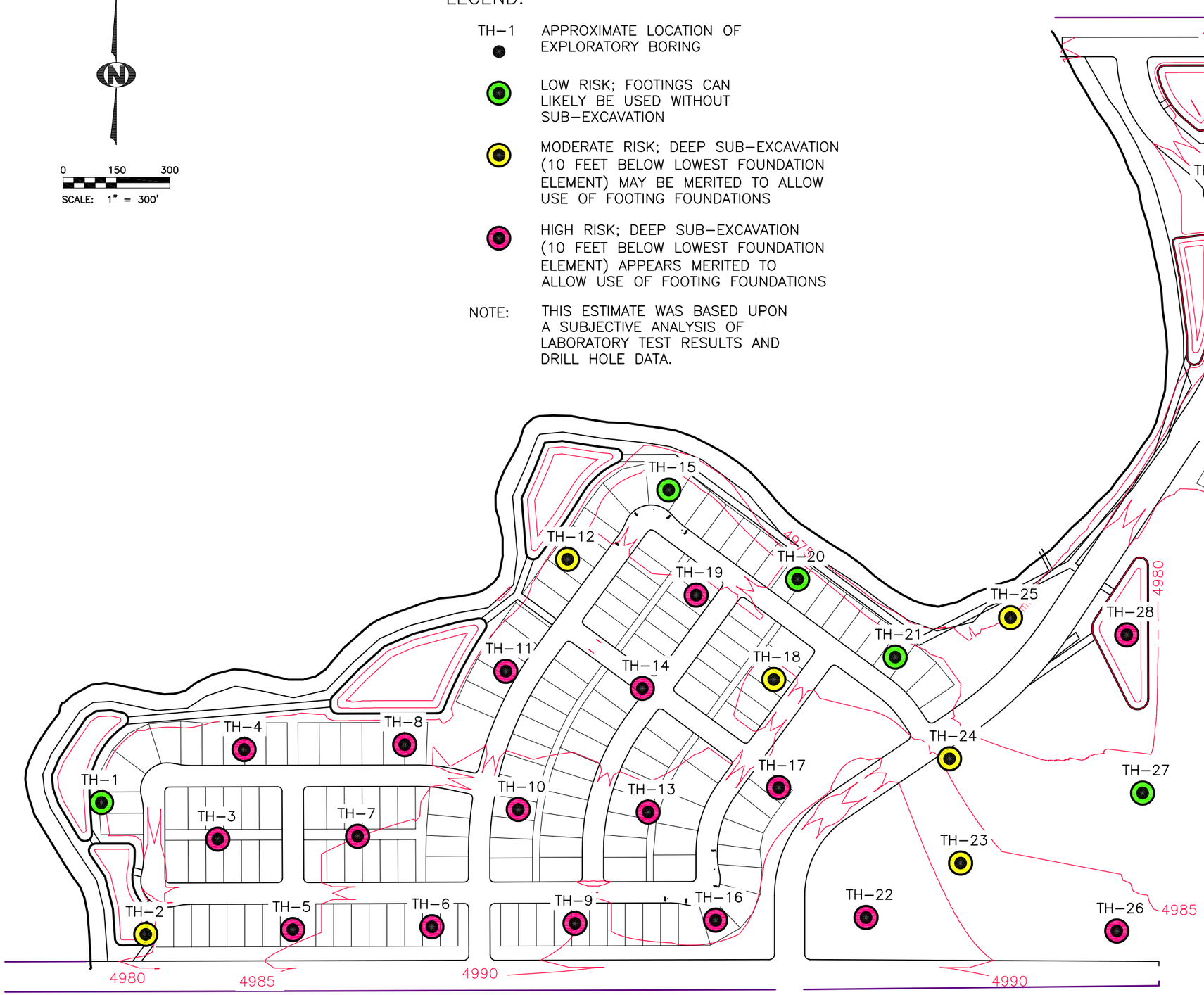
MODERATE RISK; DEEP SUB–EXCAVATION (10 FEET BELOW LOWEST FOUNDATION ELEMENT) MAY BE MERITED TO ALLOW USE OF FOOTING FOUNDATIONS

HIGH RISK; DEEP SUB–EXCAVATION (10 FEET BELOW LOWEST FOUNDATION ELEMENT) APPEARS MERITED TO ALLOW USE OF FOOTING FOUNDATIONS

NOTE: THIS ESTIMATE WAS BASED UPON A SUBJECTIVE ANALYSIS OF LABORATORY TEST RESULTS AND DRILL HOLE DATA.

0 150 300

SCALE: 1" = 300'

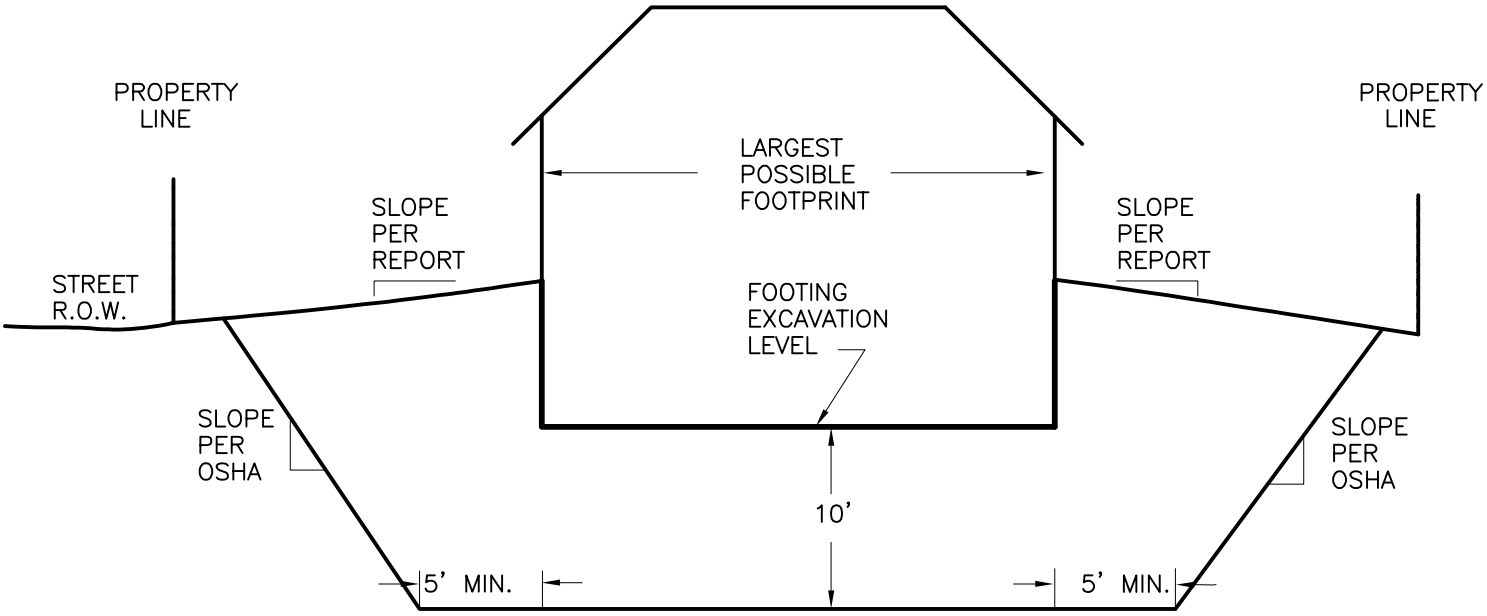


ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREENS SUBDIVISION
CTL\T Project No. DN50,350-115-R1

Preliminary Risk Assessment Due to Expansive Soil and Bedrock

Fig. 4

95-SUB-EXCAVATION_01



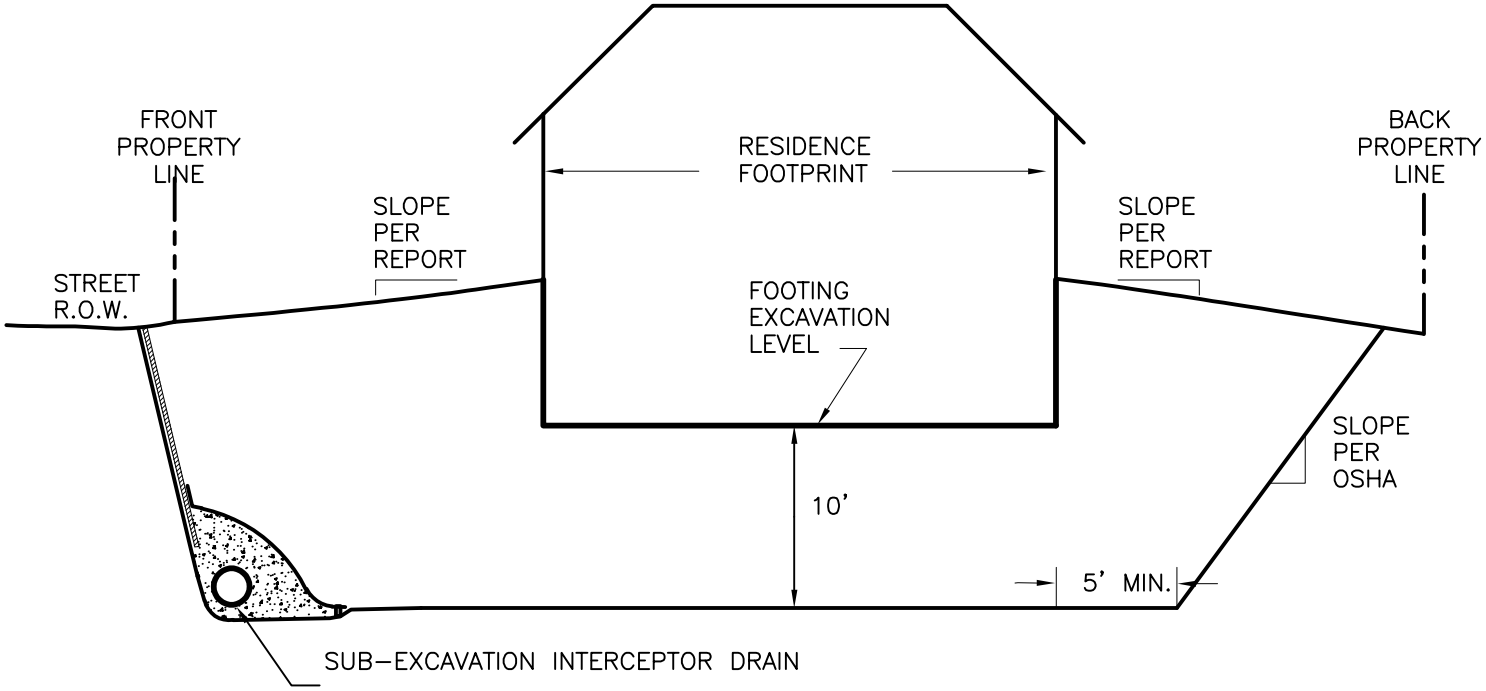
NOT TO SCALE

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREENS SUBDIVISION
CTL\T Project No. DN50,350-115-R1

Conceptual Sub-excavation Profile

Fig. 5

95-SUB-EXCAVATION_01



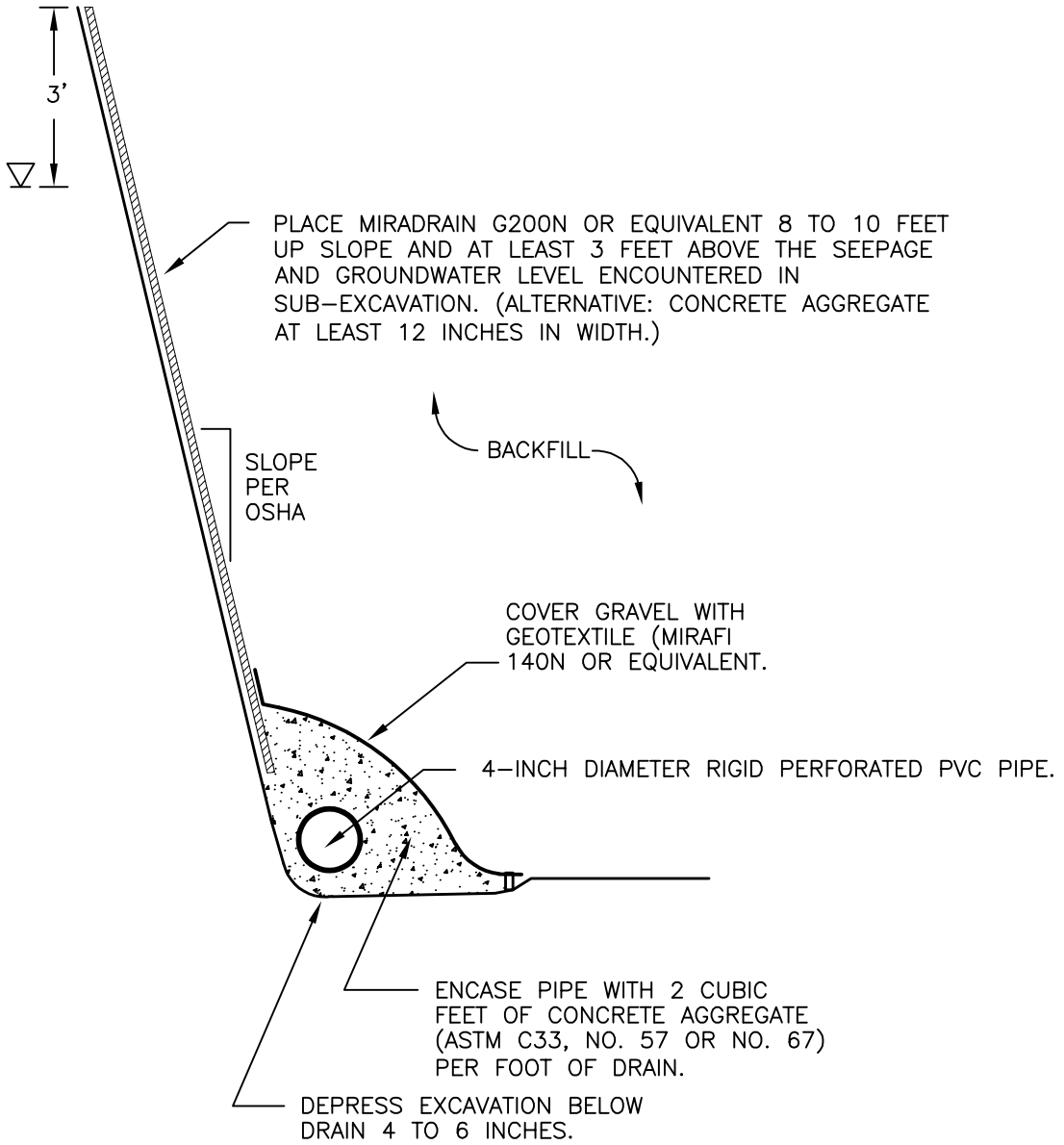
NOT TO SCALE

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREENS SUBDIVISION
CTL\T Project No. DN50,350-115-R1

Conceptual Sub-excavation Profile with Interceptor Drain

Fig. 6

20-INTERCEPTOR_08



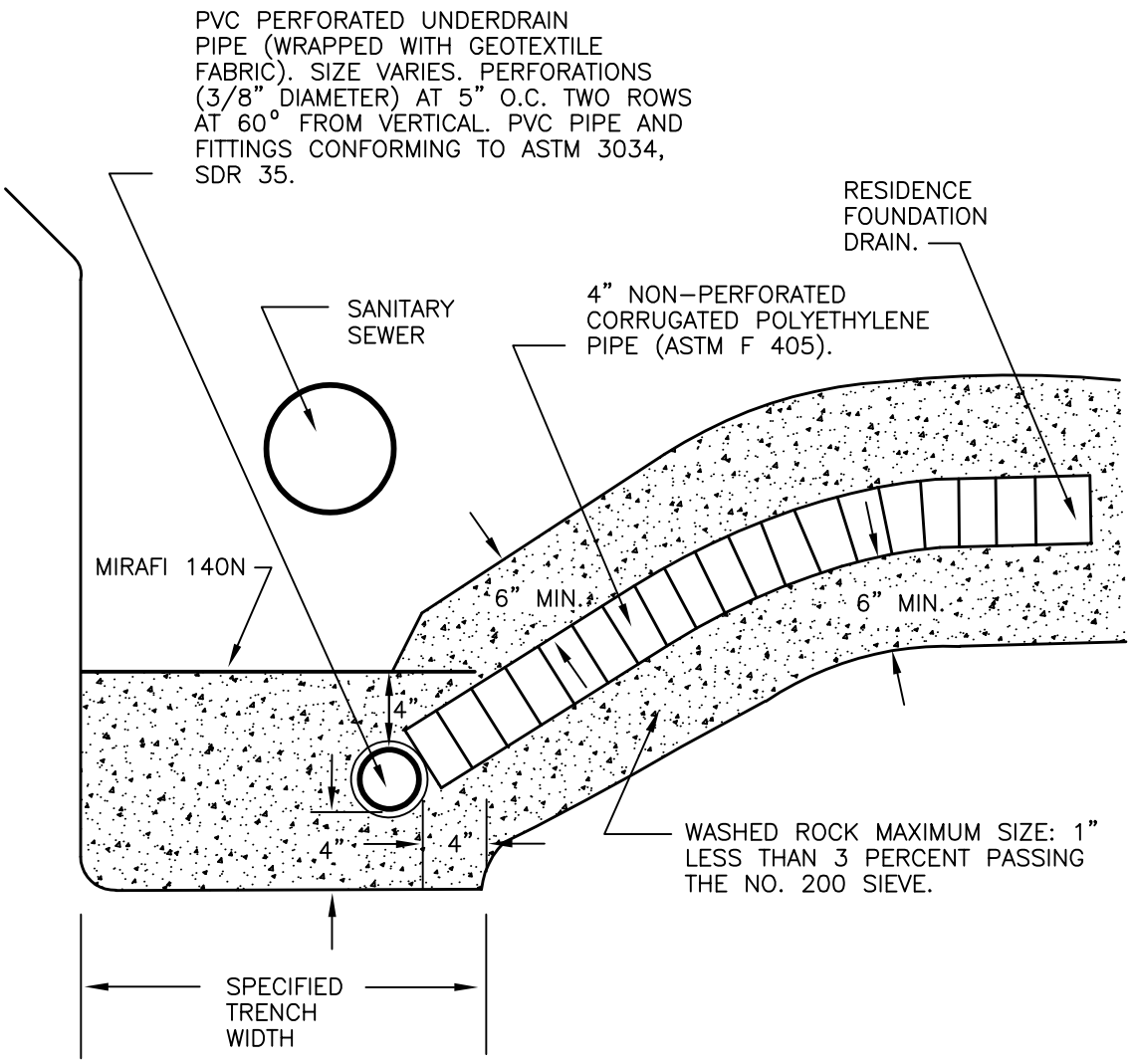
NOTE:
THE BOTTOM OF THE DRAIN SHOULD SLOPE TO A POSITIVE GRAVITY OUTLET WITH A MINIMUM SLOPE OF 0.5 PERCENT.

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREENS SUBDIVISION
CTL\T Project No. DN50,350-115-R1

Sub-Excavation Interceptor Drain

Fig. 7

50-UNDERDRAIN_02

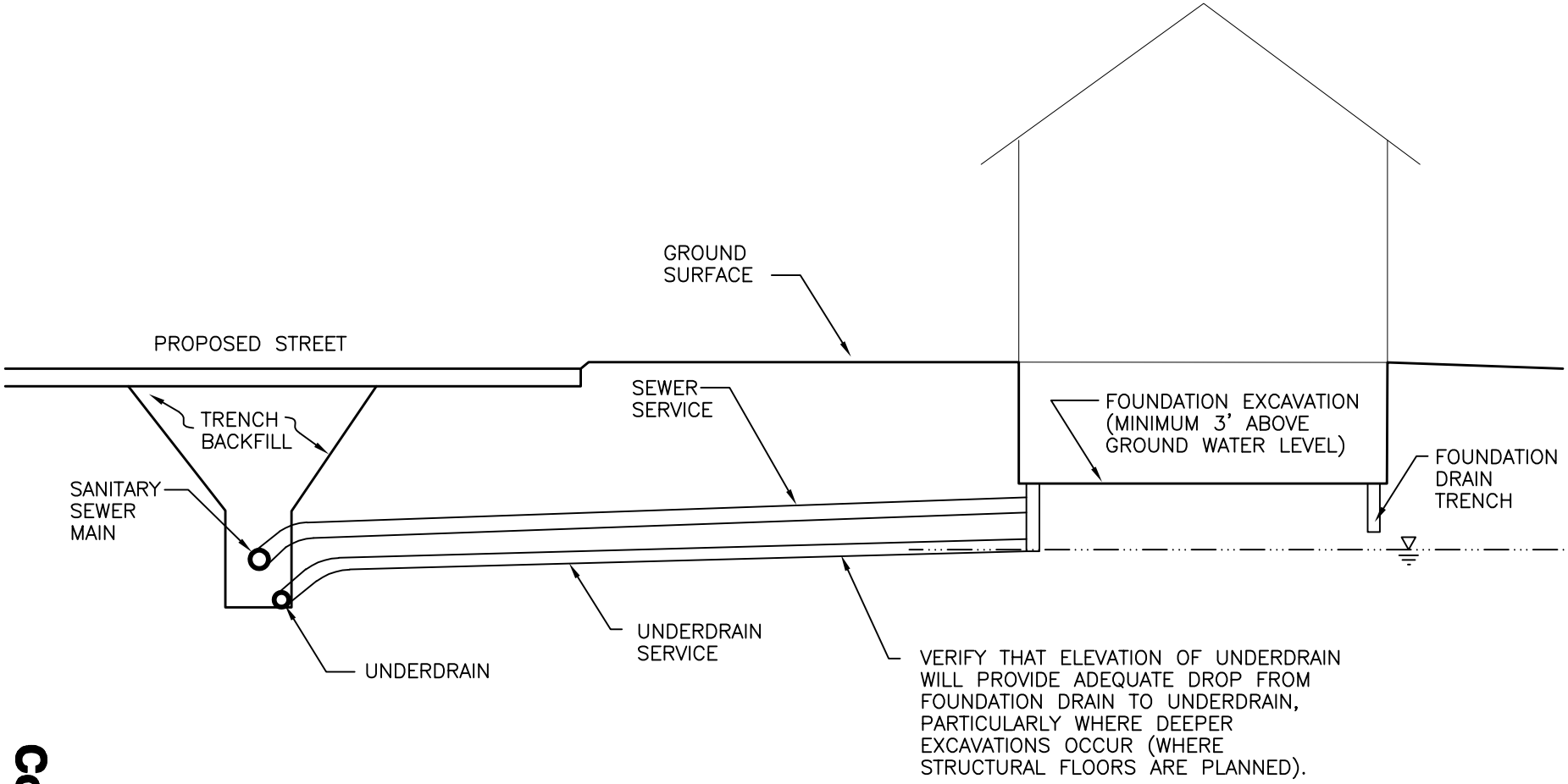


NOTE: NOT TO SCALE.

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREENS SUBDIVISION
CTL\T Project No. DN50,350-115-R1

Sewer Underdrain Detail

Fig. 8



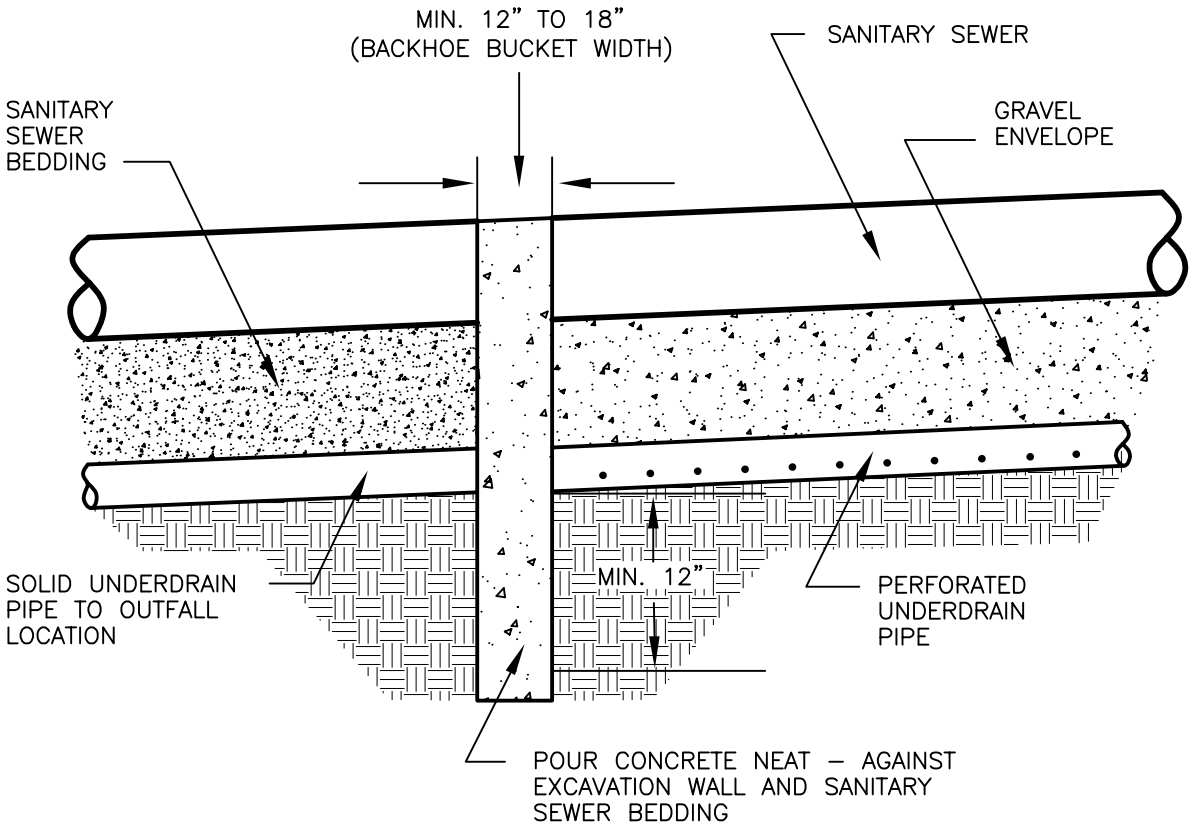
NOT TO SCALE

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREENS SUBDIVISION
CTL\T Project No. DN50,350-115-R1

Conceptual Underdrain Service Profile

Fig. 9

50–UNDERDRAIN_05



NOTE:
THE CONCRETE CUTOFF WALL SHOULD EXTEND INTO THE UNDISTURBED SOILS OUTSIDE THE UNDERDRAIN AND SANITARY SEWER TRENCH A MINIMUM DISTANCE OF 12 INCHES.

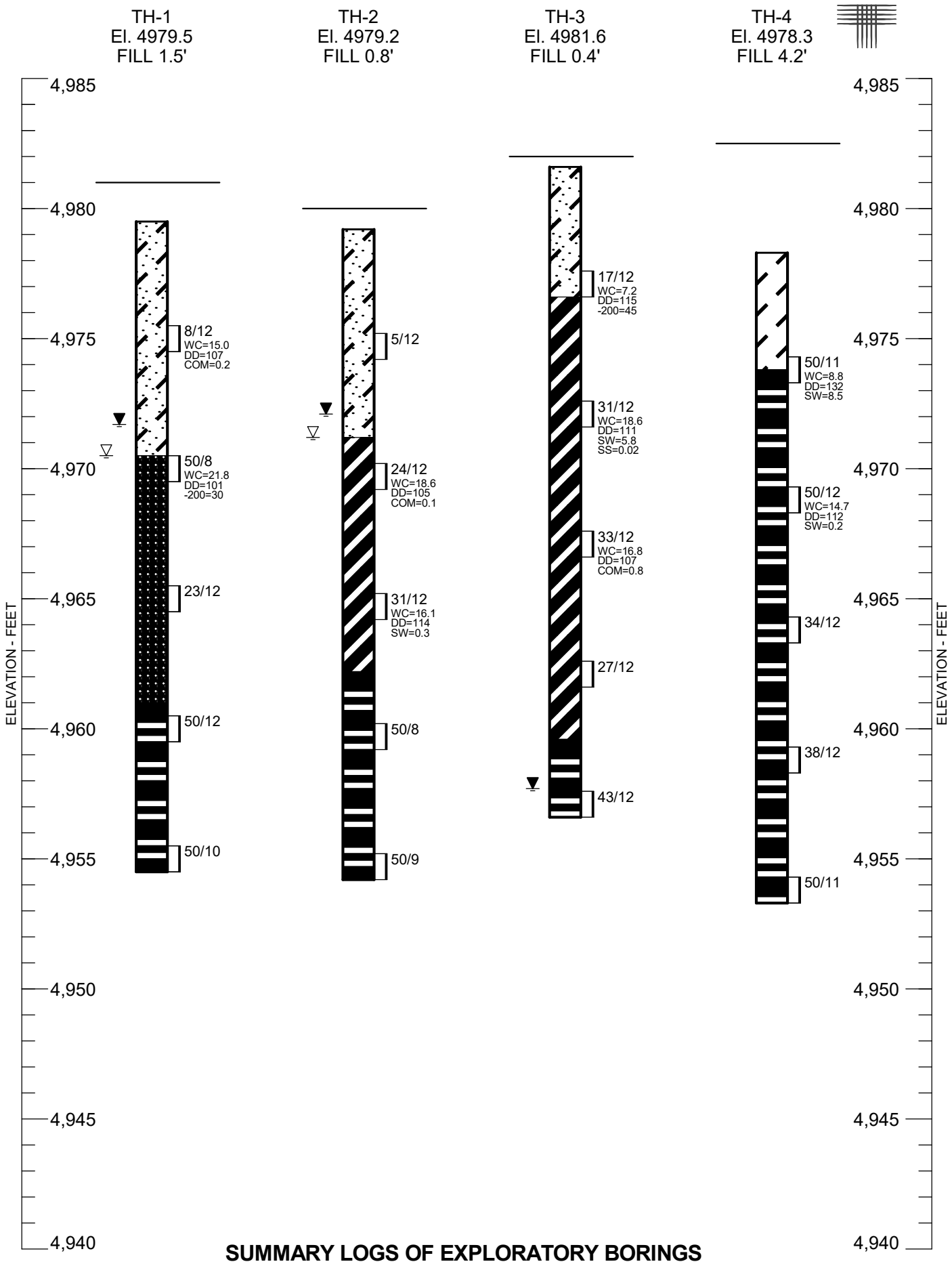
ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREENS SUBDIVISION
CTL\T Project No. DN50,350-115-R1

Underdrain Cutoff Wall Detail

Fig. 10

APPENDIX A

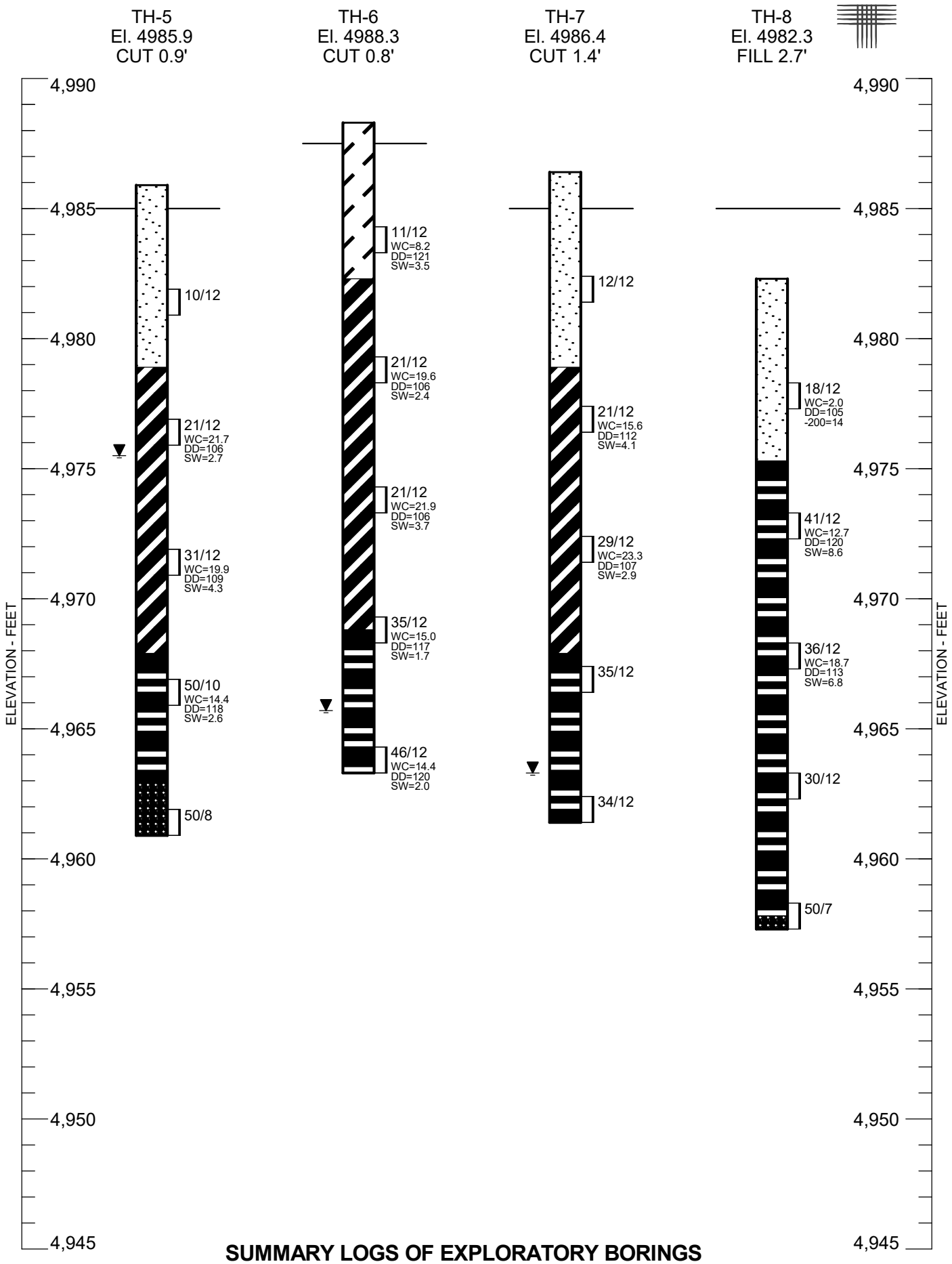
SUMMARY LOGS OF EXPLORATORY BORINGS



SUMMARY LOGS OF EXPLORATORY BORINGS

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREENS SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

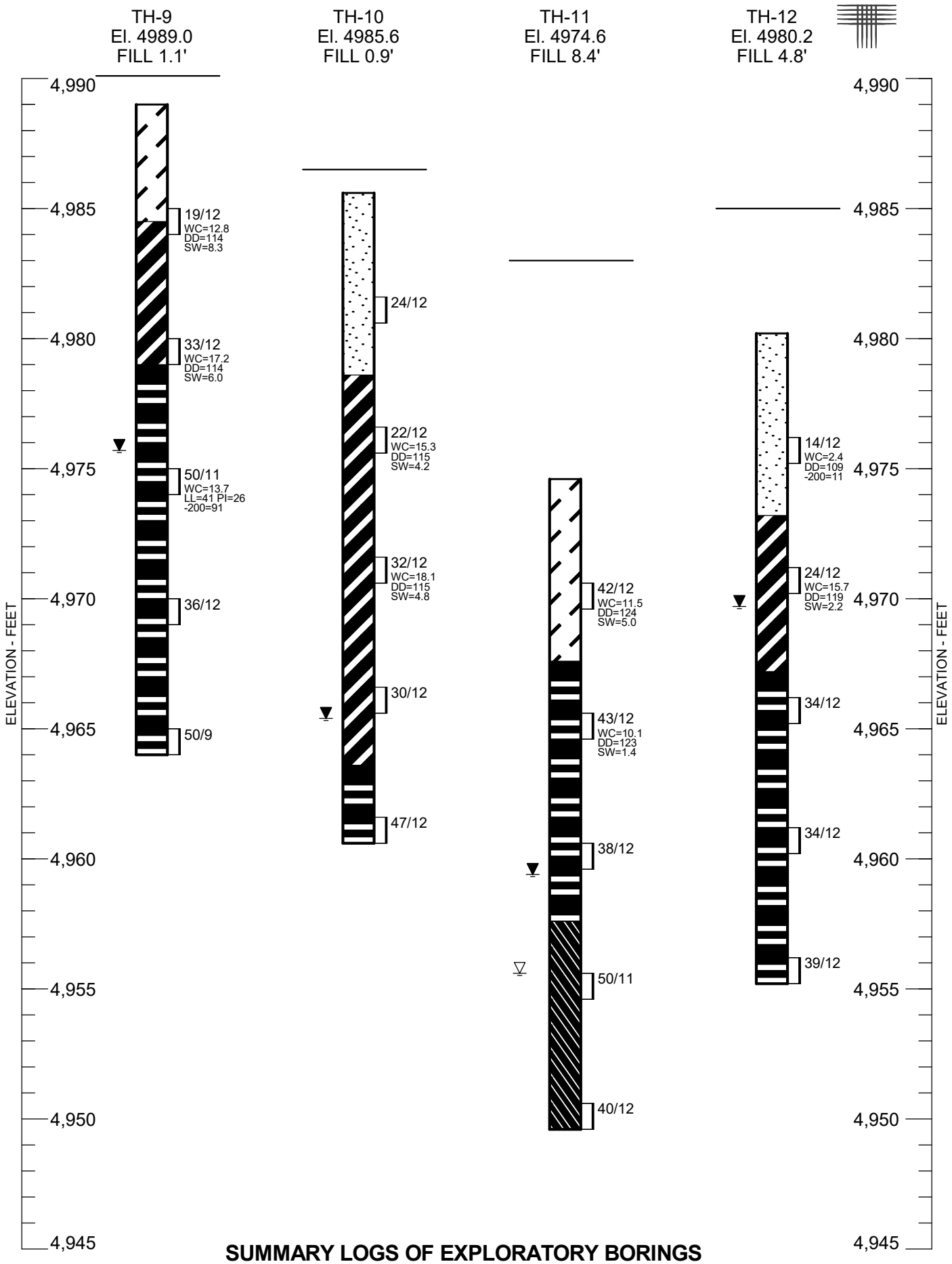
FIG. A- 1



SUMMARY LOGS OF EXPLORATORY BORINGS

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREENS SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

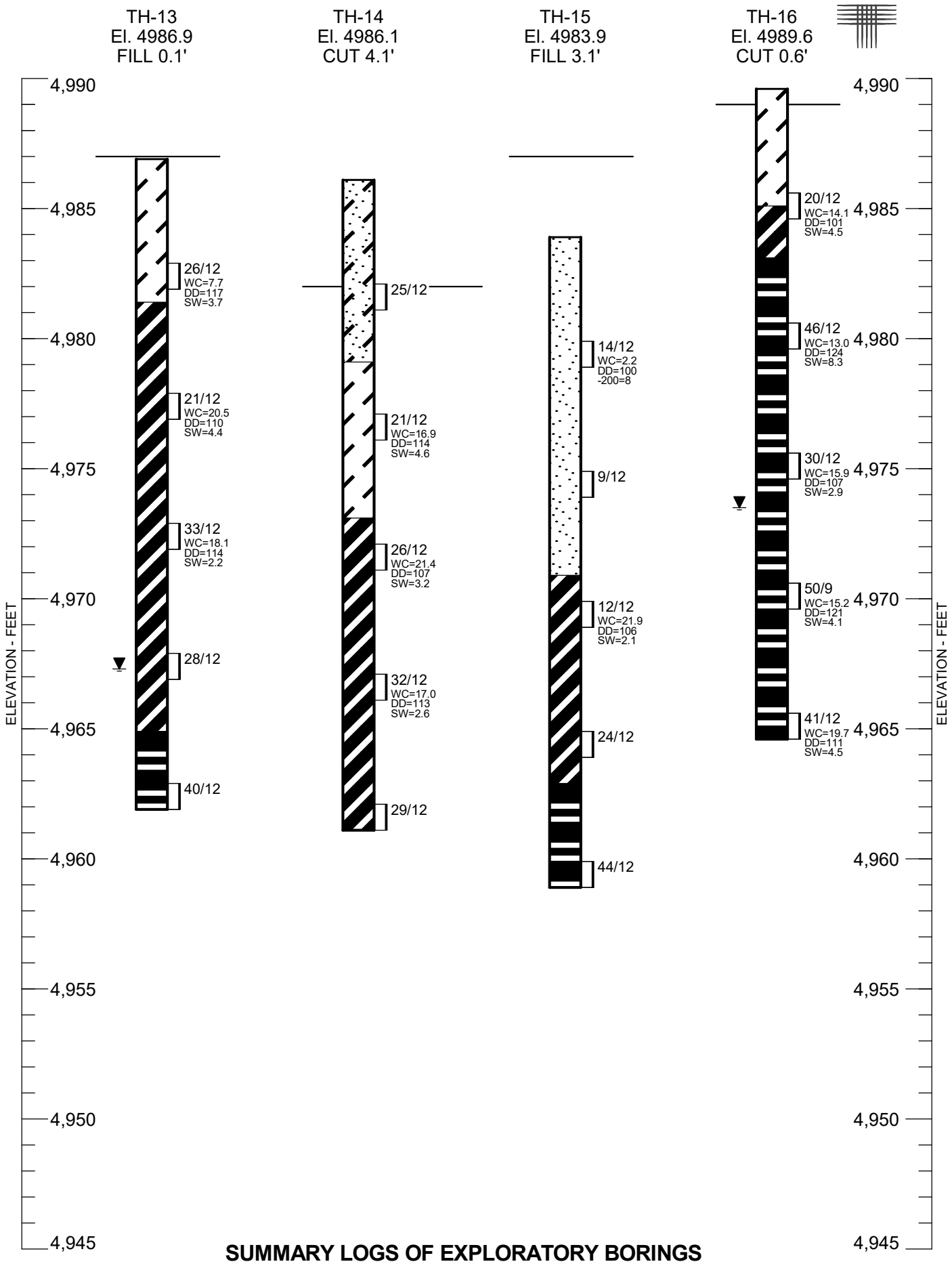
FIG. A- 2



SUMMARY LOGS OF EXPLORATORY BORINGS

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREENS SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

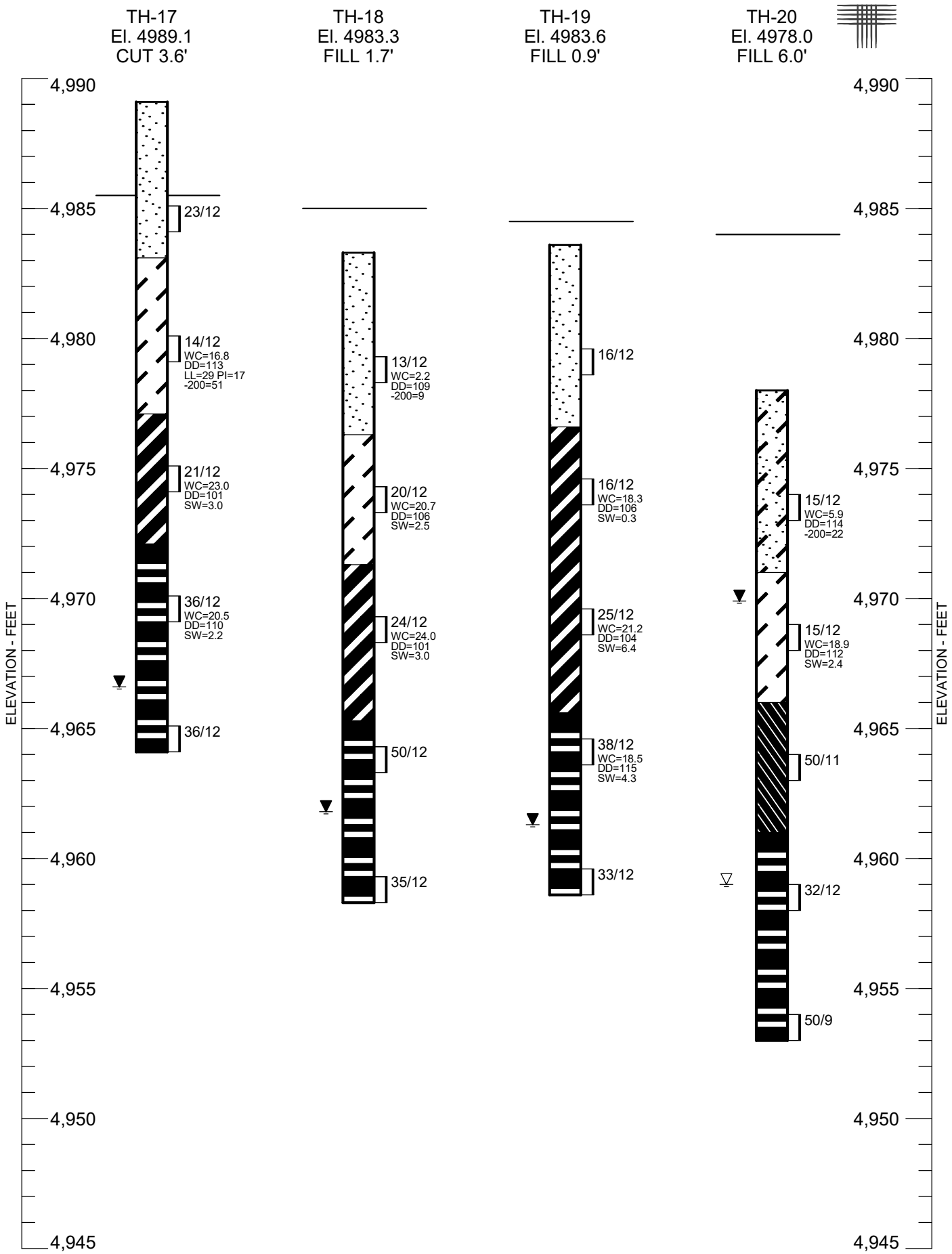
FIG. A- 3



SUMMARY LOGS OF EXPLORATORY BORINGS

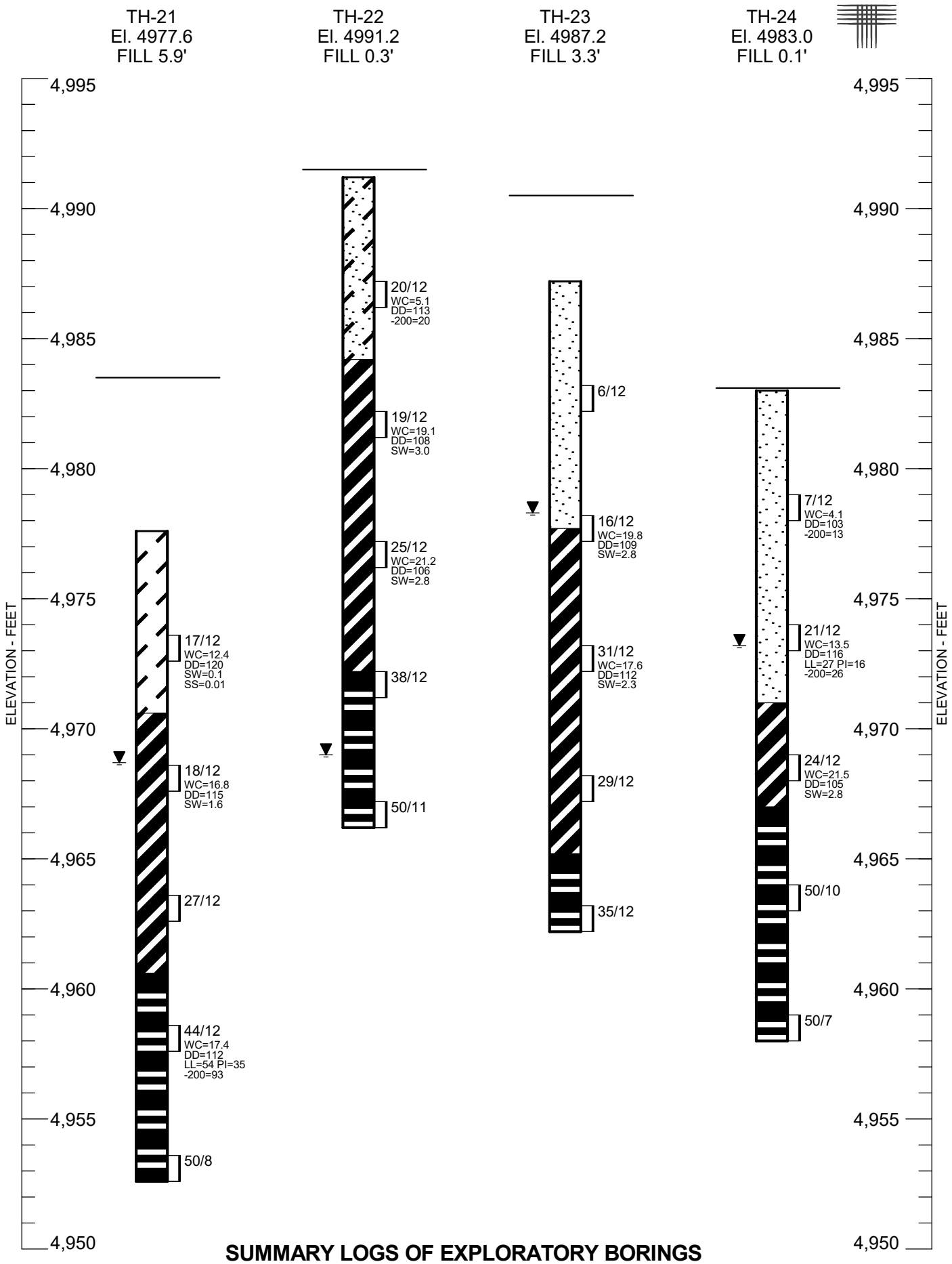
ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREENS SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

FIG. A- 4



ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREENS SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

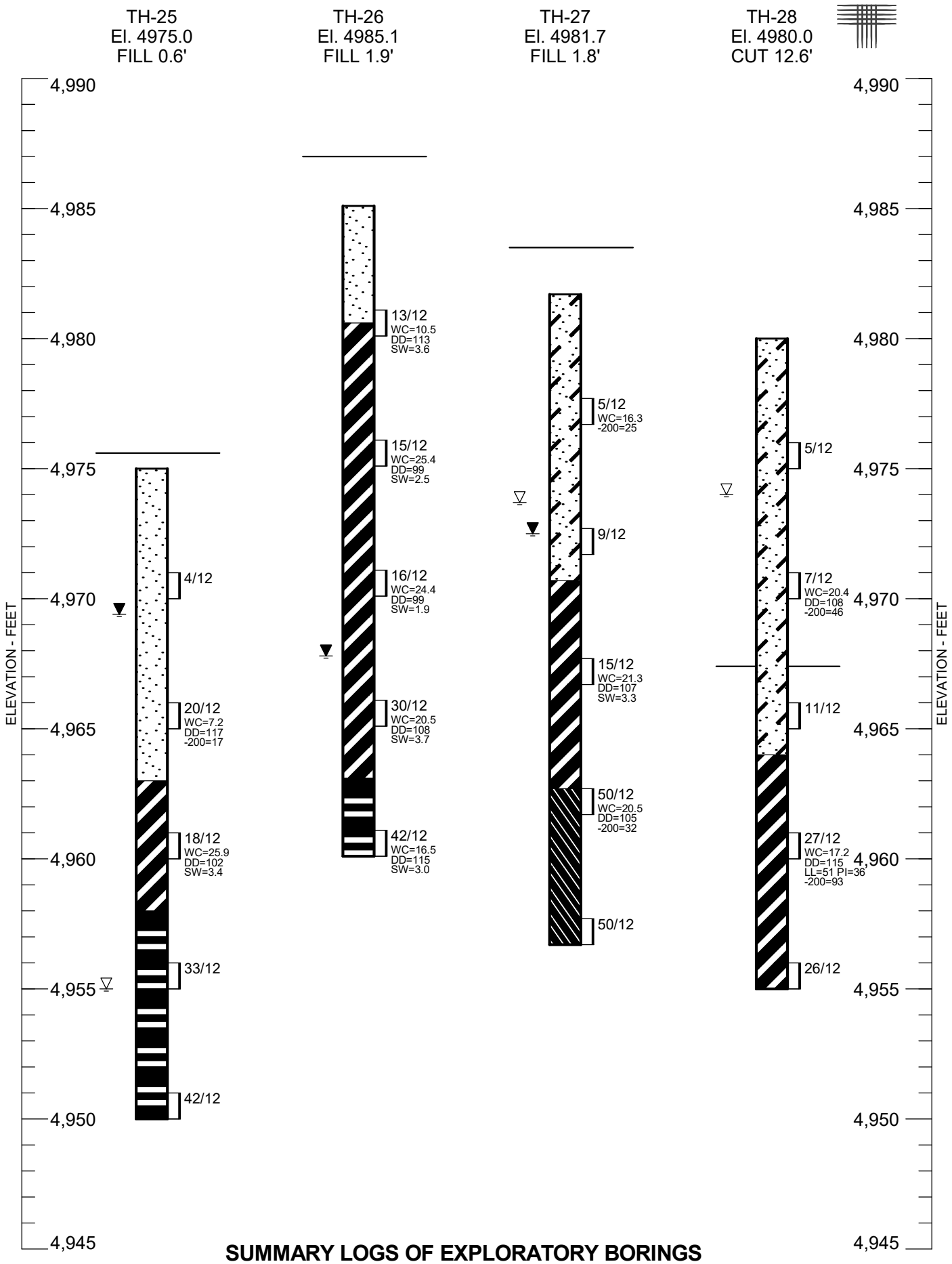
FIG. A- 5



SUMMARY LOGS OF EXPLORATORY BORINGS

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREENS SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

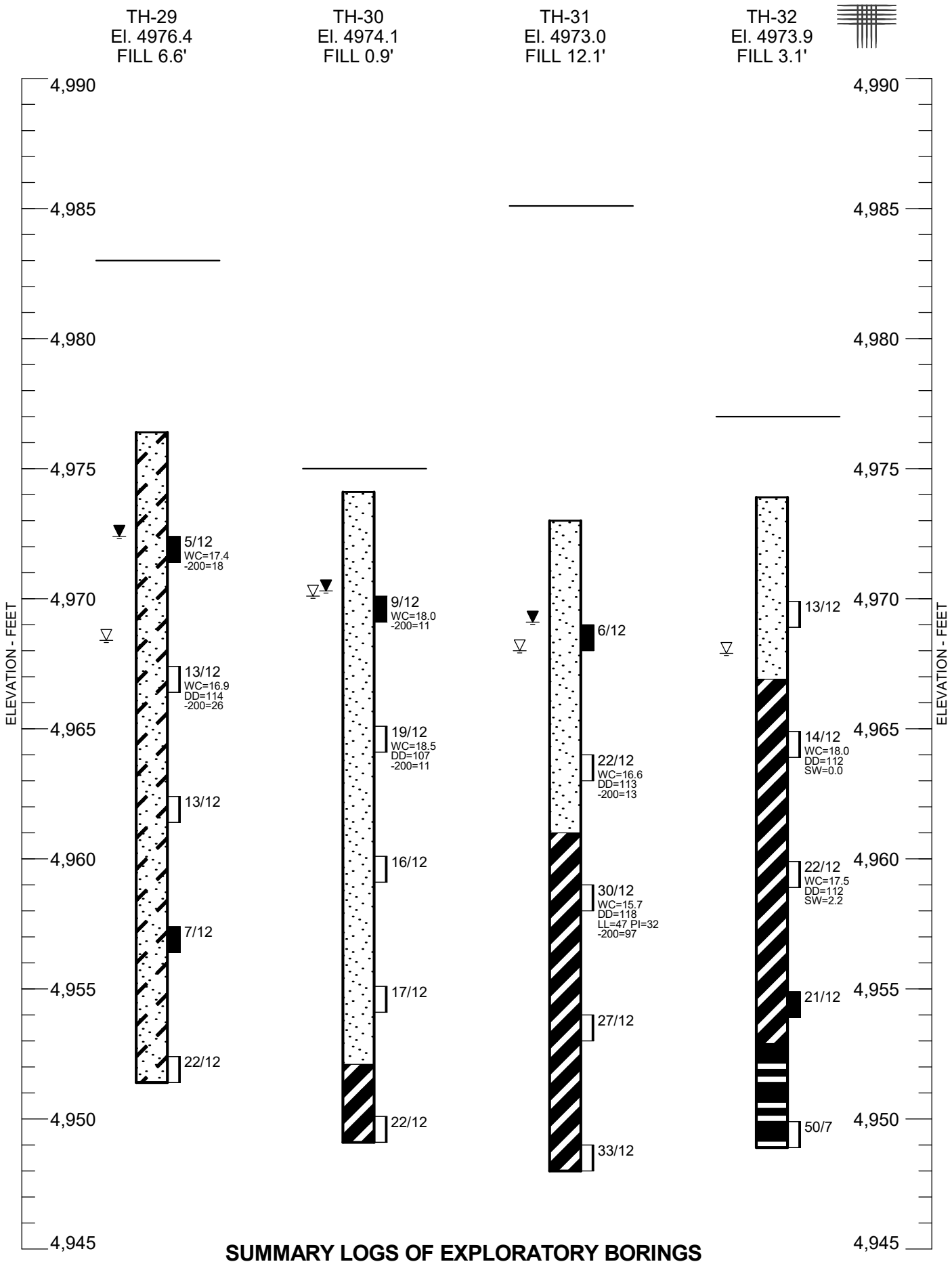
FIG. A- 6



SUMMARY LOGS OF EXPLORATORY BORINGS

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREENS SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

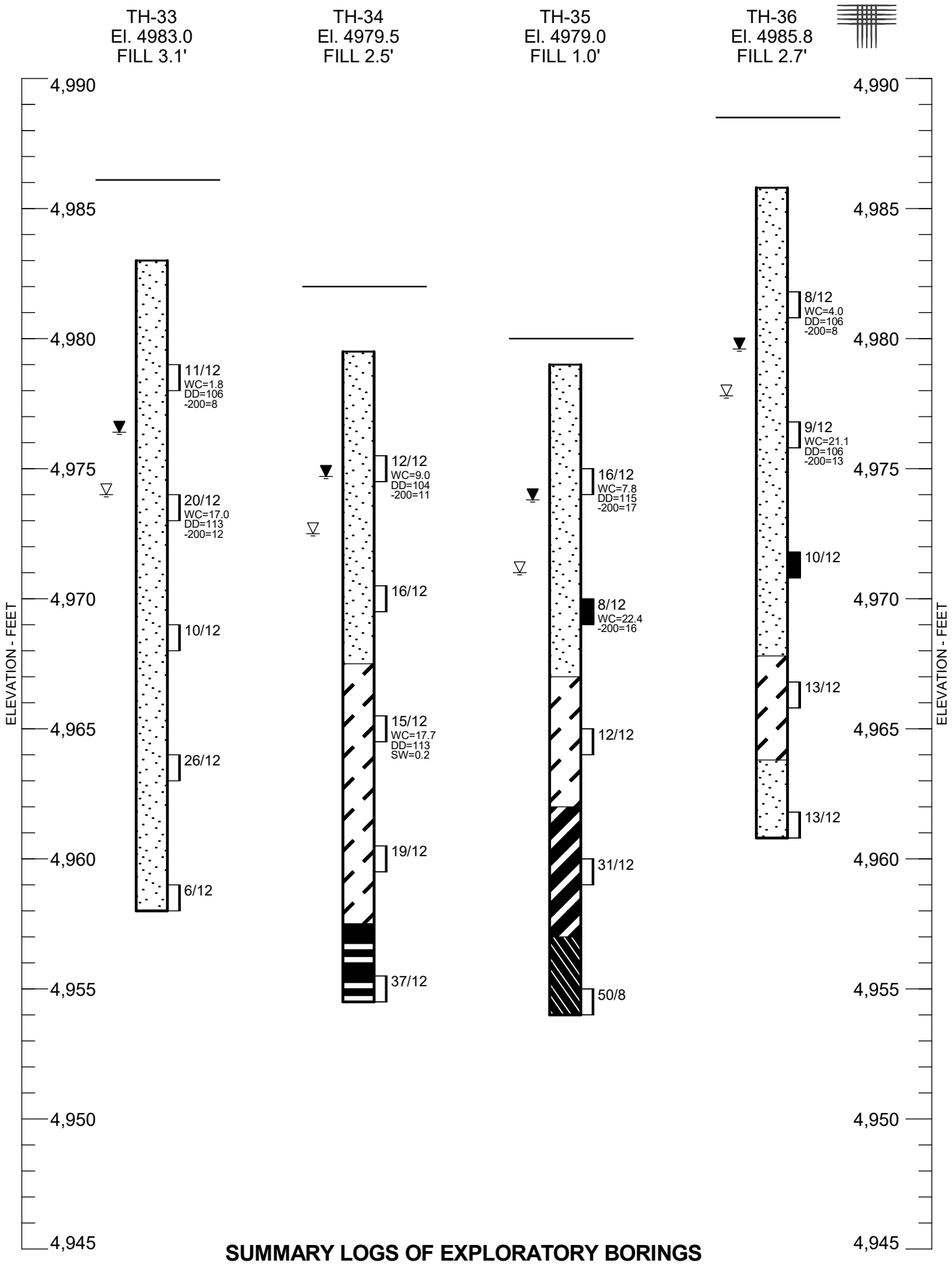
FIG. A- 7



SUMMARY LOGS OF EXPLORATORY BORINGS

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREENS SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

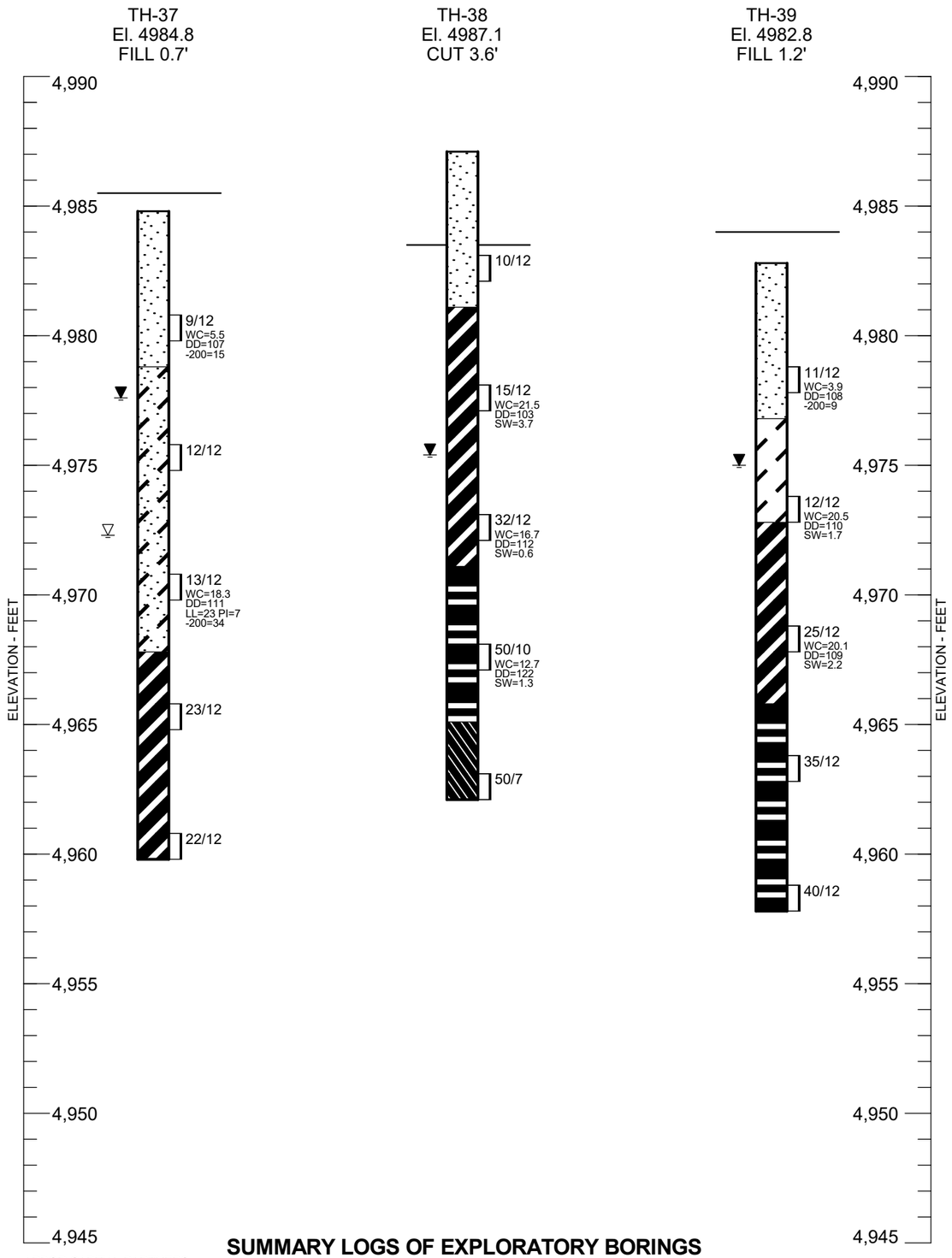
FIG. A- 8



SUMMARY LOGS OF EXPLORATORY BORINGS

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREENS SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

FIG. A- 9



LEGEND:

- CLAY, SANDY, SILTY, STIFF TO VERY STIFF, SLIGHTLY MOIST TO MOIST, GRAY, LIGHT BROWN, WHITE (CL).
- SAND, SILTY TO CLAYEY, LOOSE TO MEDIUM DENSE, SLIGHTLY MOIST TO MOIST, BROWN, LIGHT BROWN, GRAY, TAN (SM, SC).
- SAND, SLIGHTLY SILTY TO SILTY, CLAYEY AT TIMES, LOOSE TO MEDIUM DENSE, SLIGHTLY MOIST TO VERY MOIST, BROWN, GRAY, TAN, WHITE (SP-SM, SM).
- WEATHERED CLAYSTONE, OCCASIONAL SANDSTONE SEAMS, SLIGHTLY MOIST TO MOIST, BROWN, RUST, GRAY.
- BEDROCK, CLAYSTONE, SILTY AT TIMES, MEDIUM HARD TO HARD, SLIGHTLY MOIST TO MOIST, BROWN, GRAY, OLIVE, RUST.
- BEDROCK, SANDSTONE, CLAYEY AT TIMES, MEDIUM HARD TO HARD, SLIGHTLY MOIST, WHITE, GRAY, LIGHT BROWN, RUST.
- BEDROCK, INTERBEDDED CLAYSTONE/SANDSTONE, SILTY, MEDIUM HARD TO HARD, SLIGHTLY MOIST TO MOIST, BROWN, GRAY, TAN.
- DRIVE SAMPLE. THE SYMBOL 8/12 INDICATES 8 BLOWS OF AN AUTOMATIC 140-POUND HAMMER FALLING 30 INCHES WERE REQUIRED TO DRIVE A 2.5-INCH O.D. SAMPLER 12 INCHES.
- DRIVE SAMPLE. THE SYMBOL 5/12 INDICATES 5 BLOWS OF AN AUTOMATIC 140-POUND HAMMER FALLING 30 INCHES WERE REQUIRED TO DRIVE A 2.0-INCH O.D. SAMPLER 12 INCHES.
- WATER LEVEL MEASURED AT TIME OF DRILLING.
- WATER LEVEL MEASURED AFTER DRILLING ON JANUARY 22, 2020.
- INDICATES PROPOSED GRADE.

NOTES:

1. THE BORINGS WERE DRILLED JANUARY 7 THROUGH 10, 2020 USING 4-INCH DIAMETER, CONTINUOUS-FLIGHT SOLID-STEM AUGER AND TRUCK-MOUNTED CME-45 DRILL RIG.
2. BORING LOCATIONS AND ELEVATIONS WERE SURVEYED BY ATWELL GROUP PRIOR TO DRILLING.
3. WC - INDICATES MOISTURE CONTENT (%).
   DD - INDICATES DRY DENSITY (PCF).
   SW INDICATES SWELL WHEN WETTED UNDER APPROXIMATE POST-GRADING OVERBURDEN PRESSURE (%).
   COM- INDICATES COMPRESSION WHEN WETTED UNDER APPROXIMATE POST-GRADING OVERBURDEN PRESSURE (%).
   LL INDICATES LIQUID LIMIT.
   PI - INDICATES PLASTICITY INDEX.
   -200 - INDICATES PASSING NO. 200 SIEVE (%).
   SS - INDICATES WATER-SOLUBLE SULFATE CONTENT (%).
4. THESE LOGS ARE SUBJECT TO THE EXPLANATIONS, LIMITATIONS AND CONCLUSIONS CONTAINED IN THIS REPORT.

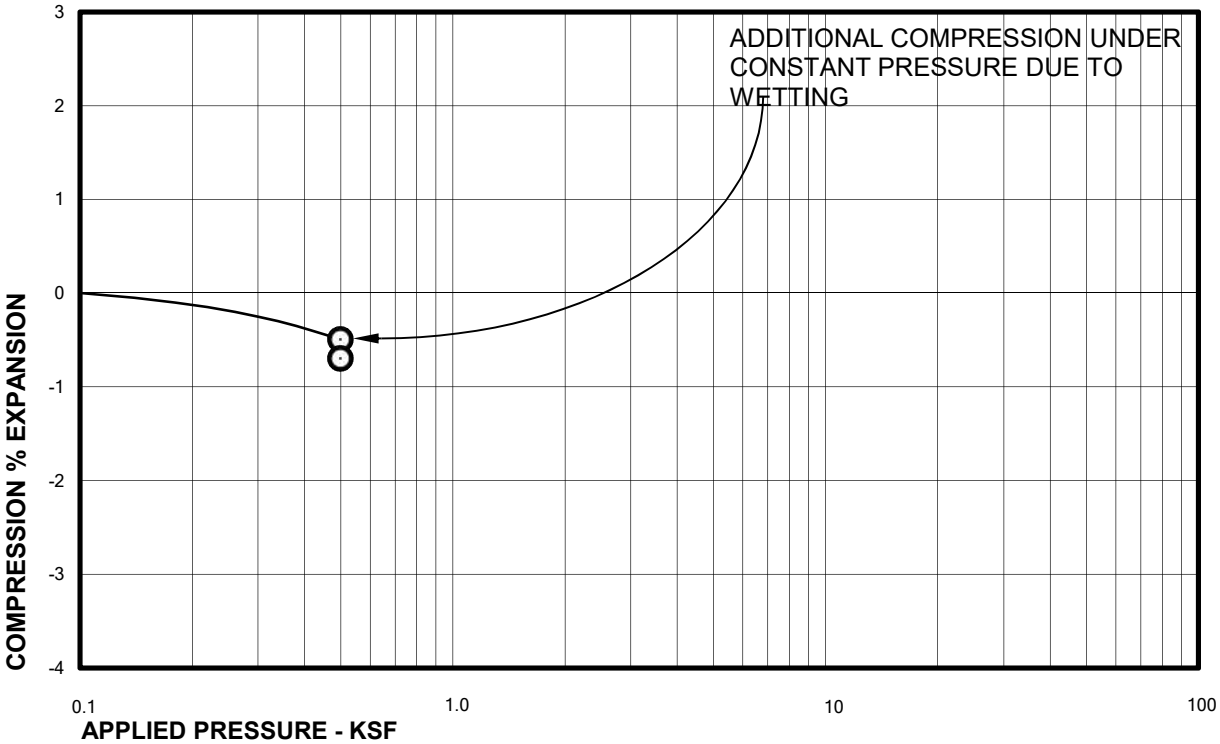
SUMMARY LOGS OF EXPLORATORY BORINGS

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREENS SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

FIG. A- 10

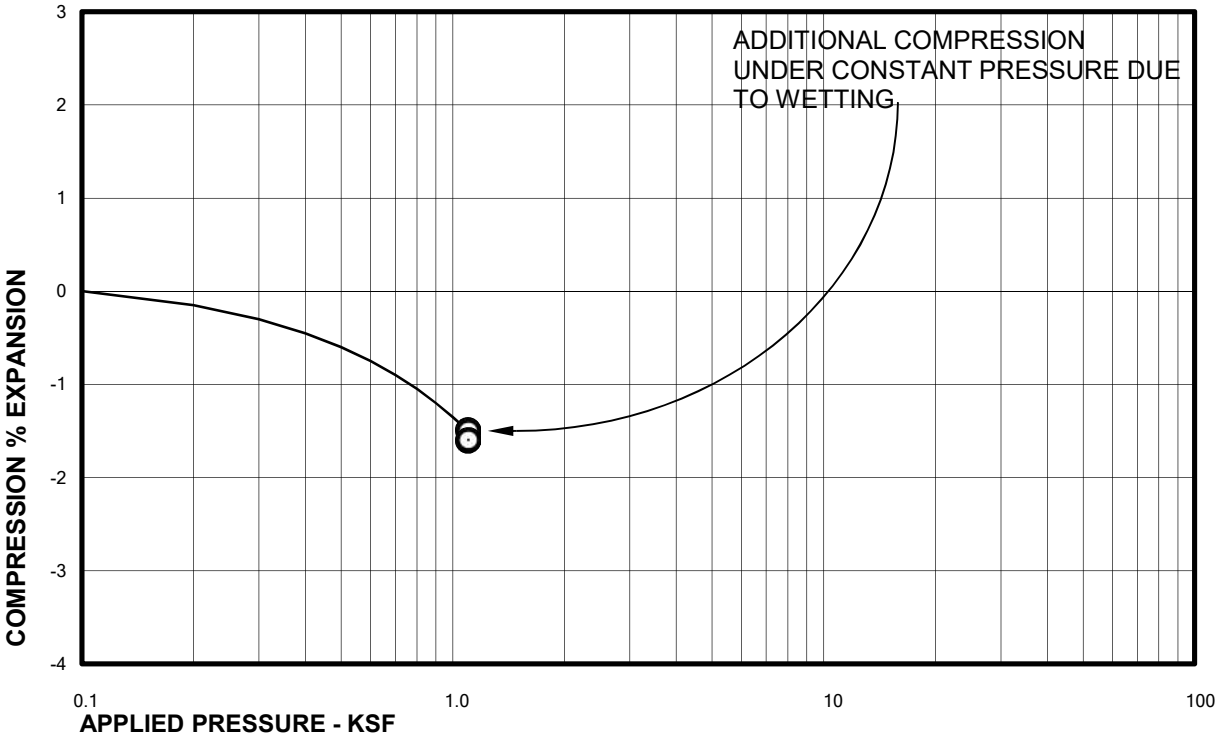
APPENDIX B

LABORATORY TEST RESULTS AND TABLE B-I



Sample of SAND, CLAYEY (SC) DRY UNIT WEIGHT= 107 PCF

From TH-1 AT 4 FEET MOISTURE CONTENT= 15.0 %



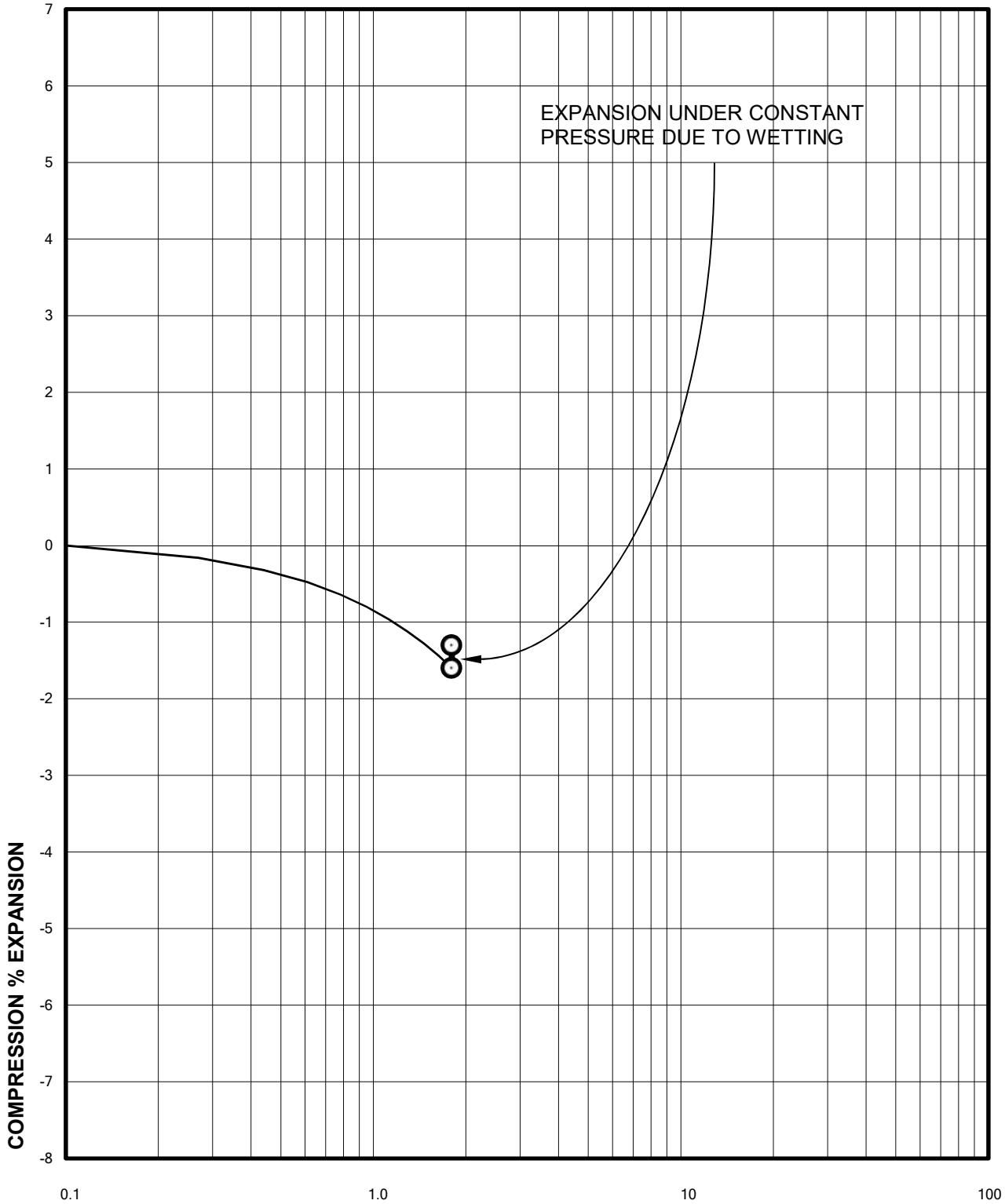
Sample of WEATHERED CLAYSTONE DRY UNIT WEIGHT= 105 PCF

From TH-2 AT 9 FEET MOISTURE CONTENT= 18.6 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-1



Sample of WEATHERED CLAYSTONE

From TH-2 AT 14 FEET

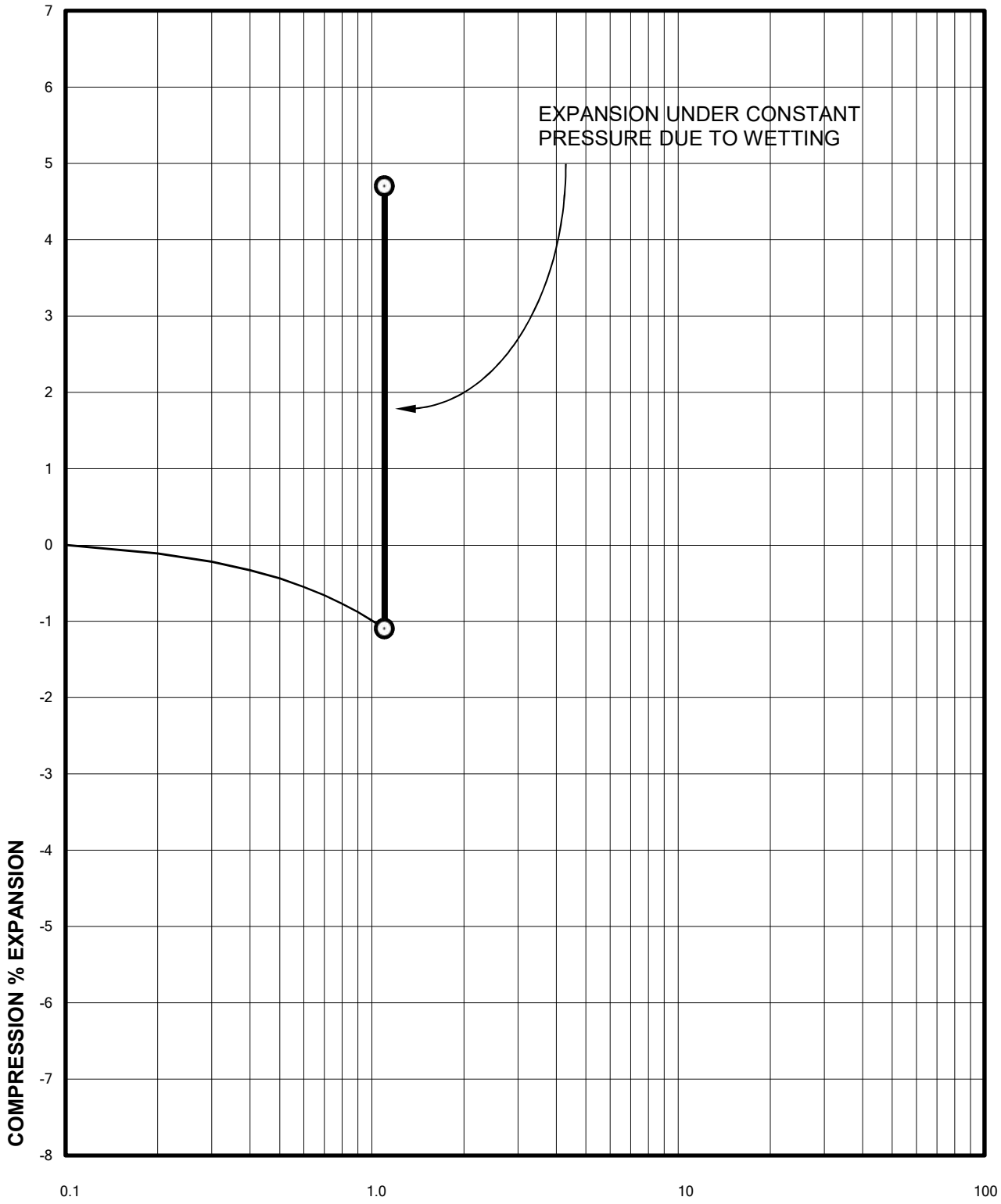
DRY UNIT WEIGHT= 114 PCF

MOISTURE CONTENT= 16.1 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-2



Sample of WEATHERED CLAYSTONE

From TH-3 AT 9 FEET

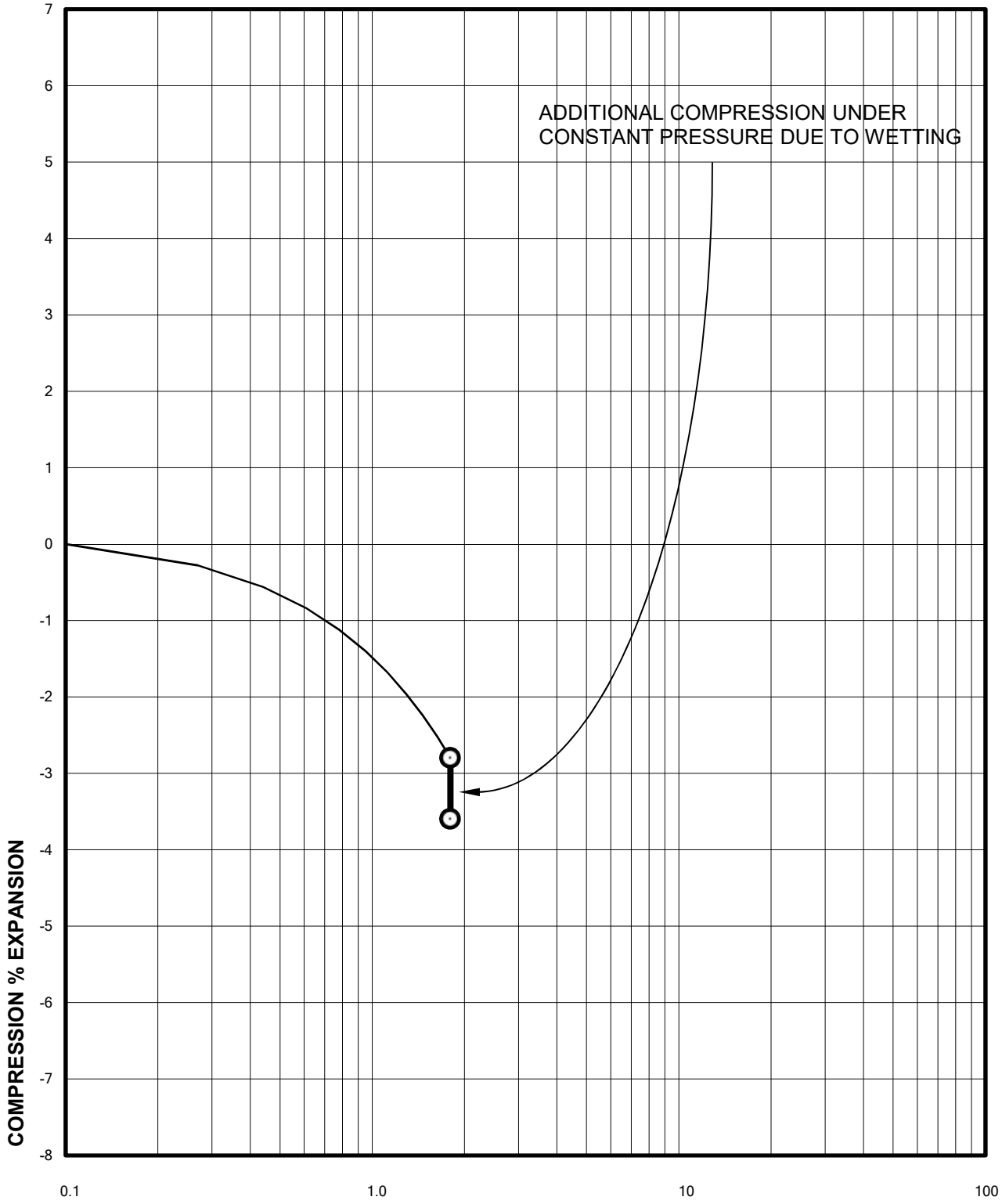
DRY UNIT WEIGHT= 111 PCF

MOISTURE CONTENT= 18.6 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-3



Sample of WEATHERED CLAYSTONE

From TH-3 AT 14 FEET

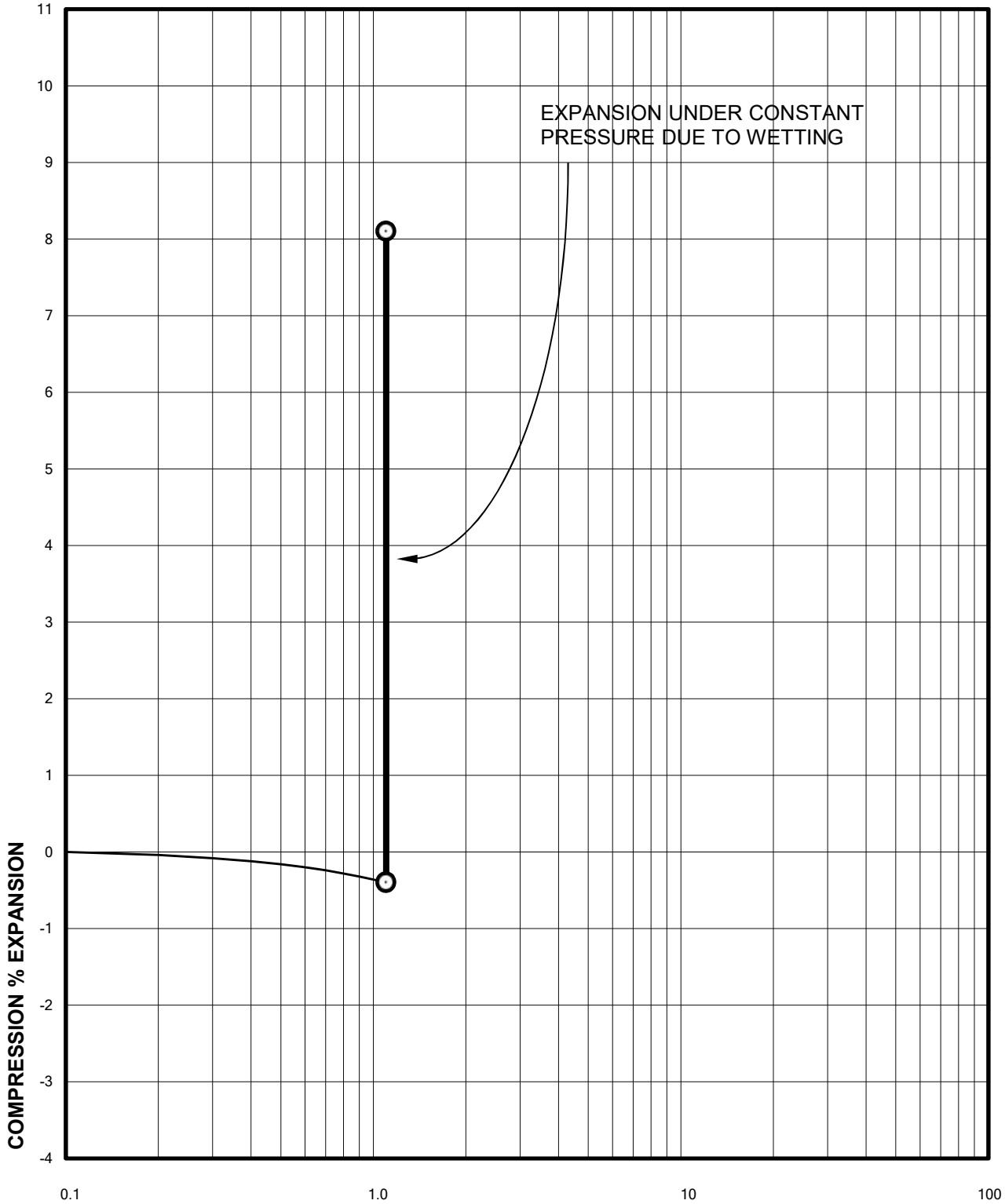
DRY UNIT WEIGHT= 107 PCF

MOISTURE CONTENT= 16.8 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-4



Sample of CLAYSTONE

From TH-4 AT 4 FEET

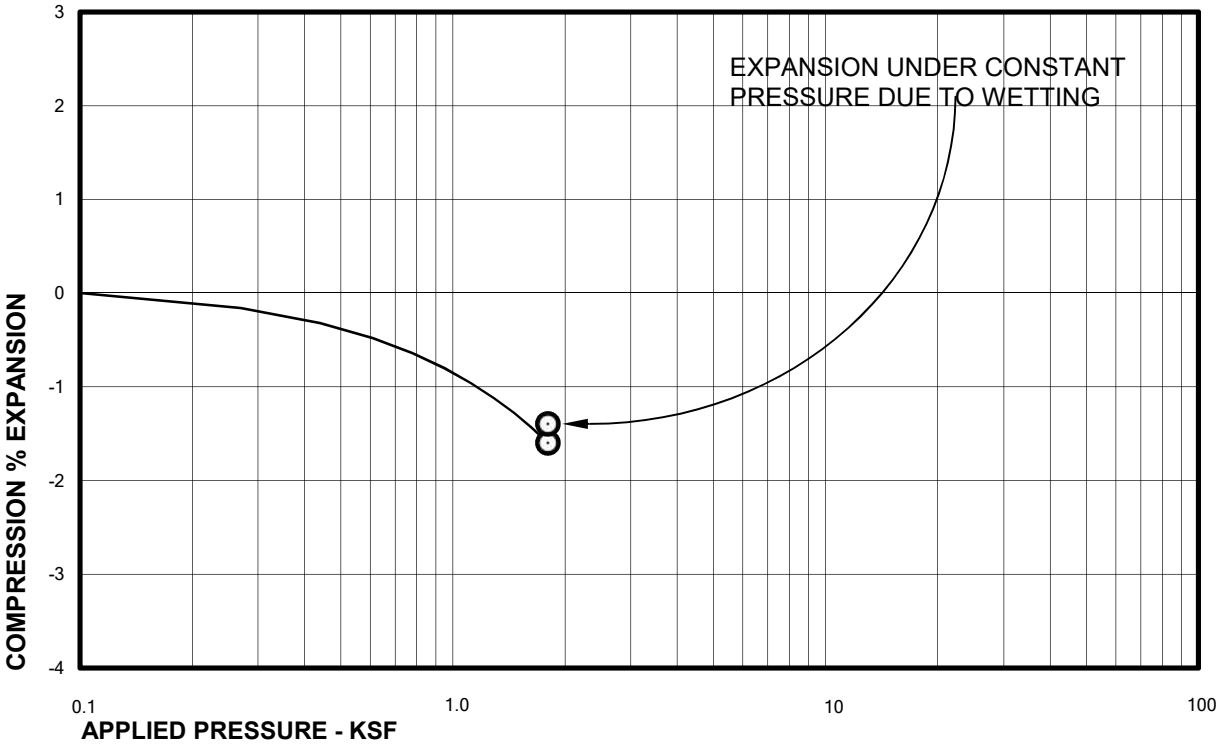
DRY UNIT WEIGHT= 132 PCF

MOISTURE CONTENT= 8.8 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

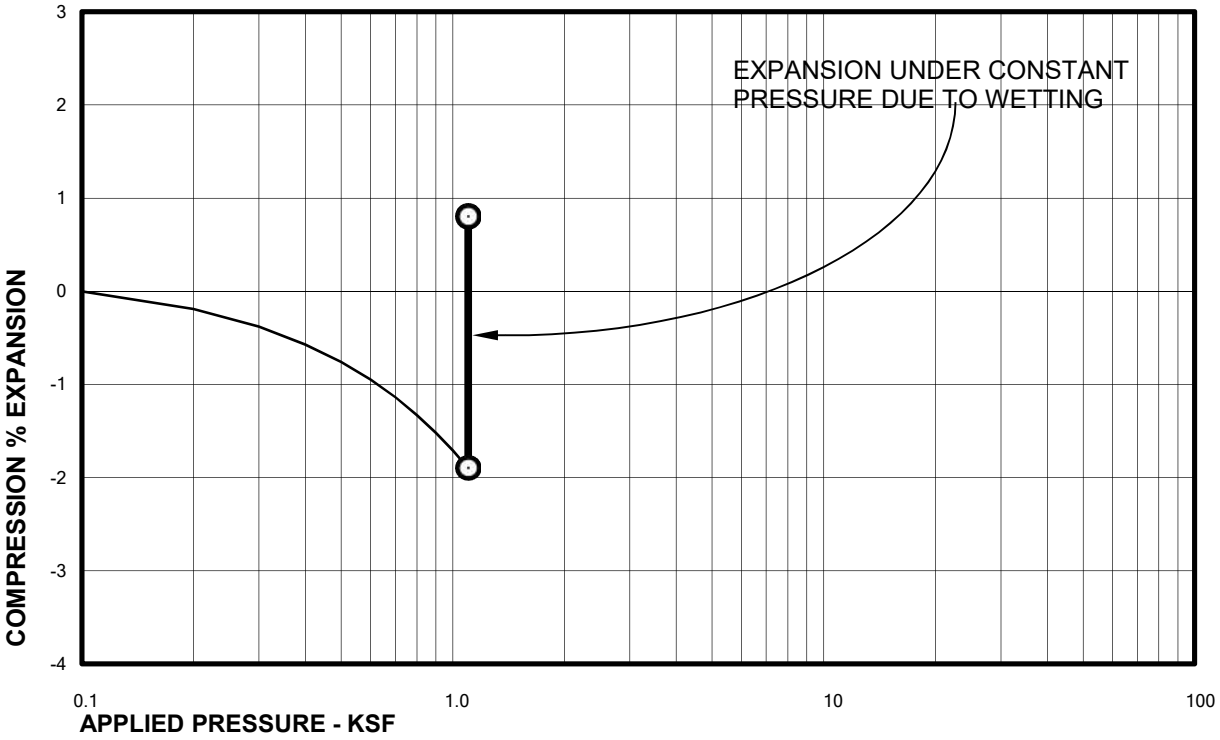
Swell Consolidation Test Results

FIG. B-5



Sample of CLAYSTONE
From TH-4 AT 9 FEET

DRY UNIT WEIGHT= 112 PCF
MOISTURE CONTENT= 14.7 %



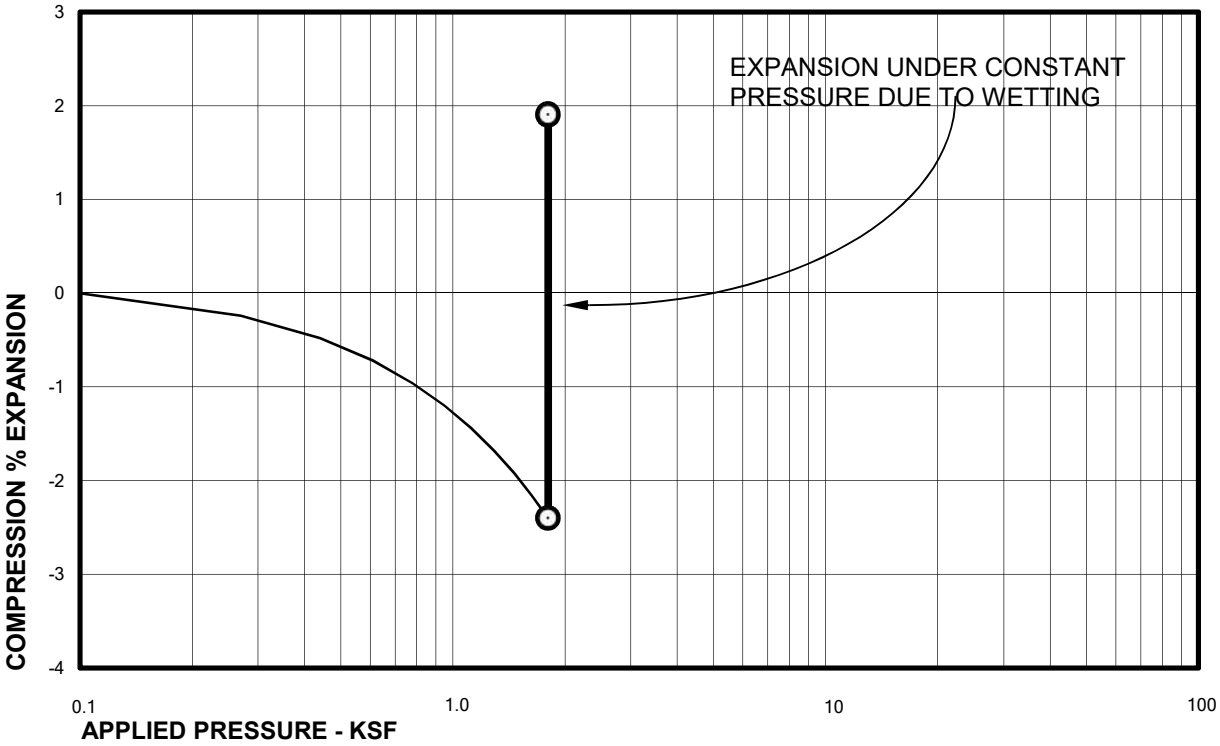
Sample of WEATHERED CLAYSTONE
From TH-5 AT 9 FEET

DRY UNIT WEIGHT= 106 PCF
MOISTURE CONTENT= 21.7 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

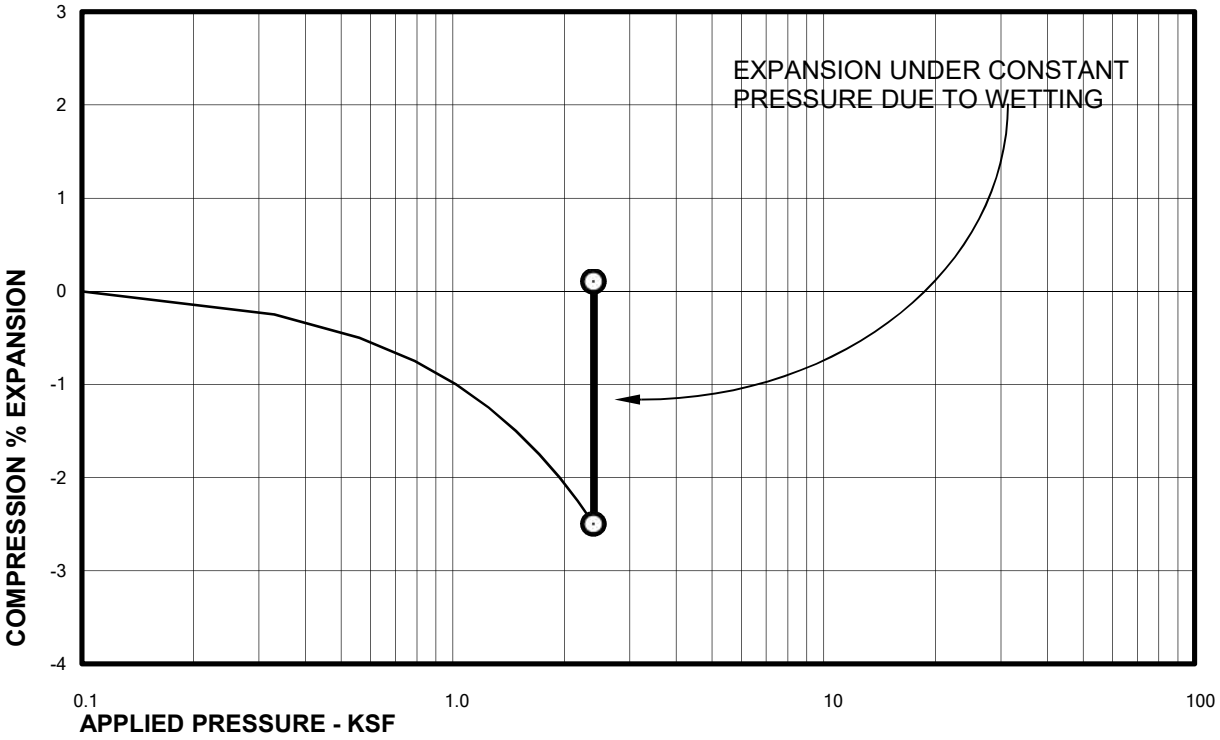
Swell Consolidation Test Results

FIG. B-6



Sample of WEATHERED CLAYSTONE
From TH-5 AT 14 FEET

DRY UNIT WEIGHT= 109 PCF
MOISTURE CONTENT= 19.9 %



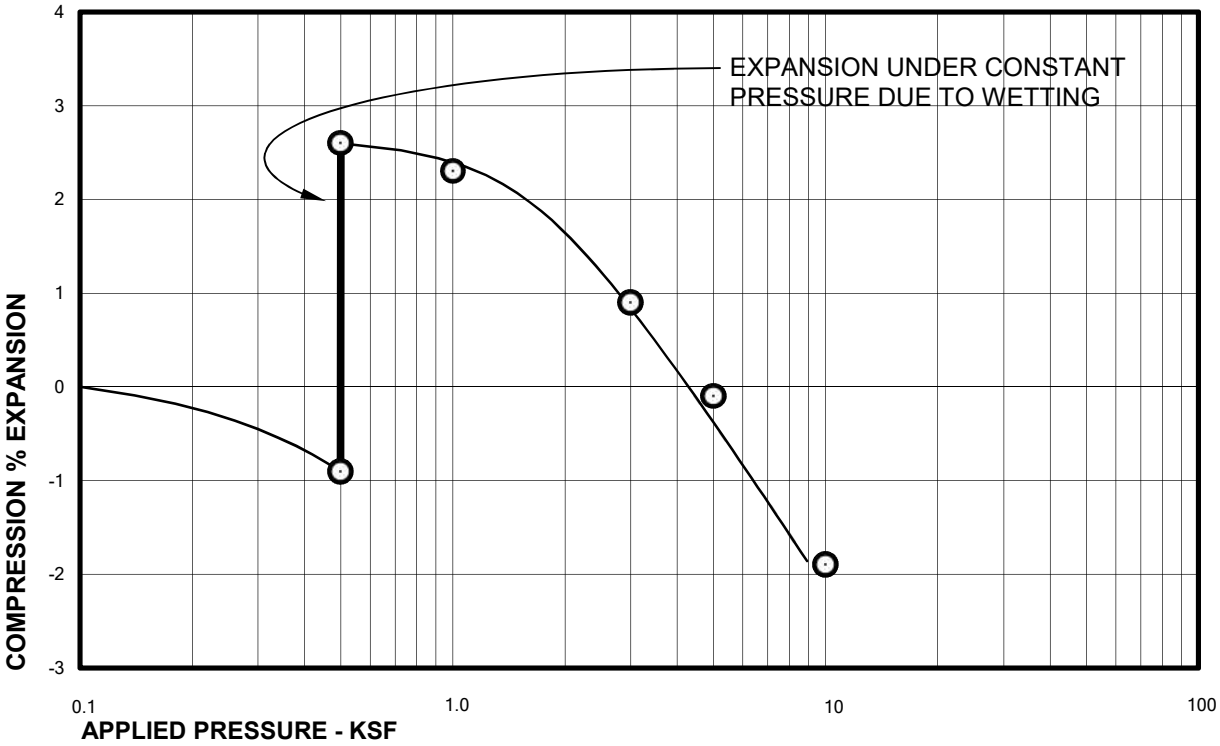
Sample of CLAYSTONE
From TH-5 AT 19 FEET

DRY UNIT WEIGHT= 118 PCF
MOISTURE CONTENT= 14.4 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

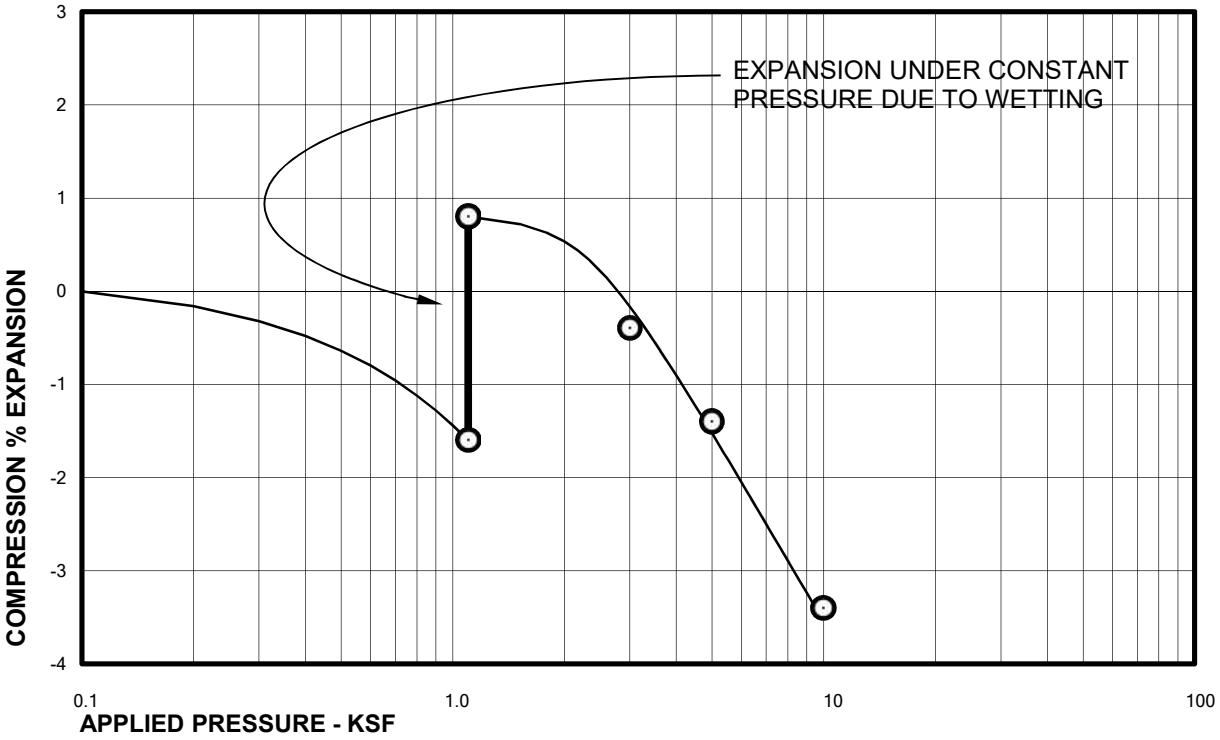
Swell Consolidation Test Results

FIG. B-7



Sample of CLAY, SANDY (CL) DRY UNIT WEIGHT= 121 PCF

From TH-6 AT 4 FEET MOISTURE CONTENT= 8.2 %



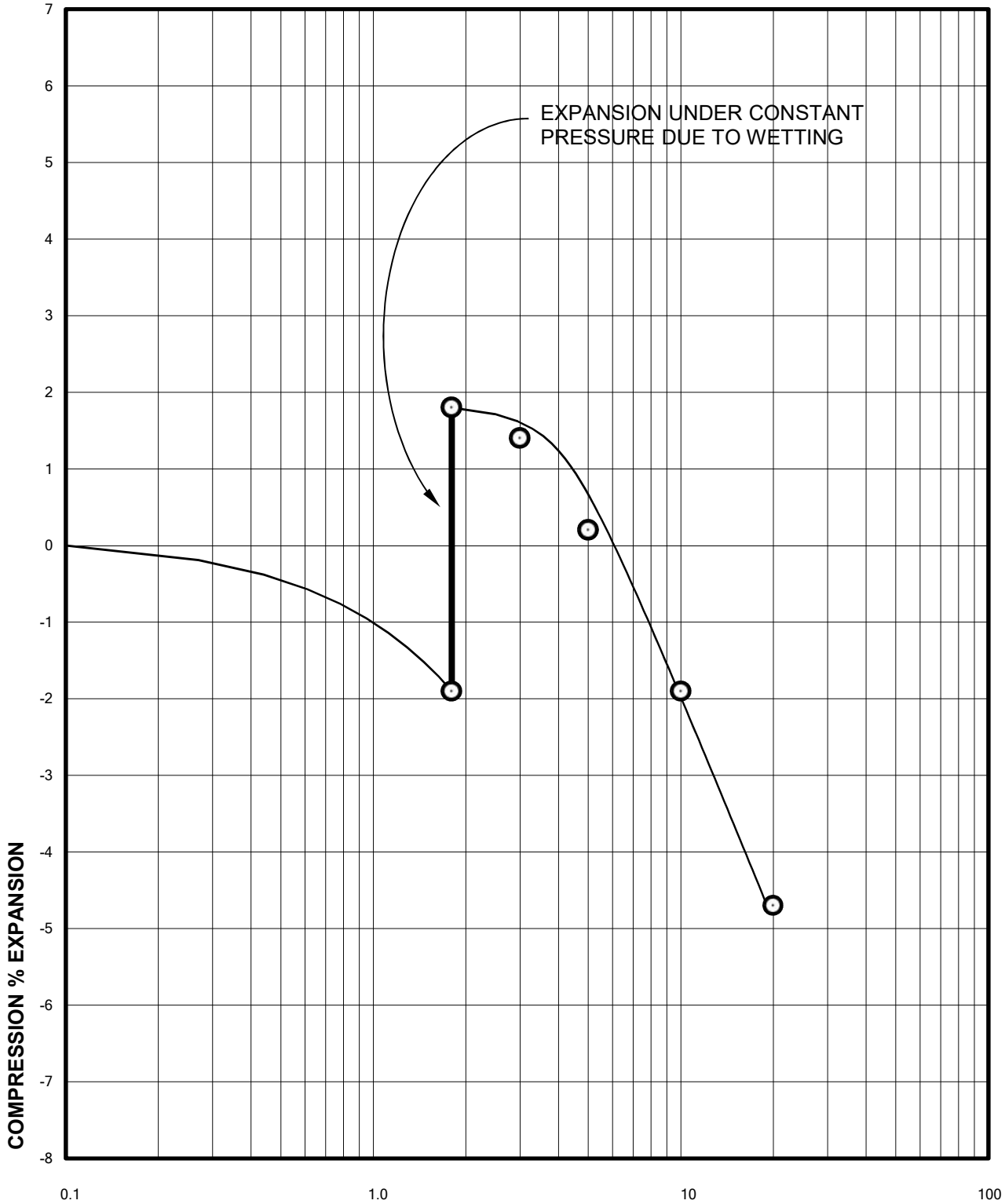
Sample of WEATHERED CLAYSTONE DRY UNIT WEIGHT= 106 PCF

From TH-6 AT 9 FEET MOISTURE CONTENT= 19.6 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-8



Sample of WEATHERED CLAYSTONE

From TH-6 AT 14 FEET

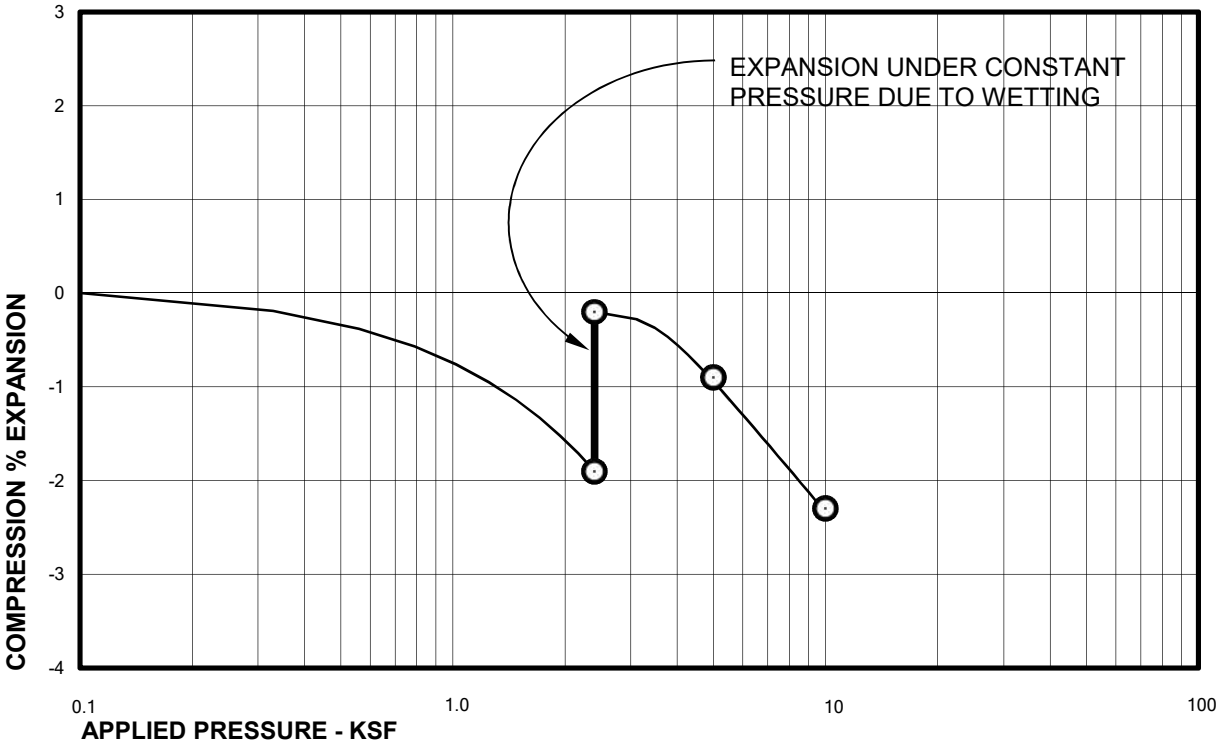
DRY UNIT WEIGHT= 106 PCF

MOISTURE CONTENT= 21.9 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

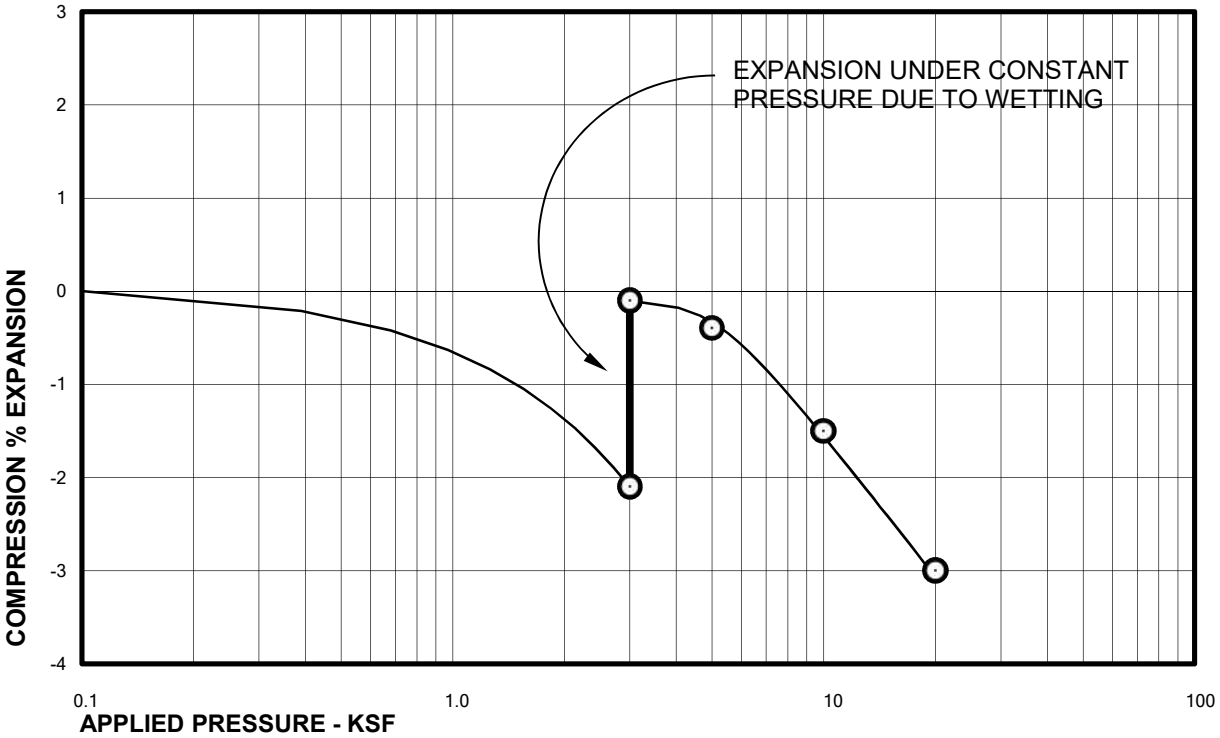
Swell Consolidation Test Results

FIG. B-9



Sample of CLAYSTONE
From TH-6 AT 19 FEET

DRY UNIT WEIGHT= 117 PCF
MOISTURE CONTENT= 15.0 %



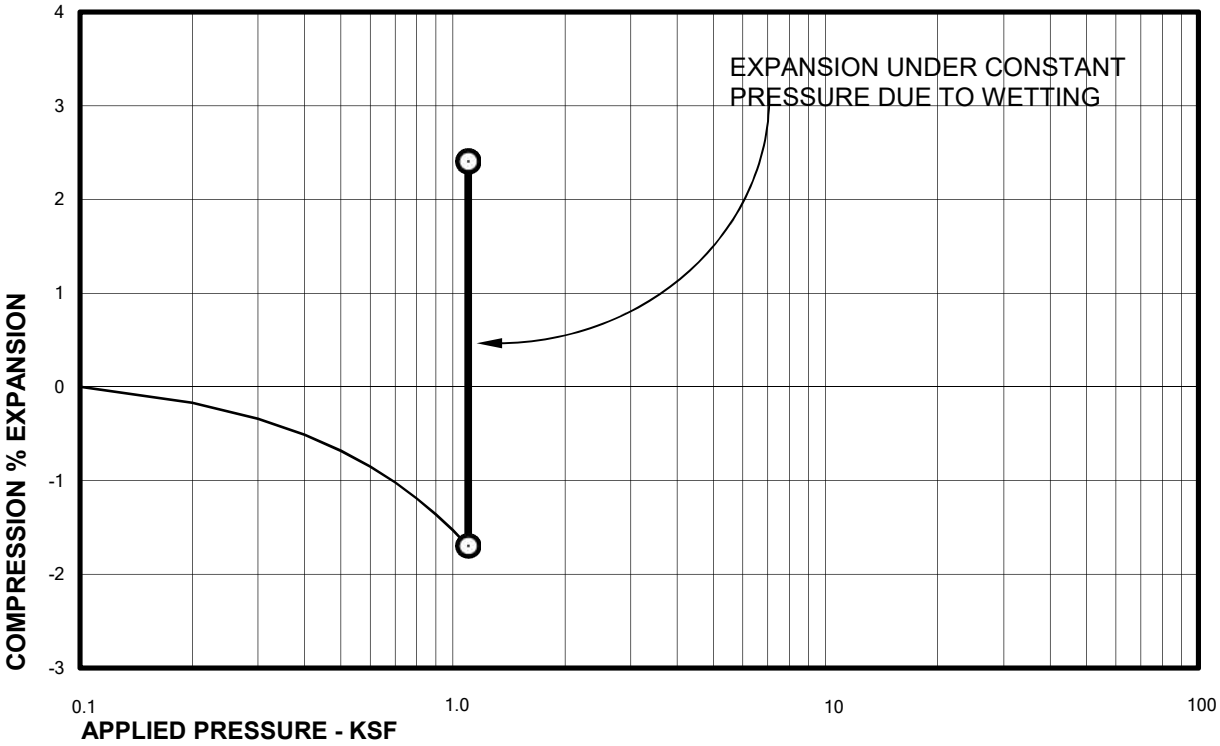
Sample of CLAYSTONE
From TH-6 AT 24 FEET

DRY UNIT WEIGHT= 120 PCF
MOISTURE CONTENT= 14.4 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

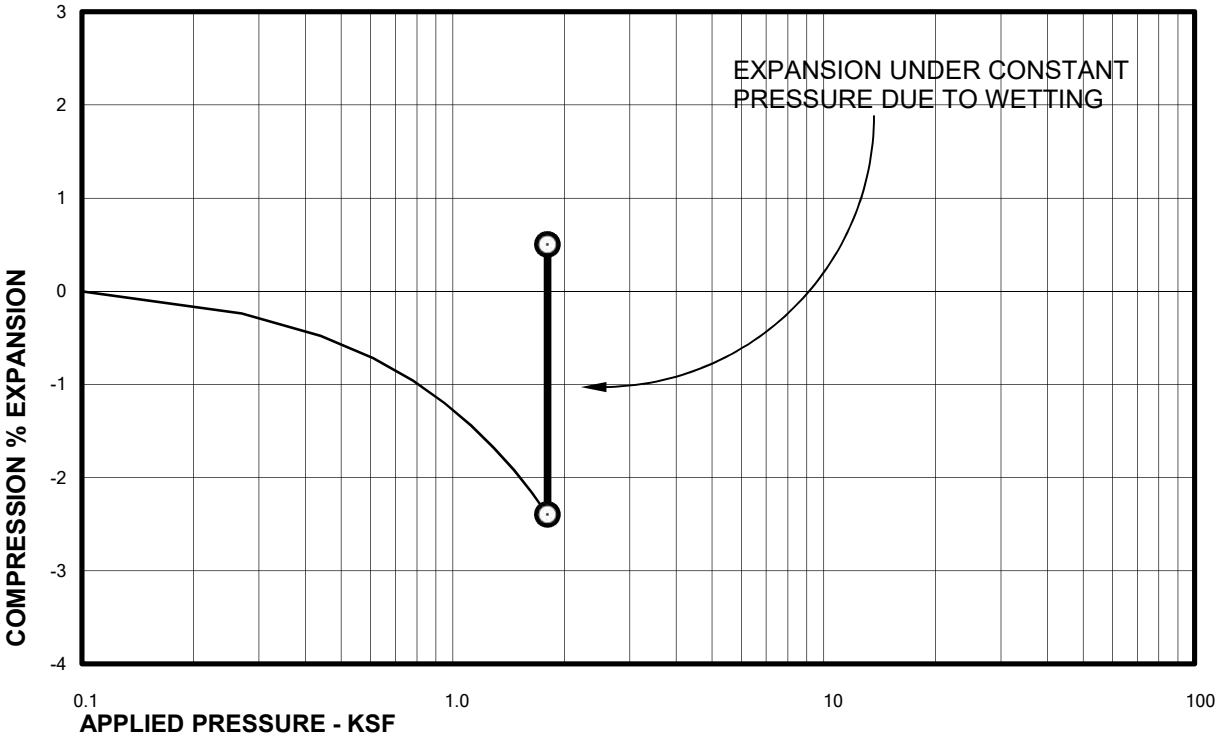
Swell Consolidation Test Results

FIG. B-10



Sample of WEATHERED CLAYSTONE
From TH-7 AT 9 FEET

DRY UNIT WEIGHT= 112 PCF
MOISTURE CONTENT= 15.6 %



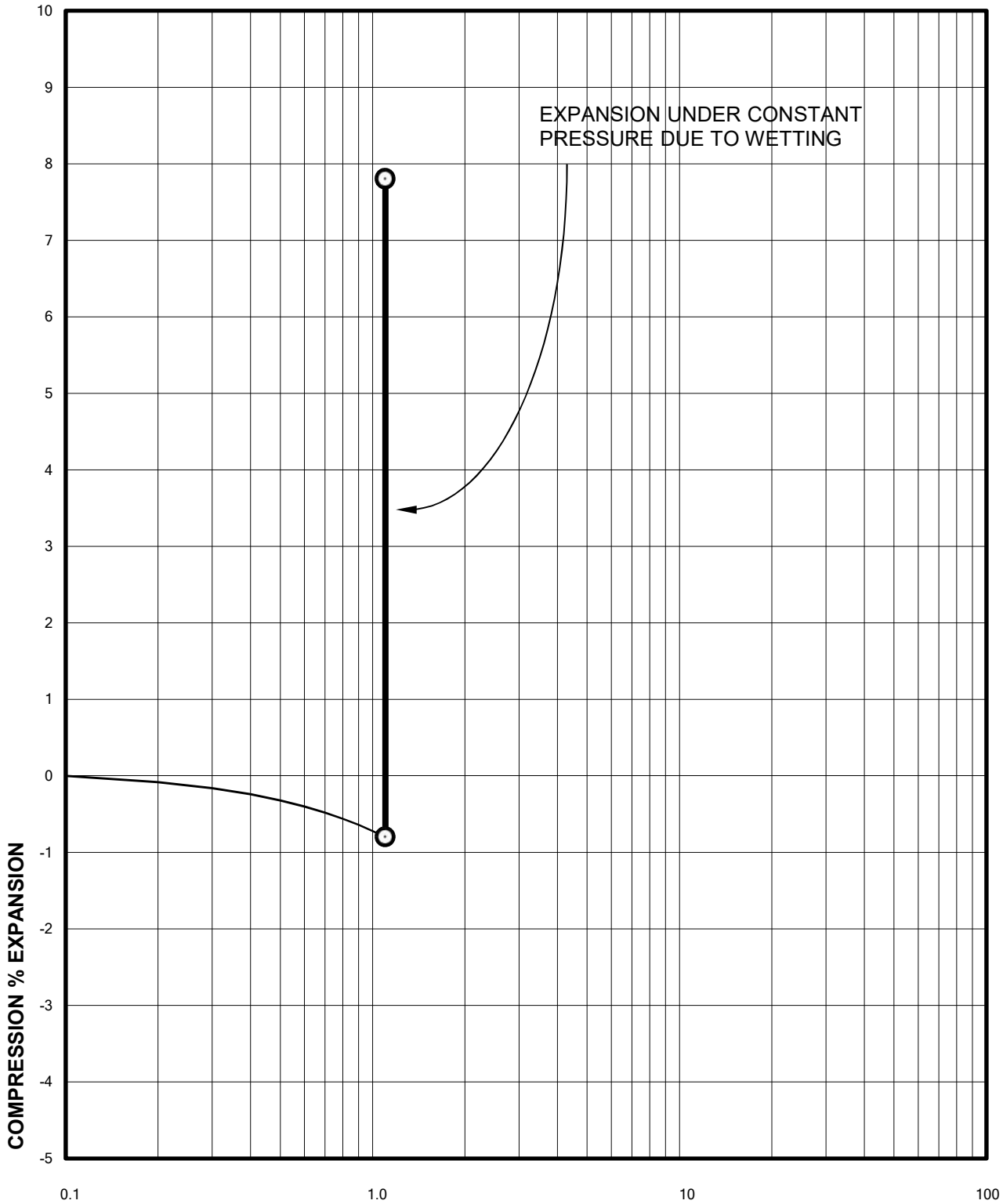
Sample of WEATHERED CLAYSTONE
From TH-7 AT 14 FEET

DRY UNIT WEIGHT= 107 PCF
MOISTURE CONTENT= 23.3 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-11



Sample of CLAYSTONE

From TH-8 AT 9 FEET

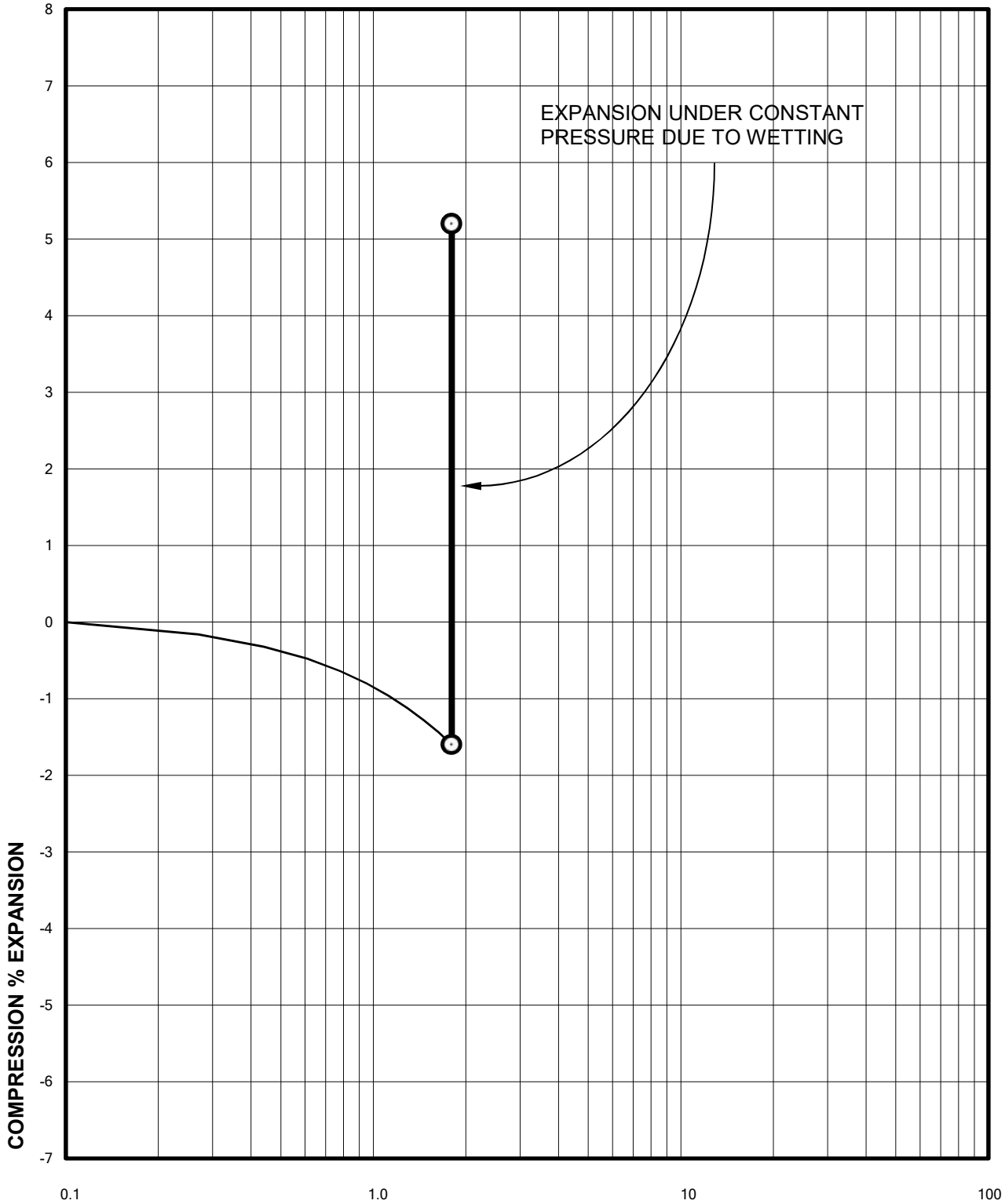
DRY UNIT WEIGHT= 120 PCF

MOISTURE CONTENT= 12.7 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-12



Sample of CLAYSTONE

From TH-8 AT 14 FEET

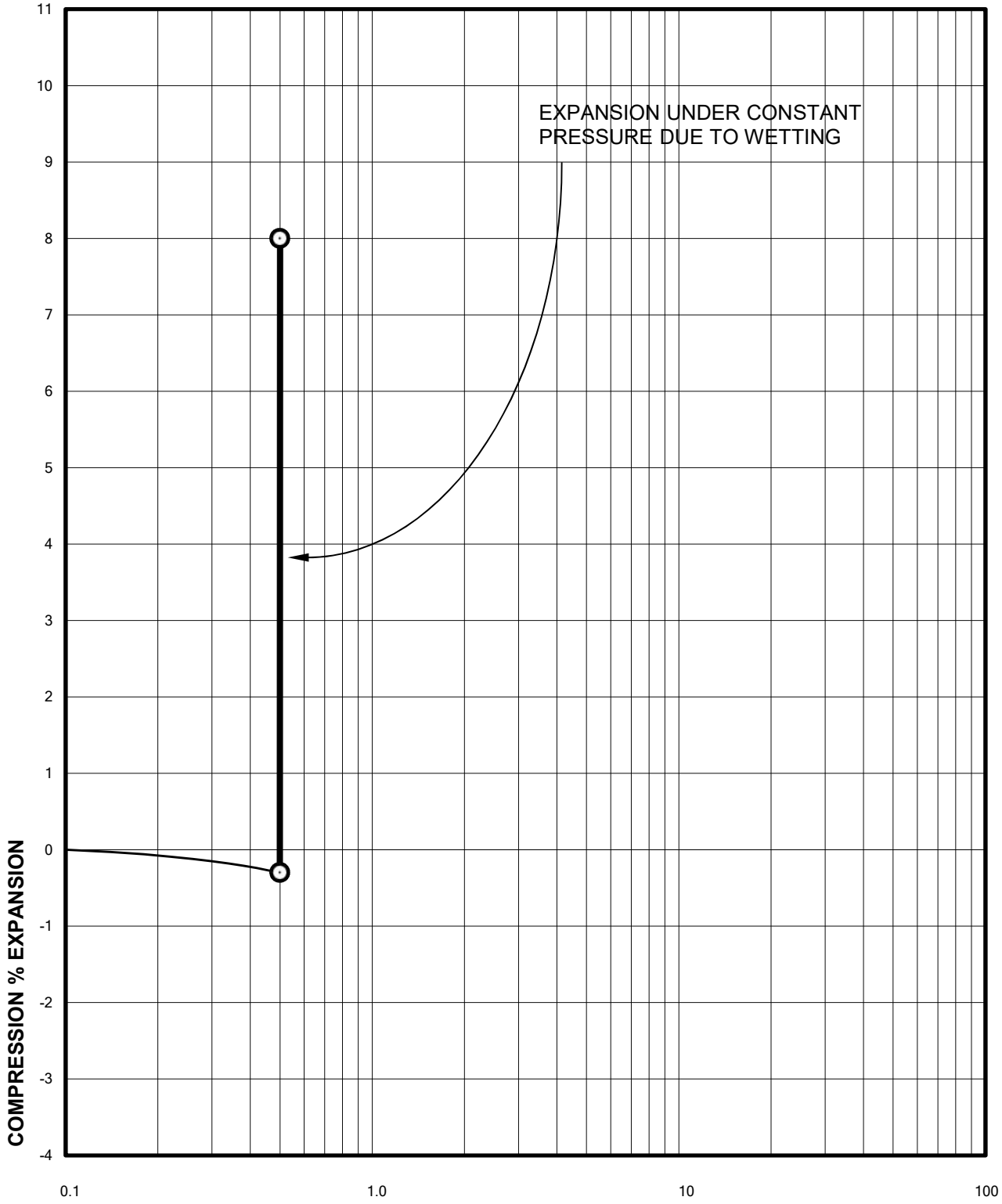
DRY UNIT WEIGHT= 113 PCF

MOISTURE CONTENT= 18.7 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-13



Sample of WEATHERED CLAYSTONE

From TH-9 AT 4 FEET

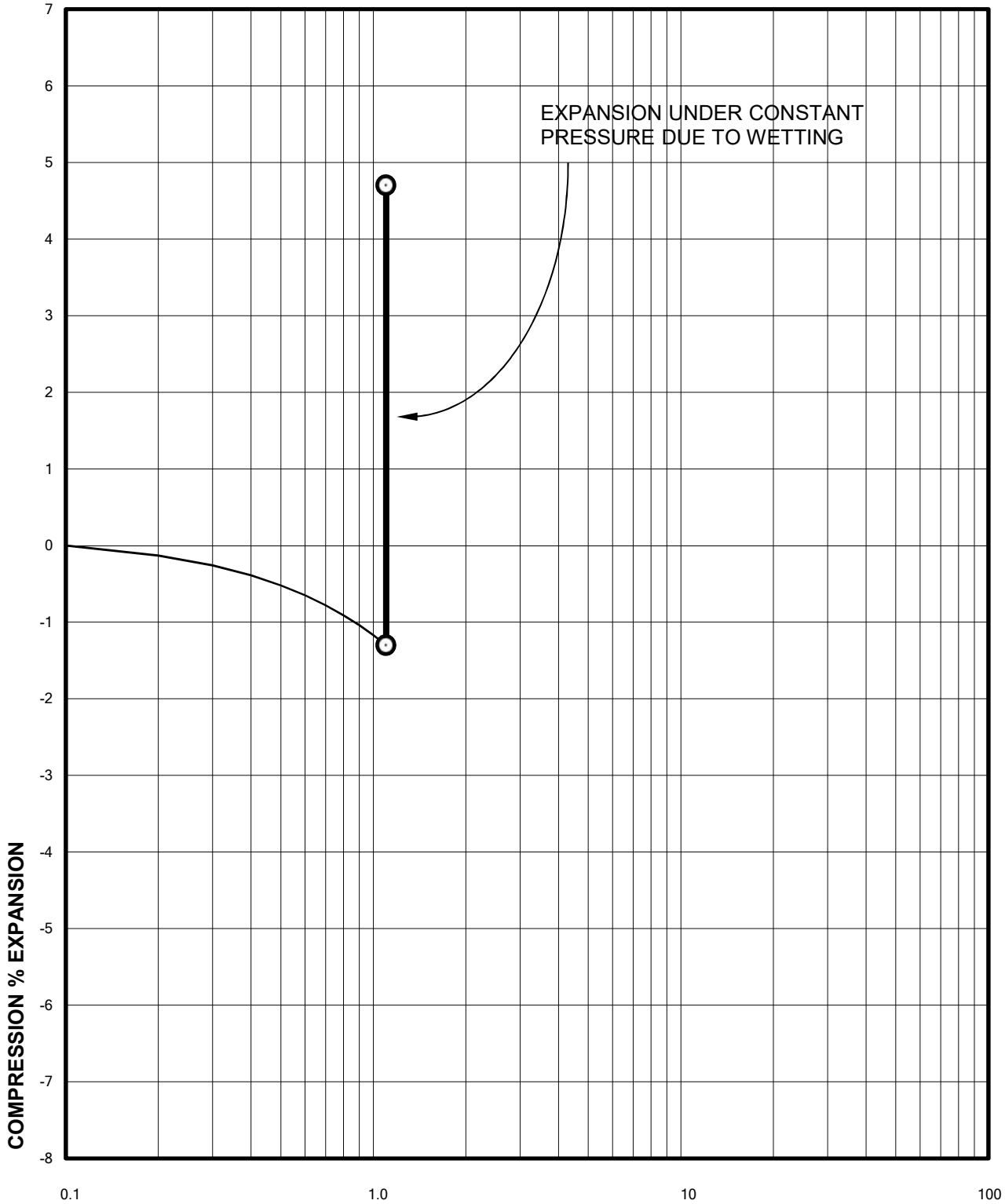
DRY UNIT WEIGHT= 114 PCF

MOISTURE CONTENT= 12.8 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-14



Sample of WEATHERED CLAYSTONE

From TH-9 AT 9 FEET

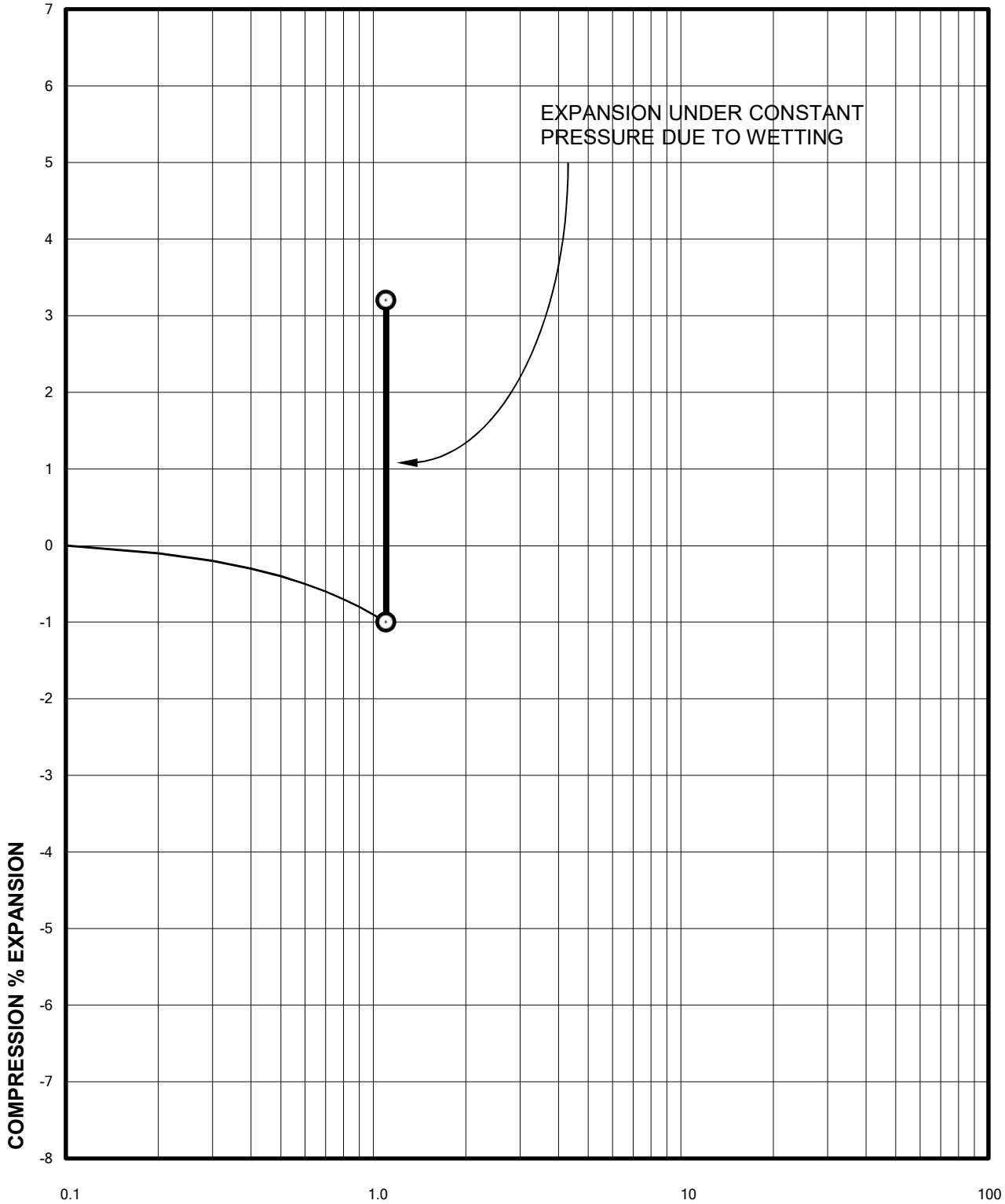
DRY UNIT WEIGHT= 114 PCF

MOISTURE CONTENT= 17.2 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-15



Sample of WEATHERED CLAYSTONE

From TH-10 AT 9 FEET

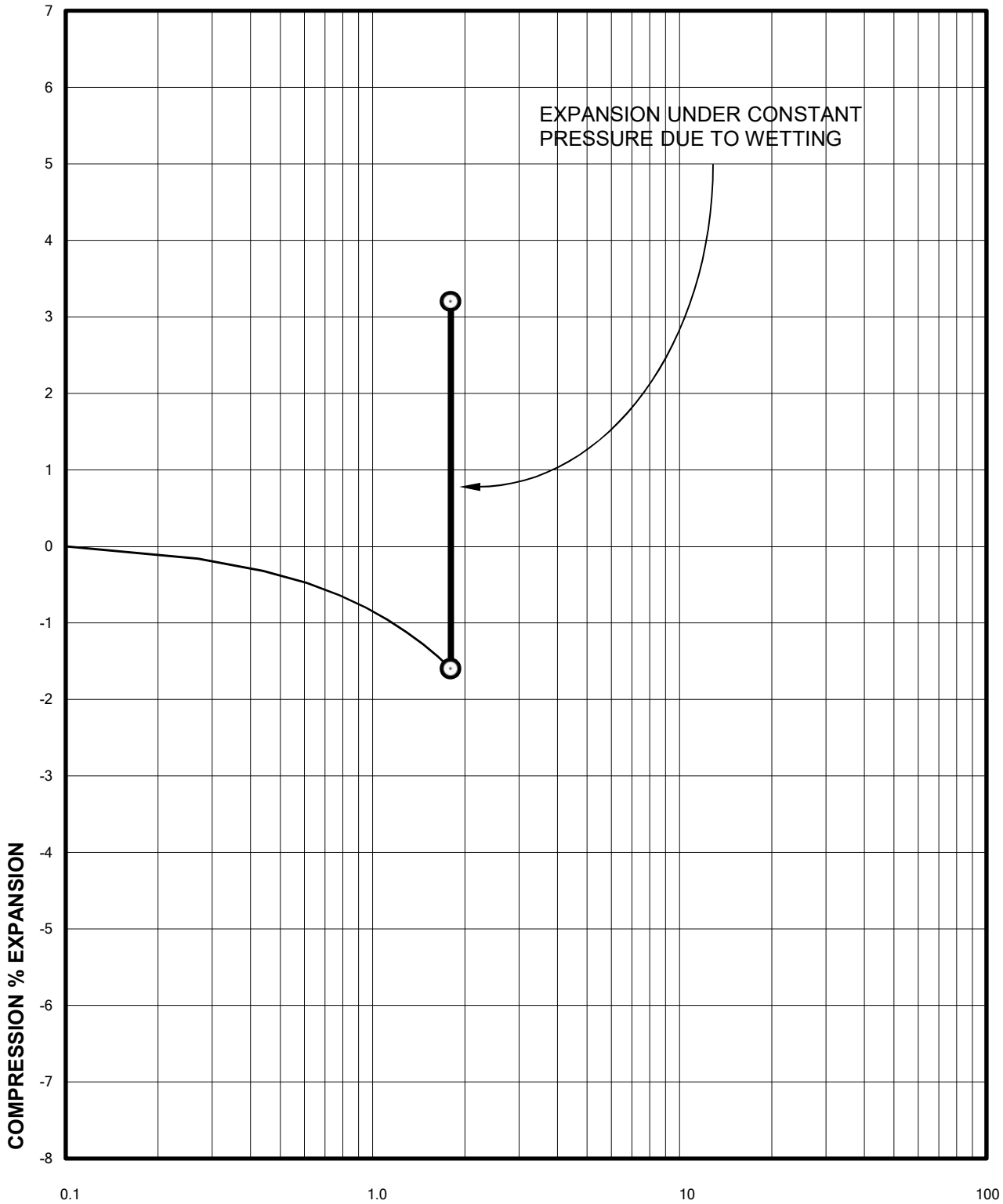
DRY UNIT WEIGHT= 115 PCF

MOISTURE CONTENT= 15.3 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-16



Sample of WEATHERED CLAYSTONE

From TH-10 AT 14 FEET

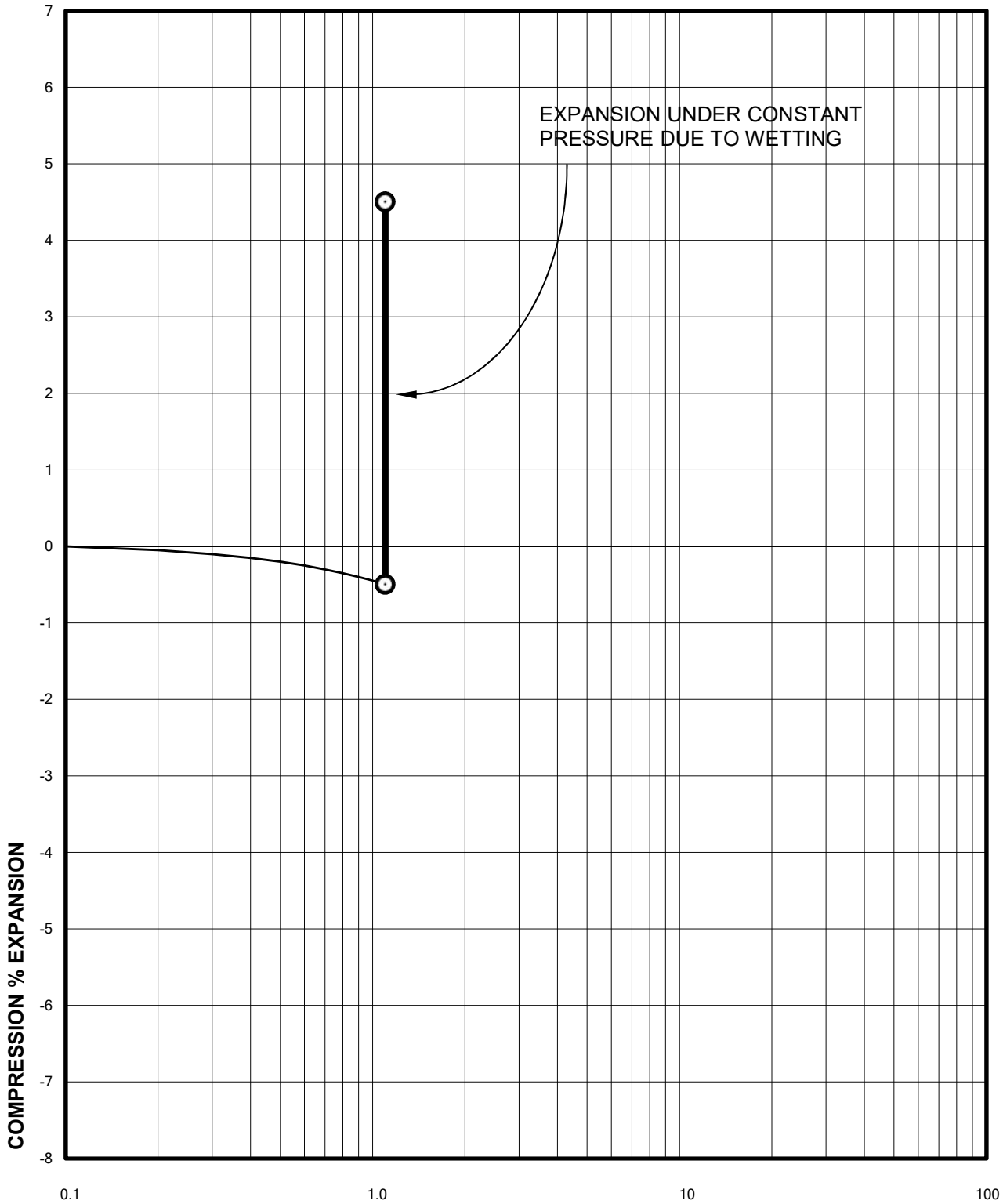
DRY UNIT WEIGHT= 115 PCF

MOISTURE CONTENT= 18.1 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-17



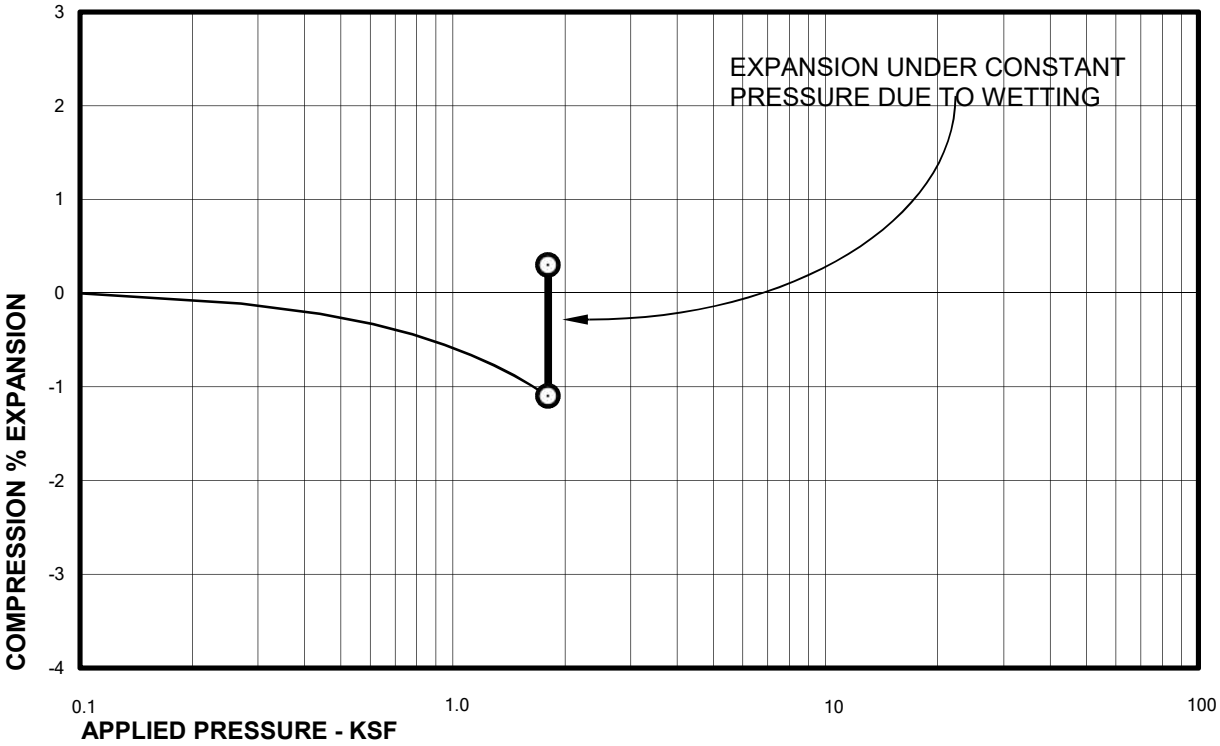
Sample of CLAY, SANDY (CL)
From TH-11 AT 4 FEET

DRY UNIT WEIGHT= 124 PCF
MOISTURE CONTENT= 11.5 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

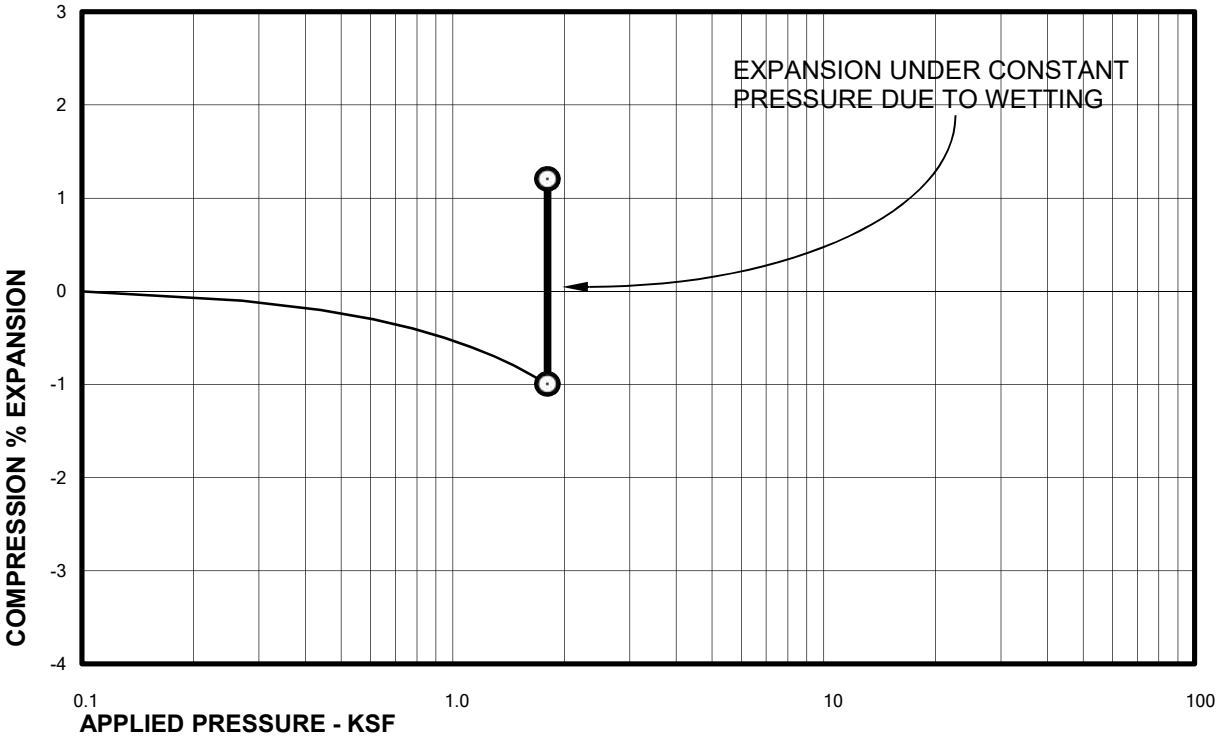
Swell Consolidation Test Results

FIG. B-18



Sample of CLAYSTONE
From TH-11 AT 9 FEET

DRY UNIT WEIGHT= 123 PCF
MOISTURE CONTENT= 10.1 %



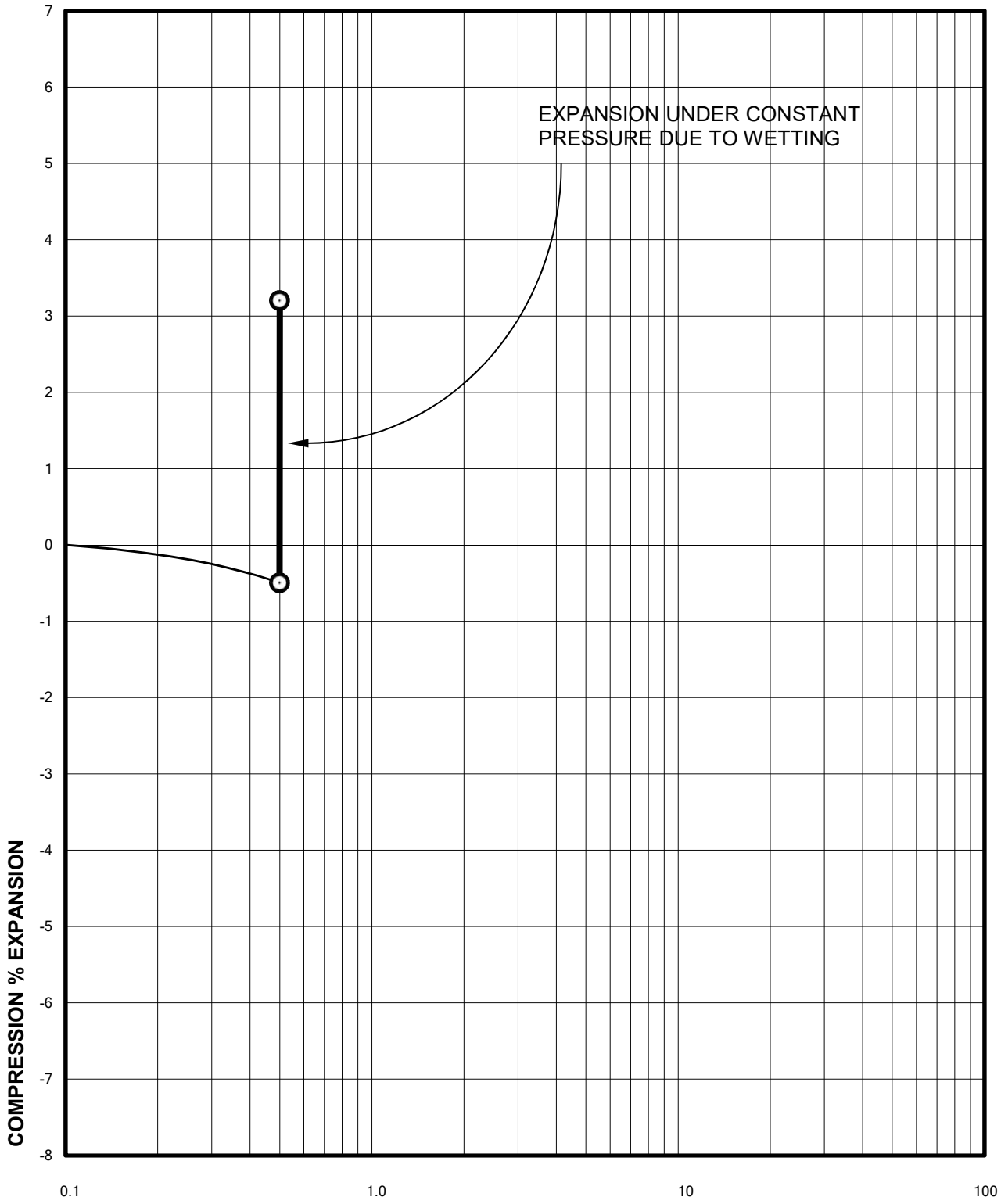
Sample of WEATHERED CLAYSTONE
From TH-12 AT 9 FEET

DRY UNIT WEIGHT= 119 PCF
MOISTURE CONTENT= 15.7 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-19



Sample of CLAY, SANDY (CL)

From TH-13 AT 4 FEET

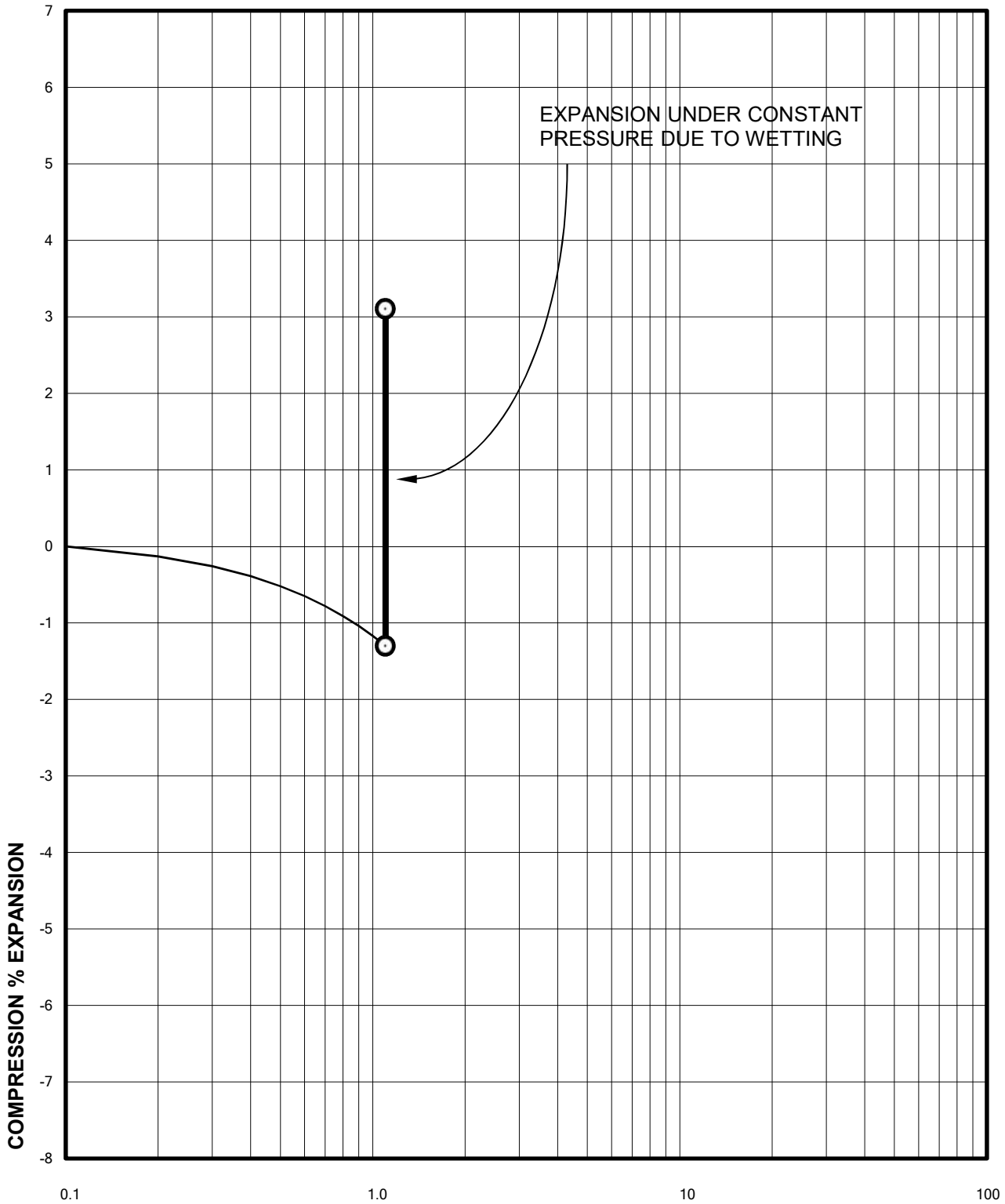
DRY UNIT WEIGHT= 117 PCF

MOISTURE CONTENT= 7.7 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-20



Sample of WEATHERED CLAYSTONE

From TH-13 AT 9 FEET

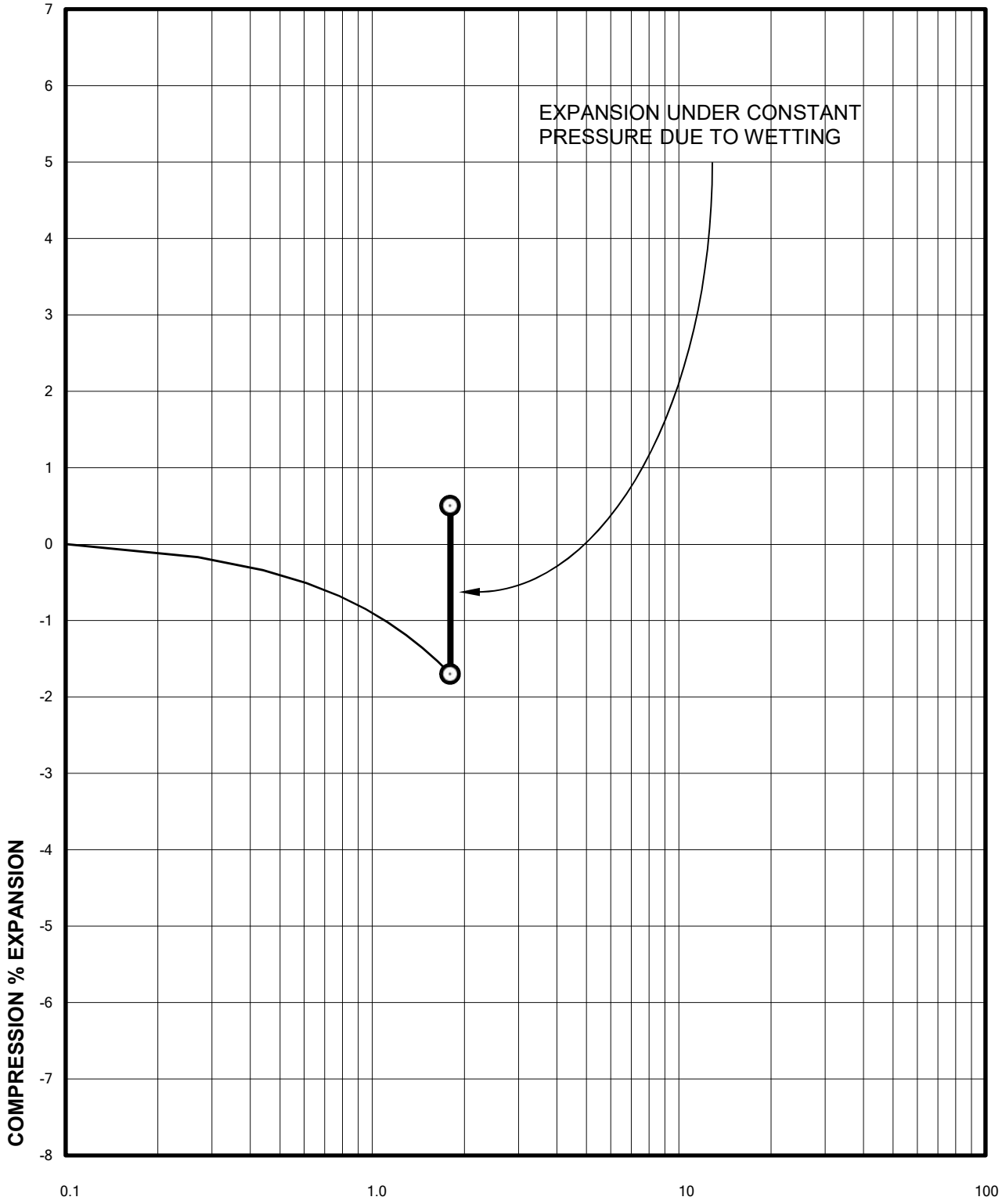
DRY UNIT WEIGHT= 110 PCF

MOISTURE CONTENT= 20.5 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-21



Sample of WEATHERED CLAYSTONE

From TH-13 AT 14 FEET

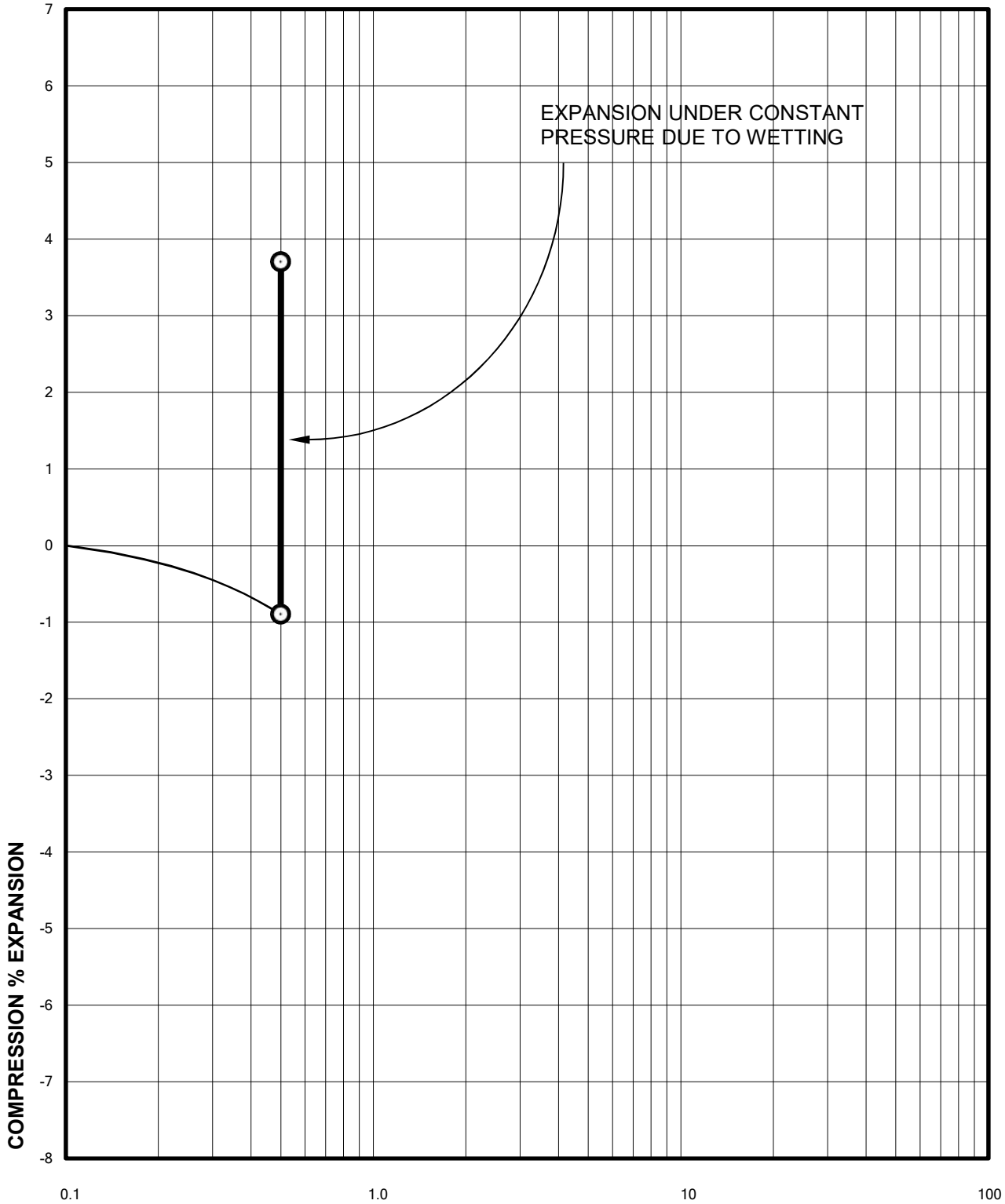
DRY UNIT WEIGHT= 114 PCF

MOISTURE CONTENT= 18.1 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-22



Sample of CLAY, SANDY (CL)

From TH-14 AT 9 FEET

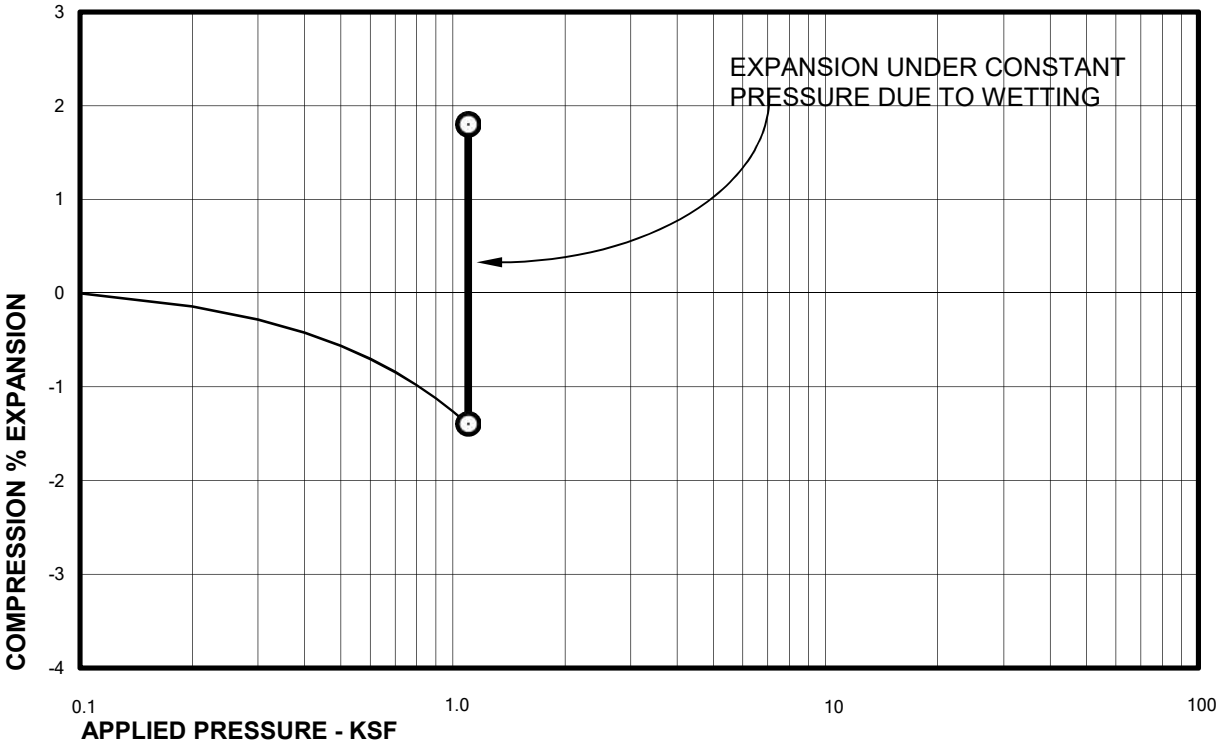
DRY UNIT WEIGHT= 114 PCF

MOISTURE CONTENT= 16.9 %

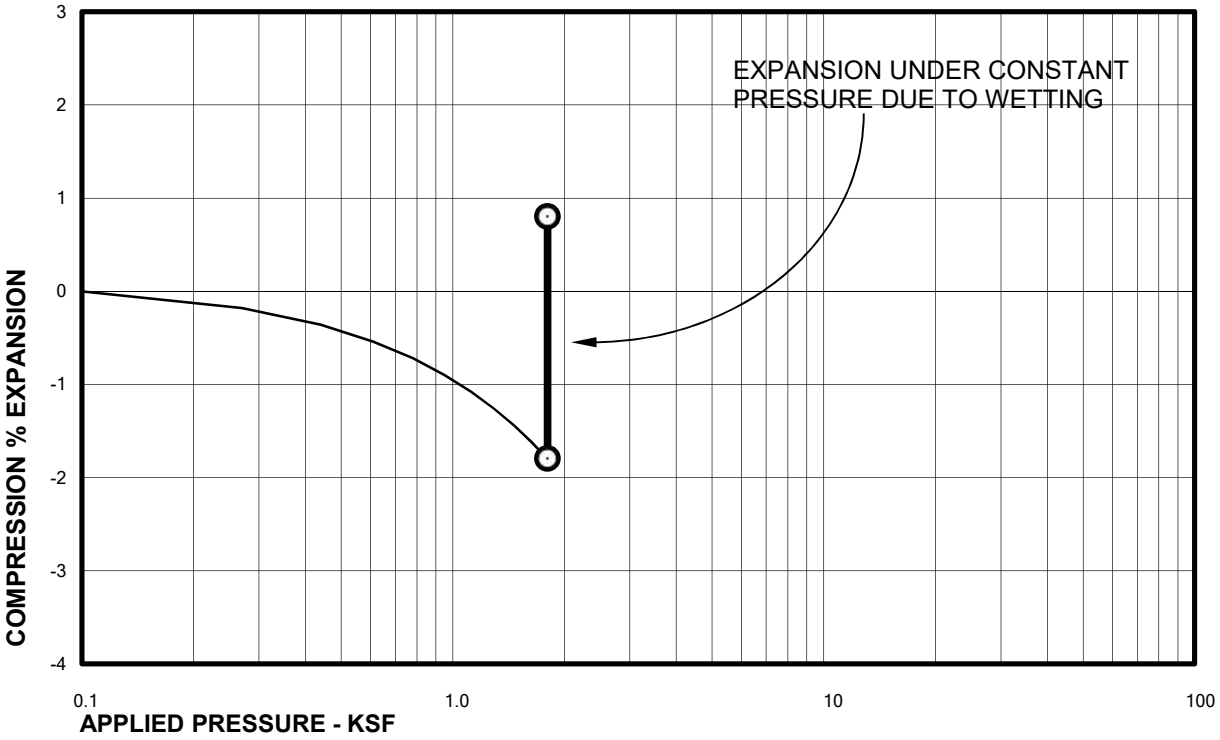
ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-23



Sample of WEATHERED CLAYSTONE DRY UNIT WEIGHT= 107 PCF
From TH-14 AT 14 FEET MOISTURE CONTENT= 21.4 %

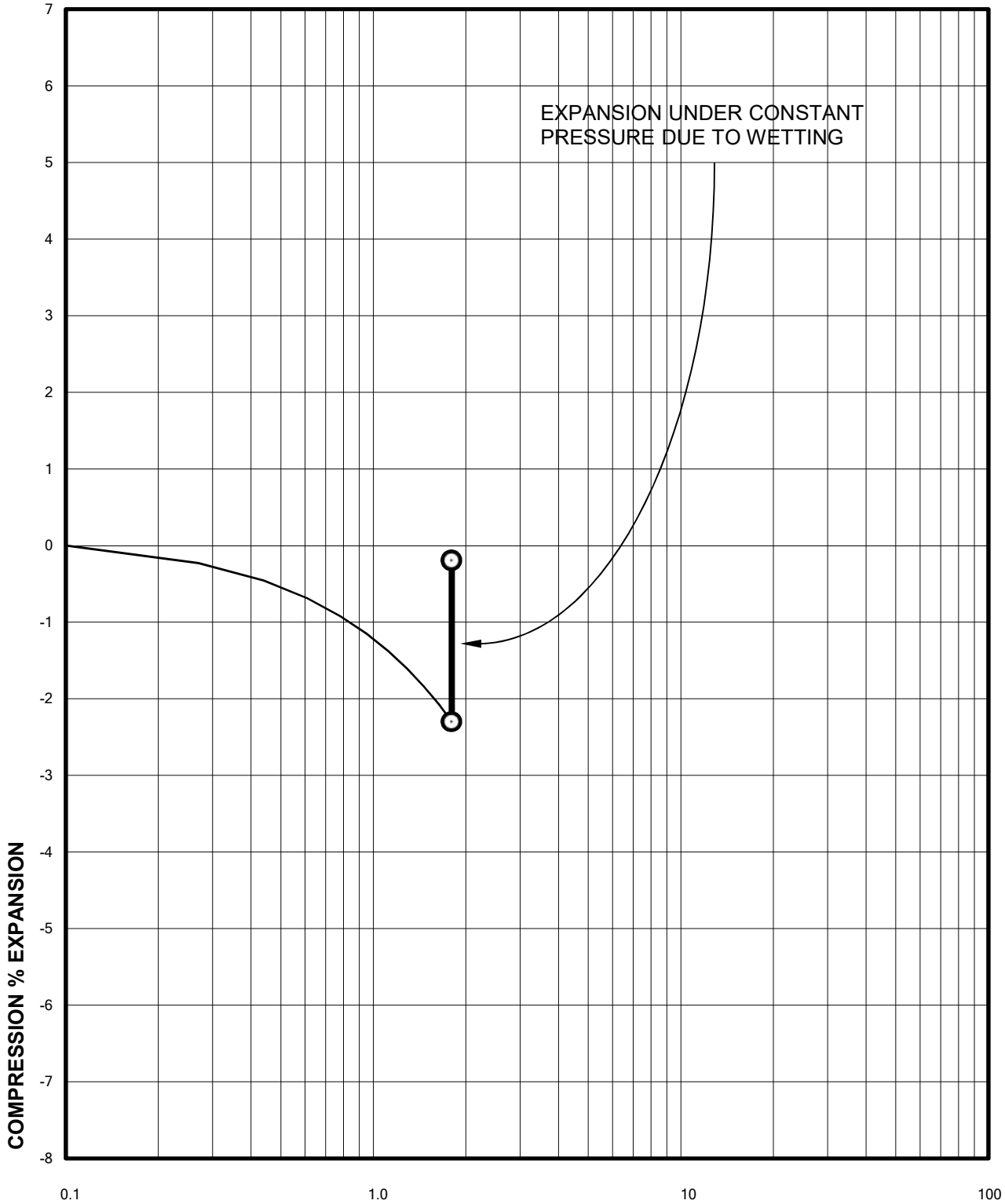


Sample of WEATHERED CLAYSTONE DRY UNIT WEIGHT= 113 PCF
From TH-14 AT 19 FEET MOISTURE CONTENT= 17.0 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-24



Sample of WEATHERED CLAYSTONE

From TH-15 AT 14 FEET

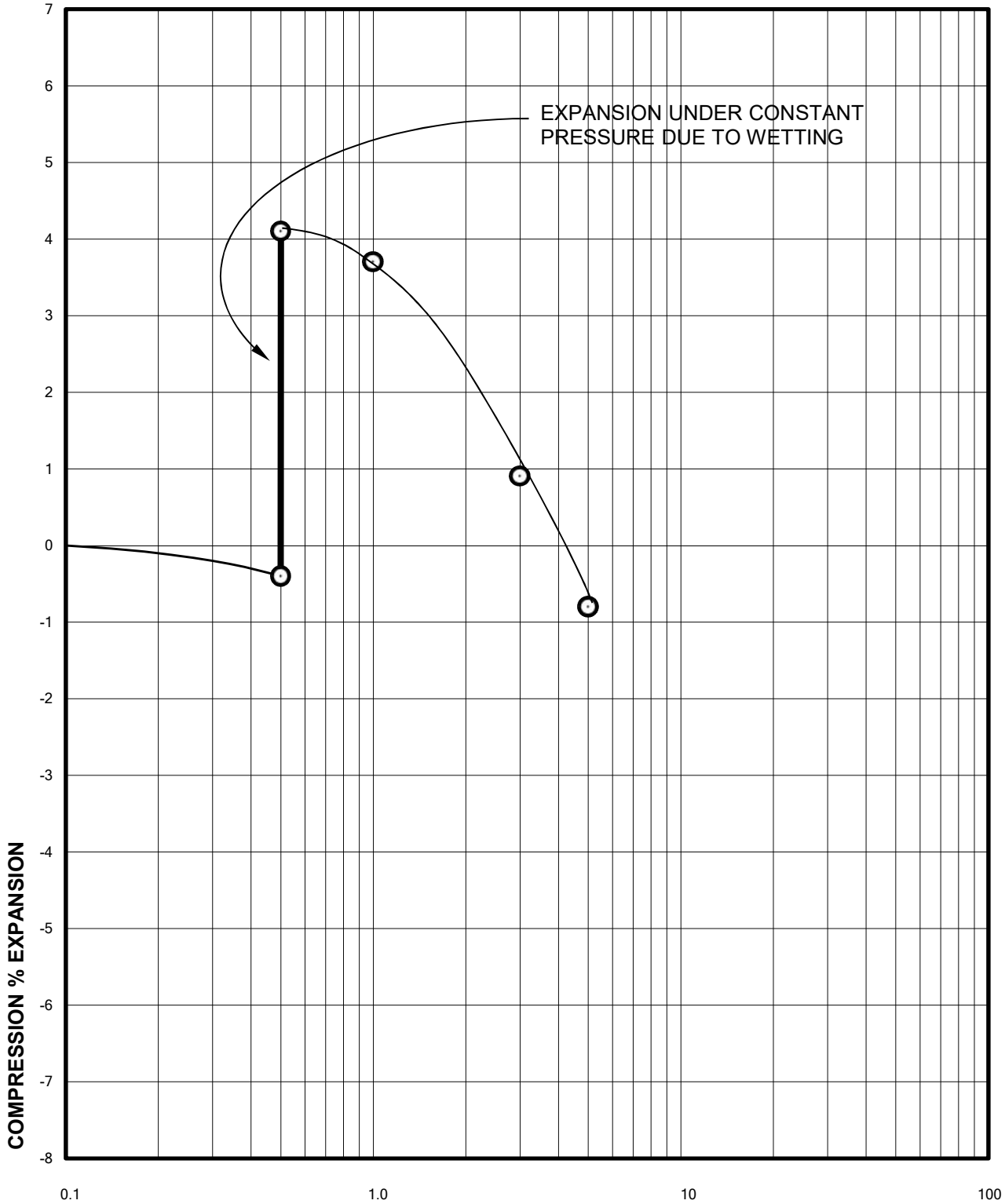
DRY UNIT WEIGHT= 106 PCF

MOISTURE CONTENT= 21.9 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-25



Sample of WEATHERED CLAYSTONE

From TH-16 AT 4 FEET

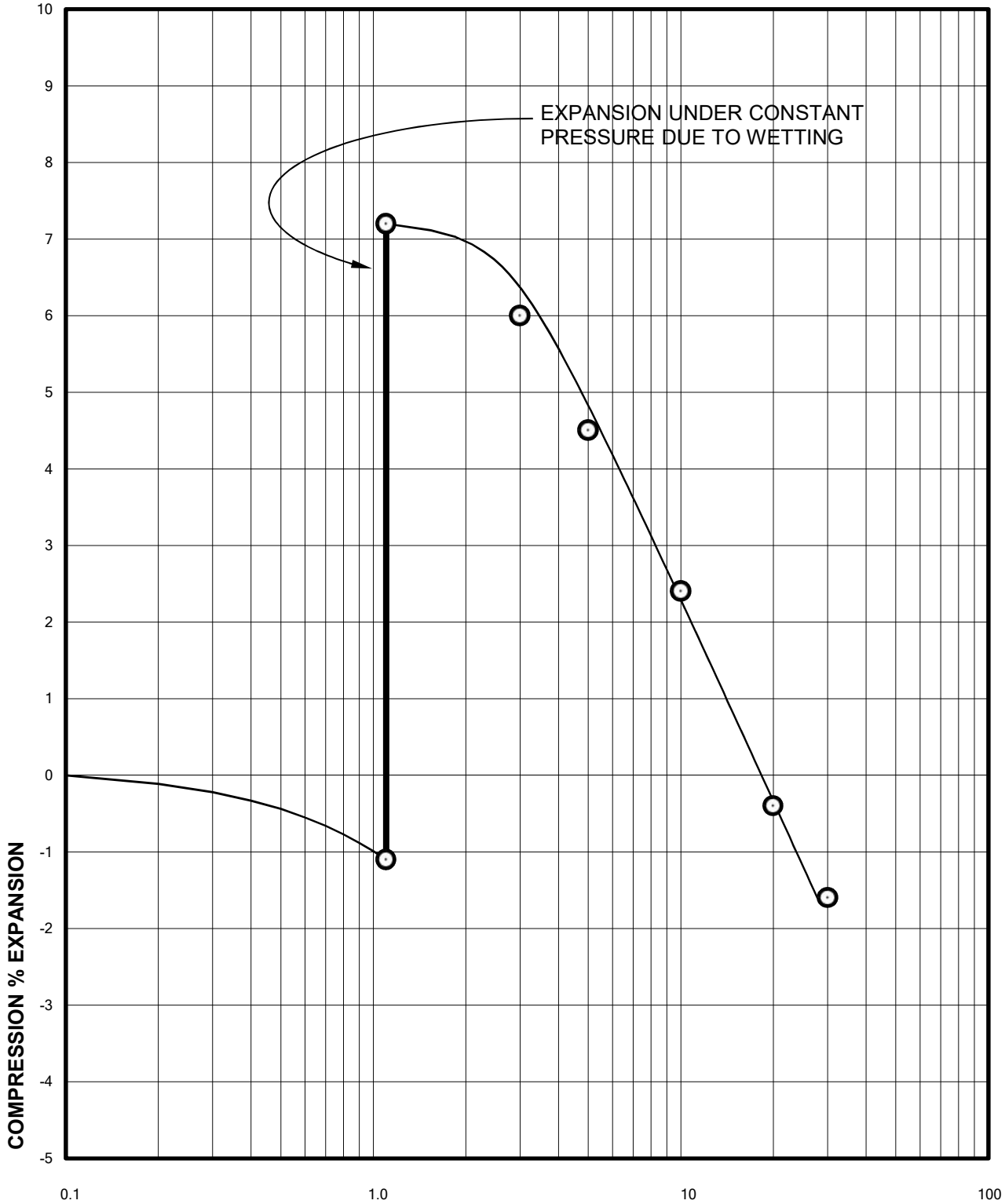
DRY UNIT WEIGHT= 101 PCF

MOISTURE CONTENT= 14.1 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-26



Sample of CLAYSTONE

From TH-16 AT 9 FEET

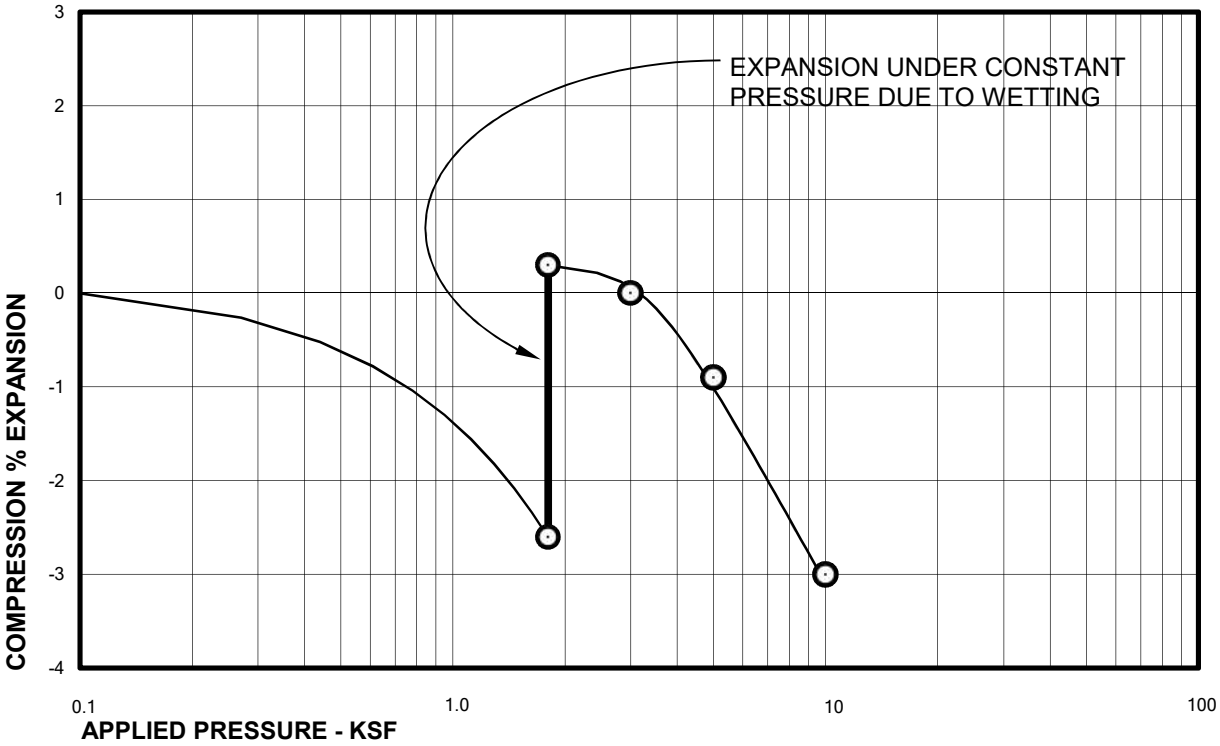
DRY UNIT WEIGHT= 124 PCF

MOISTURE CONTENT= 13.0 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

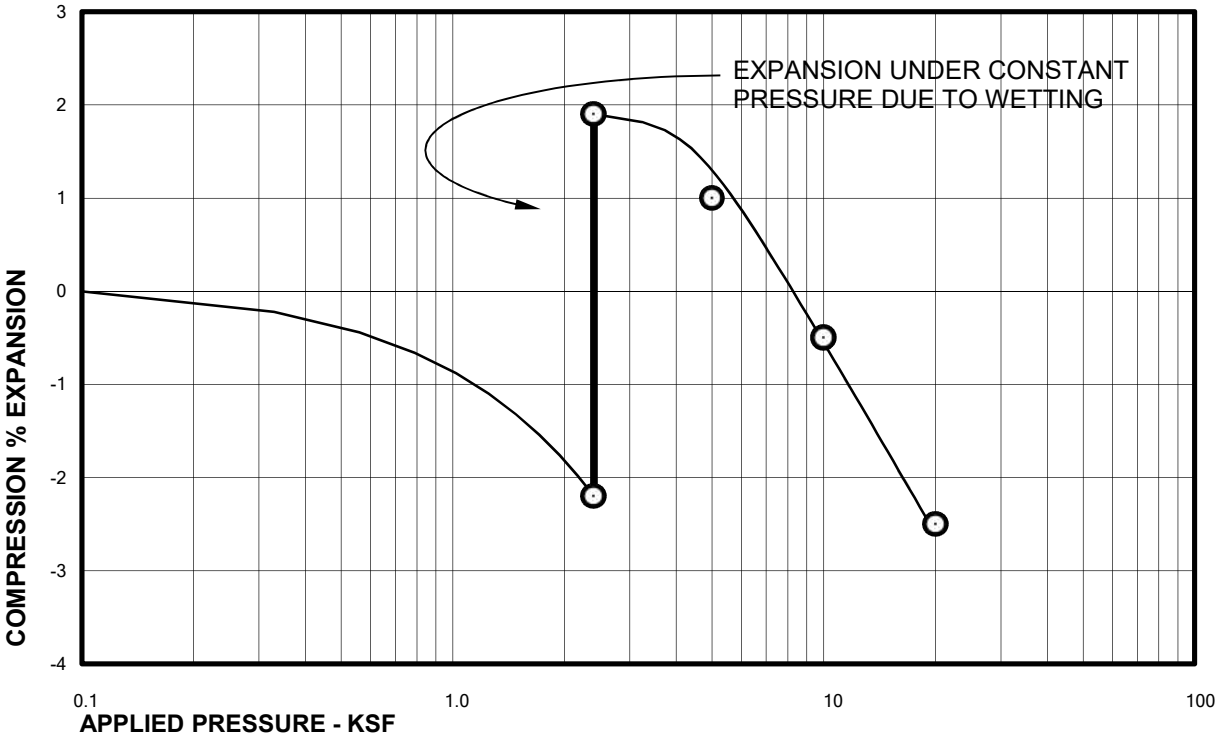
Swell Consolidation Test Results

FIG. B-27



Sample of CLAYSTONE
From TH-16 AT 14 FEET

DRY UNIT WEIGHT= 107 PCF
MOISTURE CONTENT= 15.9 %



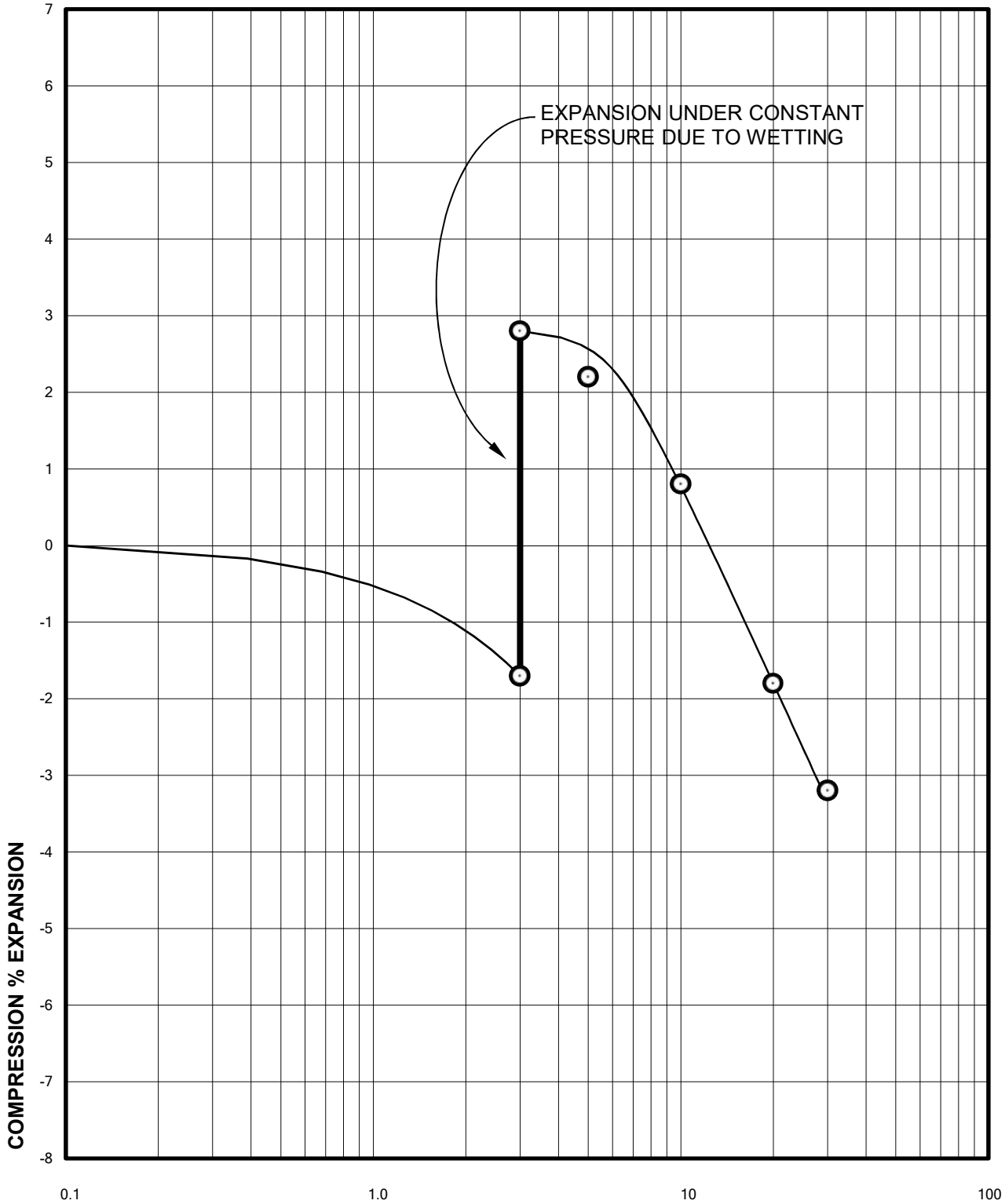
Sample of CLAYSTONE
From TH-16 AT 19 FEET

DRY UNIT WEIGHT= 121 PCF
MOISTURE CONTENT= 15.2 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-28



Sample of CLAYSTONE

From TH-16 AT 24 FEET

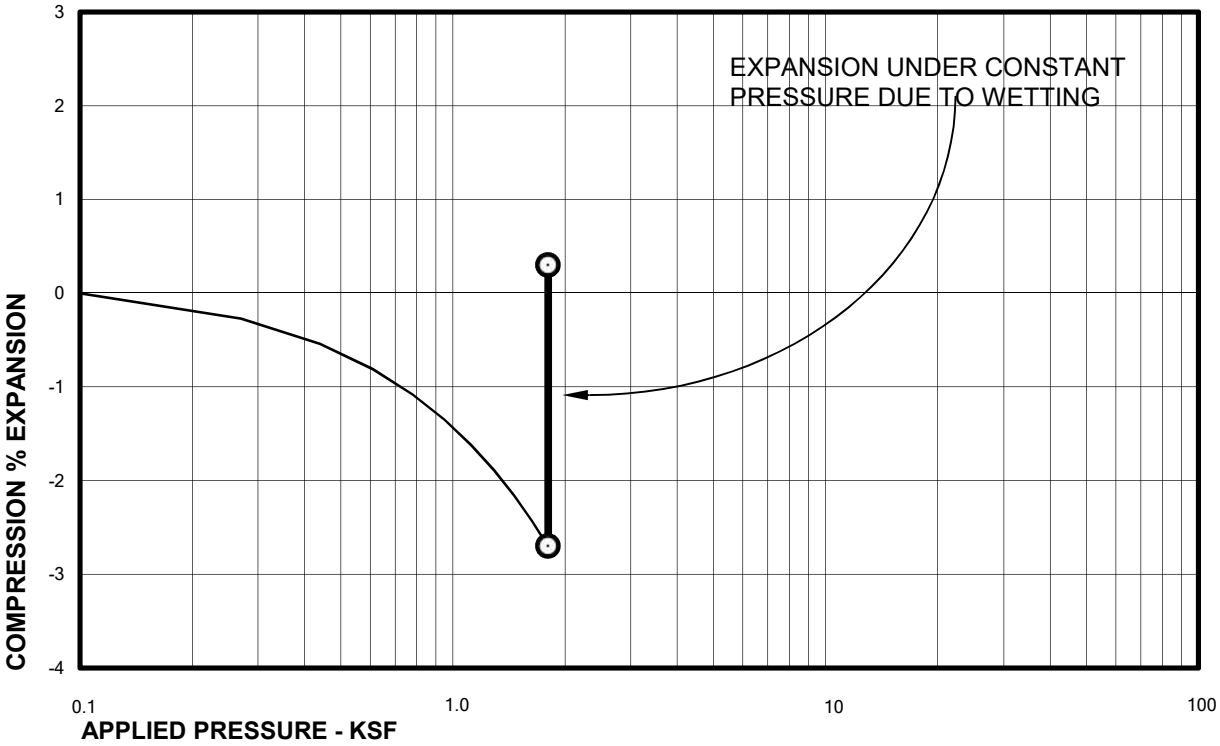
DRY UNIT WEIGHT= 111 PCF

MOISTURE CONTENT= 19.7 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

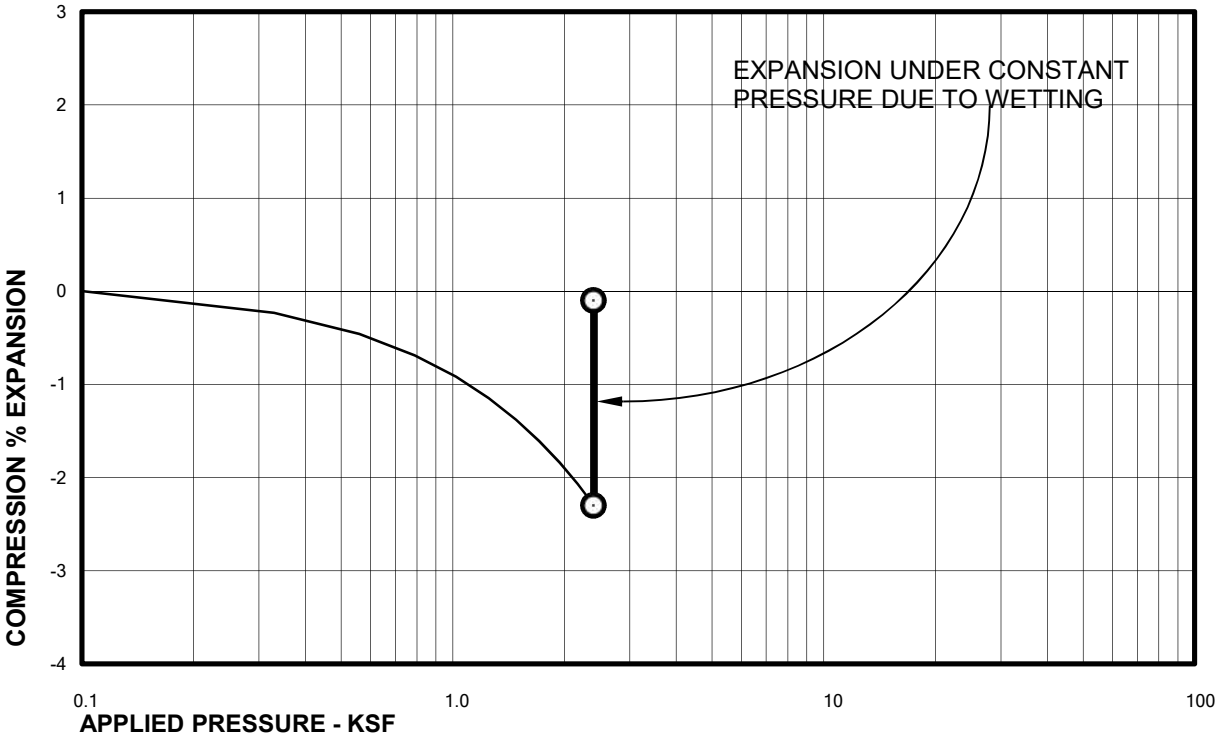
Swell Consolidation Test Results

FIG. B-29



Sample of WEATHERED CLAYSTONE
From TH-17 AT 14 FEET

DRY UNIT WEIGHT= 101 PCF
MOISTURE CONTENT= 23.0 %



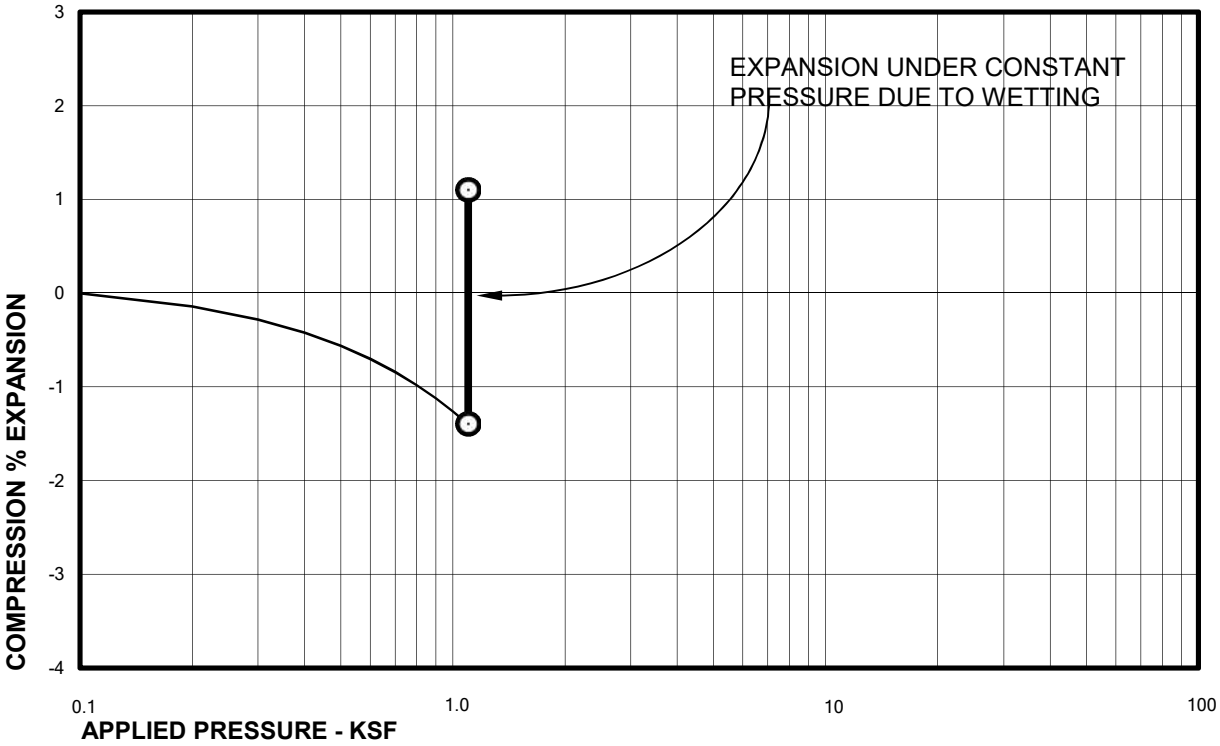
Sample of CLAYSTONE
From TH-17 AT 19 FEET

DRY UNIT WEIGHT= 110 PCF
MOISTURE CONTENT= 20.5 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

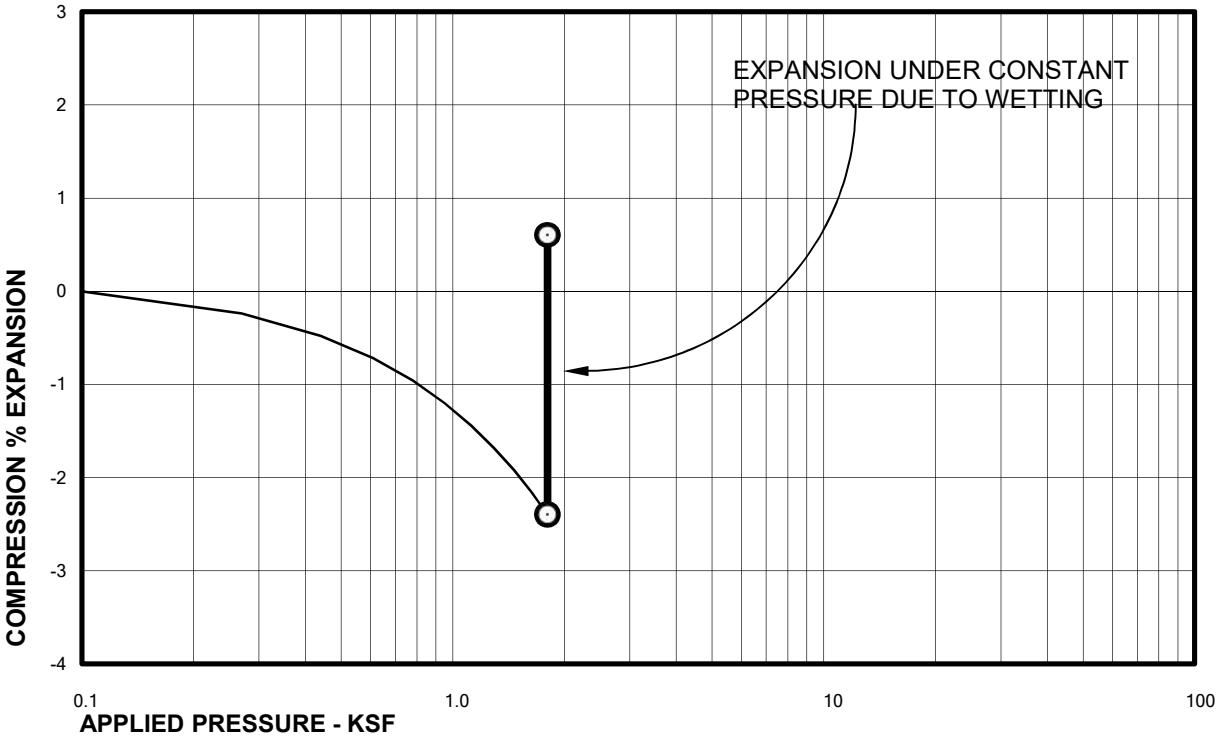
Swell Consolidation Test Results

FIG. B-30



Sample of CLAY, SANDY (CL) DRY UNIT WEIGHT= 106 PCF

From TH-18 AT 9 FEET MOISTURE CONTENT= 20.7 %



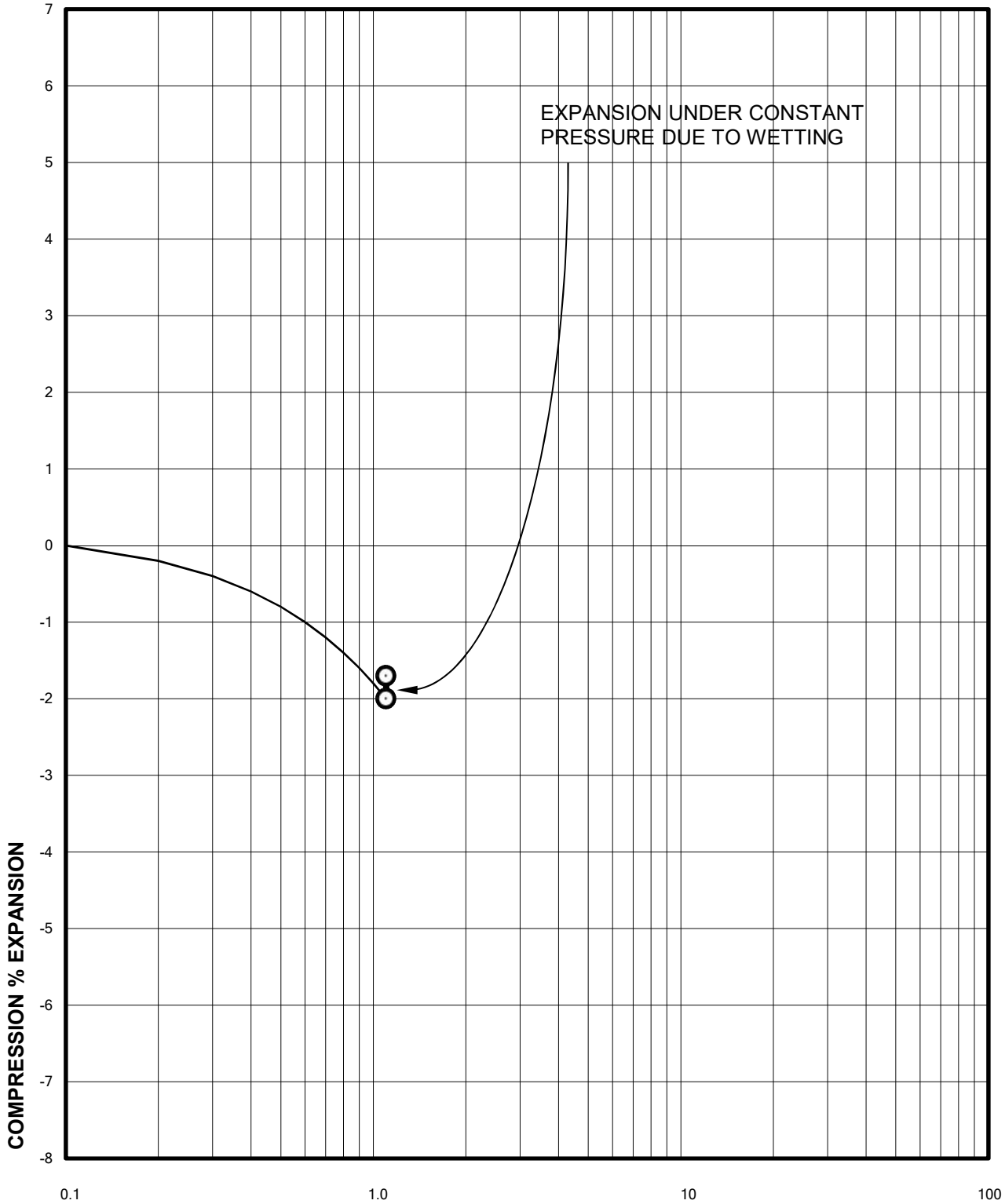
Sample of WEATHERED CLAYSTONE DRY UNIT WEIGHT= 101 PCF

From TH-18 AT 14 FEET MOISTURE CONTENT= 24.0 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-31



Sample of WEATHERED CLAYSTONE

From TH-19 AT 9 FEET

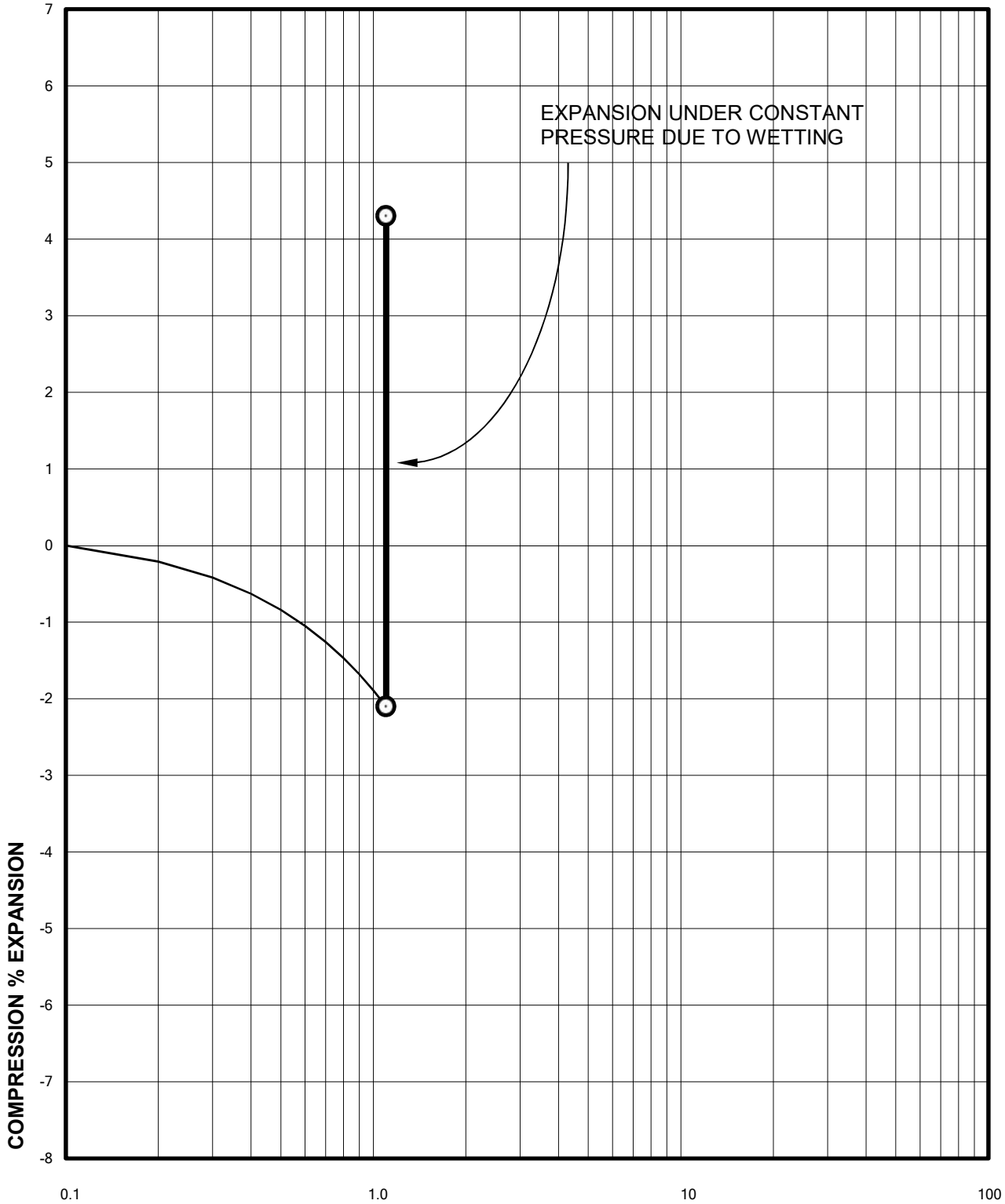
DRY UNIT WEIGHT= 106 PCF

MOISTURE CONTENT= 18.3 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-32



Sample of WEATHERED CLAYSTONE

From TH-19 AT 14 FEET

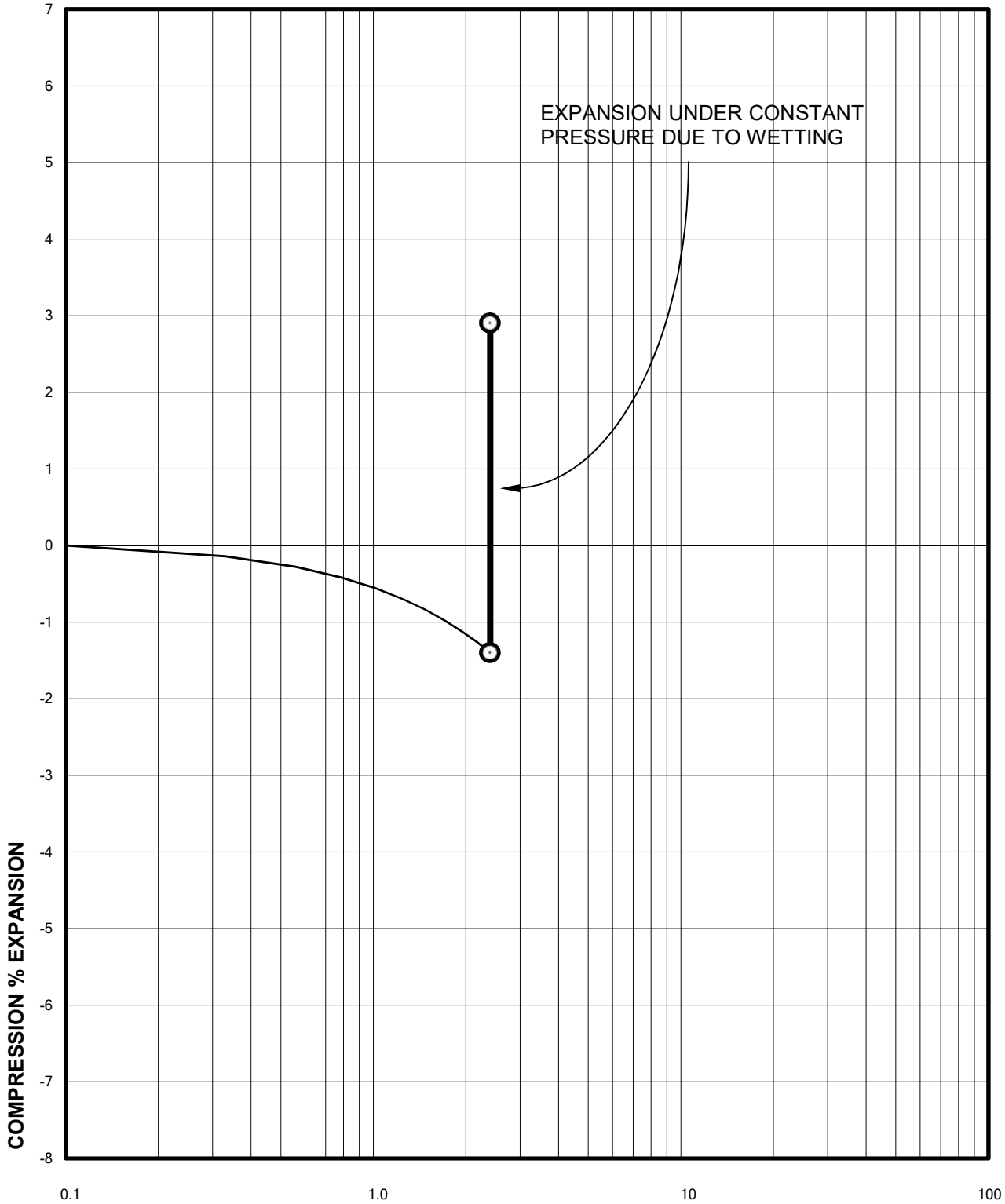
DRY UNIT WEIGHT= 104 PCF

MOISTURE CONTENT= 21.2 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-33



Sample of CLAYSTONE

From TH-19 AT 19 FEET

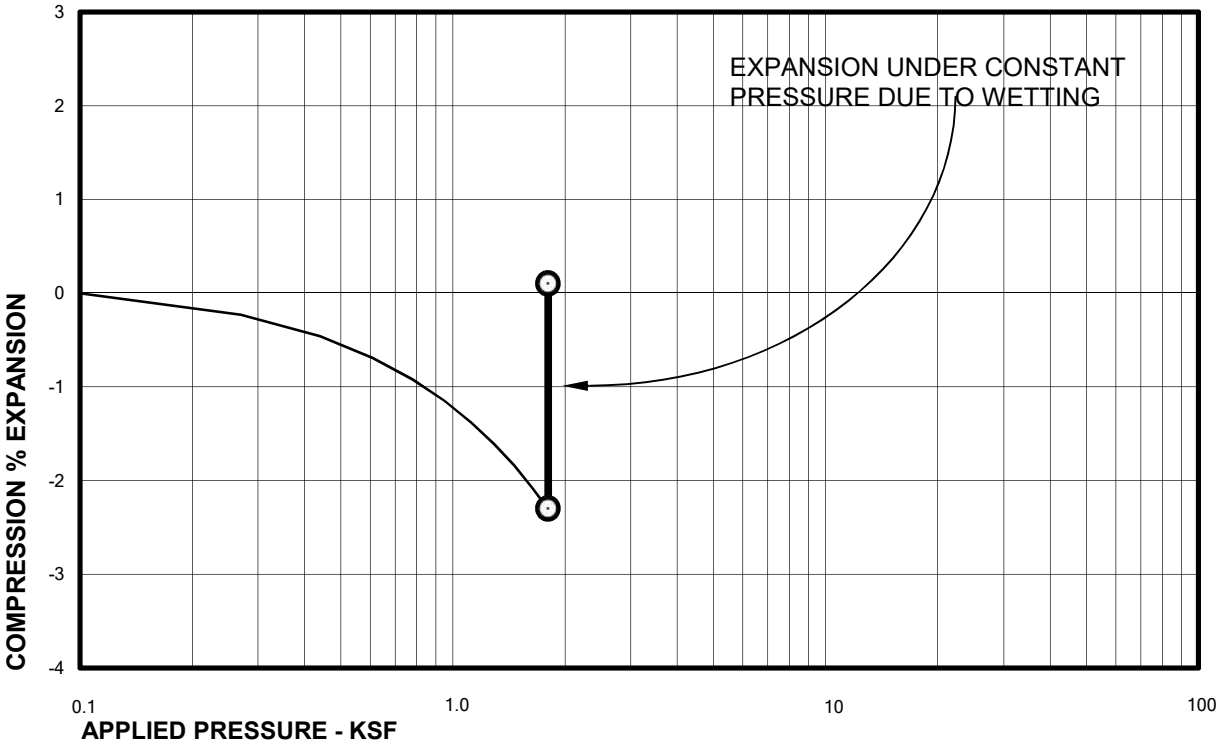
DRY UNIT WEIGHT= 115 PCF

MOISTURE CONTENT= 18.5 %

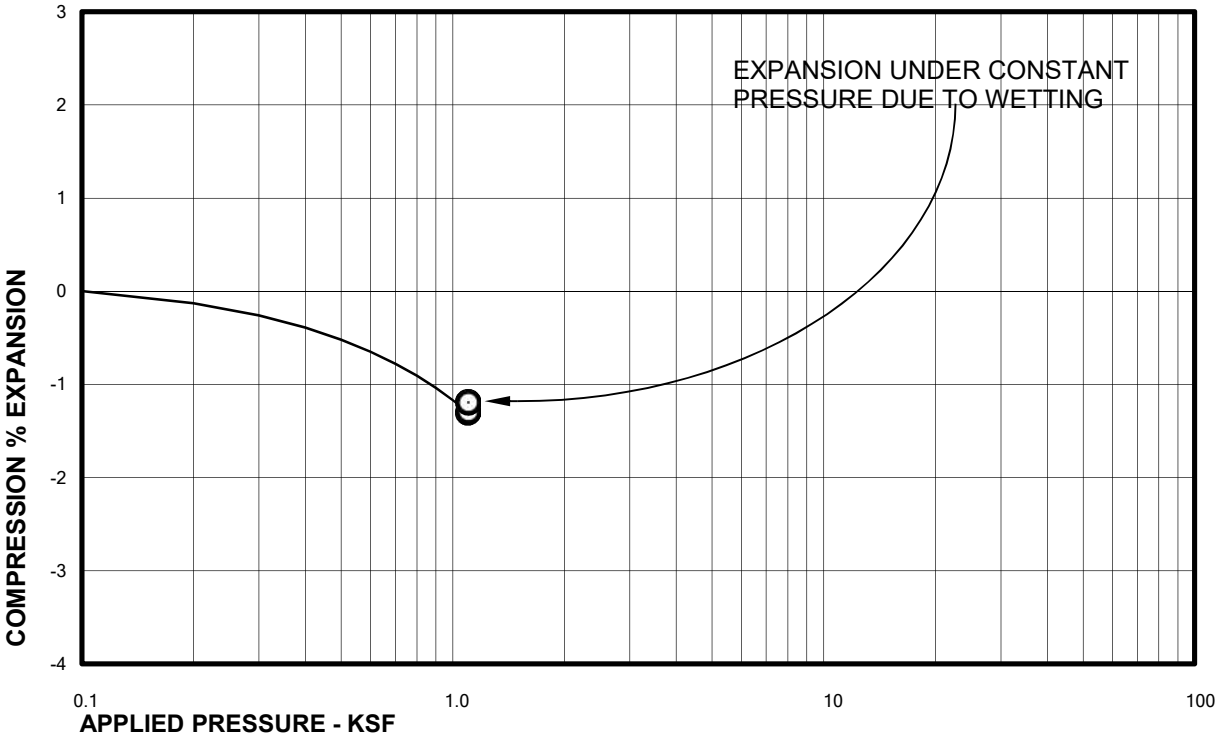
ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-34



Sample of CLAY, SANDY (CL) DRY UNIT WEIGHT= 112 PCF
From TH-20 AT 9 FEET MOISTURE CONTENT= 18.9 %

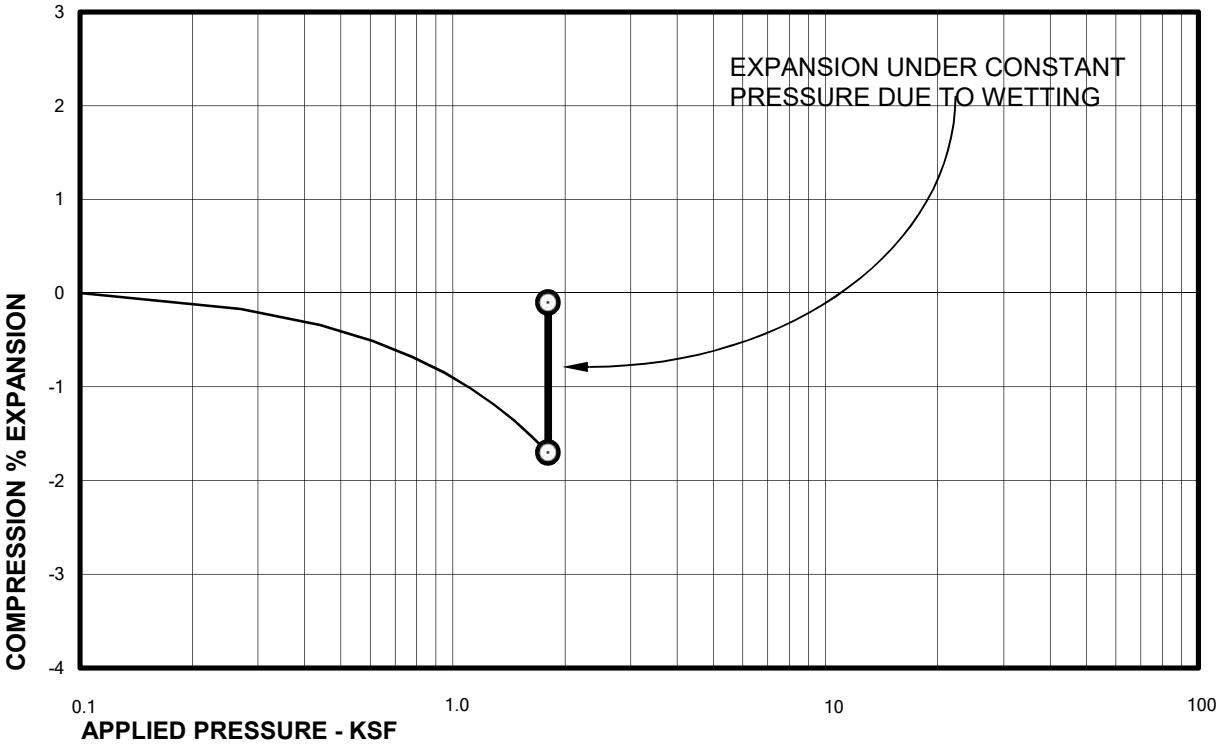


Sample of CLAY, SANDY (CL) DRY UNIT WEIGHT= 120 PCF
From TH-21 AT 4 FEET MOISTURE CONTENT= 12.4 %

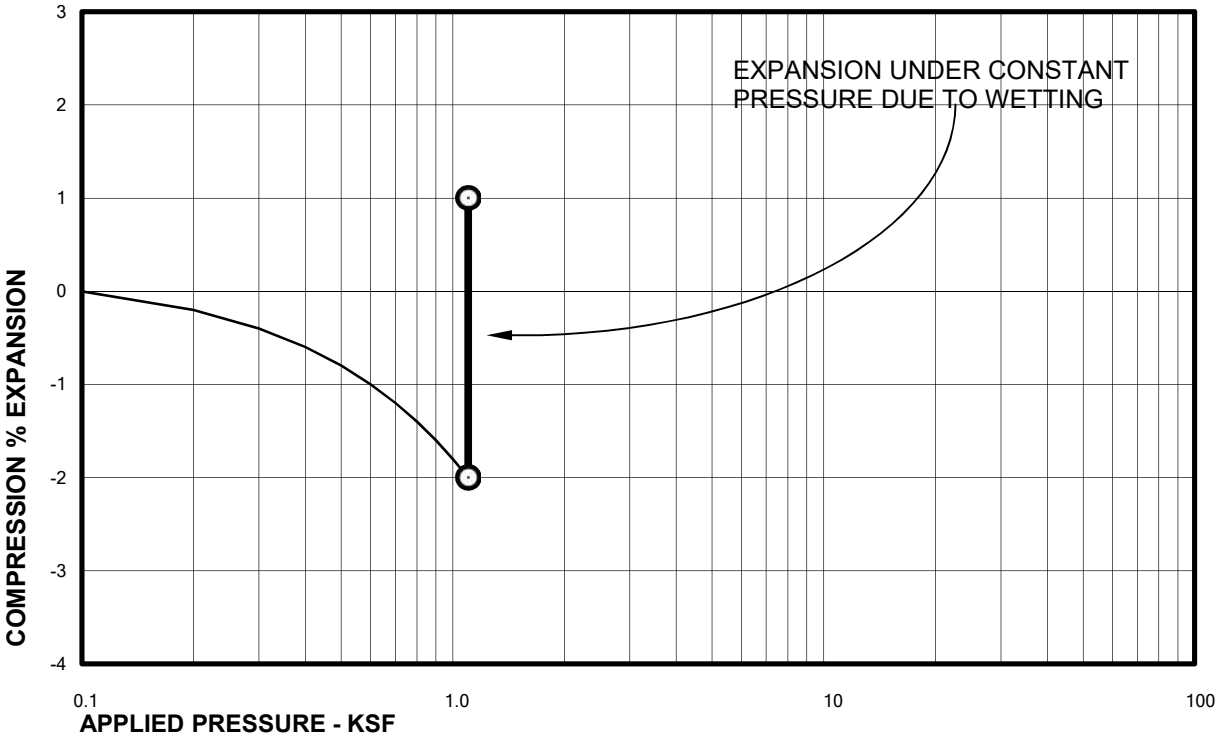
ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-35



Sample of WEATHERED CLAYSTONE DRY UNIT WEIGHT= 115 PCF
From TH-21 AT 9 FEET MOISTURE CONTENT= 16.8 %

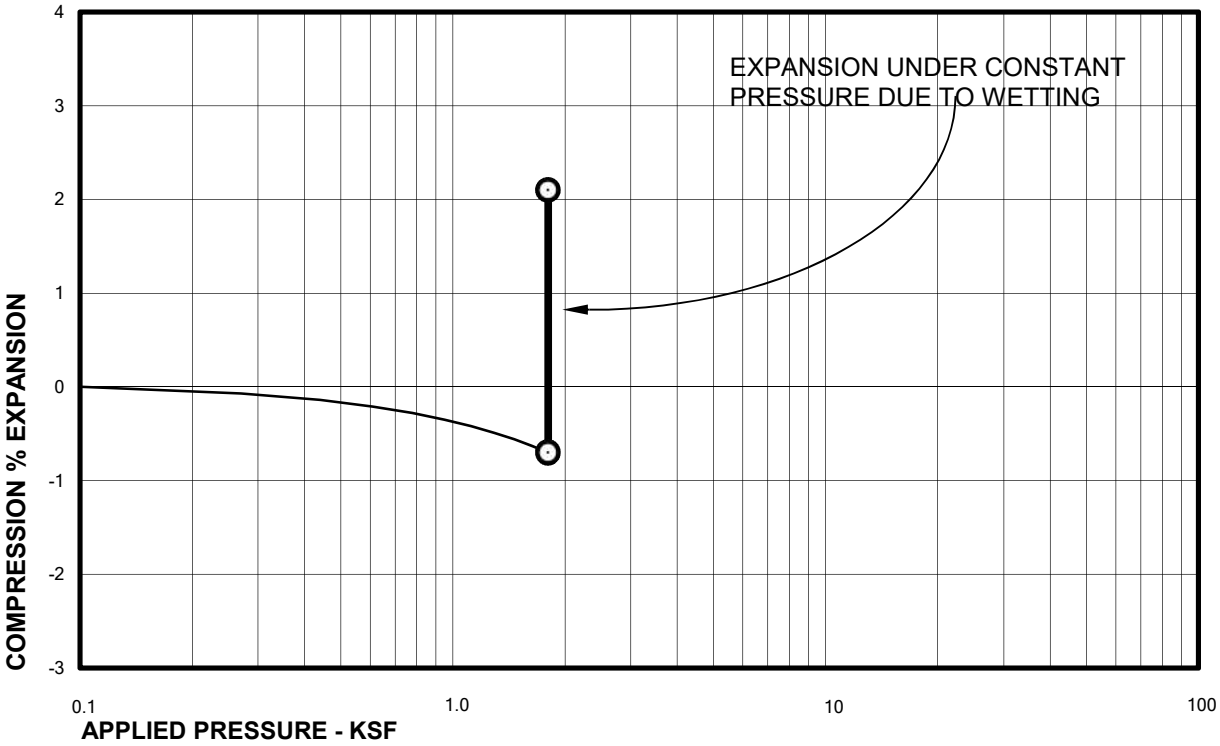


Sample of WEATHERED CLAYSTONE DRY UNIT WEIGHT= 108 PCF
From TH-22 AT 9 FEET MOISTURE CONTENT= 19.1 %

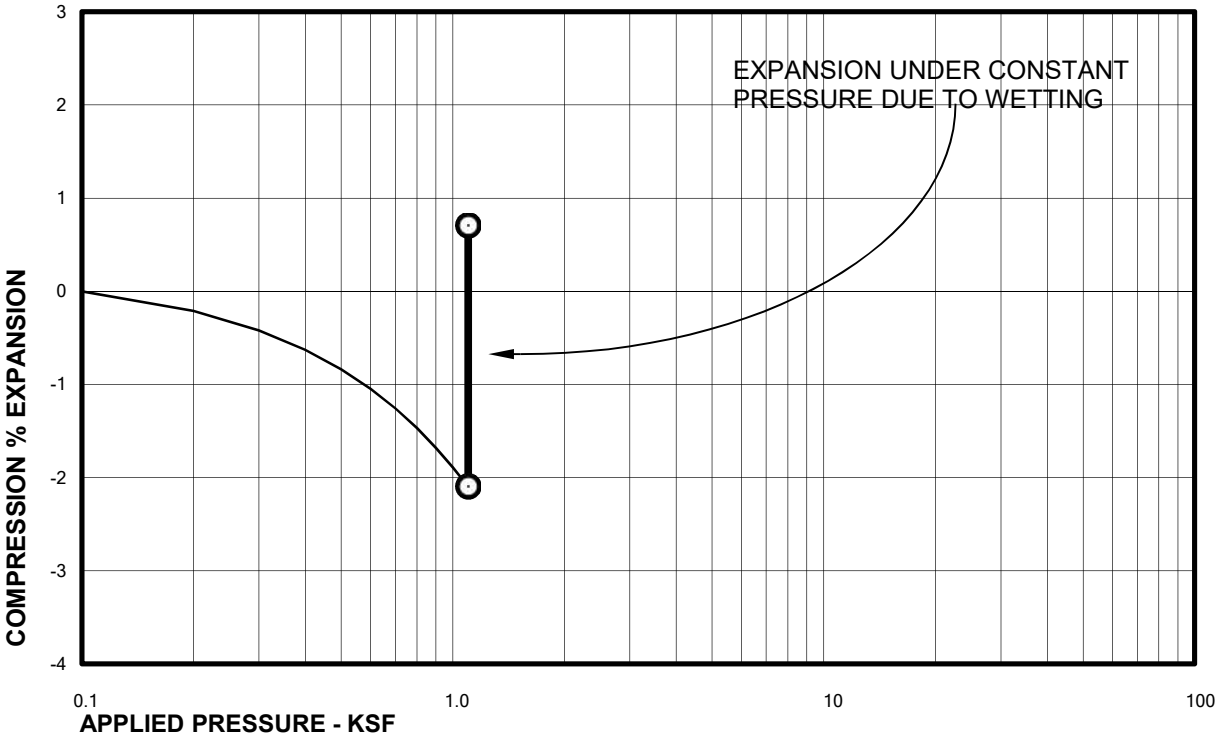
ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-36



Sample of WEATHERED CLAYSTONE DRY UNIT WEIGHT= 106 PCF
From TH-22 AT 14 FEET MOISTURE CONTENT= 21.2 %

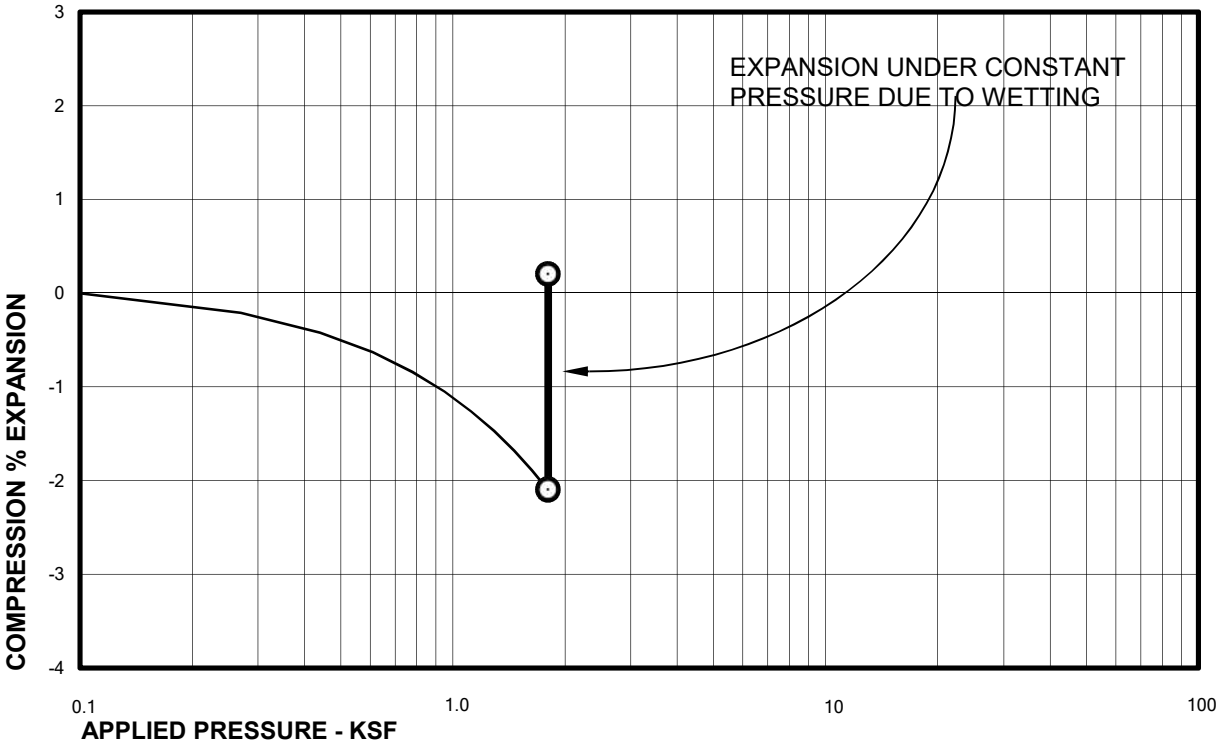


Sample of WEATHERED CLAYSTONE DRY UNIT WEIGHT= 109 PCF
From TH-23 AT 9 FEET MOISTURE CONTENT= 19.8 %

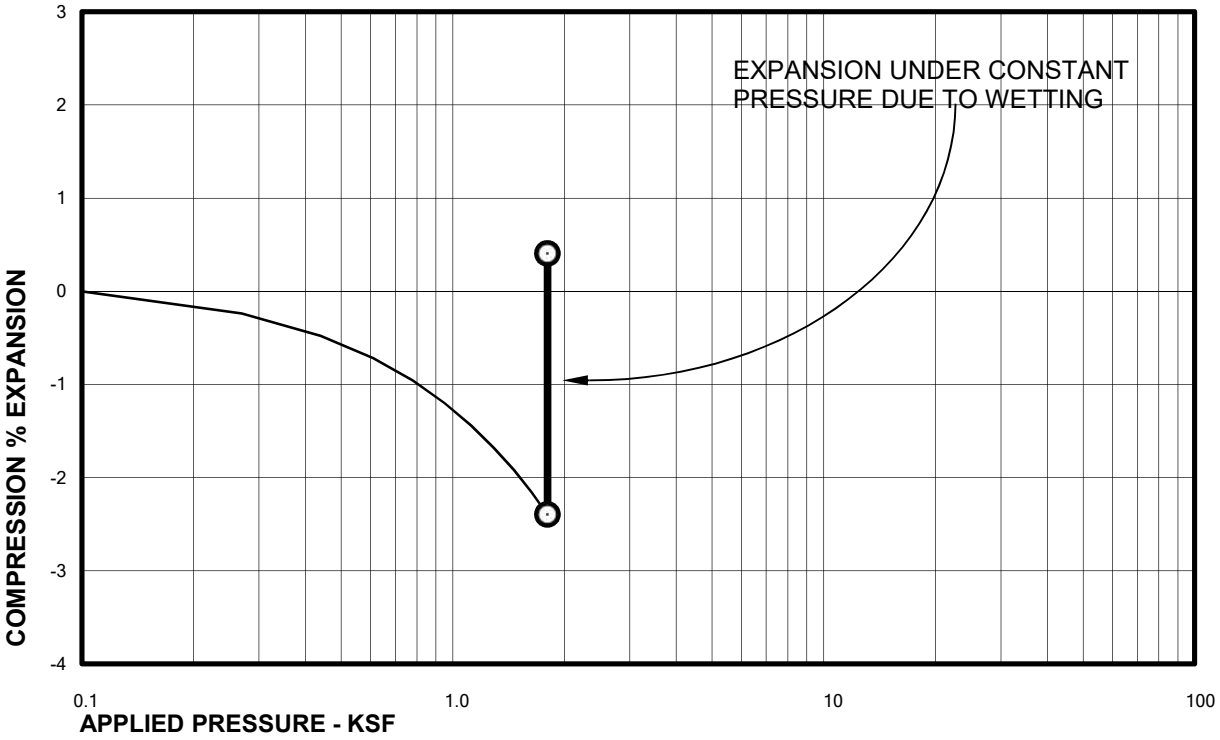
ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-37



Sample of WEATHERED CLAYSTONE DRY UNIT WEIGHT= 112 PCF
From TH-23 AT 14 FEET MOISTURE CONTENT= 17.6 %

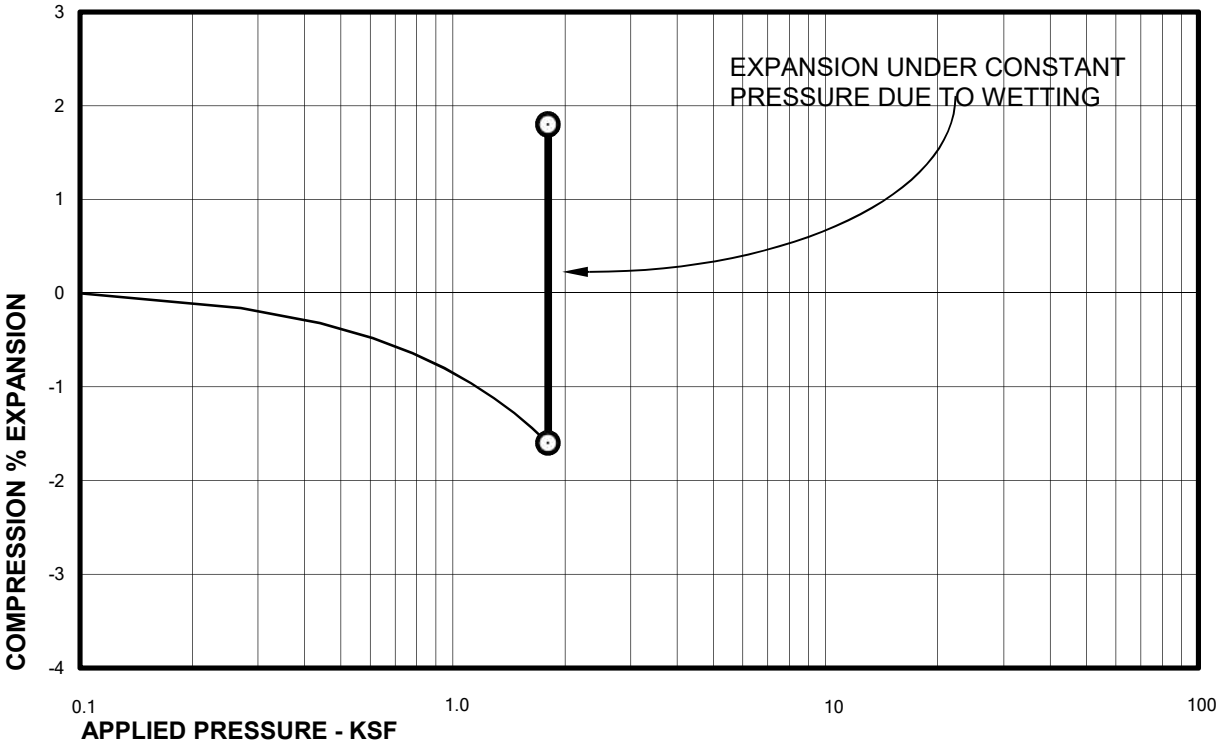


Sample of WEATHERED CLAYSTONE DRY UNIT WEIGHT= 105 PCF
From TH-24 AT 14 FEET MOISTURE CONTENT= 21.5 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

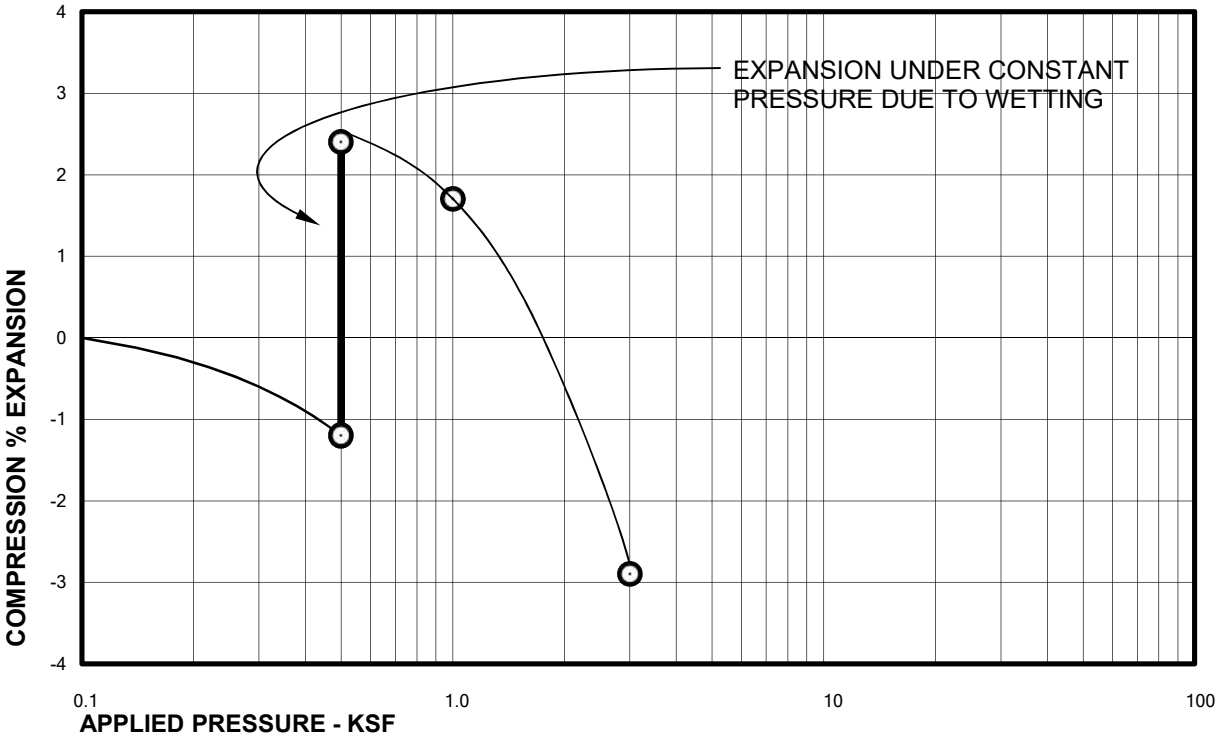
Swell Consolidation Test Results

FIG. B-38



Sample of WEATHERED CLAYSTONE
From TH-25 AT 14 FEET

DRY UNIT WEIGHT= 102 PCF
MOISTURE CONTENT= 25.9 %



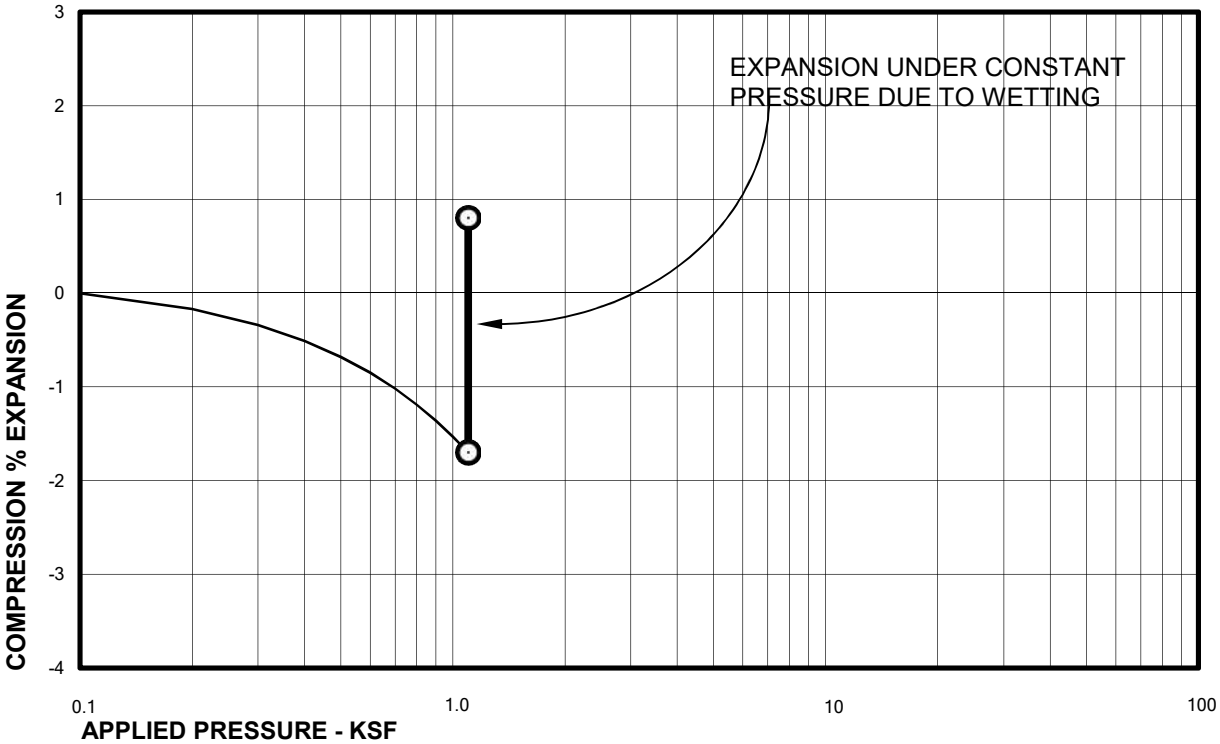
Sample of WEATHERED CLAYSTONE
From TH-26 AT 4 FEET

DRY UNIT WEIGHT= 113 PCF
MOISTURE CONTENT= 10.5 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

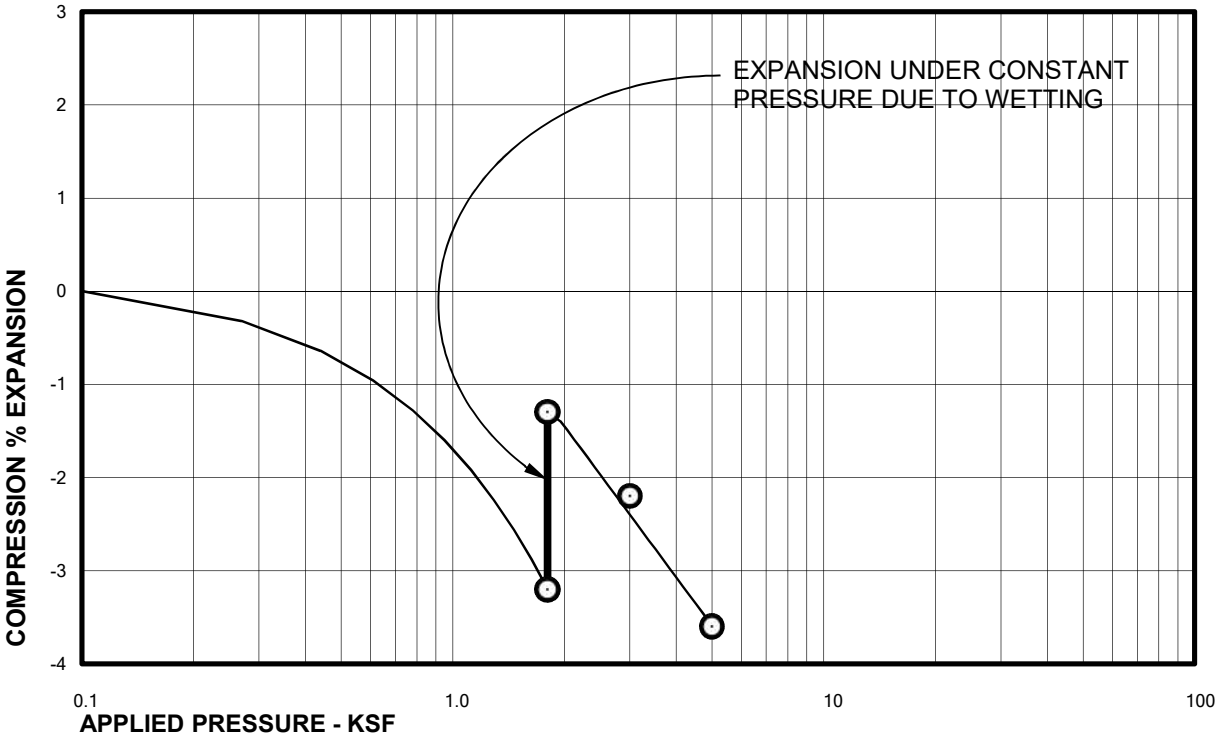
Swell Consolidation Test Results

FIG. B-39



Sample of WEATHERED CLAYSTONE
From TH-26 AT 9 FEET

DRY UNIT WEIGHT= 99 PCF
MOISTURE CONTENT= 25.4 %



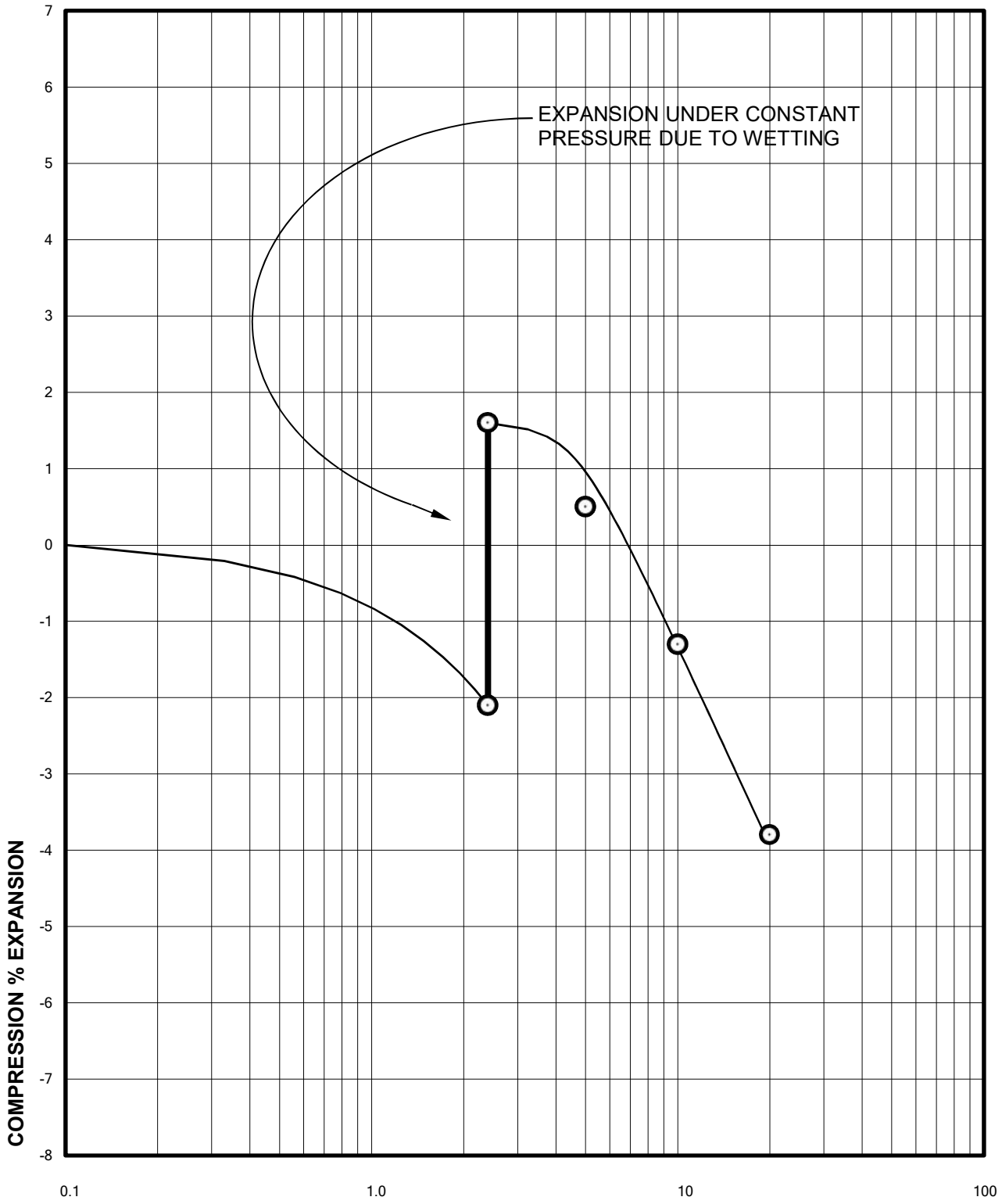
Sample of WEATHERED CLAYSTONE
From TH-26 AT 14 FEET

DRY UNIT WEIGHT= 99 PCF
MOISTURE CONTENT= 24.4 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-40



Sample of WEATHERED CLAYSTONE

From TH-26 AT 19 FEET

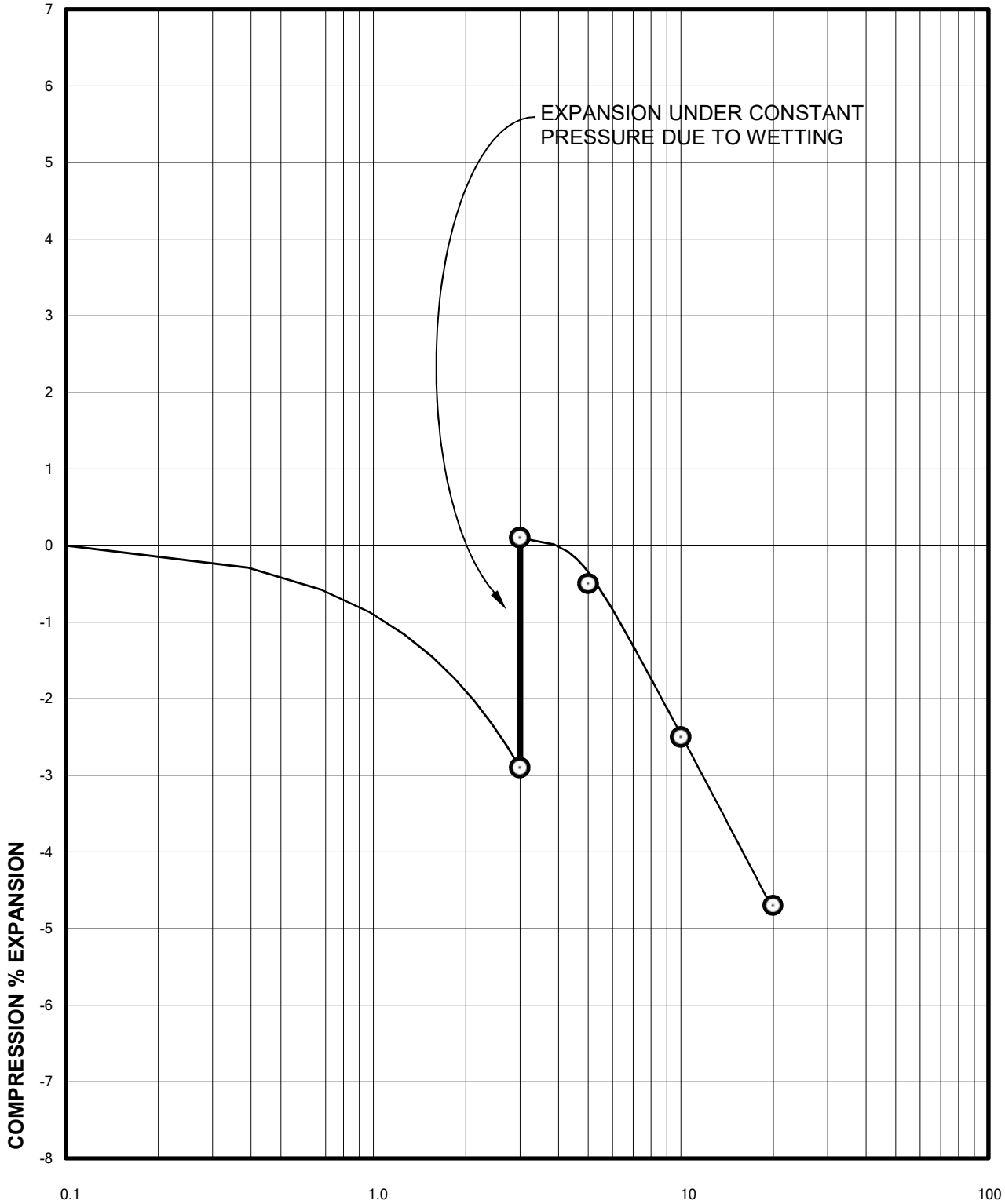
DRY UNIT WEIGHT= 108 PCF

MOISTURE CONTENT= 20.5 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-41



Sample of CLAYSTONE

From TH-26 AT 24 FEET

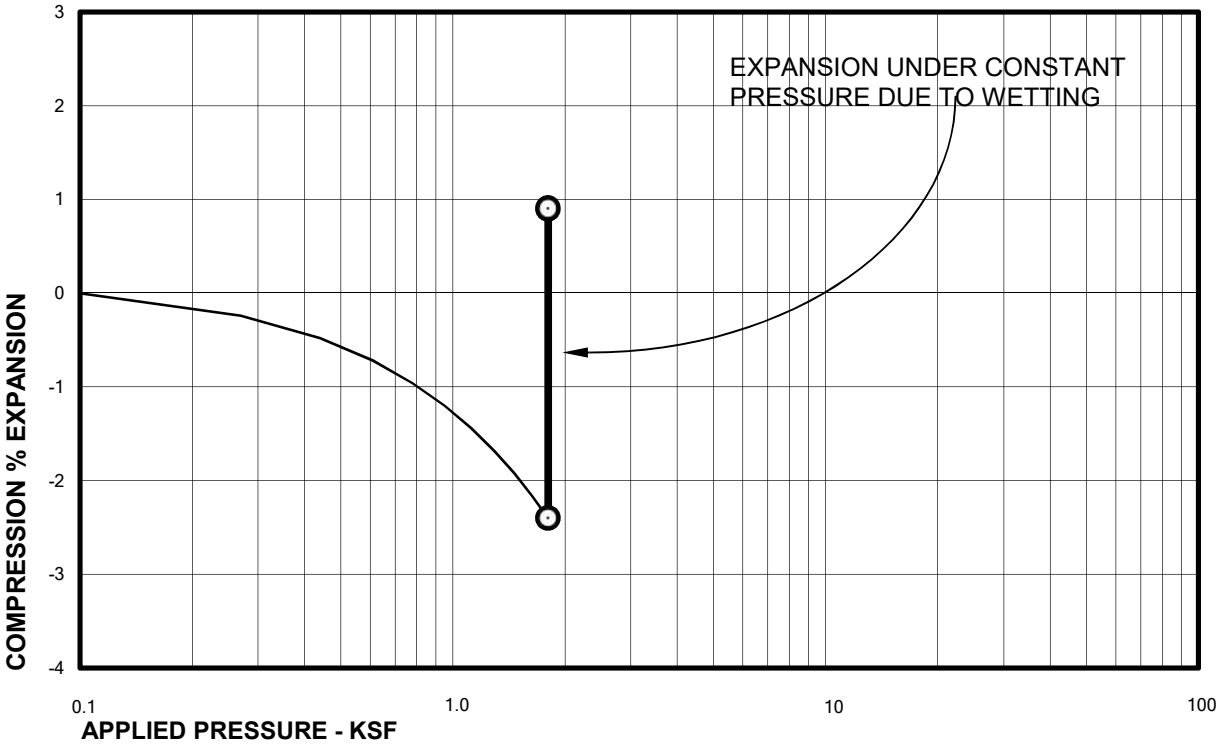
DRY UNIT WEIGHT= 115 PCF

MOISTURE CONTENT= 16.5 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

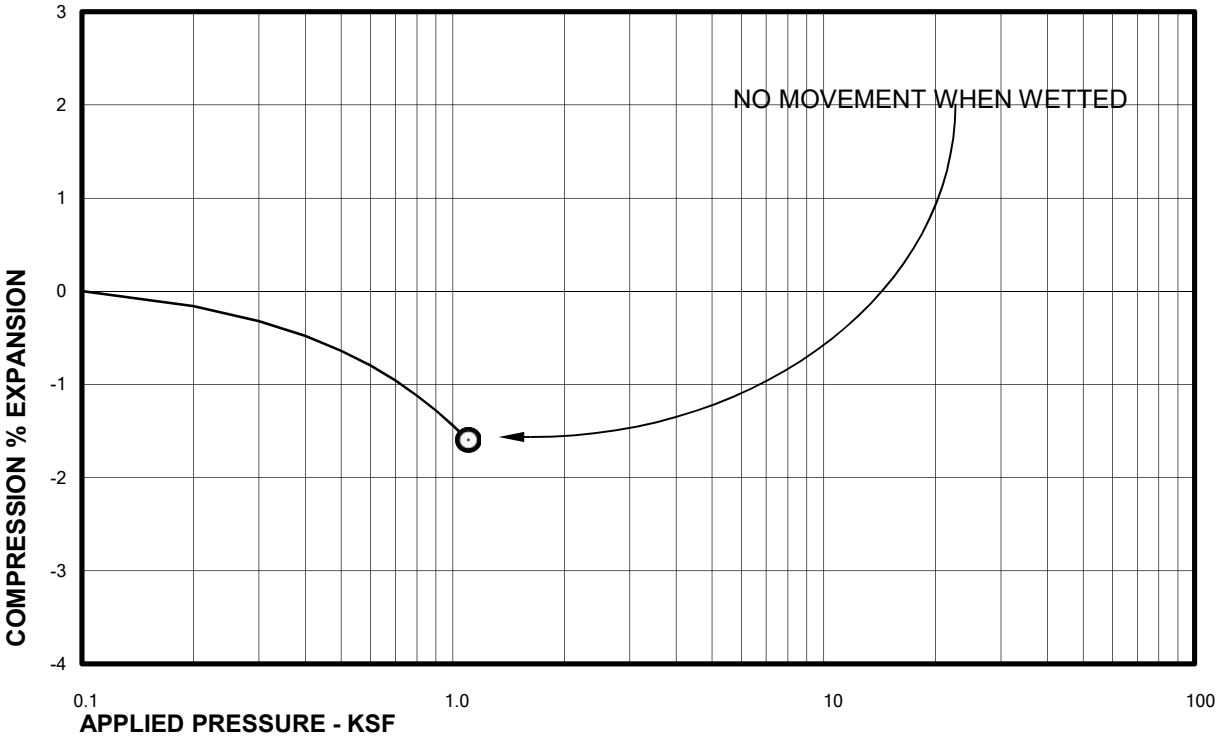
Swell Consolidation Test Results

FIG. B-42



Sample of WEATHERED CLAYSTONE
From TH-27 AT 14 FEET

DRY UNIT WEIGHT= 107 PCF
MOISTURE CONTENT= 21.3 %



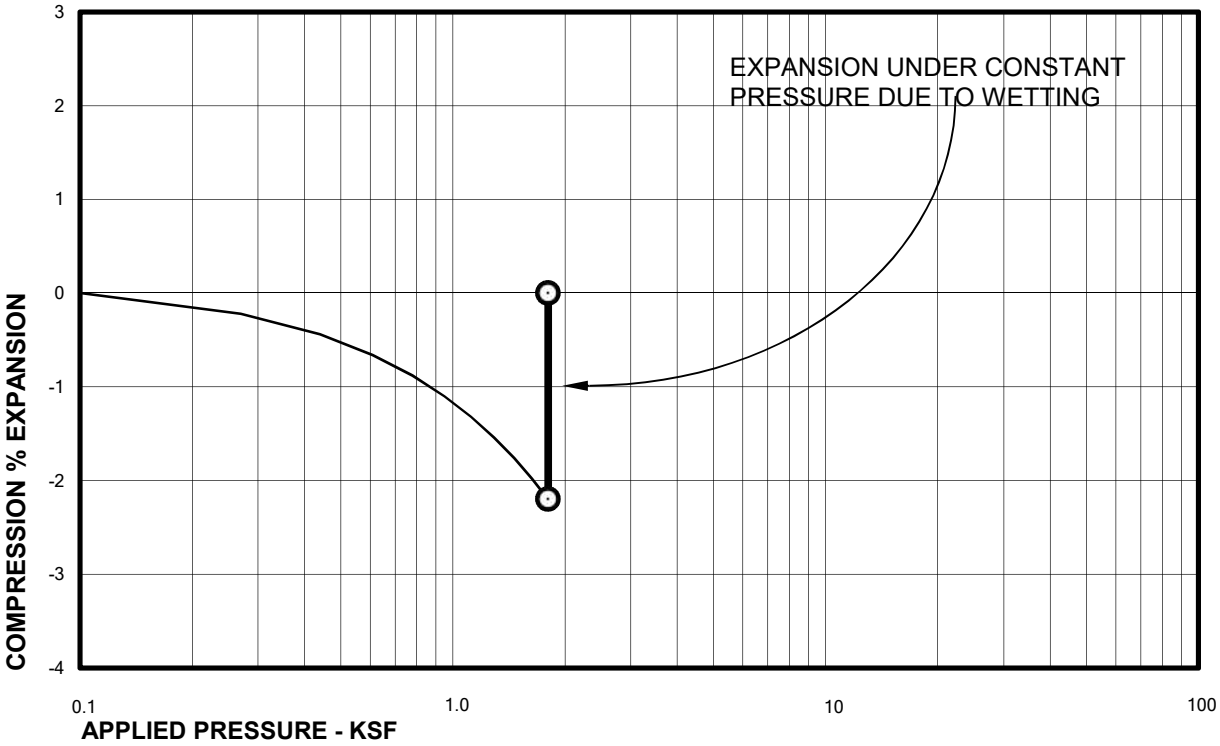
Sample of WEATHERED CLAYSTONE
From TH-32 AT 9 FEET

DRY UNIT WEIGHT= 112 PCF
MOISTURE CONTENT= 18.0 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

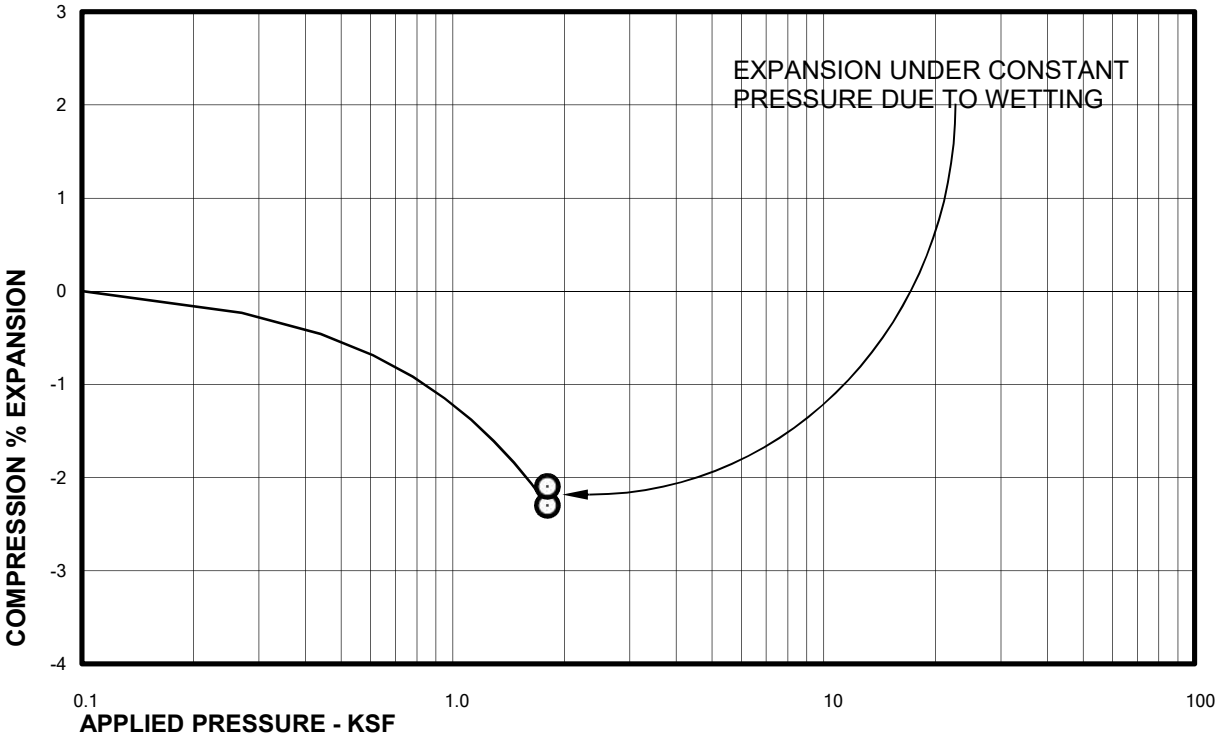
Swell Consolidation Test Results

FIG. B-43



Sample of WEATHERED CLAYSTONE — DRY UNIT WEIGHT= 112 PCF

From TH-32 AT 14 FEET — MOISTURE CONTENT= 17.5 %



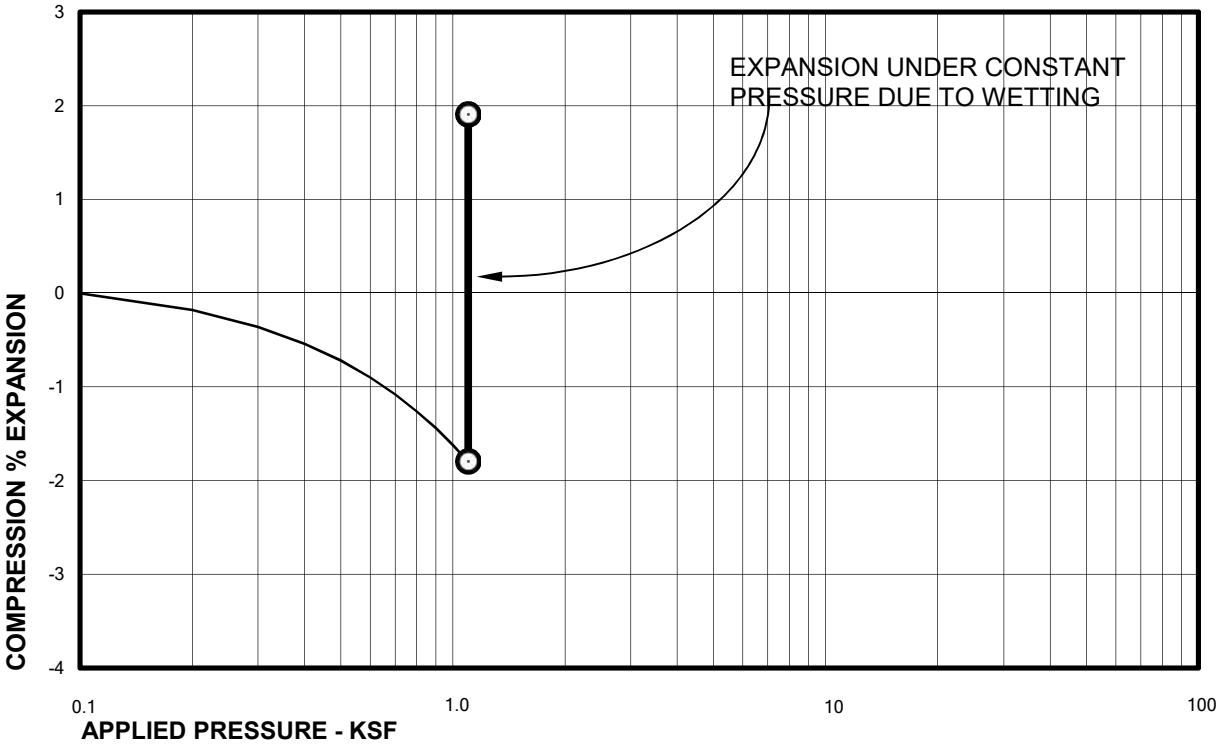
Sample of CLAY, SANDY (CL) — DRY UNIT WEIGHT= 113 PCF

From TH-34 AT 14 FEET — MOISTURE CONTENT= 17.7 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

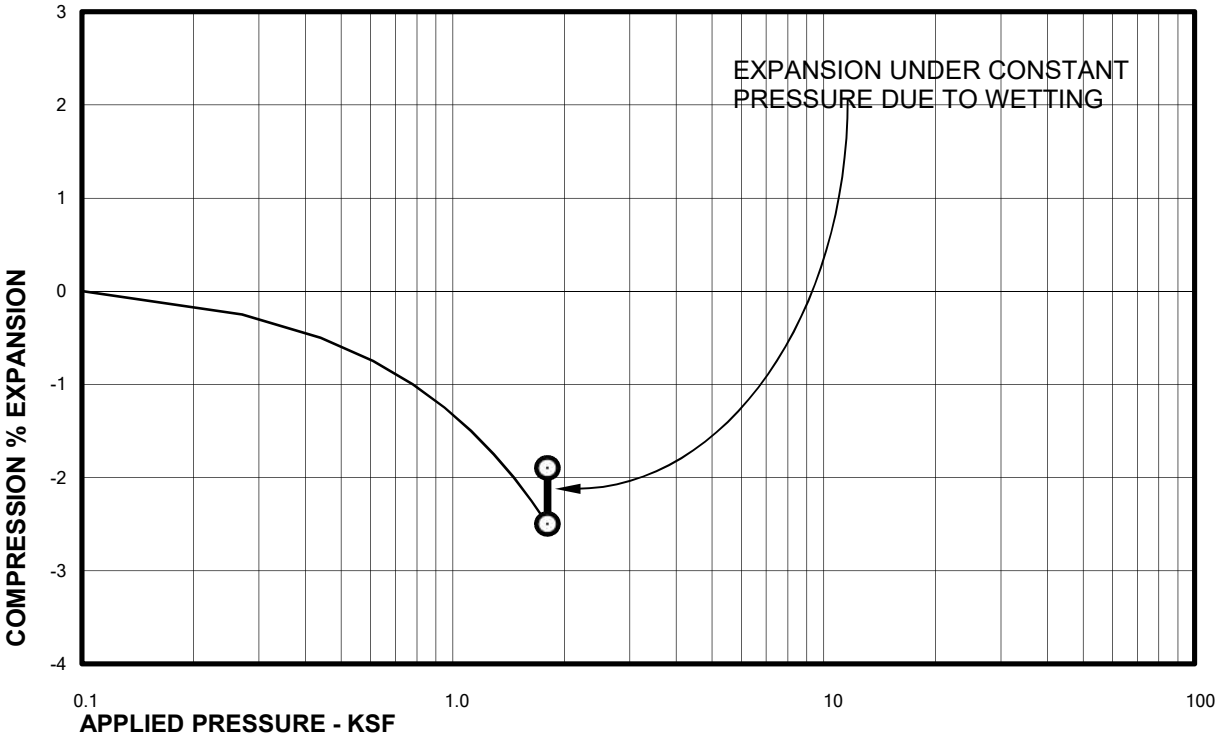
Swell Consolidation Test Results

FIG. B-44



Sample of WEATHERED CLAYSTONE
From TH-38 AT 9 FEET

DRY UNIT WEIGHT= 103 PCF
MOISTURE CONTENT= 21.5 %



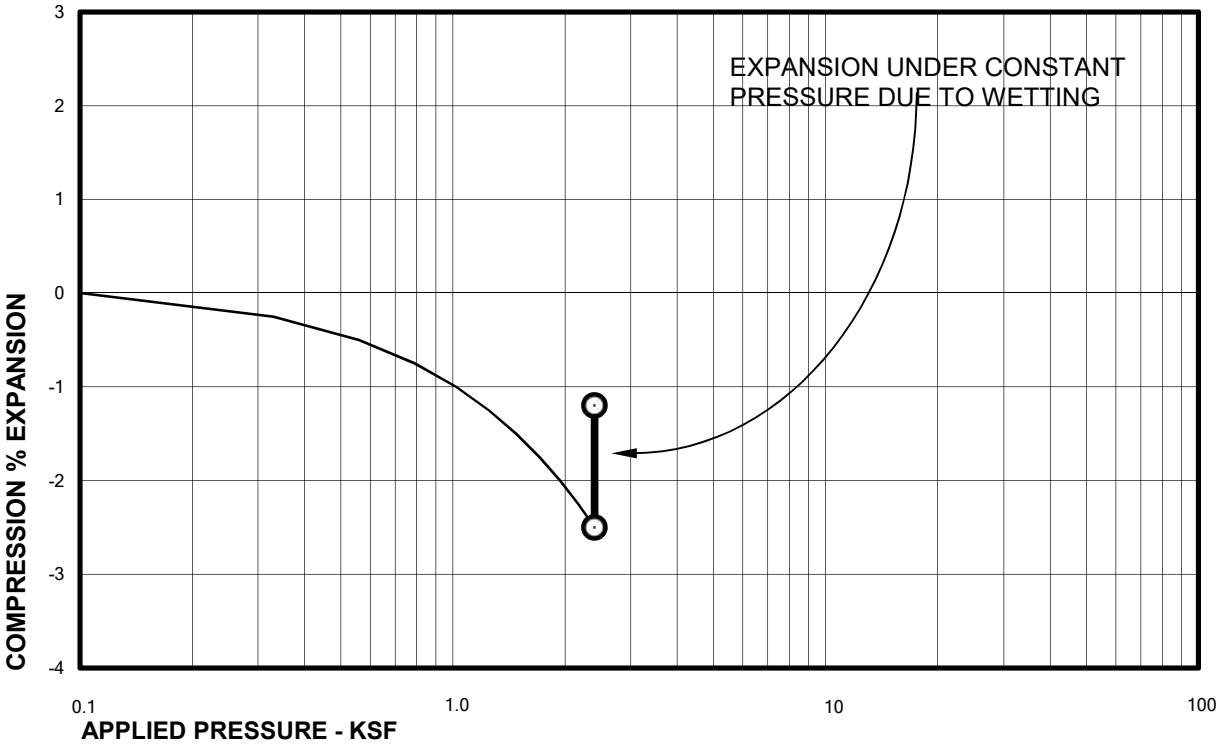
Sample of WEATHERED CLAYSTONE
From TH-38 AT 14 FEET

DRY UNIT WEIGHT= 112 PCF
MOISTURE CONTENT= 16.7 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

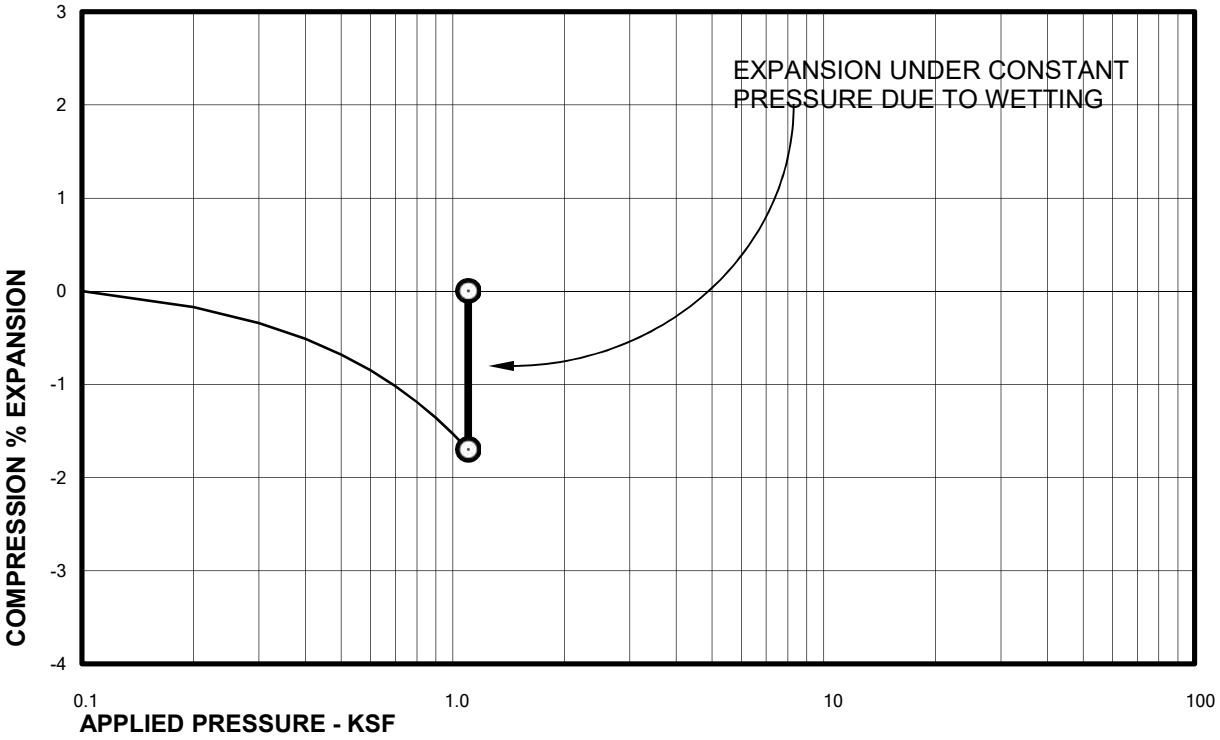
Swell Consolidation Test Results

FIG. B-45



Sample of CLAYSTONE
From TH-38 AT 19 FEET

DRY UNIT WEIGHT= 122 PCF
MOISTURE CONTENT= 12.7 %



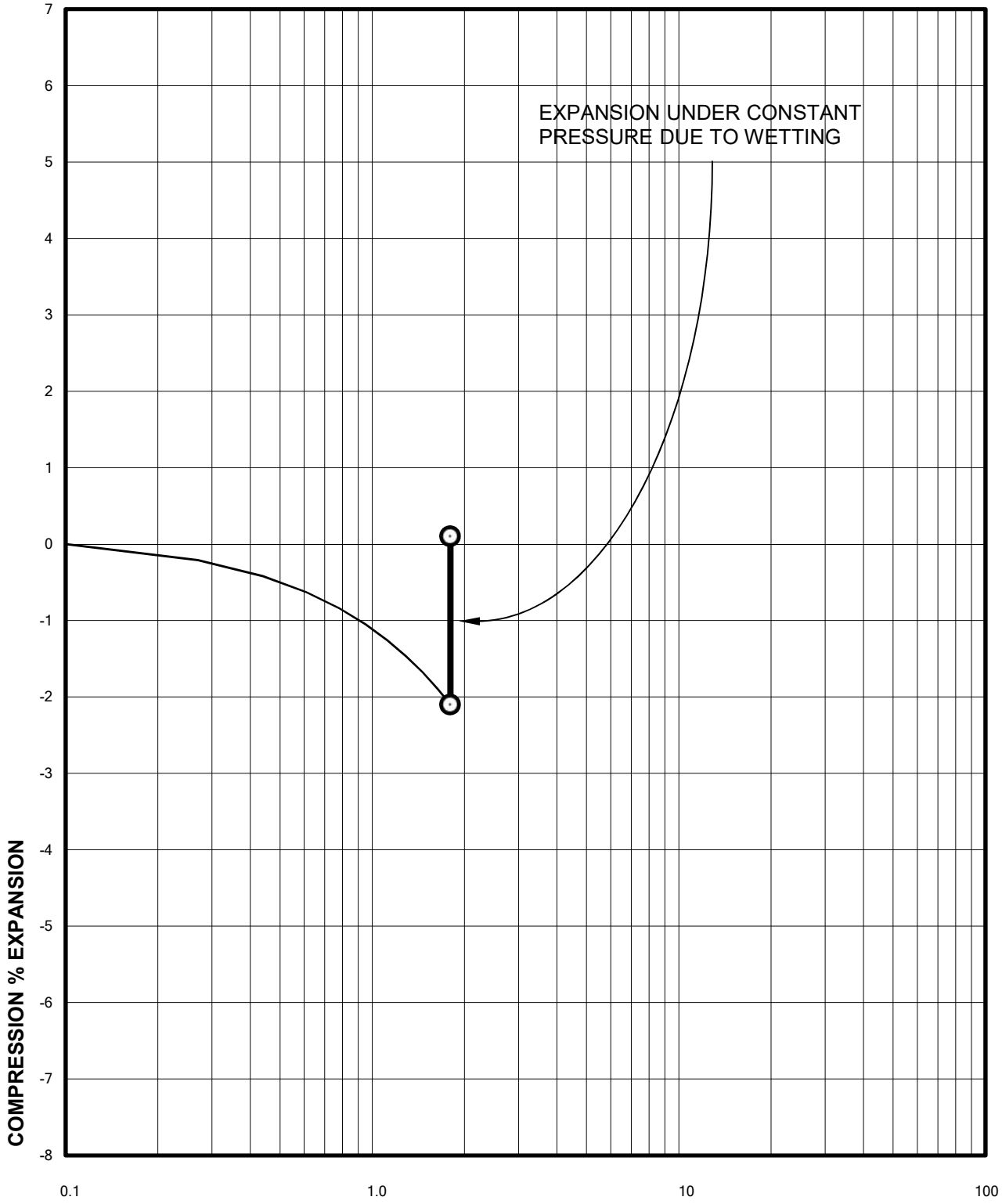
Sample of CLAY, SANDY (CL)
From TH-39 AT 9 FEET

DRY UNIT WEIGHT= 110 PCF
MOISTURE CONTENT= 20.5 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-46



Sample of WEATHERED CLAYSTONE

From TH-39 AT 14 FEET

DRY UNIT WEIGHT= 109 PCF

MOISTURE CONTENT= 20.1 %

ARBOR CAPITAL PARTNERS
c/o LAND ASSET STRATEGIES OF COLORADO, LLC
COTTONWOOD GREEN SUBDIVISION
CTL|T PROJECT NO. DN50,350-115-R1

Swell Consolidation Test Results

FIG. B-47

TABLE B - I

SUMMARY OF LABORATORY TEST RESULTS

BORING	DEPTH (ft)	MOISTURE CONTENT (%)	DRY DENSITY (pcf)	SWELL TEST DATA				ATTERBERG LIMITS		SOLUBLE SULFATE CONTENT (%)	PASSING NO. 200 SIEVE (%)	SOIL TYPE
				SWELL (%)	COMPRESSION (%)	APPLIED PRESSURE (psf)	SWELL PRESSURE (psf)	LIQUID LIMIT	PLASTICITY INDEX			
TH-1	4	15.0	107		0.2	500						SAND, CLAYEY (SC)
TH-1	9	21.8	101								30	SANDSTONE
TH-2	9	18.6	105		0.1	1,100						WEATHERED CLAYSTONE
TH-2	14	16.1	114	0.3		1,800						WEATHERED CLAYSTONE
TH-3	4	7.2	115								45	SAND, CLAYEY (SC)
TH-3	9	18.6	111	5.8		1,100				0.02		WEATHERED CLAYSTONE
TH-3	14	16.8	107		0.8	1,800						WEATHERED CLAYSTONE
TH-4	4	8.8	132	8.5		1,100						CLAYSTONE
TH-4	9	14.7	112	0.2		1,800						CLAYSTONE
TH-5	9	21.7	106	2.7		1,100						WEATHERED CLAYSTONE
TH-5	14	19.9	109	4.3		1,800						WEATHERED CLAYSTONE
TH-5	19	14.4	118	2.6		2,400						CLAYSTONE
TH-6	4	8.2	121	3.5		500	6,000					CLAY, SANDY (CL)
TH-6	9	19.6	106	2.4		1,100	5,100					WEATHERED CLAYSTONE
TH-6	14	21.9	106	3.7		1,800	10,000					WEATHERED CLAYSTONE
TH-6	19	15.0	117	1.7		2,400	8,000					CLAYSTONE
TH-6	24	14.4	120	2.0		3,000	12,000					CLAYSTONE
TH-7	9	15.6	112	4.1		1,100						WEATHERED CLAYSTONE
TH-7	14	23.3	107	2.9		1,800						WEATHERED CLAYSTONE
TH-8	4	2.0	105								14	SAND, SILTY (SM)
TH-8	9	12.7	120	8.6		1,100						CLAYSTONE
TH-8	14	18.7	113	6.8		1,800						CLAYSTONE
TH-9	4	12.8	114	8.3		500						WEATHERED CLAYSTONE
TH-9	9	17.2	114	6.0		1,100						WEATHERED CLAYSTONE
TH-9	14	13.7						41	26		91	CLAYSTONE
TH-10	9	15.3	115	4.2		1,100						WEATHERED CLAYSTONE
TH-10	14	18.1	115	4.8		1,800						CLAYSTONE
TH-11	4	11.5	124	5.0		1,100						CLAY, SANDY (CL)
TH-11	9	10.1	123	1.4		1,800						CLAYSTONE
TH-12	4	2.4	109								11	SAND, SLIGHTLY SILTY (SP-SM)
TH-12	9	15.7	119	2.2		1,800						WEATHERED CLAYSTONE
TH-13	4	7.7	117	3.7		500						CLAY, SANDY (CL)
TH-13	9	20.5	110	4.4		1,100						WEATHERED CLAYSTONE
TH-13	14	18.1	114	2.2		1,800						WEATHERED CLAYSTONE
TH-14	9	16.9	114	4.6		500						CLAY, SANDY (CL)
TH-14	14	21.4	107	3.2		1,100						WEATHERED CLAYSTONE
TH-14	19	17.0	113	2.6		1,800						WEATHERED CLAYSTONE
TH-15	4	2.2	100								8	SAND, SLIGHTLY SILTY (SP-SM)
TH-15	14	21.9	106	2.1		1,800						WEATHERED CLAYSTONE
TH-16	4	14.1	101	4.5		500	4,900					WEATHERED CLAYSTONE
TH-16	9	13.0	124	8.3		1,100	22,000					CLAYSTONE
TH-16	14	15.9	107	2.9		1,800	8,500					CLAYSTONE
TH-16	19	15.2	121	4.1		2,400	18,000					CLAYSTONE
TH-16	24	19.7	111	4.5		3,000	19,000					CLAYSTONE
TH-17	9	16.8	113					29	17		51	CLAY, SANDY (CL)
TH-17	14	23.0	101	3.0		1,800						WEATHERED CLAYSTONE

TABLE B - I

SUMMARY OF LABORATORY TEST RESULTS

BORING	DEPTH (ft)	MOISTURE CONTENT (%)	DRY DENSITY (pcf)	SWELL TEST DATA				ATTERBERG LIMITS		SOLUBLE SULFATE CONTENT (%)	PASSING NO. 200 SIEVE (%)	SOIL TYPE
				SWELL (%)	COMPRESSION (%)	APPLIED PRESSURE (psf)	SWELL PRESSURE (psf)	LIQUID LIMIT	PLASTICITY INDEX			
TH-17	19	20.5	110	2.2		2,400						CLAYSTONE
TH-18	4	2.2	109								9	SAND, SLIGHTLY SILTY (SP-SM)
TH-18	9	20.7	106	2.5		1,100						CLAY, SANDY (CL)
TH-18	14	24.0	101	3.0		1,800						WEATHERED CLAYSTONE
TH-19	9	18.3	106	0.3		1,100						WEATHERED CLAYSTONE
TH-19	14	21.2	104	6.4		1,100						WEATHERED CLAYSTONE
TH-19	19	18.5	115	4.3		2,400						CLAYSTONE
TH-20	4	5.9	114								22	SAND, SILTY (SM)
TH-20	9	18.9	112	2.4		1,800						CLAY, SANDY (CL)
TH-21	4	12.4	120	0.1		1,100				0.01		CLAY, SANDY (CL)
TH-21	9	16.8	115	1.6		1,800						WEATHERED CLAYSTONE
TH-21	19	17.4	112					54	35		93	CLAYSTONE
TH-22	4	5.1	113								20	SAND, SILTY (SM)
TH-22	9	19.1	108	3.0		1,100						WEATHERED CLAYSTONE
TH-22	14	21.2	106	2.8		1,800						WEATHERED CLAYSTONE
TH-23	9	19.8	109	2.8		1,100						WEATHERED CLAYSTONE
TH-23	14	17.6	112	2.3		1,800						WEATHERED CLAYSTONE
TH-24	4	4.1	103								13	SAND, SILTY (SM)
TH-24	9	13.5	116					27	16		26	SAND, CLAYEY (SC)
TH-24	14	21.5	105	2.8		1,800						WEATHERED CLAYSTONE
TH-25	9	7.2	117								17	SAND, SILTY (SM)
TH-25	14	25.9	102	3.4		1,800						WEATHERED CLAYSTONE
TH-26	4	10.5	113	3.6		500	2,200					WEATHERED CLAYSTONE
TH-26	9	25.4	99	2.5		1,100						WEATHERED CLAYSTONE
TH-26	14	24.4	99	1.9		1,800	4,200					WEATHERED CLAYSTONE
TH-26	19	20.5	108	3.7		2,400	12,000					WEATHERED CLAYSTONE
TH-26	24	16.5	115	3.0		3,000	12,000					CLAYSTONE
TH-27	4	16.3									25	SAND, CLAYEY (SC)
TH-27	14	21.3	107	3.3		1,800						WEATHERED CLAYSTONE
TH-27	19	20.5	105								32	INTERBEDDED CLAYSTONE/SANDSTO
TH-28	9	20.4	108								46	SAND, CLAYEY (SC)
TH-28	19	17.2	115					51	36		93	WEATHERED CLAYSTONE
TH-29	4	17.4									18	SAND, SILTY (SM)
TH-29	9	16.9	114								26	SAND, CLAYEY (SC)
TH-30	4	18.0									11	SAND, SLIGHTLY SILTY (SP-SM)
TH-30	9	18.5	107								11	SAND, SLIGHTLY SILTY (SP-SM)
TH-31	9	16.6	113								13	SAND, SILTY (SM)
TH-31	14	15.7	118					47	32		97	WEATHERED CLAYSTONE
TH-32	9	18.0	112	0.0		1,100						WEATHERED CLAYSTONE
TH-32	14	17.5	112	2.2		1,800						WEATHERED CLAYSTONE
TH-33	4	1.8	106								8	SAND, SLIGHTLY SILTY (SP-SM)
TH-33	9	17.0	113								12	SAND, SLIGHTLY SILTY (SP-SM)
TH-34	4	9.0	104								11	SAND, SLIGHTLY SILTY (SP-SM)
TH-34	14	17.7	113	0.2		1,800						CLAY, SANDY (CL)
TH-35	4	7.8	115								17	SAND, SILTY (SM)

TABLE B - I

SUMMARY OF LABORATORY TEST RESULTS

BORING	DEPTH (ft)	MOISTURE CONTENT (%)	DRY DENSITY (pcf)	SWELL TEST DATA				ATTERBERG LIMITS		SOLUBLE SULFATE CONTENT (%)	PASSING NO. 200 SIEVE (%)	SOIL TYPE
				SWELL (%)	COMPRESSION (%)	APPLIED PRESSURE (psf)	SWELL PRESSURE (psf)	LIQUID LIMIT	PLASTICITY INDEX			
TH-35	9	22.4									16	SAND, SILTY (SM)
TH-36	4	4.0	106								8	SAND, SLIGHTLY SILTY (SP-SM)
TH-36	9	21.1	106								13	SAND, SILTY (SM)
TH-37	4	5.5	107								15	SAND, SILTY (SM)
TH-37	14	18.3	111					23	7		34	SAND, CLAYEY (SC)
TH-38	9	21.5	103	3.7		1,100						WEATHERED CLAYSTONE
TH-38	14	16.7	112	0.6		1,800						WEATHERED CLAYSTONE
TH-38	19	12.7	122	1.3		2,400						CLAYSTONE
TH-39	4	3.9	108								9	SAND, SLIGHTLY SILTY (SP-SM)
TH-39	9	20.5	110	1.7		1,100						CLAY, SANDY (CL)
TH-39	14	20.1	109	2.2		1,800						WEATHERED CLAYSTONE

APPENDIX C

GUIDELINE SITE GRADING SPECIFICATIONS
Cottonwood Greens Subdivision
Fort Lupton, Colorado

GUIDELINE SITE GRADING SPECIFICATIONS

Cottonwood Greens Subdivision
Fort Lupton, Colorado

1. DESCRIPTION

This item shall consist of the excavation, transportation, placement and compaction of materials from locations indicated on the plans, or staked by the Engineer, as necessary to achieve preliminary street and overlot grade elevations. These specifications shall also apply to compaction of excess cut materials that may be placed outside of the development boundaries.

2. GENERAL

The Soils Representative shall be the Owner's Representative. The Soils Representative shall approve fill materials, method of placement, moisture contents and percent compaction, and shall give written approval of the completed fill.

3. CLEARING JOB SITE

The Contractor shall substantially remove all debris, vegetation, organics and other deleterious materials before excavation or fill placement. The Contractor shall dispose of the cleared material to provide the Owner with a clean, neat appearing job site. Cleared material shall not be placed in areas to receive fill or where the material will support structures of any kind.

4. AREA TO BE FILLED

Debris, vegetation, organics and other deleterious materials shall be substantially removed from the ground surface upon which fill is to be placed. The surface shall then be plowed or scarified until the surface is free from ruts, hummocks or other uneven features, which would prevent uniform compaction.

After the foundation for the fill has been cleared and scarified, it shall be disced or bladed until it is free from large clods, brought to the proper moisture content (optimum to 3 percent above optimum moisture content for clays and within 2 percent of optimum moisture content for sands) and compacted to at least 95 percent of maximum dry density as determined in accordance with ASTM D 698.

5. FILL MATERIALS

Fill soils shall be substantially free from debris, vegetation, organics and other deleterious materials, and shall not contain rocks or lumps having a diameter greater than six (6) inches. Claystone bedrock should be broken down to three (3) inches or smaller in size. Fill materials shall be obtained from cut areas shown on the plans or staked in the field by the Engineer.

On-site materials classifying as CL, CH, SC, SM, SW, SP, GP, GC and GM are acceptable.

6. MOISTURE CONTENT

Fill material classifying as CH, CL and SC shall be moisture-conditioned between optimum and 3 percent above optimum moisture content. Granular soils classifying as SM, SW, SP, GP, GC and GM shall be moisture conditioned to within 2 percent of optimum moisture content as determined from Proctor compaction tests. Sufficient laboratory compaction tests shall be made to determine the optimum moisture content for the various soils encountered in borrow areas.

The Contractor may be required to add moisture to the excavation materials in the borrow area if, in the opinion of the Soils Representative, it is not possible to obtain uniform moisture content by adding water on the fill surface. The Contractor may be required to rake or disc the fill soils to provide uniform moisture content through the soils.

The application of water to embankment materials shall be made with any type of watering equipment approved by the Soils Representative, which will give the desired results. Water jets from the spreader shall not be directed at the embankment with such force that fill materials are washed out.

Should too much water be added to any part of the fill, such that the material is too wet to permit the desired compaction from being obtained, rolling and all work on that section of the fill shall be delayed until the material has been allowed to dry to the required moisture content. The Contractor will be permitted to rework wet material in an approved manner to hasten its drying.

7. COMPACTION OF FILL AREAS

Selected fill material shall be placed and mixed in evenly spread layers. After each fill layer has been placed, it shall be uniformly compacted to not less than the specified percentage of maximum density. Fill shall be compacted to at least 95 percent of the maximum density as determined in accordance with ASTM D 698. At the option of the Soils Representative, soils classifying as SW, GP, GC, or GM may be compacted to 95 percent of maximum density as determined in accordance with ASTM D 1557 or 70 percent relative density for cohesionless sand soils. Fill materials shall be placed such that the thickness of loose materials does not exceed 10 inches and the compacted lift thickness does not exceed 6 inches.

Compaction as specified above, shall be obtained by the use of sheepsfoot rollers, multiple-wheel pneumatic-tired rollers, or other equipment for soils classifying as CL, CH, or SC. Granular fill shall be compacted using vibratory equipment or other approved equipment. Compaction shall be accomplished while the fill material is at the specified moisture content. Compaction of each layer shall be continuous over the entire area. Compaction equipment shall make sufficient trips to ensure that the required density is obtained.

8. COMPACTION OF SLOPES

Fill slopes shall be compacted by means of sheepsfoot rollers or other suitable equipment. Compaction operations shall be continued until slopes are stable, but not

too dense for planting, and there is no appreciable amount of loose soils on the slopes. Compaction of slopes may be done progressively in increments of three to five feet (3' to 5') in height or after the fill is brought to its total height. Permanent fill slopes shall not exceed 3:1 (horizontal to vertical).

9. PLACEMENT OF FILL ON NATURAL SLOPES

Where natural slopes are steeper than 20 percent in grade and the placement of fill is required, benches shall be cut at the rate of one bench for each 5 feet in height (minimum of two benches). Benches shall be at least 10 feet in width. Larger bench widths may be required by the Engineer. Fill shall be placed on completed benches as outlined within this specification.

10. DENSITY TESTS

Field density tests shall be made by the Soils Representative at locations and depths of his choosing. Where sheepsfoot rollers are used, the soil may be disturbed to a depth of several inches. Density tests shall be taken in compacted material below the disturbed surface. When density tests indicate that the density or moisture content of any layer of fill or portion thereof is not within specification, the particular layer or portion shall be reworked until the required density or moisture content has been achieved.

11. SEASONAL LIMITS

No fill material shall be placed, spread or rolled while it is frozen, thawing, or during unfavorable weather conditions. When work is interrupted by heavy precipitation, fill operations shall not be resumed until the Soils Representative indicates that the moisture content and density of previously placed materials are as specified.

12. NOTICE REGARDING START OF GRADING

The Contractor shall submit notification to the Soils Representative and Owner advising them of the start of grading operations at least three (3) days in advance of the starting date. Notification shall also be submitted at least 3 days in advance of any resumption dates when grading operations have been stopped for any reason other than adverse weather conditions.

13. REPORTING OF FIELD DENSITY TESTS

Density tests made by the Soils Representative, as specified under "Density Tests" above, shall be submitted progressively to the Owner. Dry density, moisture content, and percentage compaction shall be reported for each test taken.

14. DECLARATION REGARDING COMPLETED FILL

The Soils Engineer shall provide a written declaration stating that the site was filled with acceptable materials, and was placed in general accordance with the specifications.

APPENDIX D

GUIDELINE SUB-EXCAVATION SPECIFICATIONS
Cottonwood Greens Subdivision
Fort Lupton, Colorado

Note: This guideline is intended for use with sub-excavation. If sub-excavation is not selected, the guidelines in Appendix C should be followed.

GUIDELINE SUB-EXCAVATION SPECIFICATIONS
Cottonwood Greens Subdivision
Fort Lupton, Colorado

1. DESCRIPTION

This item shall consist of the excavation, transportation, placement and compaction of materials from locations indicated on the plans, or staked by the Engineer, as necessary to achieve preliminary street and overlot grade elevations. These specifications shall also apply to compaction of excess cut materials that may be placed outside of the development boundaries.

2. GENERAL

The Soils Representative shall be the Owner's Representative. The Soils Representative shall approve fill materials, method of placement, moisture contents and percent compaction, and shall give written approval of the completed fill.

3. CLEARING JOB SITE

The Contractor shall substantially remove all debris, vegetation, organics and other deleterious materials before excavation or fill placement. The Contractor shall dispose of the cleared material to provide the Owner with a clean, neat appearing job site. Cleared material shall not be placed in areas to receive fill or where the material will support structures of any kind.

4. AREA TO BE FILLED

Debris, vegetation, organics and other deleterious materials shall be substantially removed from the ground surface upon which fill is to be placed. The surface shall then be plowed or scarified until the surface is free from ruts, hummocks or other uneven features, which would prevent uniform compaction.

After the foundation for the fill has been cleared and scarified, it shall be disced or bladed until it is free from large clods, brought to the proper moisture content (between optimum and 4 percent above optimum moisture content for clays and within 2 percent of optimum moisture content for sands) and compacted to at least 95 percent of maximum dry density as determined in accordance with ASTM D 698.

5. FILL MATERIALS

Fill soils shall be substantially free from debris, vegetation, organics and other deleterious materials, and shall not contain rocks or lumps having a diameter greater than six (6) inches. Claystone bedrock should be broken down to three (3) inches or smaller in size. Fill materials shall be obtained from cut areas shown on the plans or staked in the field by the Engineer.

On-site materials classifying as CL, CH, SC, SM, SW, SP, GP, GC and GM are acceptable. Concrete, asphalt, and other deleterious materials or debris shall not be used as fill.

6. MOISTURE CONTENT

Fill materials shall be moisture-conditioned to within limits of optimum moisture content specified in “Moisture Content and Density Criteria”. Sufficient laboratory compaction tests shall be made to determine the optimum moisture content for the various soils encountered in borrow areas or imported to the site.

The Contractor may be required to add moisture to the excavation materials in the borrow area if, in the opinion of the Soils Engineer, it is not possible to obtain uniform moisture content by adding water on the fill surface. The Contractor will be required to rake or disc the fill to provide uniform moisture content throughout the fill.

The application of water to embankment materials shall be made with any type of watering equipment that will give the desire results. Water jets from the spreader shall not be directed at the embankment with such force that fill materials are washed out.

Should too much water be added to any part of the fill, such that the material is too wet to permit the desired compaction from being obtained, rolling and all work on that section of the fill shall be delayed until the material has been allowed to dry to the required moisture content. The Contractor will be permitted to rework wet material in an approved manner to hasten its drying.

7. COMPACTION OF FILL MATERIALS

Selected fill material shall be placed and mixed in evenly spread layers. After each fill layer has been placed, it shall be uniformly compacted to not less than the specified percentage of maximum density given in “Moisture Content and Density Criteria”. Fill materials shall be placed such that the thickness of loose material does not exceed 10 inches and the compacted lift thickness does not exceed 6 inches.

Compaction, as specified above, shall be obtained by the use of suitable equipment. Compaction shall be accomplished while the fill material is at the specified moisture content. Compaction of each layer shall be continuous over the entire area. Compaction equipment shall make sufficient trips to ensure that the required density is obtained.

8. MOISTURE CONTENT AND DENSITY CRITERIA

Fill material shall be substantially compacted to at least 95 percent of standard Proctor maximum dry density (ASTM D 698, AASHTO T 99) between optimum and 4 percent above optimum moisture content for clays and within 2 percent of optimum moisture content for sands. Additional criteria for acceptance are presented in DENSITY TESTS.

9. DENSITY TESTS

Field density tests shall be made by the Soils Engineer at locations and depths of his choosing. Where sheepsfoot rollers are used, the soil may be disturbed to a depth of several inches. Density tests shall be taken in compacted material below the disturbed surface. When density tests indicate the density or moisture content of any layer of fill or portion thereof not within specifications, the particular layer or portion shall be reworked until the required density or moisture content has been achieved.

Allowable ranges of moisture content and density given in MOISTURE CONTENT AND DENSITY CRITERIA are based on design considerations. The moisture shall be controlled by the Contractor so that moisture content of the compacted earth fill, as determined by tests performed by the Soils Engineer, shall be within the limits given. The Soils Engineer will inform the Contractor when the placement moisture is less than or exceeds the limits specified and the Contractor shall immediately make adjustments in procedures as necessary to maintain placement moisture content within the specified limits, to satisfy the following requirements.

A. Moisture

1. The average moisture content of material tested each day shall not be less than 1 percent over optimum moisture content.

2. Material represented by samples tested having moisture lower than optimum will be rejected. Such rejected materials shall be reworked until moisture equal to or greater than optimum is achieved.

B. Density

1. The average dry density of material tested each day shall not be less than 95 percent of standard Proctor maximum dry density (ASTM D 698).

2. No more than 10 percent of the material represented by the samples tested shall be at dry densities less than 95 percent of standard Proctor maximum dry density (ASTM D 698).

3. Material represented by samples tested having dry density less than 95 percent of standard Proctor maximum dry density (ASTM D 698) will be rejected. Such rejected materials shall be reworked until a dry density equal to or greater than 95 percent of standard Proctor maximum dry density (ASTM D 698) is obtained.

10. OBSERVATION AND TESTING OF FILL

Observation by the Soils Engineer shall be sufficient during the placement of fill and compaction operations so that they can declare the fill was placed in general conformance with specifications. All observations necessary to test the placement of fill and observe compaction operations will be at the expense of the Owner.

11. SEASONAL LIMITS

No fill material shall be placed, spread or rolled while it is frozen, thawing, or during unfavorable weather conditions. When work is interrupted by heavy precipitation, fill operations shall not be resumed until the Soils Engineer indicates the moisture content and density of previously placed materials are as specified.

12. REPORTING OF FIELD DENSITY TESTS

Density tests made by the Soils Engineer, as specified under “Density Tests” above, shall be submitted progressively to the Owner. Dry density, moisture content and percentage compaction shall be reported for each test taken.

COTTONWOOD GREENS SUBDIVISION

A TRACT OF LAND LOCATED IN THE SOUTH HALF OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH PRINCIPAL MERIDIAN, FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO

CONSTRUCTION PLANS

LEGAL DESCRIPTION:

A PLAT OF MULTIPLE PARCELS OF LAND SITUATED IN THE SOUTH HALF OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE SIXTH PRINCIPAL MERIDIAN, CITY OF FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO, BEING MORE PARTICULARLY DESCRIBED AS FOLLOWS:

COMMENCING AT THE SOUTHEAST CORNER OF SAID SECTION 33, AS MONUMENTED BY A 2-1/2" ALUMINUM CAP STAMPED "GEOSURV 1998, PLS 22097", AND CONSIDERING THE EAST LINE OF THE SOUTHEAST QUARTER OF SAID SECTION 33, AS MONUMENTED ON THE NORTH END BY A 2-1/2" ALUMINUM CAP STAMPED "ALPHA ENGRG 1997 25937" AS BEARING NORTH 00°09'31" WEST WITH ALL BEARINGS CONTAINED HEREIN RELATIVE THERETO;

THENCE NORTH 00°09'31" WEST ALONG THE EAST LINE OF THE SOUTHEAST QUARTER OF SAID SECTION 33 1325.90 FEET TO THE SOUTH 1/16 CORNER BETWEEN SECTION 33 AND SECTION 34;

THENCE NORTH 89°52'26" WEST ALONG THE SOUTH LINE OF THE NORTH HALF OF THE SOUTHEAST QUARTER OF SAID SECTION 33 205.84 FEET TO THE WESTERLY RIGHT OF WAY LINE OF WELD COUNTY ROAD 31 AS CONVEYED TO WELD COUNTY IN THAT WARRANTY DEED RECORDED MAY 23, 1980 AS RECEPTION NO. 1825641 OF THE RECORDS OF WELD COUNTY, AND THE **POINT OF BEGINNING**;

THENCE NORTH 89°52'26" WEST CONTINUING ALONG THE SOUTH LINE OF THE NORTH HALF OF THE SOUTHEAST QUARTER OF SAID SECTION 33 1389.28 FEET TO THE EAST LINE OF THAT PARCEL OF LAND CONVEYED TO AIMS I IN A WARRANTY DEED RECORDED JANUARY 21, 1986 AS RECEPTION NO. 2039953 OF THE RECORDS OF WELD COUNTY;

THENCE SOUTH 00°08'34" EAST ALONG A LINE PARALLEL WITH THE NORTH-SOUTH CENTERLINE OF SAID SECTION 33 1291.22 FEET TO A LINE PARALLEL WITH AND 30.00 FEET NORTHERLY OF, AS MEASURED AT A RIGHT ANGLE, THE SOUTH LINE OF THE SOUTHEAST QUARTER OF SAID SECTION 33;

THENCE NORTH 89°42'22" WEST ALONG SAID PARALLEL LINE 1048.85 FEET TO THE NORTH-SOUTH CENTERLINE OF SAID SECTION 33;

THENCE SOUTH 89°50'24" WEST ALONG A LINE PARALLEL WITH AND 30.00 FEET NORTHERLY OF, AS MEASURED AT A RIGHT ANGLE, THE SOUTH LINE OF THE SOUTHWEST QUARTER OF SAID SECTION 33 1966.48 FEET TO THE CENTERLINE OF THE FULTON DITCH, BEING COINCIDENTAL WITH THE EASTERLY LINES OF THE EDELEN HEIGHTS MINOR SUBDIVISION NO. 1 RECORDED JUNE 6, 2018 AS RECEPTION NO. 4404851 OF THE RECORDS OF WELD COUNTY:

THENCE ALONG SAID CENTERLINE THE FOLLOWING SIX (6) COURSES:

1. NORTH 06°12'34" WEST 151.28 FEET;
2. NORTH 20°43'56" WEST 88.12 FEET;
3. NORTH 30°47'46" WEST 240.23 FEET;
4. NORTH 11°35'19" WEST 84.39 FEET;
5. NORTH 13°59'13" EAST 78.29 FEET;
6. NORTH 31°25'15" EAST 147.40 FEET TO THE NORTHEAST CORNER OF SAID EDELEN HEIGHTS MINOR SUBDIVISION NO. 1;

THENCE CONTINUING ALONG SAID CENTERLINE OF FULTON DITCH THE FOLLOWING TEN (10) COURSES:

1. NORTH 38°52'08" EAST 65.88 FEET;
2. NORTH 67°22'47" EAST 93.12 FEET;
3. SOUTH 80°35'03" EAST 199.77 FEET;
4. NORTH 65°44'52" EAST 169.57 FEET;
5. SOUTH 83°34'28" EAST 232.47 FEET;
6. NORTH 48°40'18" EAST 227.84 FEET;
7. NORTH 67°11'05" EAST 165.39 FEET;
8. NORTH 78°11'40" EAST 180.87 FEET;
9. NORTH 37°22'05" EAST 53.66 FEET;
10. NORTH 04°39'12" WEST A DISTANCE OF 176.96 FEET (RECORD DISTANCE = 177.03 FEET) TO THE NORTH LINE OF THE SOUTH HALF OF THE SOUTHWEST QUARTER OF SAID SECTION 33;

THENCE CONTINUING ALONG SAID CENTERLINE OF FULTON DITCH AND THE WESTERLY AND NORTHERLY LINES OF PARCEL B AS DESCRIBED IN THAT DEED RECORDED DECEMBER 13, 1984 AS RECEPTION NO. 1991950 OF THE RECORDS OF WELD COUNTY THE FOLLOWING FIVE (5) COURSES:

1. NORTH 04°39'12" WEST 31.82 FEET (RECORD DISTANCE=31.82 FEET);
2. NORTH 24°35'11" EAST 259.79 FEET (RECORD DISTANCE=259.75 FEET);
3. SOUTH 84°27'39" EAST 426.41 FEET (RECORD DISTANCE=426.35 FEET);
4. SOUTH 62°30'49" EAST 185.28 FEET (RECORD DISTANCE=185.25 FEET);
5. SOUTH 44°49'06" EAST 187.12 FEET (RECORD DISTANCE=187.09 FEET) TO THE NORTH-SOUTH CENTERLINE OF SAID SECTION 33;

THENCE CONTINUING ALONG SAID CENTERLINE OF FULTON DITCH THE FOLLOWING SEVEN (7) COURSES:

1. SOUTH 44°49'06" EAST 119.68 FEET;
2. SOUTH 67°19'06" EAST 102.80 FEET;
3. SOUTH 53°17'11" EAST 266.98 FEET;
4. NORTH 85°19'19" EAST 82.20 FEET;
5. NORTH 63°33'42" EAST 205.14 FEET;
6. NORTH 47°56'22" EAST 237.78 FEET;
7. NORTH 39°06'23" EAST 22.89 FEET TO THE NORTH LINE OF THE SOUTH HALF OF THE SOUTHEAST QUARTER OF SECTION 33 AND THE SOUTHWEST CORNER OF PARCEL 1 AS DESCRIBED IN THAT WARRANTY DEED RECORDED APRIL 24, 1989 AS REC. NO. 2177392 OF THE RECORDS OF WELD COUNTY;

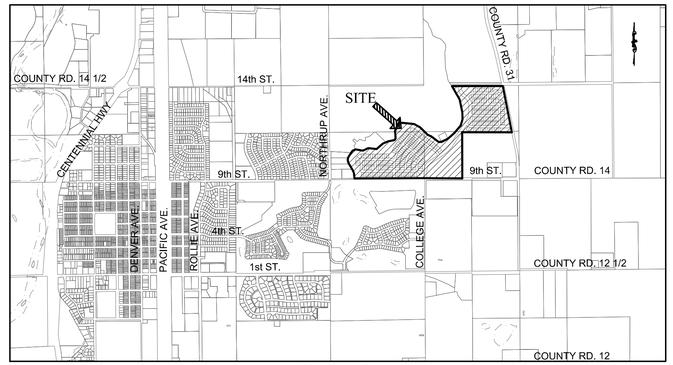
THENCE CONTINUING ALONG SAID CENTERLINE OF FULTON DITCH AND THE WESTERLY LINES OF SAID PARCEL 1 THE FOLLOWING FIVE (5) COURSES:

1. NORTH 39°06'23" EAST 246.83 FEET;
2. NORTH 16°42'35" EAST 177.01 FEET;
3. NORTH 02°13'20" WEST 191.53 FEET;
4. NORTH 11°46'35" WEST 367.88 FEET;
5. NORTH 29°31'20" WEST A DISTANCE OF 434.19 FEET TO A LINE PARALLEL WITH AND 30.00 FEET SOUTHERLY OF, AS MEASURED AT A RIGHT ANGLE, THE EAST-WEST CENTERLINE OF SAID SECTION 33;

THENCE NORTH 89°58'06" EAST ALONG THE EAST-WEST CENTERLINE OF SAID SECTION 33 1422.77 FEET TO THE WESTERLY RIGHT OF WAY LINE OF WELD COUNTY ROAD 31;

THENCE SOUTH 11°09'18" EAST ALONG THE WESTERLY RIGHT OF WAY LINE OF WELD COUNTY ROAD 31 1319.64 FEET TO THE **POINT OF BEGINNING**;

SAID DESCRIBED PARCELS OF LAND CONTAIN IN TOTAL 5,272,460 SQUARE FEET, OR 121.04 ACRES, MORE OR LESS.



VICINITY MAP
SCALE: 1"=2,000'

Sheet List Table	
Sheet Number	Sheet Title
1	COVER SHEET
2	NOTES & LEGEND
3	EXISTING CONDITIONS & DEMO
4	EXISTING CONDITIONS & DEMO
5	EXISTING CONDITIONS & DEMO
6	PHASING PLAN
7	OVERALL GRADING
8	OVERALL GRADING
9	OVERALL GRADING
10	OVERALL GRADING
11	OVERALL GRADING
12	OVERALL GRADING
13	OVERALL GRADING
14	OVERALL UTILITY
15	OVERALL UTILITY
16	OVERALL UTILITY
17	OVERALL HORIZONTAL CONTROL
18	OVERALL HORIZONTAL CONTROL
19	OVERALL HORIZONTAL CONTROL
DETAIL GRADING	
20	DETAIL GRADING
21	DETAIL GRADING
22	DETAIL GRADING
23	DETAIL GRADING
24	DETAIL GRADING
25	DETAIL GRADING
26	DETAIL GRADING
STREET PLAN & PROFILE	
27	STREET INDEX
28	9TH ST.
29	9TH ST.
30	9TH ST.
31	9TH STREET FLOWLINE
32	9TH STREET FLOWLINE
33	9TH STREET FLOWLINE
34	COLLEGE AVE
35	COLLEGE AVE.
36	COLLEGE AVE.
37	GIANNA AVE.
38	GIANNA AVE. & ALTO AVE.
39	ALTO AVE.
40	SAVONA AVE. & CHRISTINA ST.
41	CHRISTINA ST.
42	SARAH AVE.
43	ALYSSA ST.
44	MOLINA AVE.
45	PEYTON AVE.
46	KERI AVE.
47	TEANO ST.
48	TEANO ST.
49	BOSA ST.
50	LENOLA ST.
51	RAVENNA AVE.
52	MATERA AVE.
53	MANTOVA CT.
54	14TH ST.
55	14TH ST.
56	WCR 31
57	WCR 31
58	9TH ST. SECTIONS
59	9TH ST. SECTIONS
60	9TH ST. SECTIONS
61	STREET INTERSECTIONS
62	STREET INTERSECTIONS
63	STREET INTERSECTIONS
64	STREET INTERSECTIONS
SANITARY SEWER PLAN & PROFILE	
65	SANITARY INDEX
66	9TH ST. & OUTFALL
67	SAVONA AVE. & CHRISTINA ST.
68	CHRISTINA ST. & SARAH AVE.
69	SARAH AVE. & ALYSSA ST.
70	GIANNA AVE.
71	GIANNA AVE. & ALTO AVE.
72	COLLEGE AVE.
73	COLLEGE AVE.
74	PEYTON AVE.
75	KERI AVE.
76	TEANO ST.
77	BOSA ST.
78	LENOLA ST.
79	RAVENNA AVE.
80	MANTOVA CT.
STORM SEWER PLAN & PROFILE	
81	STORM INDEX
82	OFF-SITE OUTFALL
83	OUTFALL & TRACT A
84	TRACT A
85	TRACT A
86	TRACT A
87	TRACT A
88	TRACT A
89	TRACT H & KERI AVE.
90	SAVONA AVE., STORM LINE 1, 4 & 6
91	STORM LINES 2 & 4
92	PUBLIC STORM
93	PUBLIC STORM
94	PUBLIC STORM
95	NE 100-YEAR
96	PUBLIC STORM INLETS
97	POND 1 PLAN
98	POND 2 PLAN
99	POND 3 PLAN
100	POND 4 PLAN
101	POND 5 PLAN
WATER PLAN & PROFILE	
102	WATER INDEX
103	GIANNA AVE.
104	GIANNA AVE.
105	ALTO AVE.
106	SAVONA AVE.
107	CHRISTINA ST.
108	SARAH AVE.
109	ALYSSA ST.
110	MOLINA AVE.
111	PEYTON AVE.
112	KERI AVE.
113	TEANO ST.
114	TEANO ST.
115	BOSA ST.
116	LENOLA ST.
117	RAVENNA AVE.
118	MATERA AVE.
119	MANTOVA CT.
120	COLLEGE AVE
121	COLLEGE AVE
122	COLLEGE AVE
123	14TH STREET
124	14TH STREET
IRRIGATION PLAN & PROFILE	
125	IRRIGATION INDEX
126	GIANNA AVE.
127	GIANNA AVE.
128	ALTO AVE.
129	SAVONA AVE.
130	CHRISTINA ST.
131	SARAH AVE.
132	ALYSSA ST.
133	PEYTON AVE.
134	TEANO ST.
135	TEANO ST.
136	BOSA ST.
137	LENOLA ST.
138	RAVENNA AVE.
139	MANTOVA CT.
140	COLLEGE AVE
141	COLLEGE AVE
142	COLLEGE AVE
DETAILS	
143	STREET DETAILS
144	SANITARY DETAILS
145	SANITARY DETAILS
146	STORM DETAILS
SIGNAGE & STRIPING	
147	SIGNAGE & STRIPING
148	SIGNAGE & STRIPING
149	9TH STREET
150	14TH STREET
151	WCR 31

CITY ENGINEER'S APPROVAL:

APPROVED THIS ___ DAY OF _____, 2020.

_____
CITY ENGINEER

CITY WATER AND SEWER DEPARTMENT APPROVAL:

APPROVED THIS ___ DAY OF _____, 2020.

_____
DIRECTOR OF PUBLIC WORKS

CITY ADMINISTRATOR'S APPROVAL:

APPROVED THIS ___ DAY OF _____, 2020.

_____
CITY ADMINISTRATOR

PLANNING COMMISSION RECOMMENDATION:

RECOMMENDED THIS ____ DAY OF _____, 2020, BY RESOLUTION NO. _____.

_____
CHAIRPERSON, FORT LUPTON
PLANNING COMMISSION

MAYOR'S CERTIFICATE:
THIS IS TO CERTIFY THAT A PLAT OF THE ABOVE-DESCRIBED PROPERTY WAS APPROVED BY [ORDINANCE/RESOLUTION] NO. _____ OF THE CITY OF FORT LUPTON PASSED AND ADOPTED ON THE DAY OF _____, A.D., 2020 AND THAT THE MAYOR OF THE CITY OF FORT LUPTON, AS AUTHORIZED BY SAID [ORDINANCE/RESOLUTION] ON BEHALF OF THE CITY OF FORT LUPTON, HEREBY ACKNOWLEDGES AND ADOPTS THE SAID PLAT UPON WHICH THIS CERTIFICATE IS ENDORSED FOR ALL PURPOSES INDICATED THEREON.

_____
MAYOR

ATTEST: _____

_____
CITY CLERK

(SEAL)

OWNER:
ARBOR CAPITAL PARTNERS, LLC.
4040 MACAURTHER BLVD.,
SUITE 250
NEWPORT BEACH, CA 92660
(303) 905-3496
CONTACT: JIM RIGHEIMER

CIVIL ENGINEER:
ATWELL, LLC.
143 UNION BLVD.,
SUITE 700
LAKEWOOD, CO 80228
(303) 462-1100
CONTACT: MICHAEL MCGOLDRICK

SURVEYOR:
ATWELL, LLC.
143 UNION BLVD.,
SUITE 700
LAKEWOOD, CO 80228
(303) 462-1100
CONTACT: MICHAEL L. POOL

CITY OF FORT LUPTON:
130 S. McKINLEY AVE.
FORT LUPTON, CO 80621
(303) 857-6694
CONTACT: ROY VESTAL

XCEL ENERGY(GAS):
5460 W. 60TH AVE.
ARVADA, CO 80003
(800) 895-4999
CONTACT: DONNA SANDERS

UNITED POWER (ELEC):
P.O. BOX 929
BRIGHTON, CO 80601
(303) 659-0551
CONTACT: HECTOR AVENDANO

CENTURYLINK (FIBER OPTIC):
5324 WADSWORTH BYP.,
SUITE F
ARVADA, CO 80002
(303) 403-9980

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

ENGINEER'S STATEMENT

THE CONSTRUCTION PLANS INCLUDED HEREIN HAVE BEEN PREPARED UNDER MY DIRECT SUPERVISION IN ACCORDANCE WITH THE REQUIREMENTS OF FORT LUPTON ENGINEERING CONSTRUCTION STANDARDS AND SPECIFICATIONS MANUAL.

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

_____ _____
MICHAEL A. MCGOLDRICK, P.E. DATE
COLORADO NO. 30960
FOR AND ON BEHALF OF ATWELL, LLC.

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT: ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
COVER SHEET

DATE 03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 1

CAD FILE: 19003254-COVER SHEET.DWG

GENERAL NOTES – WATER & SANITARY SEWER

1. ALL CONSTRUCTION WORK SHALL BE IN ACCORDANCE WITH THE CITY OF FORT LUPTON STANDARD SPECIFICATIONS, LATEST EDITION OR PROJECT SPECIFICATIONS, WHICHEVER IS MORE STRINGENT.

2. ALL OVER LOT GRADING IN THE RIGHT–OF–WAY OR EASEMENT SHALL BE COMPLETED PRIOR TO INSTALLING WATER OR SANITARY SEWER LINES.

3. CONTRACTOR SHALL VERIFY ALL UTILITY LOCATIONS PRIOR TO CONSTRUCTION. CALL UTILITY NOTIFICATION CENTER OF COLORADO AT 811 OR 1–800–922–1987 BEFORE DIGGING, GRADING OR EXCAVATING.

4. MAINTAIN A MINIMUM OF 10 FOOT HORIZONTAL CLEAR DISTANCE SEPARATION BETWEEN WATER AND SANITARY SEWER MAINS AND SERVICES. WATER MAINS AND SERVICES ARE TO BE LOCATED 18 INCHES MINIMUM ABOVE THE SANITARY SEWER MAIN OR SERVICES. IF FIELD CONDITIONS VARY FROM THOSE SHOWN ON THESE PLANS AND THE SANITARY SEWER CANNOT BE LOCATED BELOW THE WATER MAIN OR SERVICE, A CLEAR VERTICAL DISTANCE OF 18 INCHES CANNOT BE MAINTAINED, OR A MINIMUM 10 FOOT HORIZONTAL SEPARATION CANNOT BE ACHIEVED, THE CITY OF FORT LUPTON INSPECTION SERVICES SHALL BE CONTACTED IMMEDIATELY TO REVIEW THE SITUATION. IF NO OTHER FEASIBLE SOLUTION CAN BE USED TO MAINTAIN THE REQUIRED CLEARANCES, THE SANITARY SEWER SHALL BE ENCASED PER CURRENT CONSTRUCTION STANDARDS.

5. WHERE WATER AND SANITARY SEWER LINES ARE LOCATED IN COMMON UTILITY EASEMENT AREAS, THERE SHALL BE NO OTHER UTILITIES LOCATED HORIZONTALLY WITHIN 10 FEET OF EITHER LINE EXCEPT AT APPROVED CROSSINGS.

6. CONTRACTOR SHALL NOTIFY THE CITY OF FORT LUPTON ONE WEEK PRIOR TO COMMENCING WORK AFTER DRAWING DISTRIBUTION AND PRECONSTRUCTION MEETING HELD WITH THE CITY.

7. CONTRACTOR TO OBTAIN ALL PERMITS, DO ALL EXCAVATION FOR OSHA SAFE TRENCH.

8. CONTRACTOR SHALL POTHOLE ALL EXISTING UTILITIES TO BE CROSSED BY WATER AND/OR SEWER LINES AT LEAST 24 HOURS PRIOR TO CROSSING TO ENSURE 18 INCH MINIMUM CLEARANCE IF OPEN CUT METHODS ARE USED AND 24 INCH MINIMUM CLEARANCE FOR BORED CROSSINGS. IF VERTICAL CLEARANCE CANNOT BE MET AS SHOWN ON THE DRAWINGS, CONTACT THE DESIGN ENGINEER IMMEDIATELY. HORIZONTAL AND VERTICAL LOCATION OF CROSSED EXISTING UTILITIES SHALL BE RECORDED ON THE AS–BUILT RECORD DRAWINGS.

9. SHOULD ANY VARIATIONS BEFORE OR DURING CONSTRUCTION TO THE WATER MAIN OR SANITARY SEWER COLLECTION SYSTEM DESIGN(S) BE CONSIDERED, NOTICE MUST FIRST BE GIVEN TO THE ENGINEER (BRAD EATON, 970–395–9880).

10. THE CONTRACTOR SHALL PROVIDE THE OWNER WITH AS–BUILT RECORD DRAWINGS UPON COMPLETION OF WORK.

11. ALL WATER MAINS, FIRE HYDRANTS, AND SERVICES SHALL HAVE A MINIMUM COVER OF 5.0 FEET AND A MAXIMUM COVER OF 6.0 FEET UNLESS OTHERWISE INDICATED ON THE DRAWINGS.

12. ALL NEW WATER MAINS SHALL BE BULKHEADED AND TESTED AND APPROVED PRIOR TO CONNECTION TO THE EXISTING WATER SYSTEM. VALVES WHICH PASS TESTING FOR PRESSURE AND LEAKAGE AT THE TIME OF INSTALLATION AND THE TESTING WAS PERFORMED IN THE PRESENCE OF THE CITY MAY BE CONSIDERED AS A BULKHEAD.

13. ALL VALVES AT DEAD ENDS SHALL BE RESTRAINED WITH RESTRAINING GLANDS UPSTREAM OF THE VALVE. LENGTH OF RESTRAINT IS SHOWN ON THE DRAWINGS.

14. ALL DUCTILE IRON PIPE AND FITTINGS SHALL BE POLYWRAPPED IN ACCORDANCE WITH AWWA STANDARD C–105.

15. NO POLYVINYL CHLORIDE (PVC) PIPE STORED OUTSIDE AND EXPOSED TO SUNLIGHT SHALL EXCEED THE MANUFACTURER'S RECOMMENDATION EXPOSURE TIME. THIS TIME SHALL BEGIN FROM THE DATE OF MANUFACTURE. IF THE TIME WILL BE GREATER THAN THE MANUFACTURE'S RECOMMENDED TIME, THE PIPE SHALL BE COVERED WITH AN OPAQUE MATERIAL. AIR CIRCULATION SHALL BE PROVIDED UNDER THE COVERING.

16. COPPER TRACING WIRE SHALL BE INSTALLED PER SPECIFICATIONS FOR ALL WATER PIPE.

17. FOR TAPPING PVC C–900 PIPE, AN APPROVED TAPPING SADDLE SHALL BE USED. THE TAPPING MACHINE USED TO MAKE THE CONNECTION MUST OPERATE WITH A CUTTING/TAPPING TOOL WHICH IS CLASSIFIED AS A CORE CUTTING TOOL (EITHER WITH INTERNAL TEETH OR WITH DOUBLE SLOTS) OF THE SHELL DESIGN WHICH RETAINS THE COUPON WHILE PENETRATING THE WALL OF THE WATER MAIN. THE TAPPING MACHINE SHOULD PROVIDE THE STANDARD RATCHET HANDLE ON THE BORING BAR AND SHOULD BE OF THE DESIGN WHERE CUTTING AND TAPPING IS CONTROLLED AND ACCOMPLISHED WITH A FEED–NUT OR FEED–SCREW AND YOKE.

18. ALL BACKFLOW PROTECTION SHALL BE PROVIDED IN ACCORDANCE WITH THE COLORADO CROSS–CONNECTION CONTROL MANUAL, LATEST EDITION, AND AS REQUIRED NECESSARY BY THE CITY OF FORT LUPTON WATER AND SEWER DEPARTMENT. ALL BACKFLOW ASSEMBLIES MUST BE TESTED UPON INSTALLATION AND JUST PRIOR TO END OF WARRANTY PERIOD. OWNER SHALL BE RESPONSIBLE FOR TESTING EACH YEAR THEREAFTER.

19. ALL DUCTILE IRON PIPE (D.I.P.) WATER MAINS SHALL BE THICKNESS CL. 50 UNLESS OTHERWISE NOTED.

20. THERE SHALL BE NO PERMANENT STRUCTURES, FENCES, OR LANDSCAPING (PLANTINGS OR BERMS) PLACED WITHIN A 10.0 FOOT RADIUS OF FIRE HYDRANTS AS CONSTRUCTED.

21. BEDDING FOR DUCTILE IRON PIPE SHALL BE TYPE 3 AS PER AWWA C–151 STANDARD LAYING CONDITIONS UNLESS OTHERWISE SPECIFIED.

22. PVC POTABLE (DOMESTIC) WATER MAIN PIPE SHALL MEET THE FOLLOWING QUALITY STANDARDS: AWWA C–900; CLASS 200 – DR 14 ELASTOMERIC RING – ASTM D1869 & F477 RING TIGHT JOINT.

23. PVC WATER PIPE SHALL BE INSTALLED USING A CDOT CLASS B BEDDING 6 INCHES ABOVE AND 6 INCHES BELOW THE PIPE.

24. INSULATED 12 GAUGE TRACER WIRE SHALL BE AFFIXED TO THE PROPOSED WATER MAINS.
   A. PASS CURRENT THROUGH WIRE AND DEMONSTRATE THAT THE WIRE IS CAPABLE OF LOCATING THE WATER MAINS.
   B. IF WIRE WILL NOT PASS CURRENT, LOCATE BREAK IN CIRCUIT AND TEST UNTIL TRACER WIRE WORKS IN ACCORDANCE WITH ITS INTENDED USE.

25. ALL SANITARY SEWER LINES SHALL BE ASTM D–3034 (PVC SDR 35) UNLESS OTHERWISE NOTED.

26. ALL SANITARY SEWER LINES SHALL HAVE A MINIMUM OF 10.0' HORIZONTAL & 18" VERTICAL CLEARANCE FROM PROPOSED OR EXISTING WATER LINES & STORM DRAIN LINES.

27. ALL SANITARY SEWER SERVICES TO BE 4" DIAMETER PVC (SDR 35) & SHALL NOT HAVE A SLOPE LESS THAN 1% OR MORE THAN 8%.

PROJECT GENERAL NOTES:

1. THE FOLLOWING SHALL BE FURNISHED WITH EACH BITUMINOUS PAVER:
   - A SKID TYPE DEVICE AT LEAST 30 FEET IN LENGTH. THIS DEVICE SHALL BE USED ON ALL PASSES AND LIFTS OF BITUMINOUS PAVEMENT PLACED.
   - ANY LAYER OF BITUMINOUS PAVEMENT THAT IS TO HAVE A SUCCEEDING LAYER PLACED THEREON SHALL BE COMPLETED FULL WIDTH BEFORE SUCCEEDING LAYER IS PLACED.

2. TYPE OF COMPACTION FOR THIS PROJECT SHALL BE AASHTO T–99 (ASTM D698) (STANDARD PROCTOR) FOR SUBGRADE SOILS AND AASHTO T–180 (ASTM D1557) (MODIFIED PROCTOR) FOR AGGREGATE BASE COURSE.

3. THE CONTRACTOR IS RESPONSIBLE FOR DUST CONTROL, AND IT SHALL BE THE CONTRACTOR'S RESPONSIBILITY TO PROVIDE THE NECESSARY EQUIPMENT AND MATERIALS TO SATISFACTORILY CONTROL DUST AT ALL TIMES, AND AS DIRECTED BY THE CITY. WATER SHALL BE USED AS THE DUST PALLIATIVE WHERE REQUIRED. THE CONTRACTOR WILL FURNISH AND SPREAD WATER AT NO ADDITIONAL COST TO THE PROJECT.

4. DEPTH OF MOISTURE–CONTROL FOR THIS PROJECT SHALL BE AS FOLLOWS:
   - FULL DEPTH OF ALL EMBANKMENTS
   - BASE OF CUTS AND FILLS, 0.5 FT.
   - EXCAVATION AND DIGGING AS REQUIRED FOR THE COMPACTION OF BASES OF CUTS AND FILLS WILL BE CONSIDERED SUBSIDIARY TO THAT OPERATION AND WILL NOT BE PAID FOR SEPARATELY.

5. WHEN EXISTING ASPHALT PAVEMENT IS TO BE REMOVED, IT SHALL BE CUT TO A NEAT WORK LINE WITH A CUTTING WHEEL ATTACHED TO A BLADE, SAW OR OTHER METHODS AS APPROVED BY THE ENGINEER. THIS WORK WILL NOT BE PAID FOR SEPARATELY BUT SHALL BE CONSIDERED AS SUBSIDIARY TO OTHER WORK.

6. ALL DEBRIS, RUBBISH AND OTHER MATERIALS RESULTING FROM DEMOLITION OPERATIONS SHALL BE REMOVED FROM THE SITE AND LEGALLY DISPOSED OF OFF–SITE. LOCATION OF DUMP, LENGTH OF HAUL, AND DISPOSAL EXPENSES SHALL BE CONTRACTOR'S RESPONSIBILITY.

7. THE STREETS ADJACENT TO THE CONSTRUCTION AREA SHALL BE CLEARED OF DEBRIS GENERATED BY THE PROJECT BY THE CONTRACTOR AT THE EARLIEST OPPORTUNITY, BUT IN NO CASE SHALL THE ROADS BE LEFT UNCLEARED AFTER THE COMPLETION OF THE DAY'S WORK. IT SHALL BE THE CONTRACTOR'S RESPONSIBILITY TO PROVIDE THE NECESSARY EQUIPMENT AND MATERIAL TO SATISFACTORILY CLEAN THE ROADWAYS AT NO ADDITIONAL COST TO THE PROJECT.

8. IT IS THE CONTRACTOR'S RESPONSIBILITY TO PROVIDE SITE GRADING IN A MANNER CONSISTENT WITH THE PLANS.

9. THERE SHALL BE A MINIMUM 12" VERTICAL SEPARATION WHERE UTILITY SLEEVES ARE LOCATED IN THE SAME TRENCH.

10. CONTRACTOR SHALL SUBMIT AS–BUILT INFORMATION TO THE PROJECT ENGINEER TO REVIEW AND PREPARE FINAL AS–BUILT RECORD DRAWINGS.

11. ALL WORK WITHIN THE PUBLIC RIGHT–OF–WAY OR EASEMENT SHALL CONFORM TO THE CITY OF FORT LUPTON CONSTRUCTION SPECIFICATIONS AND DESIGN STANDARDS.

12. THE CONTRACTOR IS RESPONSIBLE FOR OBTAINING ALL REQUIRED PERMITS PRIOR TO COMMENCEMENT OF ANY WORK ON THE PROJECT. A PRE–CONSTRUCTION CONFERENCE SHALL BE HELD WITH CITY REPRESENTATIVES BEFORE A PERMIT WILL BE ISSUED.

13. THE CONTRACTOR SHALL NOTIFY CITY OF FORT LUPTON AT LEAST 24–HOURS PRIOR TO THE DESIRED INSPECTION.

14. IT IS THE CONTRACTOR'S RESPONSIBILITY TO NOTIFY THE ENGINEER OF ANY PROBLEMS IN CONFORMING TO THE ACCEPTED PLANS FOR ANY ELEMENT OF THE PROPOSED IMPROVEMENTS PRIOR TO ITS CONSTRUCTION.

15. THE CONTRACTOR SHALL BE SOLELY AND COMPLETELY RESPONSIBLE FOR THE CONDITIONS AT AND ADJACENT TO THE JOB SITE, INCLUDING SAFETY OF ALL PERSONS AND PROPERTY, DURING THE PERFORMANCE OF THE WORK. THIS REQUIREMENT SHALL APPLY CONTINUOUSLY AND SHALL NOT BE LIMITED TO NORMAL WORKING HOURS. THE DUTY OF THE ENGINEER OR CITY TO CONDUCT CONSTRUCTION REVIEW OF THE CONTRACTOR'S PERFORMANCE IS NOT INTENDED TO INCLUDE REVIEW OF THE ADEQUACY OF THE CONTRACTOR'S SAFETY MEASURES IN, ON, OR NEAR THE CONSTRUCTION SITE.

16. THE CONTRACTOR SHALL PROVIDE ALL LIGHTS, SIGNS, BARRICADES, FLAG PERSONS, OR OTHER DEVICES NECESSARY TO PROVIDE FOR PUBLIC SAFETY IN ACCORDANCE WITH THE CURRENT MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES.

17. THE CONTRACTOR IS RESPONSIBLE FOR THE PROTECTION OF ALL SURVEY MONUMENTS. ANY MONUMENT THAT MUST BE DESTROYED FOR CONSTRUCTION MUST BE REPLACED. THE CONTRACTOR SHALL ENGAGE THE SERVICES OF A LICENSE SURVEYOR PRIOR TO DISTURBING ANY MONUMENTS.

18. PRIOR TO FINAL PLACEMENT OF SURFACE PAVEMENT, ALL UNDERGROUND UTILITY MAINS SHALL BE INSTALLED.

UTILITY MAINTENANCE STATEMENT:

1. ALL PUBLIC WATER, STORM SEWER AND SANITARY SEWER MAINS AND APPURTENANCES LOCATED IN PUBLIC ROW SHALL BE MAINTAINED BY THE CITY OF FORT LUPTON PUBLIC WORKS DEPARTMENTS. ALL PUBLIC WATER, STORM SEWER, SANITARY SEWER MAINS AND APPURTENANCES UNDER PRIVATE DRIVES ARE LOCATED IN UTILITY EASEMENTS. CITY IS RESPONSIBLE FOR MAINTENANCE OF THESE WATER, STORM AND SANITARY SEWER FACILITIES. CITY IS NOT RESPONSIBLE FOR REPAIR OR REPLACEMENT OF PRIVATE DRIVE, CURB AND GUTTER OR LANDSCAPING DAMAGED DURING UTILITY REPAIR OR MAINTENANCE.

GENERAL NOTES – STORM DRAIN

1. SEE DETAIL SHEET NO. 146 DETAIL ST4, FOR STORM DRAIN BEDDING REQUIREMENTS.

2. RCP SHALL HAVE FLEXIBLE GASKET MATERIAL (WATER TIGHT RUBBER GASKETS) MEETING ASTM C443 AND TYPE 4–G BELL AND SPIGOT JOINTS.

3. ALL PVC STORM DRAINS SHALL BE SDR 35 PUSH–ON BELL & SPIGOT TYPE MEETING ASTM D1784, D3034 & D3212. ALL GASKETS SHALL BE OF AN O–RING TYPE IN ACCORDANCE WITH ASTM F477.

4. ALL STORM DRAINAGE CONSTRUCTION SHALL CONFORM TO THE CITY OF FORT LUPTON'S MOST RECENT STORM DRAINAGE DESIGN CRITERIA AND CONSTRUCTION SPECIFICATIONS. A COPY OF THE SPECIFICATIONS MAY BE OBTAINED FROM THE CITY.

5. STORM DRAIN PIPE MATERIAL SPECIFICATIONS ARE AS FOLLOWS:

REINFORCED CONCRETE PIPE (RCP) – REINFORCED CONCRETE PIPE SHALL BE MANUFACTURED IN ACCORDANCE WITH THE "STANDARD SPECIFICATIONS FOR REINFORCED CONCRETE CULVERT, STORM DRAIN AND SEWER PIPE," ASTM C–76, LATEST REVISION. SHOP DRAWINGS WILL BE REQUIRED WHEN STEEL PLACEMENT IS DIFFERENT THAN THAT SHOWN OR REQUIRED BY THE APPLICABLE ASTM SPECIFICATION. RCP SHALL BE CLASS III, UNLESS SPECIFIED OTHERWISE, AND OF THE SIZE INDICATED ON THE DRAWINGS. INTERNAL PIPE WALL SHALL BE REASONABLY SMOOTH AND FREE OF DEFECTS. PIPE THAT IS ROUGH OR UNEVEN SHALL BE REMOVED FROM THE JOB SITE.

6. THE CONTRACTOR SHALL VERIFY THE HORIZONTAL AND VERTICAL ALIGNMENT OF ALL POINTS OF CONNECTION AND UTILITY CROSSINGS PRIOR TO INSTALLING ANY STORM DRAIN PIPE. IF A DESIGN MODIFICATION IS REQUIRED IT SHALL BE COORDINATED WITH THE ENGINEER.

GEOTECHNICAL NOTES:

A GEOTECHNICAL REPORT "SUBSURFACE EXPLORATION PROGRAM GEOTECHNICAL AND PAVEMENT" RECOMMENDATIONS COTTONWOOD GREENS FORT LUPTON, COLORADO HAS BEEN PREPARED BY GROUND ENGINEERING CONSULTANTS, INC., PROJ. NO. 12–3636, DATE NOVEMBER 15, 2018. REFER TO GEOTECHNICAL REPORT FOR ANY REQUIREMENTS EXCEEDING CITY STANDARDS.

ALLOWABLE PAVEMENT SECTION THICKNESS (INCHES)

	ASPHALT CONCRETE SURFACE	AGGREGATE BASE COURSE	FULL DEPTH ASPHALT	PORTLAND CEMENT CONCRETE
PARKING LOT	6.5"			
DRIVE LANES HEAVY TRUCK TRAFFIC	7.5"	6"		
FULL DEPTH				

LEGEND

- PROPERTY BOUNDARY
- PROPOSED RIGHT–OF–WAY
- EXISTING RIGHT–OF–WAY
- PROPOSED LOT LINE
- EXISTING LOT LINE
- PROPOSED CATCH CURB & GUTTER
- PROPOSED SPILL CURB & GUTTER
- EXISTING CURB & GUTTER
- PROPOSED SIDEWALK
- EXISTING SIDEWALK
- EXISTING SECTION LINE
- PROPOSED EASEMENT
- EXISTING EASEMENT
- PROPOSED CONTOURS
- EXISTING CONTOURS
- PROPOSED SANITARY
- SS — EXISTING SANITARY
- S — PROPOSED SANITARY SERVICE
- PROPOSED STORM
- EXISTING STORM
- PROPOSED WATER
- W — EXISTING WATER
- W — PROPOSED WATER SERVICE
- PROPOSED HYDRANT
- EXISTING HYDRANT
- PROPOSED WATER VALVE
- EXISTING WATER VALVE
- EXISTING POWER POLE
- IRR — EXISTING IRRIGATION LINE
- GAS — EXISTING GAS LINE
- T — EXISTING TELEPHONE LINE
- OHE — EXISTING OVERHEAD ELECTRICAL
- E — EXISTING ELECTRICAL
- CATV — EXISTING CABLE TV
- FO — EXISTING FIBER OPTIC CABLE
- X — EXISTING FENCE

PROJECT NO.: LUP2019–0033 &
PLAN NO.: PPL2019–0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303–905–3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
NOTES & LEGEND

DATE 03/19/20

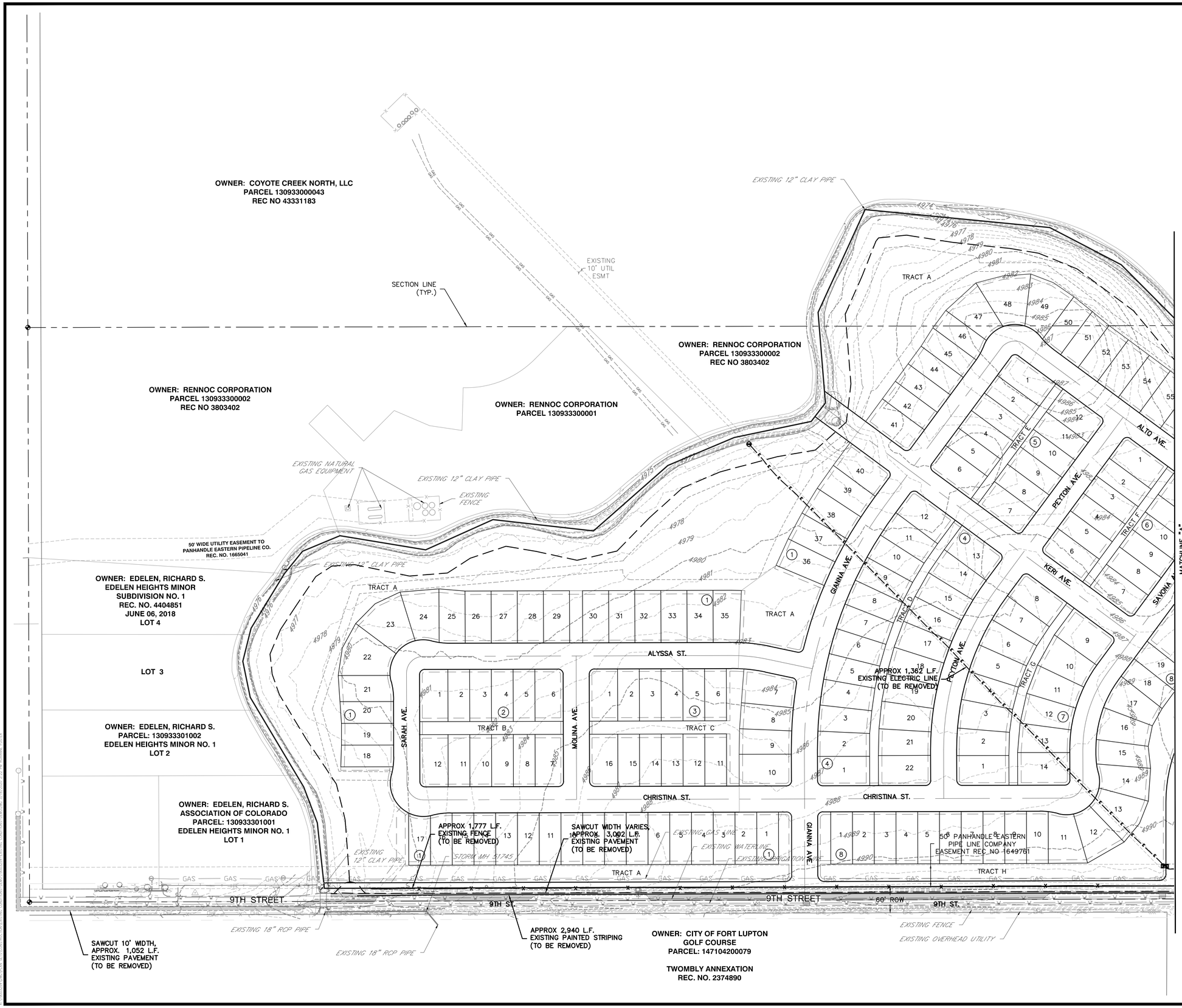
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

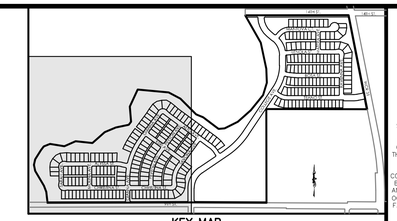
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 2

CAD FILE: 19003254–COVER SHEET.DWG





KEY MAP
N.T.S.

811
Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
ARBOR CAPITAL PARTNERS, LLC
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS

EXISTING CONDITIONS & DEMO

DATE 03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 3

CAD FILE: 19003254-EXISTING CONDITIONS-DEMO.DWG

MATCHLINE "B"
SEE SHEET 5

TRACT K

APPROX 1500 L.F.
EXISTING GAS LINE
(TO BE REMOVED)

BOSA ST. EXISTING GRAVEL ROAD
(TO BE REMOVED)

TRACT J

TEANO ST.

TRACT I

RAVENNA AVE.

APPROX 1,414 L.F.
EXISTING PAINTED STRIPING
(TO BE REMOVED)

EXISTING SIGN
(TO BE REMOVED)

SAWCUT 24' WIDTH,
APPROX. 1,352 L.F.
EXISTING PAVEMENT
(TO BE REMOVED)

EXISTING WATERLINE
(TYP.)

EXISTING
FIBER OPTICS

APPROX 636 L.F.
EXISTING GAS LINE
(TO BE REMOVED)

EXISTING
GAS LINE
(TYP.)

TRACT M

WCR 31

SECTION LINE
(TYP.)

EXISTING
20' UTIL
ESMT

APPROX 1,271 L.F.
EXISTING FENCE
(TO BE REMOVED)

EXISTING SANITARY

20' WIDE UTILITY EASEMENT TO
CITY OF FORT LUPTON
REC. NO 1119587

SECTION LINE
(TYP.)

EXISTING 12" CLAY PIPE

EXISTING
SANITARY
MH 7079

OWNER: COYOTE CREEK NORTH, LLC
PARCEL 130933400003
REC NO 43331183

OWNER: COYOTE
CREEK NORTH, LLC
PARCEL 130933400002
REC NO 43331183

COLLEGE AVE.

EXISTING
SANITARY
MH 51163

TRACT A

EXISTING ELECTRIC LINE

EXISTING FENCE

EXISTING NATURAL
GAS EQUIPMENT

MATCHLINE "A"
SEE SHEET 3

TRACT H

EXISTING GAS LINE

EXISTING
GRAVEL ROAD

TRACT I

20' WIDE UTILITY EASEMENT TO
CITY OF FORT LUPTON
REC. NO. 01978931

EXISTING FENCE

EXISTING
GRAVEL ROAD

EXISTING NATURAL
GAS EQUIPMENT

OWNER: RENNOC CORPORATION
PARCEL: 130933400064
REC. NO. 4097858

WCR 31

OWNER: THE CONNER FAMILY TRUST
PARCEL: 130933400065
REC. NO. 4089095
MARCH 03, 2015

EXISTING GAS LINE

S 1/4 S33-T2N-R66W
FOUND #6 REBAR NO
MONUMENT BOX

APPROX 200 L.F.
EXISTING ELECTRIC LINE
(TO BE REMOVED)

SAWCUT WIDTH VARIES,
APPROX. 3,002 L.F.
EXISTING PAVEMENT
(TO BE REMOVED)

EXISTING GAS LINE

EXISTING
TELEPHONE LINE

SECTION LINE
(TYP.)

OWNER: FORT LUPTON FIRE
PROTECTION DISTRICT
PARCEL 130933400062
REC. NO. 3243249

LOT 1
MCPHERSON-CERETTO SUBD.
REC. NO. 3220873
SEPTEMBER 21, 2004

COLLEGE AVE.

9TH STREET

9TH ST.

9TH STREET

S 1/4 S33-T2N-R66W
FOUND #6 REBAR WITH
3025" ALUMINUM CAP
LS 38091 "2017"
IN MONUMENT BOX

EXISTING FENCE

EXISTING WATERLINE
(TYP.)

EXISTING CABLE TV
(TYP.)

LOT 1, BLOCK 1
AMENDED PLAT OF MEADOWLARK
VILLAGE PLANNED UNIT DEVELOPMENT
REC. NO. 3667542
DECEMBER 29, 2009

LOT 1, BLOCK 1
COLORADO NATIONAL GUARD
MINUTEMAN MEADOWS SUBDIVISION
REC. NO. 3680933
MARCH 15, 2010

LOT 1, BLOCK 1
SOUTHEAST WELD COUNTY
SERVICES BUILDINGS SUBDIVISION
REC. NO. 3461166
MARCH 09, 2007

(IN FEET)
1 inch = 100 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

KEY MAP
N.T.S.

811
Know what's below.
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
EXISTING CONDITIONS & DEMO

DATE
03/19/20

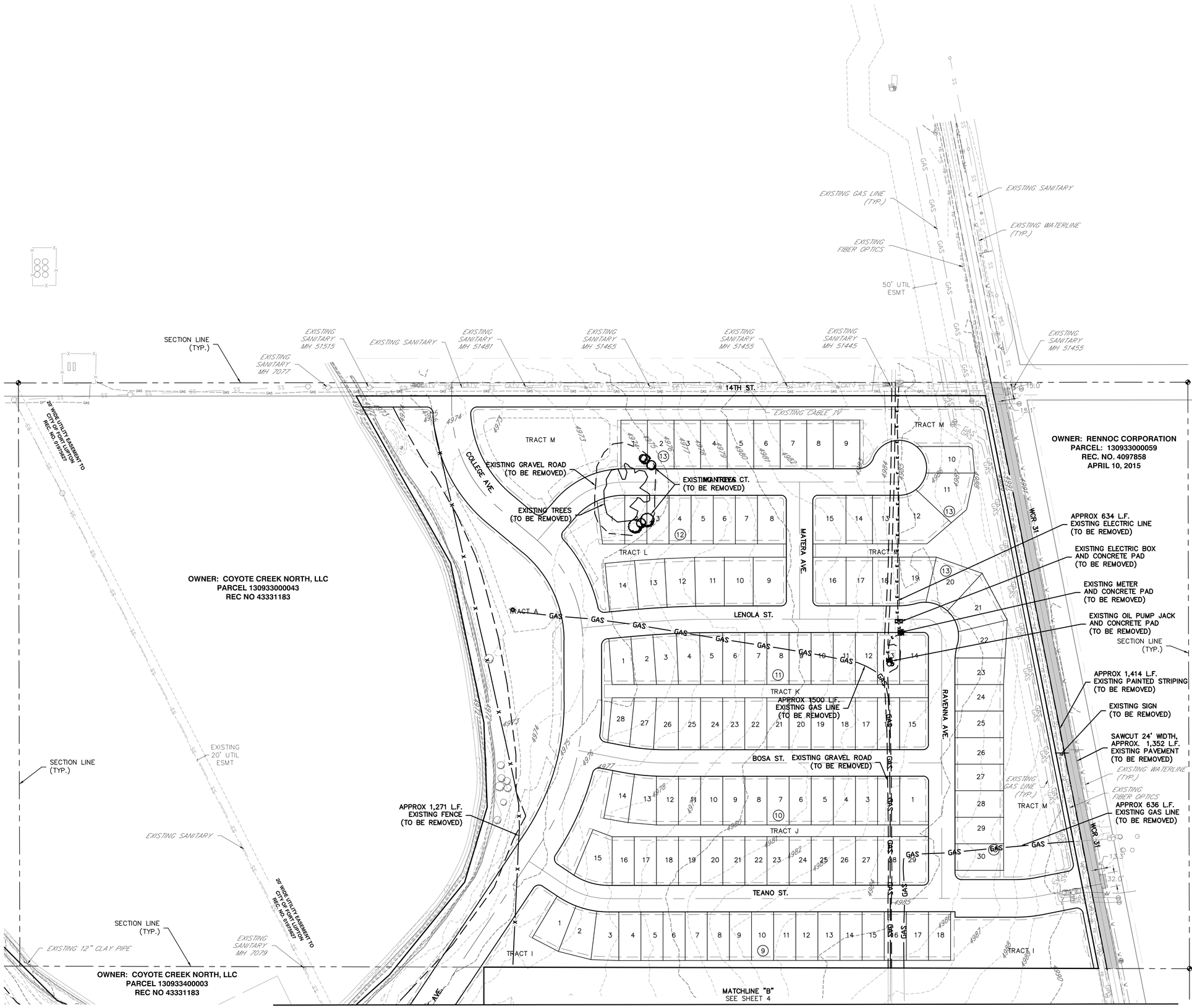
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

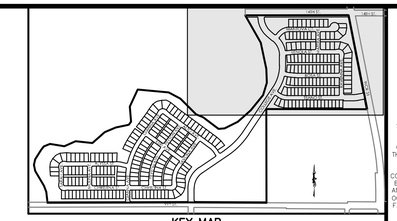
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF	CH. MAM
P.M. MAM	
JOB 19003254	
SHEET NO. 4	

CAD FILE: 19003254-EXISTING CONDITIONS-DEMO.DWG





KEY MAP
N.T.S.

811
Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT: ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
EXISTING CONDITIONS & DEMO

DATE 03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

(IN FEET)
1 inch = 100 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

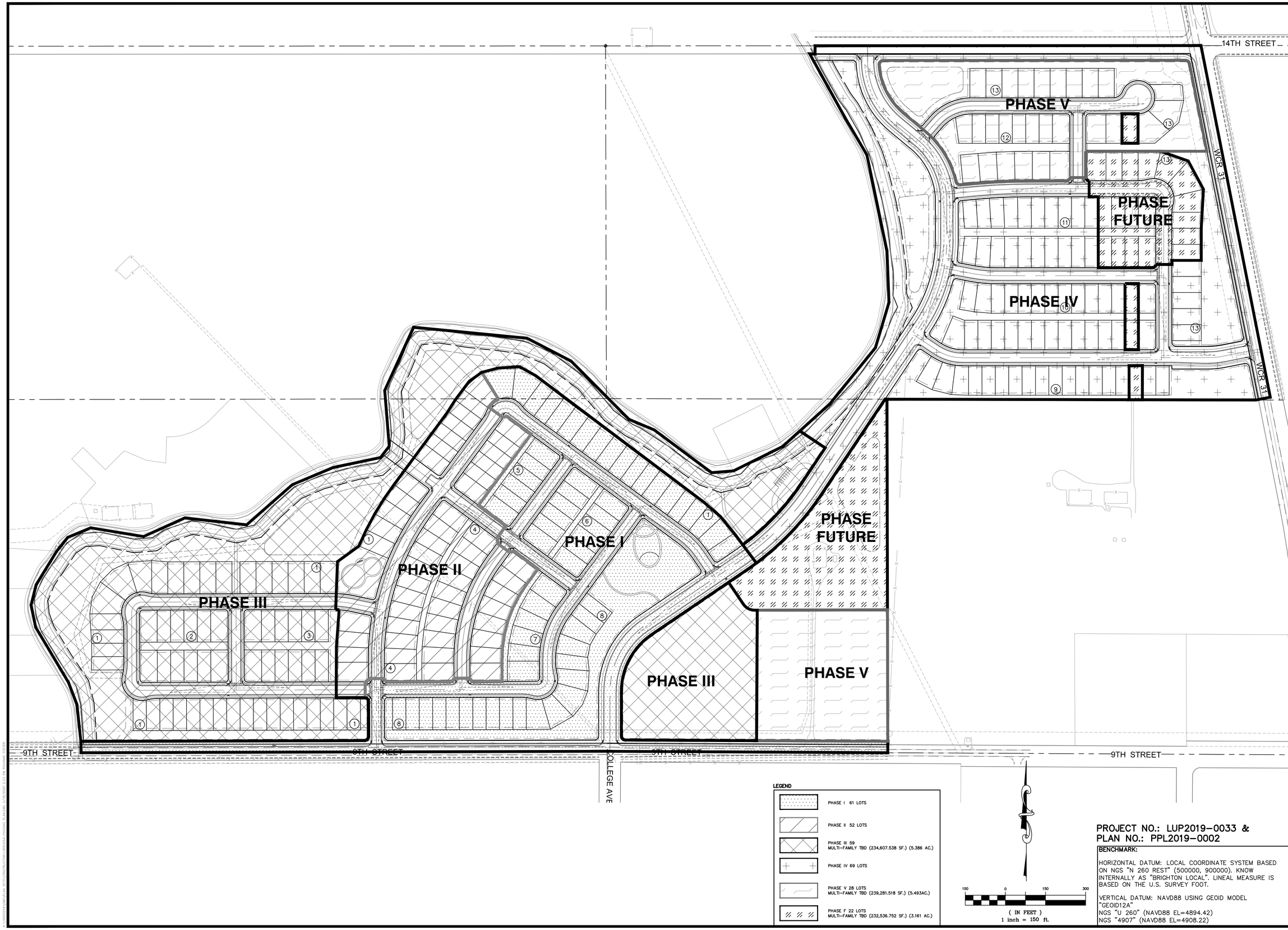
BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 5

CAD FILE: 19003254-EXISTING CONDITIONS-DEMO.DWG



PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
PHASING PLAN

DATE 03/19/20

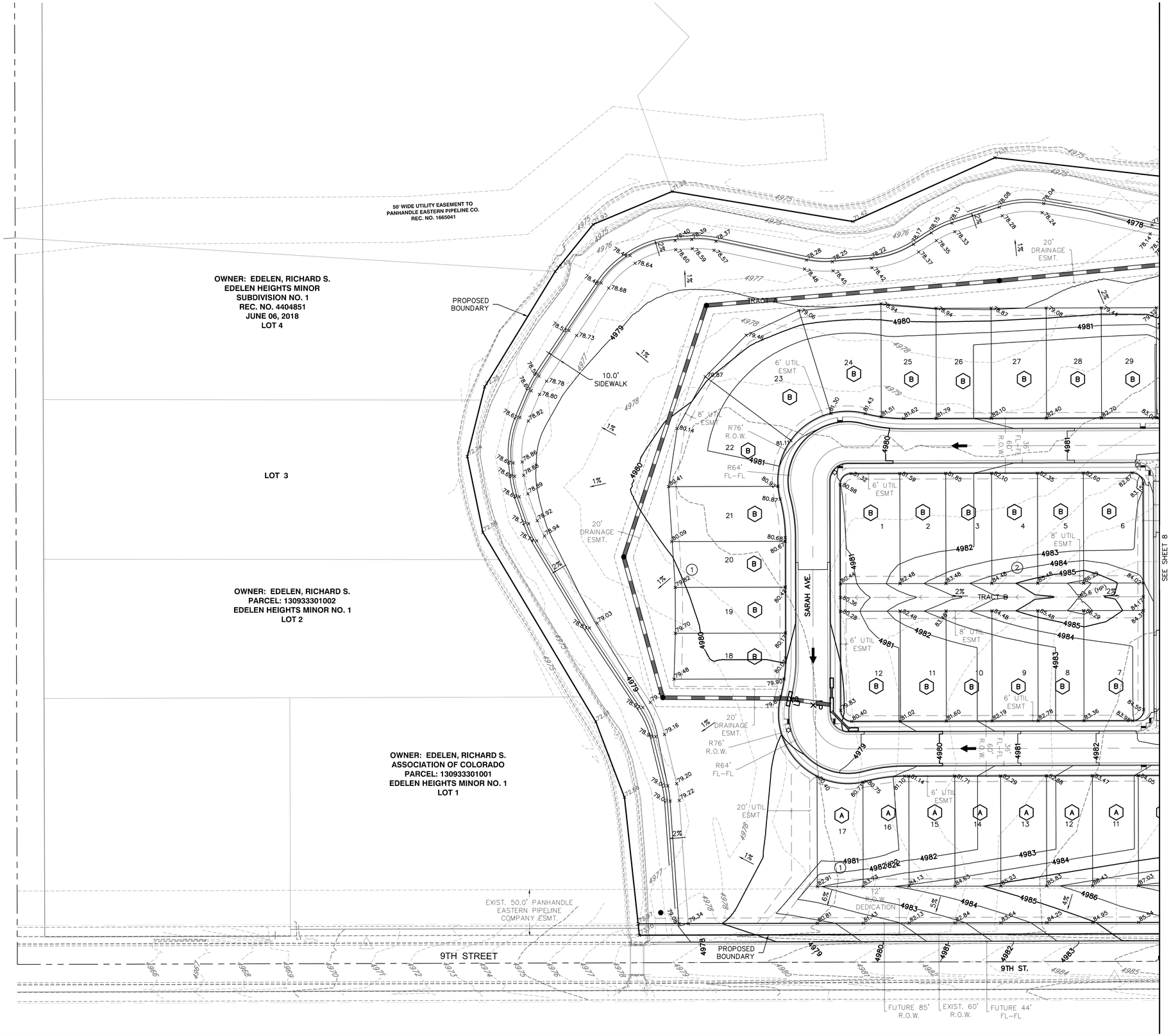
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

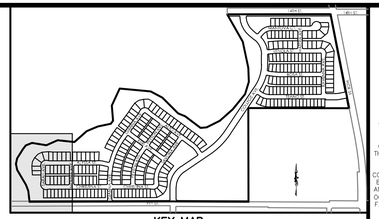
REVISIONS

PLANS UNDER REVIEW
NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 6

CAD FILE: 19003254-PHASING PLAN.DWG





KEY MAP
N.T.S.

LEGEND

	PROPERTY BOUNDARY LINE
	EXISTING CURB & GUTTER
	PROPOSED CURB & GUTTER
	PROPOSED CONTOURS
	EXISTING CONTOURS
	FLOW DIRECTION
+67.00	PROP. OVERLOT GRADE SPOT ELEV.
(67.00)	PROP. FINISHED GRADE SPOT ELEV.
A	"A" DRAINAGE LOT
B	"B" DRAINAGE LOT
T	TRANSITION LOT

(IN FEET)
1 inch = 50 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
OVERLOT GRADING

DATE
03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

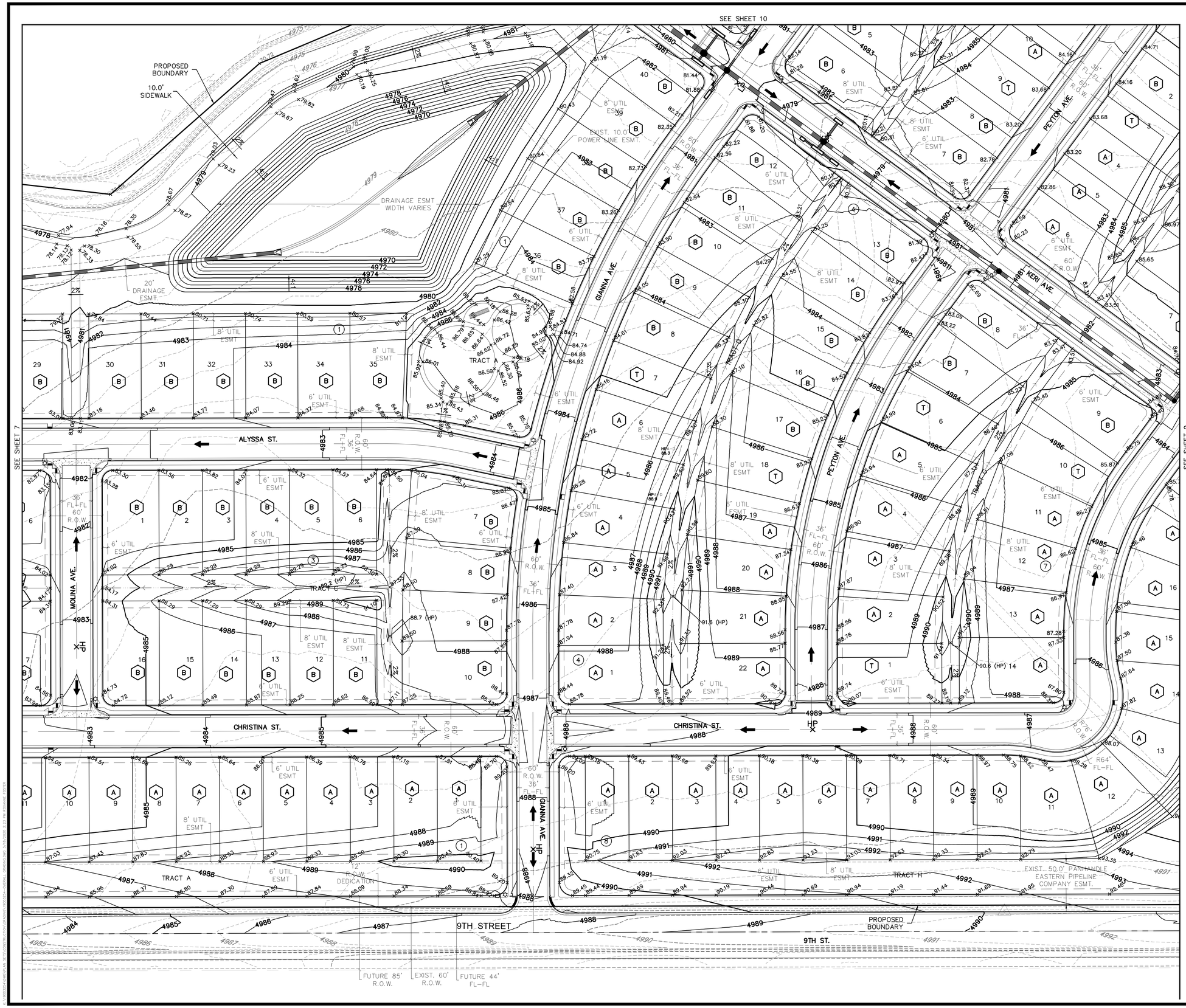
REVISIONS

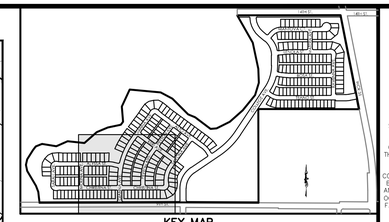
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM

JOB 19003254
SHEET NO. 7

CAD FILE: 19003254-OVERALL GRADING.DWG





KEY MAP
N.T.S.

LEGEND

	PROPERTY BOUNDARY LINE
	EXISTING CURB & GUTTER
	PROPOSED CURB & GUTTER
	PROPOSED CONTOURS
	EXISTING CONTOURS
	FLOW DIRECTION
+67.00	PROP. OVERLOT GRADE SPOT ELEV.
(67.00)	PROP. FINISHED GRADE SPOT ELEV.
A	"A" DRAINAGE LOT
B	"B" DRAINAGE LOT
T	TRANSITION LOT

50 0 50 100
(IN FEET)
1 inch = 50 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
OVERLOT GRADING

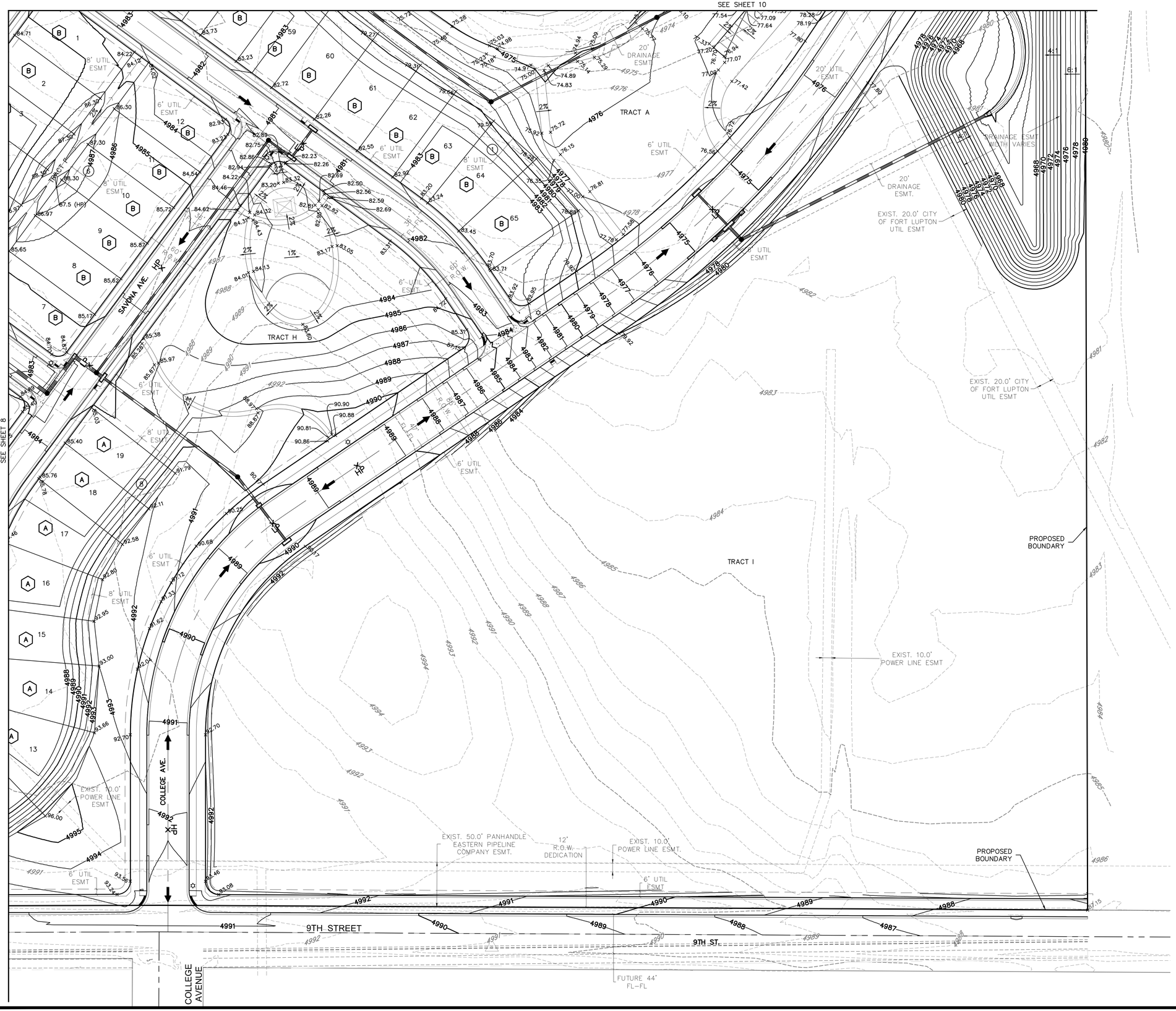
DATE	
03/19/20	
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

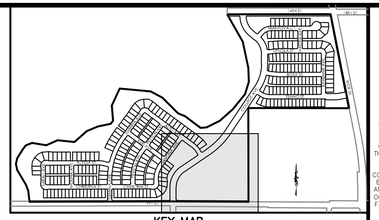
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF	CH. MAM
P.M. MAM	
JOB 19003254	
SHEET NO. 8	

CAD FILE: 19003254-OVERALL GRADING.DWG





KEY MAP
N.T.S.

LEGEND

	PROPERTY BOUNDARY LINE
	EXISTING CURB & GUTTER
	PROPOSED CURB & GUTTER
	PROPOSED CONTOURS
	EXISTING CONTOURS
	FLOW DIRECTION
+67.00	PROP. OVERLOT GRADE SPOT ELEV.
(67.00)	PROP. FINISHED GRADE SPOT ELEV.
A	"A" DRAINAGE LOT
B	"B" DRAINAGE LOT
T	TRANSITION LOT

(IN FEET)
1 inch = 50 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
OVERLOT GRADING

DATE
03/19/20

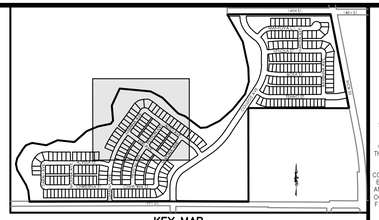
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 9

CAD FILE: 19003254-OVERALL GRADING.DWG



KEY MAP
N.T.S.

LEGEND

	PROPERTY BOUNDARY LINE
	EXISTING CURB & GUTTER
	PROPOSED CURB & GUTTER
	PROPOSED CONTOURS
	EXISTING CONTOURS
	FLOW DIRECTION
+67.00	PROP. OVERLOT GRADE SPOT ELEV.
(67.00)	PROP. FINISHED GRADE SPOT ELEV.
A	"A" DRAINAGE LOT
B	"B" DRAINAGE LOT
T	TRANSITION LOT

(IN FEET)
1 inch = 50 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR. NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
OVERLOT GRADING

DATE
03/19/20

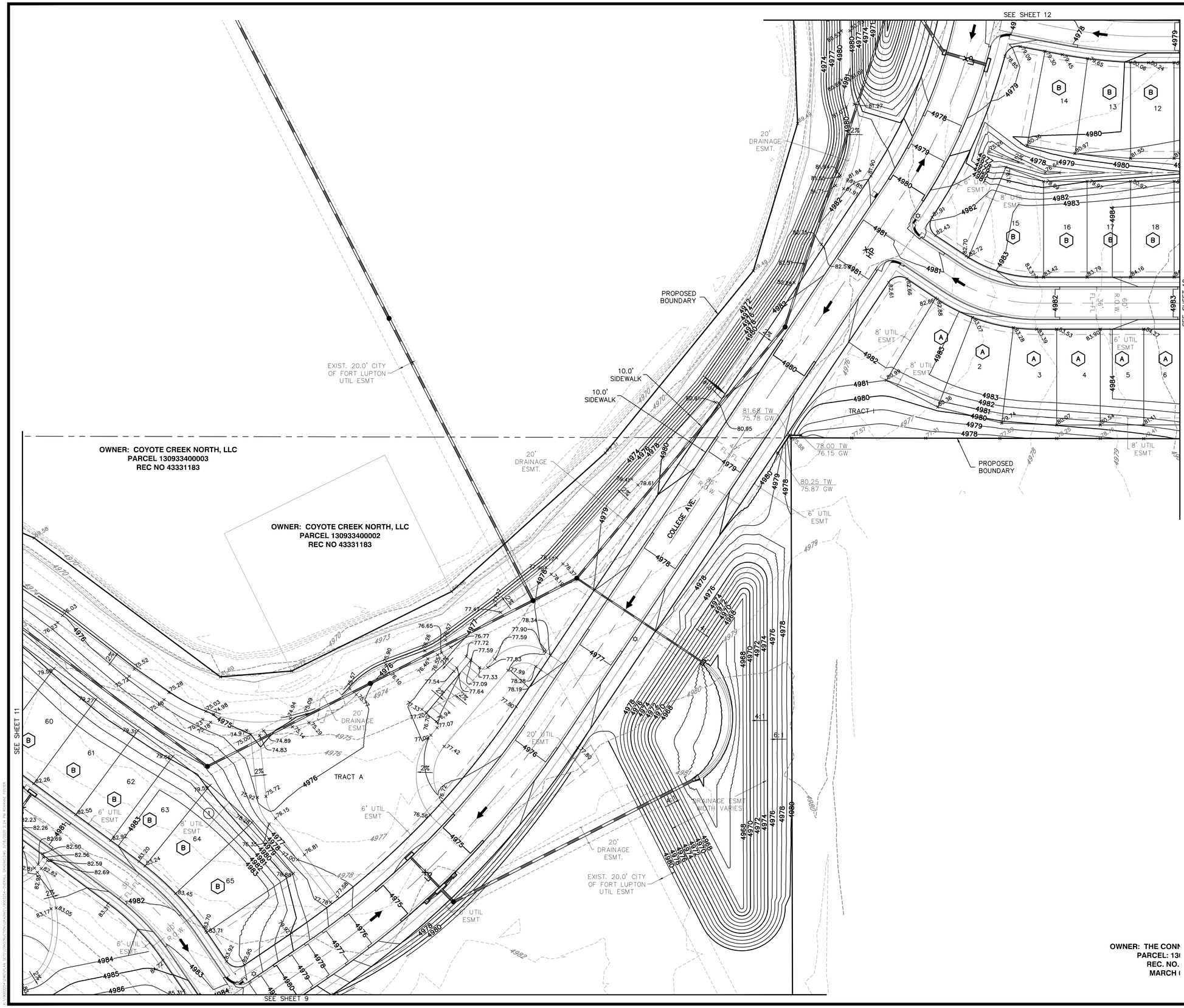
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

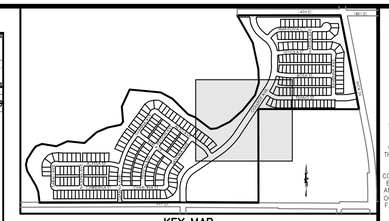
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 10

CAD FILE: 19003254-OVERALL GRADING.DWG





KEY MAP
N.T.S.

LEGEND

	PROPERTY BOUNDARY LINE
	EXISTING CURB & GUTTER
	PROPOSED CURB & GUTTER
	PROPOSED CONTOURS
	EXISTING CONTOURS
	FLOW DIRECTION
+67.00	PROP. OVERLOT GRADE SPOT ELEV.
(67.00)	PROP. FINISHED GRADE SPOT ELEV.
A	"A" DRAINAGE LOT
B	"B" DRAINAGE LOT
T	TRANSITION LOT

(IN FEET)
1 inch = 50 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

OWNER: THE CONN
PARCEL: 13
REC. NO.
MARCH

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
OVERLOT GRADING

DATE
03/19/20

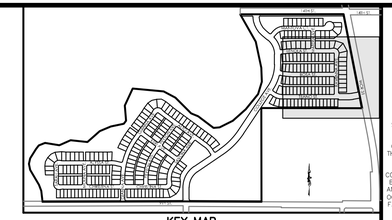
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 11

CAD FILE: 19003254-OVERALL GRADING.DWG



KEY MAP
N.T.S.

LEGEND

	PROPERTY BOUNDARY LINE
	EXISTING CURB & GUTTER
	PROPOSED CURB & GUTTER
	PROPOSED CONTOURS
	EXISTING CONTOURS
	FLOW DIRECTION
+67.00	PROP. OVERLOT GRADE SPOT ELEV.
(67.00)	PROP. FINISHED GRADE SPOT ELEV.
A	"A" DRAINAGE LOT
B	"B" DRAINAGE LOT
T	TRANSITION LOT

50 0 50 100
(IN FEET)
1 inch = 50 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
OVERLOT GRADING

DATE 03/19/20

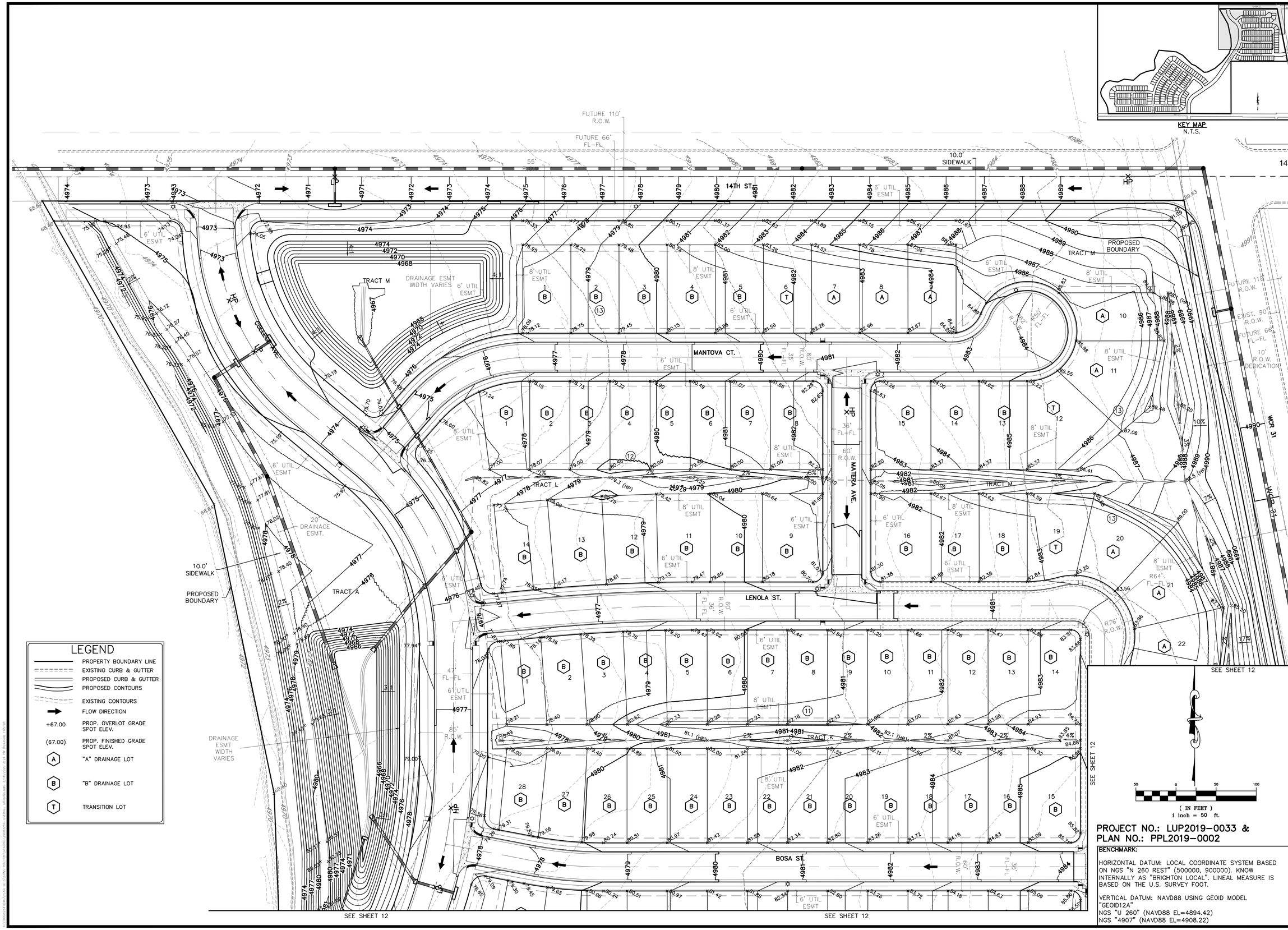
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 12

CAD FILE: 19003254-OVERALL GRADING.DWG



LEGEND

- PROPERTY BOUNDARY LINE
- EXISTING CURB & GUTTER
- PROPOSED CURB & GUTTER
- PROPOSED CONTOURS
- EXISTING CONTOURS
- FLOW DIRECTION
- +67.00 PROP. OVERLOT GRADE SPOT ELEV.
- (67.00) PROP. FINISHED GRADE SPOT ELEV.
- (A) "A" DRAINAGE LOT
- (B) "B" DRAINAGE LOT
- (T) TRANSITION LOT

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
OVERLOT GRADING

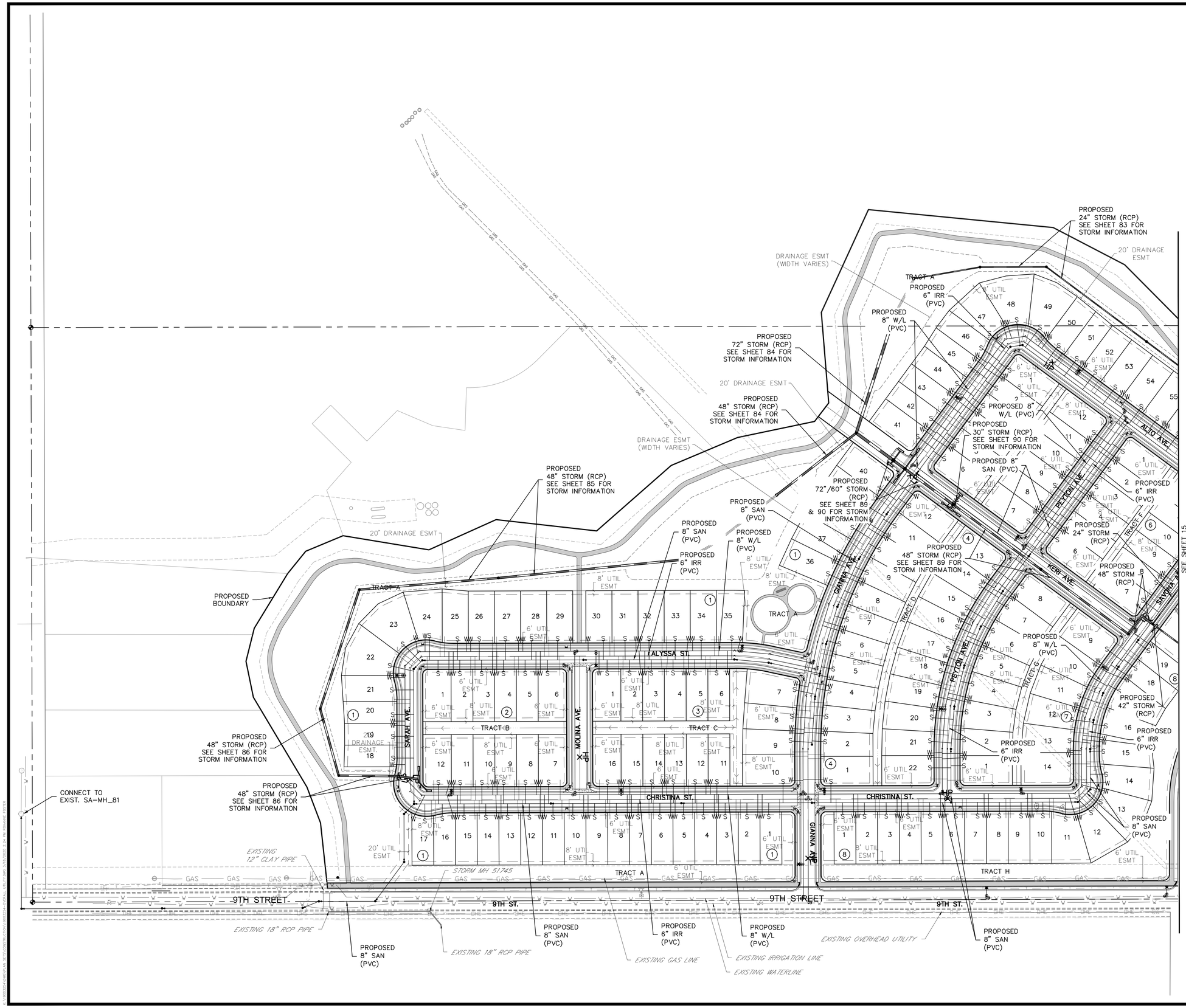
DATE 03/19/20

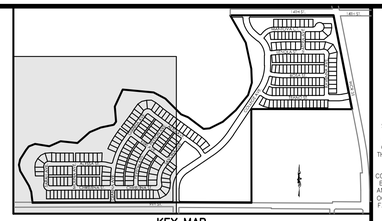
REVISIONS	
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 13

CAD FILE: 19003254-OVERALL GRADING.DWG





KEY MAP
N.T.S.

LEGEND

- PROPERTY BOUNDARY
- PROPOSED RIGHT-OF-WAY
- EXISTING RIGHT-OF-WAY
- PROPOSED LOT LINE
- EXISTING LOT LINE
- PROPOSED CURB & GUTTER
- EXISTING CURB & GUTTER
- PROPOSED SIDEWALK
- EXISTING SIDEWALK
- EXISTING SECTION LINE
- PROPOSED EASEMENT
- EXISTING EASEMENT
- PROPOSED SANITARY
- SS — EXISTING SANITARY
- S — PROPOSED SANITARY SERVICE
- PROPOSED STORM
- EXISTING STORM
- PROPOSED WATER
- W — W — EXISTING WATER
- W — PROPOSED WATER SERVICE
- PROPOSED HYDRANT
- EXISTING HYDRANT
- PROPOSED WATER VALVE

(IN FEET)
1 inch = 100 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
OVERALL UTILITY

DATE
03/19/20

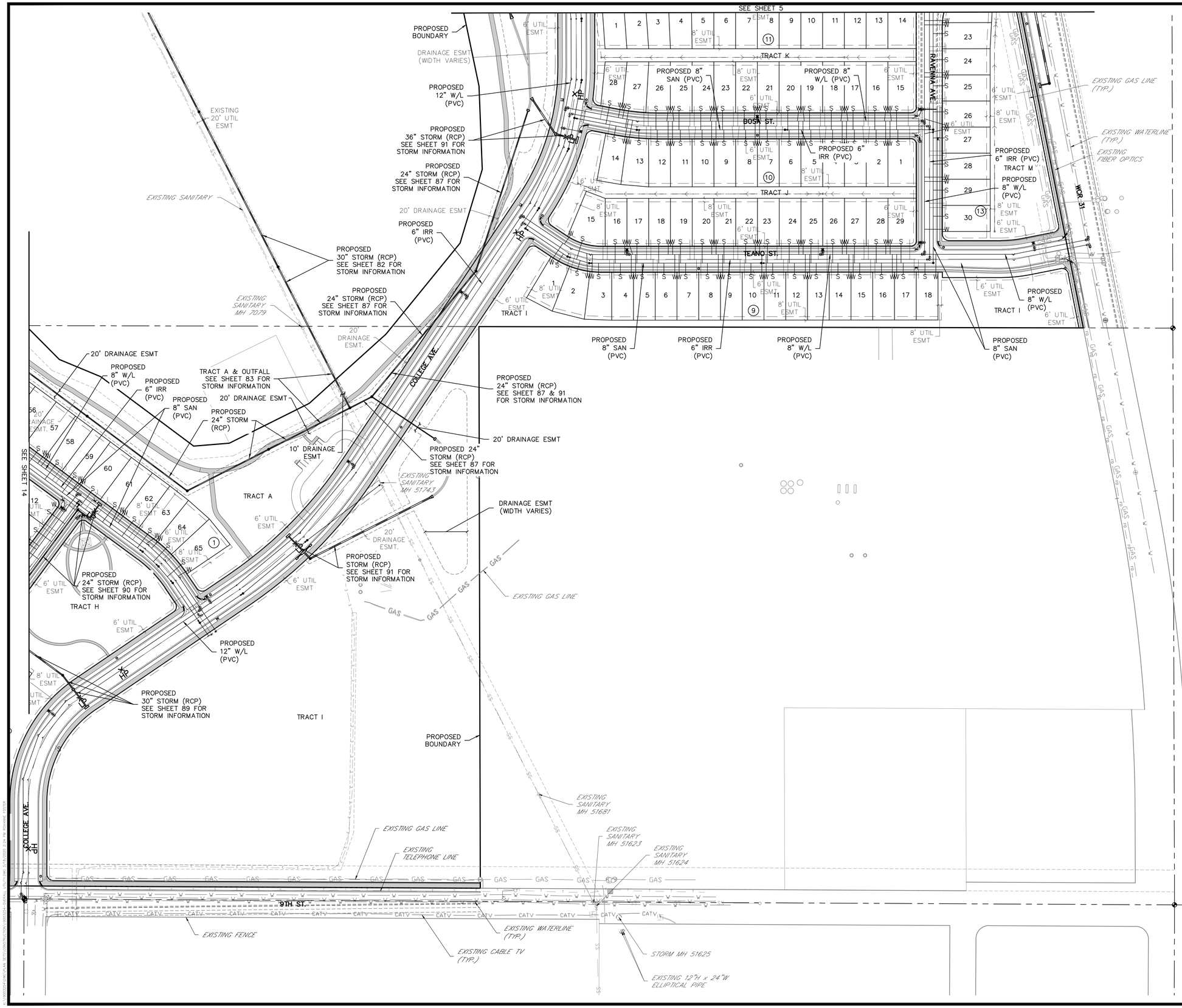
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

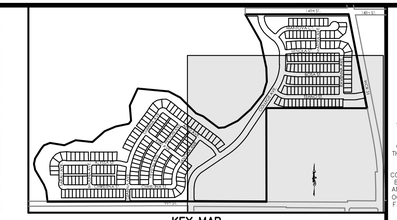
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR.	RF	CH.	MAM
P.M.	MAM		
JOB	19003254		
SHEET NO.	14		

CAD FILE: 19003254-OVERALL UTILITY.DWG





KEY MAP
N.T.S.

LEGEND

- PROPERTY BOUNDARY
- PROPOSED RIGHT-OF-WAY
- EXISTING RIGHT-OF-WAY
- PROPOSED LOT LINE
- EXISTING LOT LINE
- PROPOSED CURB & GUTTER
- EXISTING CURB & GUTTER
- PROPOSED SIDEWALK
- EXISTING SIDEWALK
- EXISTING SECTION LINE
- PROPOSED EASEMENT
- EXISTING EASEMENT
- PROPOSED SANITARY
- EXISTING SANITARY
- PROPOSED SANITARY SERVICE
- PROPOSED STORM
- EXISTING STORM
- PROPOSED WATER
- EXISTING WATER
- PROPOSED WATER SERVICE
- PROPOSED HYDRANT
- EXISTING HYDRANT
- PROPOSED WATER VALVE

(IN FEET)
1 inch = 100 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
ARBOR CAPITAL PARTNERS, LLC
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
OVERALL UTILITY

DATE 03/19/20

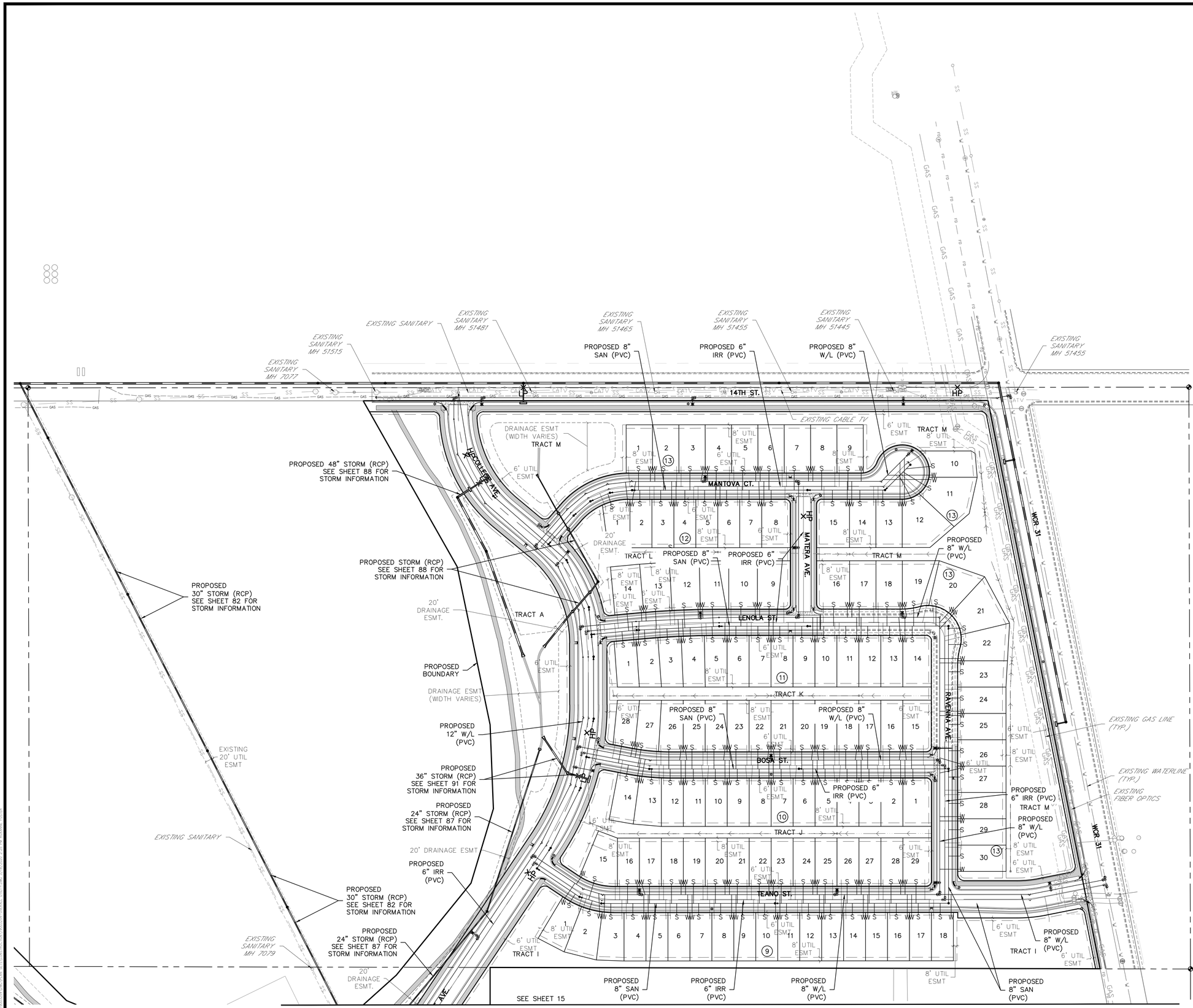
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

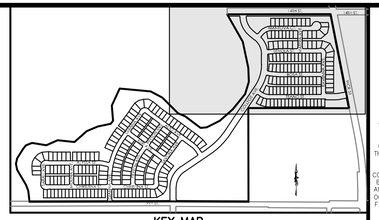
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 15

CAD FILE: 19003254-OVERALL UTILITY.DWG





KEY MAP
N.T.S.

LEGEND

- PROPERTY BOUNDARY
- PROPOSED RIGHT-OF-WAY
- EXISTING RIGHT-OF-WAY
- PROPOSED LOT LINE
- EXISTING LOT LINE
- PROPOSED CURB & GUTTER
- EXISTING CURB & GUTTER
- PROPOSED SIDEWALK
- EXISTING SIDEWALK
- EXISTING SECTION LINE
- PROPOSED EASEMENT
- EXISTING EASEMENT
- PROPOSED SANITARY
- SS — EXISTING SANITARY
- S — PROPOSED SANITARY SERVICE
- PROPOSED STORM
- EXISTING STORM
- PROPOSED WATER
- W — W — EXISTING WATER
- W — PROPOSED WATER SERVICE
- PROPOSED HYDRANT
- EXISTING HYDRANT
- PROPOSED WATER VALVE

(IN FEET)
1 inch = 100 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT: ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
OVERALL UTILITY

DATE 03/19/20

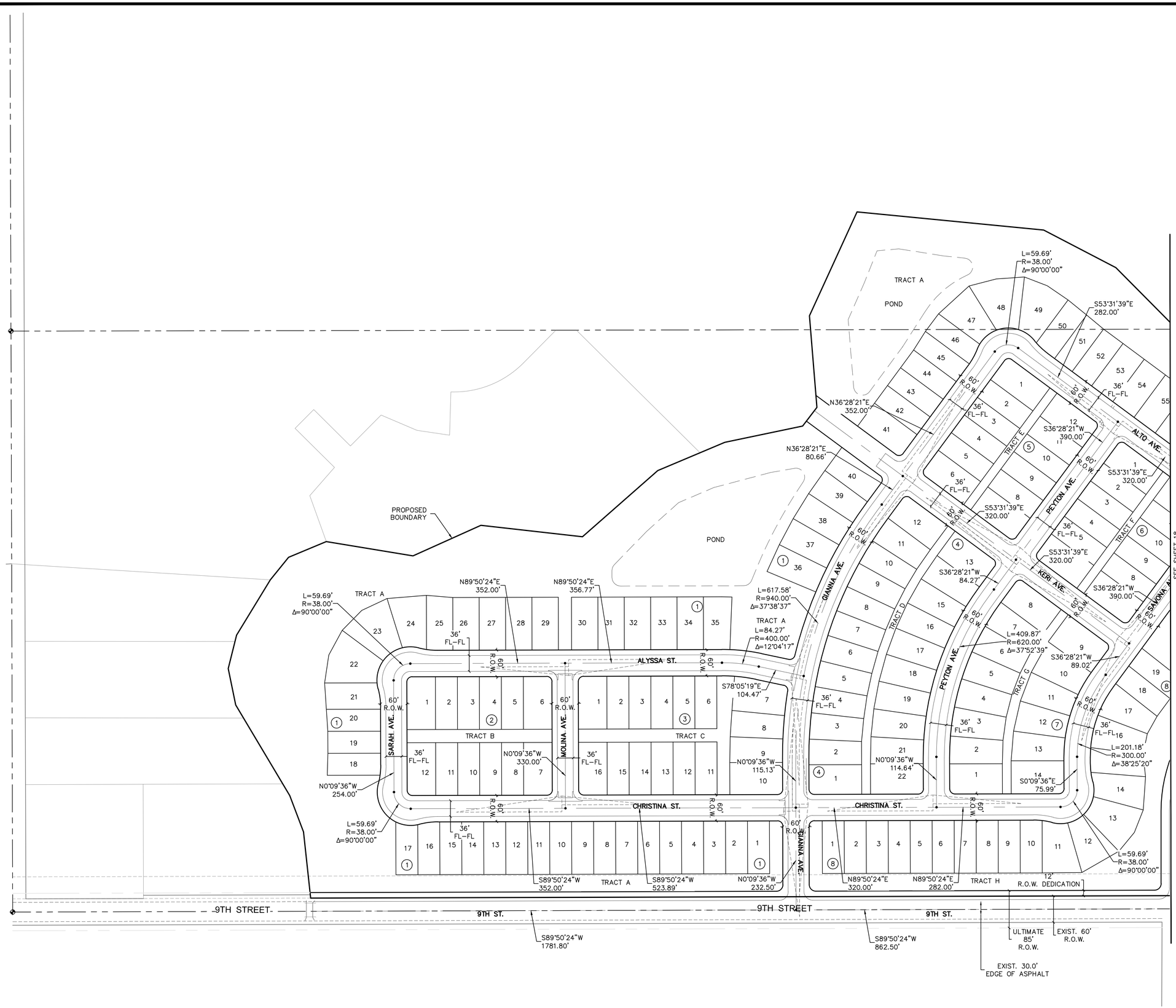
A	1st SUBMITTAL TO FT. LUPTON	03/19/2020 – MAM

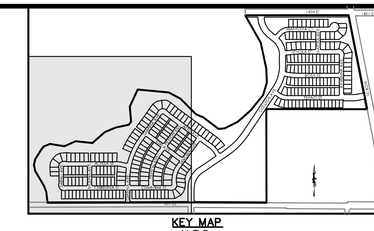
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

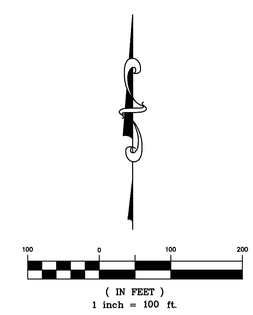
DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 16

CAD FILE: 19003254-OVERALL UTILITY.DWG





KEY MAP
N.T.S.



PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
OVERALL HORIZONTAL CONTROL

DATE
03/19/20

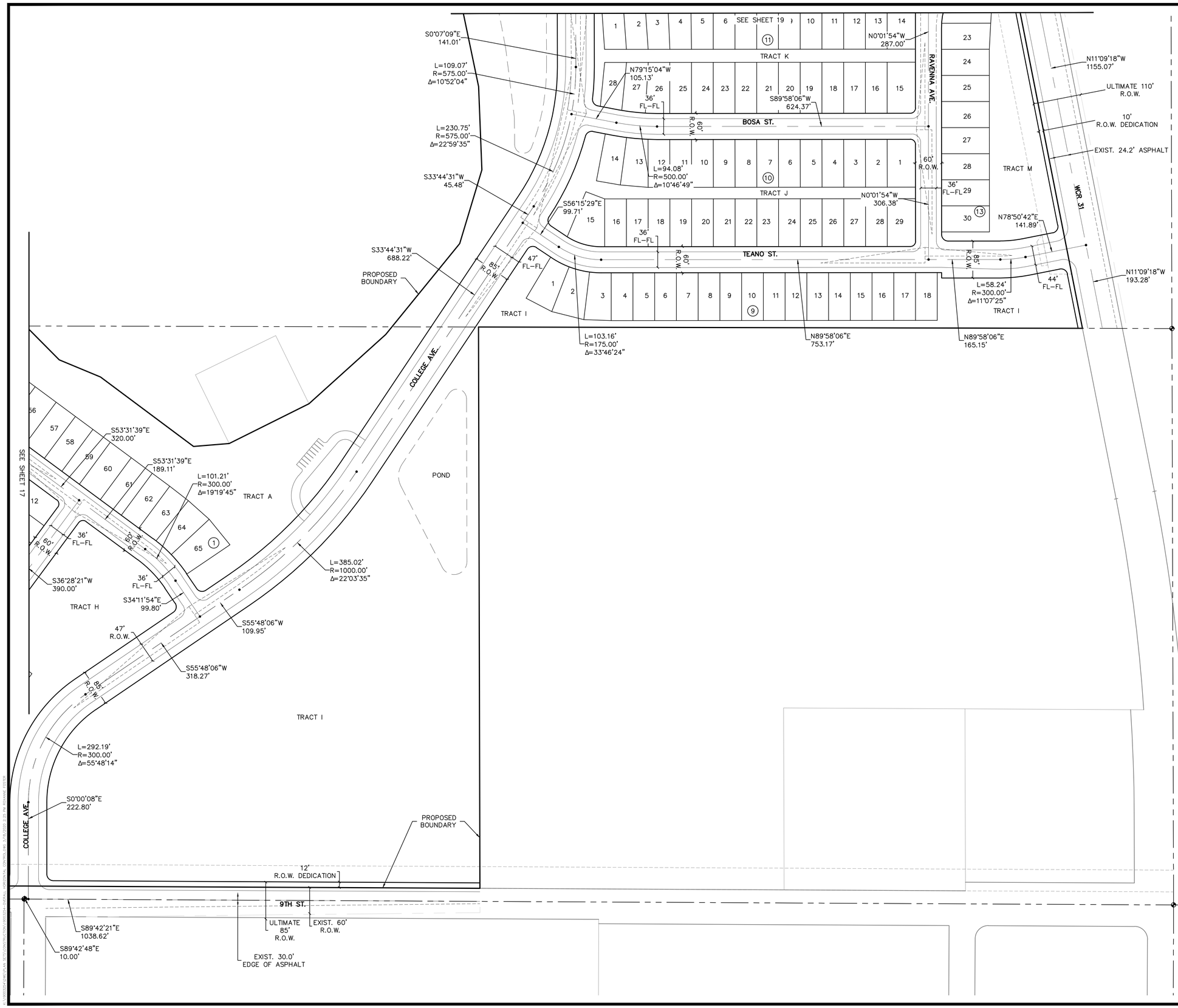
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

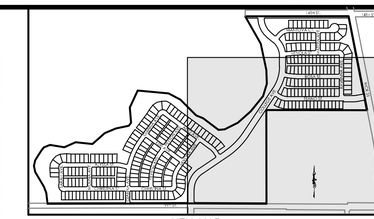
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 17

CAD FILE: 19003254-OVERALL HORIZONTAL CONTROL.DWG





KEY MAP
N.T.S.

(IN FEET)
1 inch = 100 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's **below.** **Call** before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
OVERALL HORIZONTAL CONTROL

DATE 03/19/20

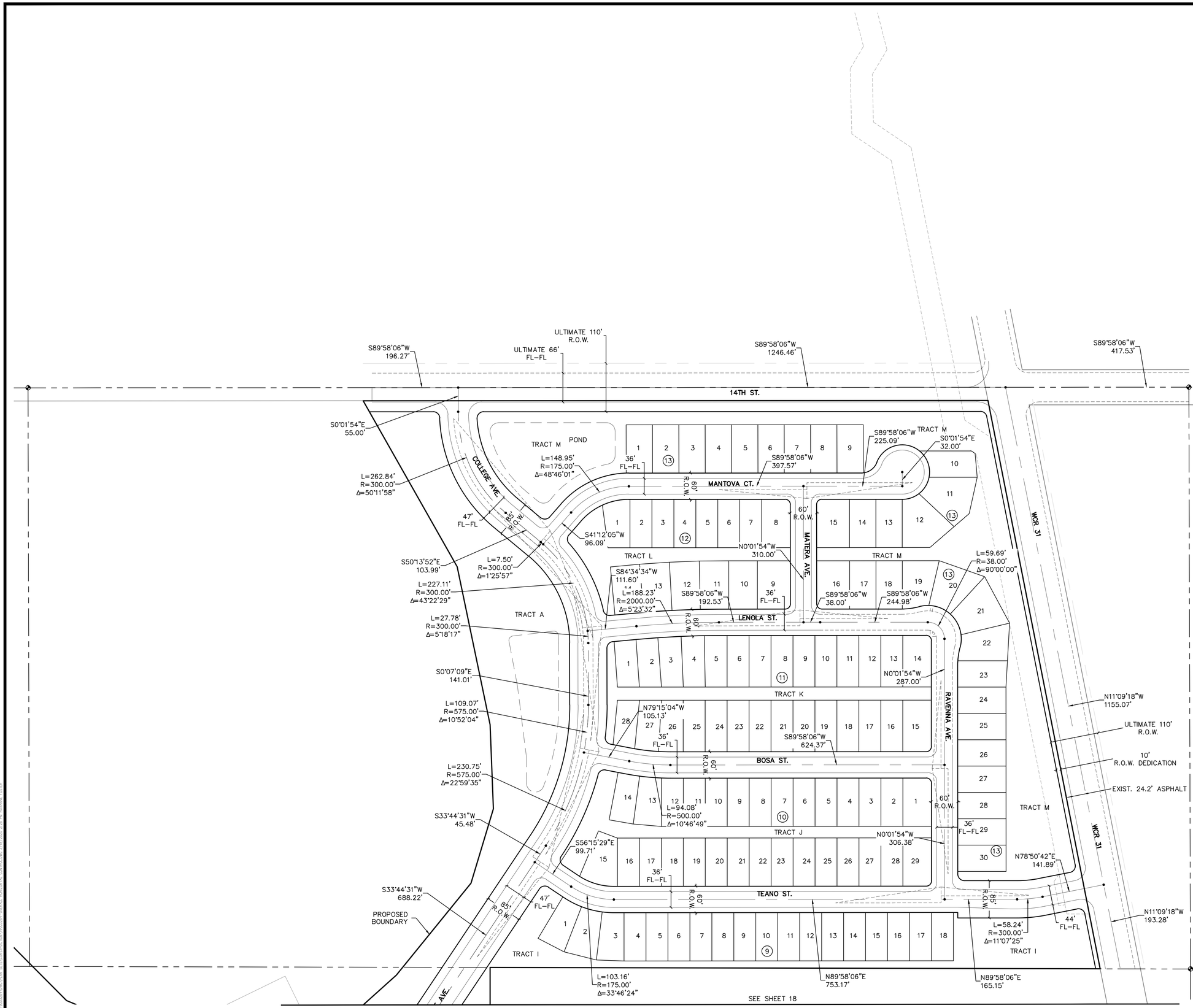
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

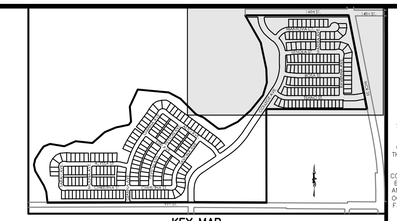
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 18

CAD FILE: 19003254-OVERALL HORIZONTAL CONTROL.DWG





KEY MAP
N.T.S.

(IN FEET)
1 inch = 100 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS

OVERALL HORIZONTAL CONTROL

DATE 03/19/20

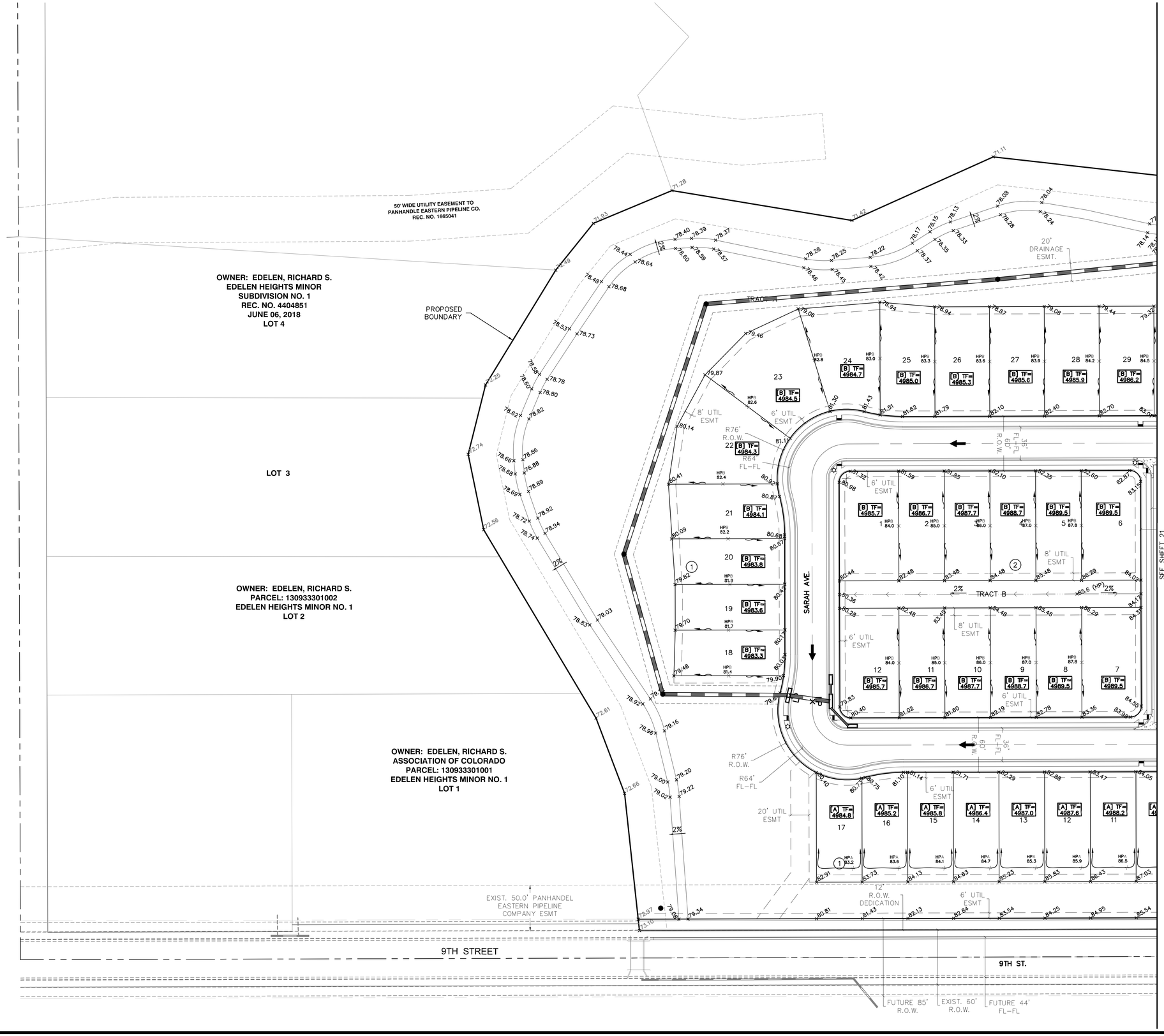
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

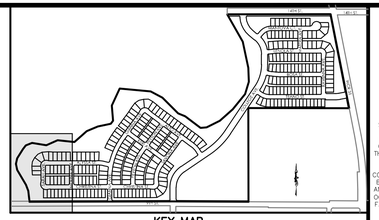
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 19

CAD FILE: 19003254-OVERALL HORIZONTAL CONTROL.DWG





KEY MAP
N.T.S.

LEGEND

- PROPERTY BOUNDARY LINE
- EXISTING CURB & GUTTER
- PROPOSED CURB & GUTTER
- FLOW DIRECTION
- +12.00 — PROP. FINISHED GRADE SPOT ELEV.
- [A] [B] [T] — LOT TYPE (SEE KEY BELOW)
- [B] TF= 5200.0 — TOP OF FOUNDATION ELEVATION
- [A] — "A" DRAINAGE LOT
- [B] — "B" DRAINAGE LOT
- [T] — TRANSITION LOT
- 30.5 TW / 30.4 GW — TW=TOP OF WALL ELEVATION, GW=BOTTOM OF WALL ELEVATION

NOTES:

1. ALL ELEVATIONS SHOWN ON THIS PLAN ARE FINISHED GRADE, UNLESS NOTED OTHERWISE.
2. TOP OF FOUNDATION ELEVATIONS SHOWN ARE MINIMUM.
3. ALL GRASS-LINED DRAINAGE SWALES TO BE 2.00% MINIMUM.
4. OWNER/CONTRACTOR MUST OBTAIN N.P.D.E.S. STORM WATER DISCHARGE PERMIT FROM CO. DEPT. OF HEALTH IF REQUIRED.
5. HOUSES MAY REQUIRE STEPS BETWEEN GARAGE SLAB & FINISHED FLOOR OF HOME. NUMBER OF STEPS TO BE DETERMINED DURING PLOT PLAN PREPARATION. REFER TO PLOT PLAN FOR FINAL DRIVEWAY AND WALK INFORMATION.

50 0 50 100
(IN FEET)
1 inch = 50 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
DETAIL GRADING

DATE 03/19/20

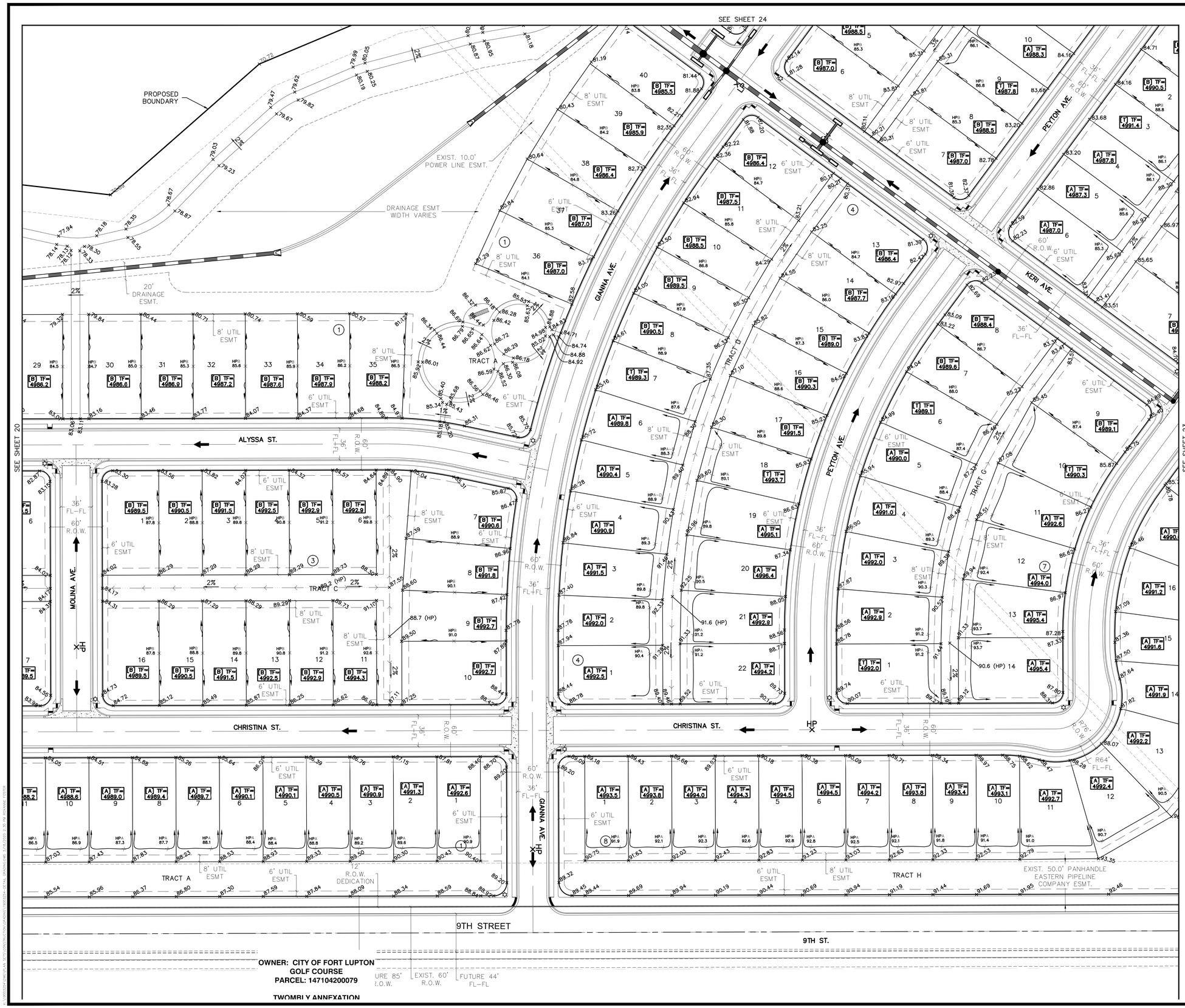
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

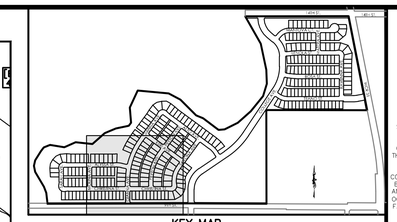
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 20

CAD FILE: 19003254-DETAIL GRADING.DWG





KEY MAP
N.T.S.

LEGEND

	PROPERTY BOUNDARY LINE
	EXISTING CURB & GUTTER
	PROPOSED CURB & GUTTER
	FLOW DIRECTION
+12.00	PROP. FINISHED GRADE SPOT ELEV.
[T] TF= 5200.0	LOT TYPE (SEE KEY BELOW) / TOP OF FOUNDATION ELEVATION
[A]	"A" DRAINAGE LOT
[B]	"B" DRAINAGE LOT
[T]	TRANSITION LOT
30.5 TW 30.4 GW	TW=TOP OF WALL ELEVATION GW=BOTTOM OF WALL ELEVATION

NOTES:

1. ALL ELEVATIONS SHOWN ON THIS PLAN ARE FINISHED GRADE, UNLESS NOTED OTHERWISE.
2. TOP OF FOUNDATION ELEVATIONS SHOWN ARE MINIMUM.
3. ALL GRASS-LINED DRAINAGE SWALES TO BE 2.00% MINIMUM.
4. OWNER/CONTRACTOR MUST OBTAIN N.P.D.E.S. STORM WATER DISCHARGE PERMIT FROM CO. DEPT. OF HEALTH IF REQUIRED.
5. HOUSES MAY REQUIRE STEPS BETWEEN GARAGE SLAB & FINISHED FLOOR OF HOME. NUMBER OF STEPS TO BE DETERMINED DURING PLOT PLAN PREPARATION. REFER TO PLOT PLAN FOR FINAL DRIVEWAY AND WALK INFORMATION.

50 0 50 100
(IN FEET)
1 inch = 50 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
DETAIL GRADING

DATE
03/19/20

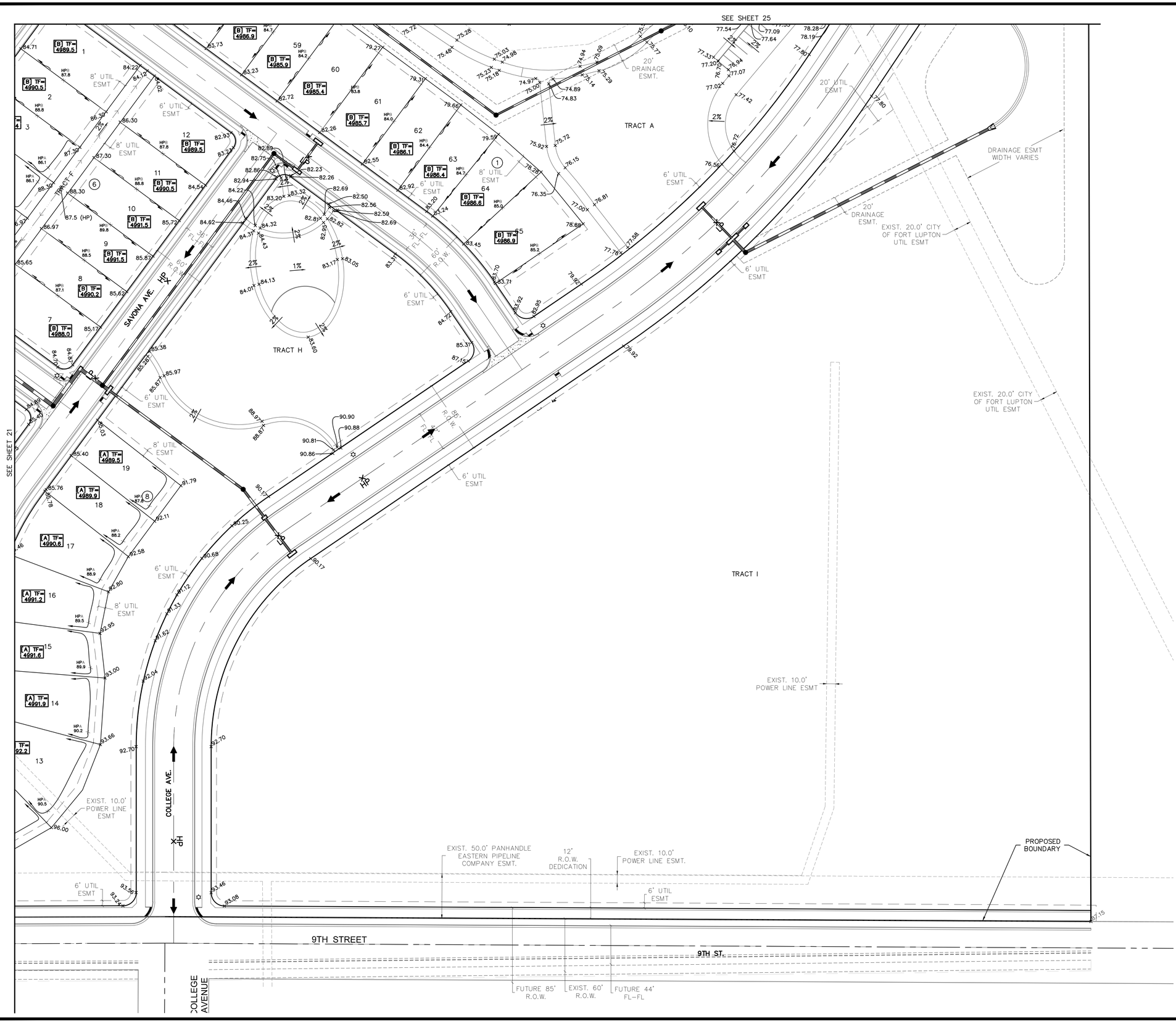
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

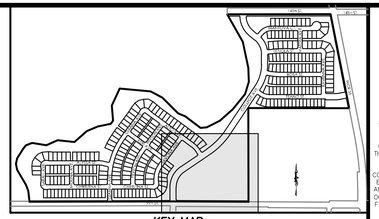
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 21

CAD FILE: 19003254-DETAIL GRADING.DWG





KEY MAP
N.T.S.

LEGEND

	PROPERTY BOUNDARY LINE
	EXISTING CURB & GUTTER
	PROPOSED CURB & GUTTER
	FLOW DIRECTION
+12.00	PROP. FINISHED GRADE SPOT ELEV.
[B] TF= 3200.0	LOT TYPE (SEE KEY BELOW) / TOP OF FOUNDATION ELEVATION
[A]	"A" DRAINAGE LOT
[B]	"B" DRAINAGE LOT
[T]	TRANSITION LOT
30.5 TW 30.4 GW	TW=TOP OF WALL ELEVATION GW=BOTTOM OF WALL ELEVATION

NOTES:

1. ALL ELEVATIONS SHOWN ON THIS PLAN ARE FINISHED GRADE, UNLESS NOTED OTHERWISE.
2. TOP OF FOUNDATION ELEVATIONS SHOWN ARE MINIMUM.
3. ALL GRASS-LINED DRAINAGE SWALES TO BE 2.00% MINIMUM.
4. OWNER/CONTRACTOR MUST OBTAIN N.P.D.E.S. STORM WATER DISCHARGE PERMIT FROM CO. DEPT. OF HEALTH IF REQUIRED.
5. HOUSES MAY REQUIRE STEPS BETWEEN GARAGE SLAB & FINISHED FLOOR OF HOME. NUMBER OF STEPS TO BE DETERMINED DURING PLOT PLAN PREPARATION. REFER TO PLOT PLAN FOR FINAL DRIVEWAY AND WALK INFORMATION.

50 0 50 100
(IN FEET)
1 inch = 50 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
DETAIL GRADING

DATE 03/19/20

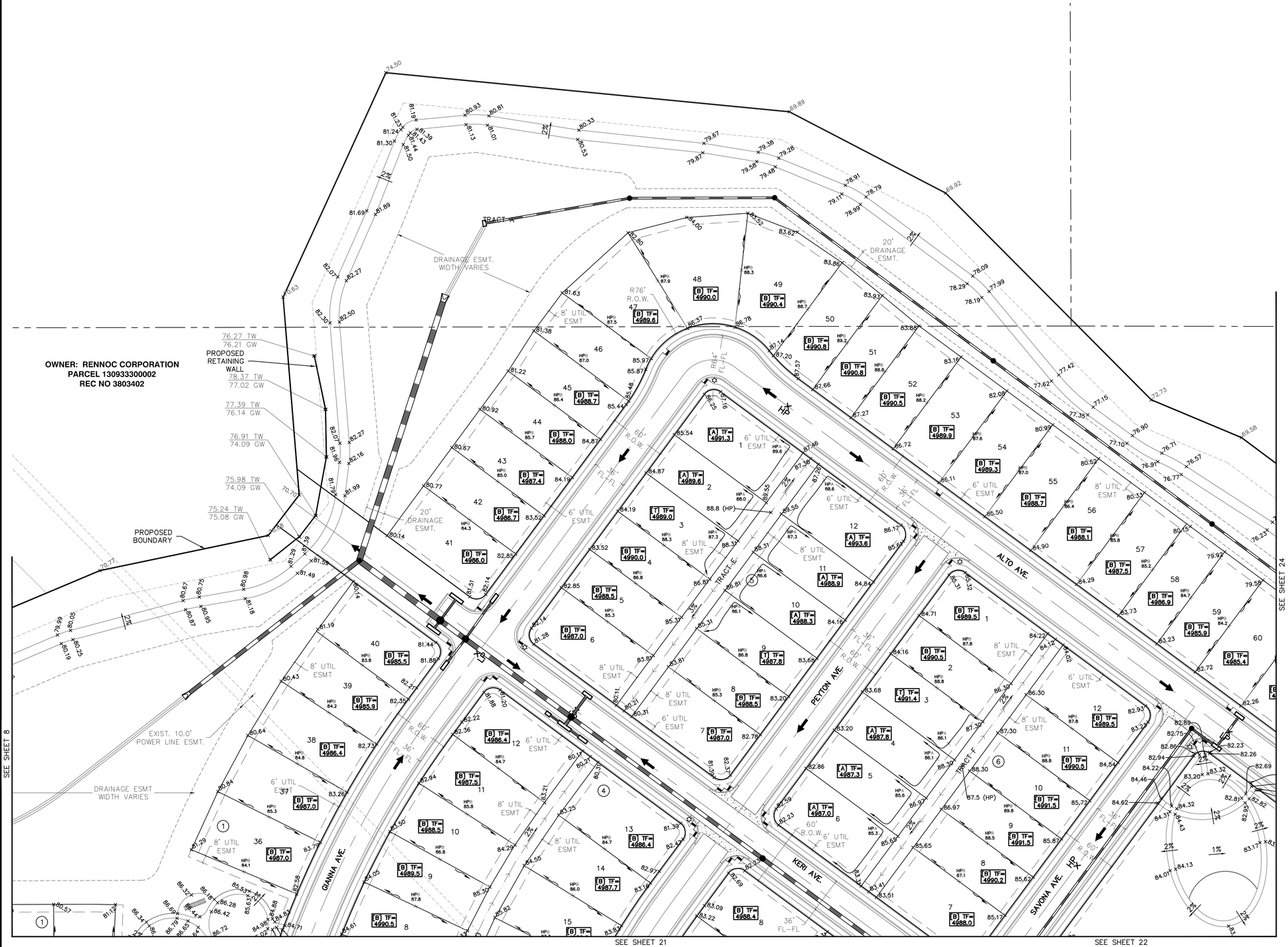
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

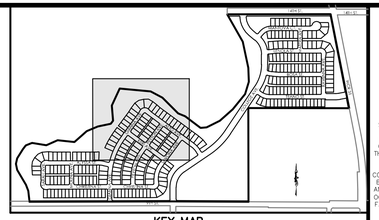
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 22

CAD FILE: 19003254-DETAIL GRADING.DWG





KEY MAP
N.T.S.

LEGEND

	PROPERTY BOUNDARY LINE
	EXISTING CURB & GUTTER
	PROPOSED CURB & GUTTER
	FLOW DIRECTION
+12.00	PROP. FINISHED GRADE SPOT ELEV.
[T] TF= 5200.0	LOT TYPE (SEE KEY BELOW) / TOP OF FOUNDATION ELEVATION
[A]	"A" DRAINAGE LOT
[B]	"B" DRAINAGE LOT
[T]	TRANSITION LOT
30.5 TW 30.4 GW	TW=TOP OF WALL ELEVATION GW=BOTTOM OF WALL ELEVATION

NOTES:

1. ALL ELEVATIONS SHOWN ON THIS PLAN ARE FINISHED GRADE, UNLESS NOTED OTHERWISE.
2. TOP OF FOUNDATION ELEVATIONS SHOWN ARE MINIMUM.
3. ALL GRASS-LINED DRAINAGE SWALES TO BE 2.00% MINIMUM.
4. OWNER/CONTRACTOR MUST OBTAIN N.P.D.E.S. STORM WATER DISCHARGE PERMIT FROM CO. DEPT. OF HEALTH IF REQUIRED.
5. HOUSES MAY REQUIRE STEPS BETWEEN GARAGE SLAB & FINISHED FLOOR OF HOME. NUMBER OF STEPS TO BE DETERMINED DURING PLOT PLAN PREPARATION. REFER TO PLOT PLAN FOR FINAL DRIVEWAY AND WALK INFORMATION.

50 0 50 100
(IN FEET)
1 inch = 50 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
DETAIL GRADING

DATE 03/19/20

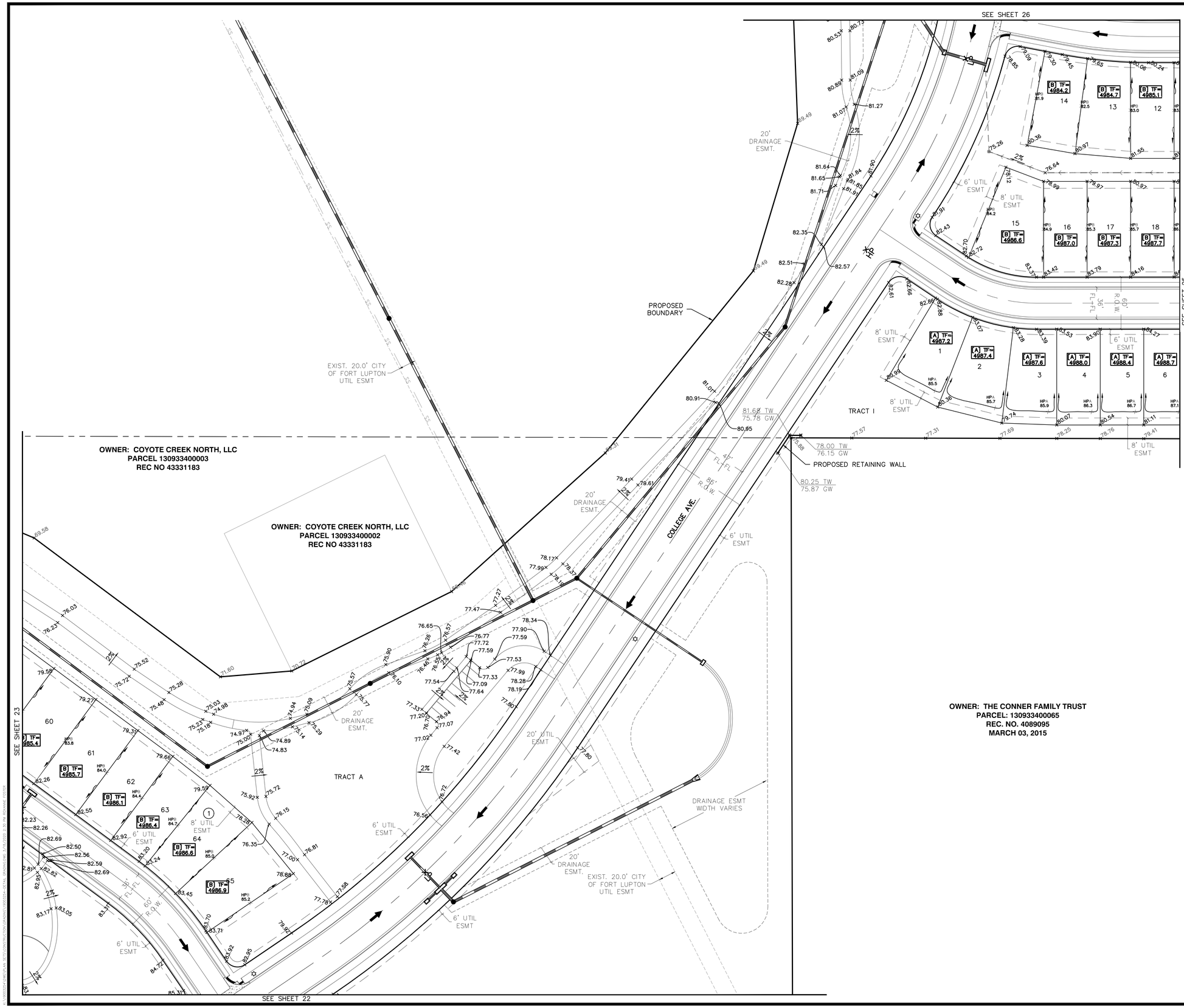
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

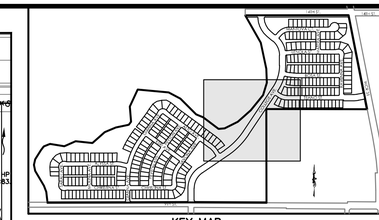
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF	CH. MAM
P.M. MAM	
JOB 19003254	
SHEET NO. 23	

CAD FILE: 19003254-DETAIL GRADING.DWG





KEY MAP
N.T.S.

LEGEND

	PROPERTY BOUNDARY LINE
	EXISTING CURB & GUTTER
	PROPOSED CURB & GUTTER
	FLOW DIRECTION
+12.00	PROP. FINISHED GRADE SPOT ELEV.
[T] TF= 5200.0	LOT TYPE (SEE KEY BELOW) / TOP OF FOUNDATION ELEVATION
[A]	"A" DRAINAGE LOT
[B]	"B" DRAINAGE LOT
[T]	TRANSITION LOT
30.5 TW 30.4 GW	TW=TOP OF WALL ELEVATION GW=BOTTOM OF WALL ELEVATION

NOTES:

1. ALL ELEVATIONS SHOWN ON THIS PLAN ARE FINISHED GRADE, UNLESS NOTED OTHERWISE.
2. TOP OF FOUNDATION ELEVATIONS SHOWN ARE MINIMUM.
3. ALL GRASS-LINED DRAINAGE SWALES TO BE 2.00% MINIMUM.
4. OWNER/CONTRACTOR MUST OBTAIN N.P.D.E.S. STORM WATER DISCHARGE PERMIT FROM CO. DEPT. OF HEALTH IF REQUIRED.
5. HOUSES MAY REQUIRE STEPS BETWEEN GARAGE SLAB & FINISHED FLOOR OF HOME. NUMBER OF STEPS TO BE DETERMINED DURING PLOT PLAN PREPARATION. REFER TO PLOT PLAN FOR FINAL DRIVEWAY AND WALK INFORMATION.

(IN FEET)
1 inch = 50 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
DETAIL GRADING

DATE 03/19/20

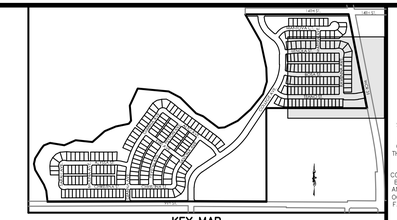
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 24

CAD FILE: 19003254-DETAIL GRADING.DWG



KEY MAP
N.T.S.

LEGEND

	PROPERTY BOUNDARY LINE
	EXISTING CURB & GUTTER
	PROPOSED CURB & GUTTER
	FLOW DIRECTION
+12.00	PROP. FINISHED GRADE SPOT ELEV.
[T] TF= 5200.0	LOT TYPE (SEE KEY BELOW) / TOP OF FOUNDATION ELEVATION
[A]	"A" DRAINAGE LOT
[B]	"B" DRAINAGE LOT
[T]	TRANSITION LOT
30.5 TW 30.4 GW	TW=TOP OF WALL ELEVATION GW=BOTTOM OF WALL ELEVATION

NOTES:

1. ALL ELEVATIONS SHOWN ON THIS PLAN ARE FINISHED GRADE, UNLESS NOTED OTHERWISE.
2. TOP OF FOUNDATION ELEVATIONS SHOWN ARE MINIMUM.
3. ALL GRASS-LINED DRAINAGE SWALES TO BE 2.00% MINIMUM.
4. OWNER/CONTRACTOR MUST OBTAIN N.P.D.E.S. STORM WATER DISCHARGE PERMIT FROM CO. DEPT. OF HEALTH IF REQUIRED.
5. HOUSES MAY REQUIRE STEPS BETWEEN GARAGE SLAB & FINISHED FLOOR OF HOME. NUMBER OF STEPS TO BE DETERMINED DURING PLOT PLAN PREPARATION. REFER TO PLOT PLAN FOR FINAL DRIVEWAY AND WALK INFORMATION.

50 0 50 100
(IN FEET)
1 inch = 50 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
DETAIL GRADING

DATE 03/19/20

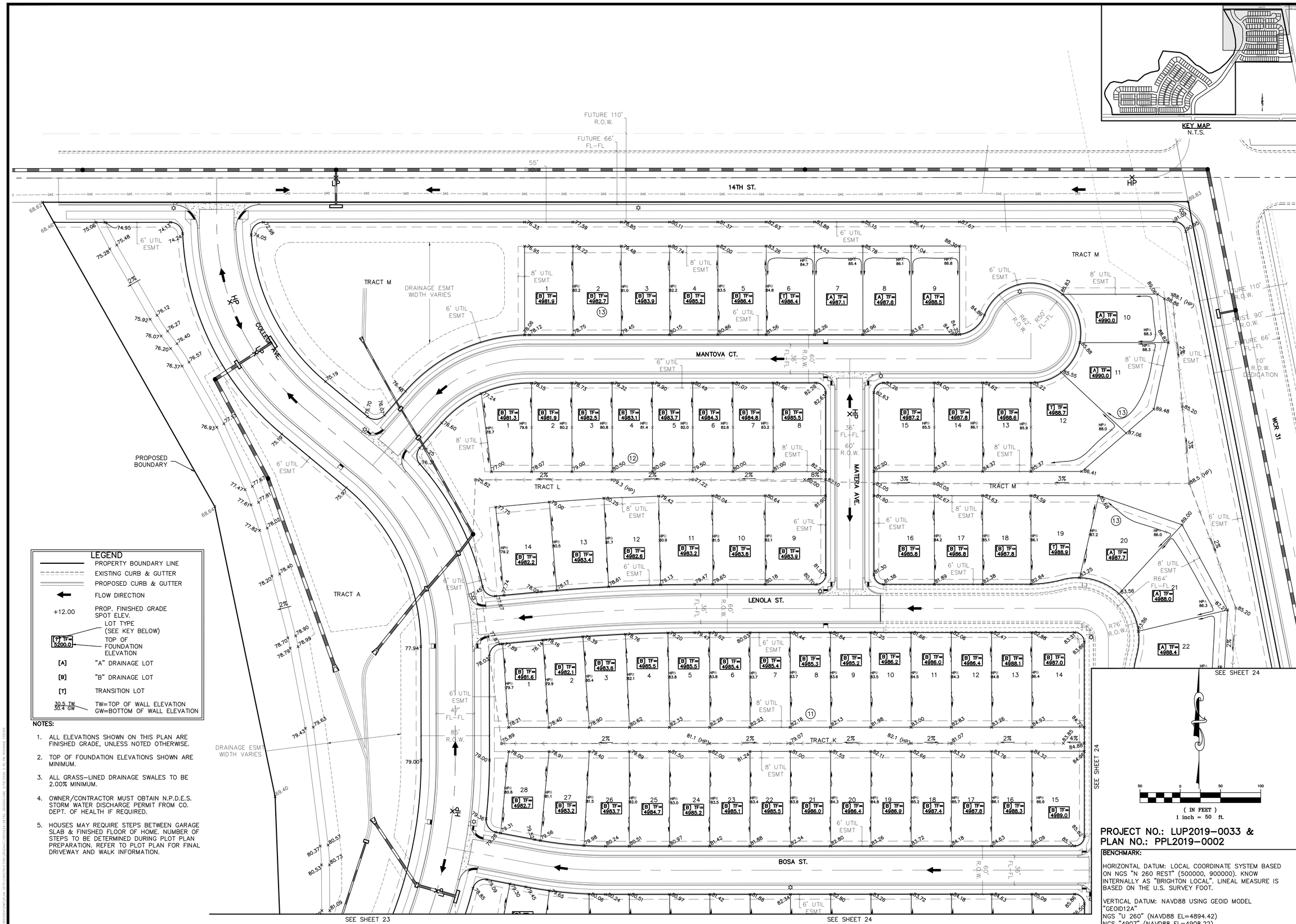
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 25

CAD FILE: 19003254-DETAIL GRADING.DWG



LEGEND

	PROPERTY BOUNDARY LINE
	EXISTING CURB & GUTTER
	PROPOSED CURB & GUTTER
	FLOW DIRECTION
+12.00	PROP. FINISHED GRADE SPOT ELEV.
[B] TF= 5200.0	LOT TYPE (SEE KEY BELOW) / TOP OF FOUNDATION ELEVATION
[A]	"A" DRAINAGE LOT
[B]	"B" DRAINAGE LOT
[T]	TRANSITION LOT
30.5 TW 30.4 GW	TW=TOP OF WALL ELEVATION GW=BOTTOM OF WALL ELEVATION

NOTES:

1. ALL ELEVATIONS SHOWN ON THIS PLAN ARE FINISHED GRADE, UNLESS NOTED OTHERWISE.
2. TOP OF FOUNDATION ELEVATIONS SHOWN ARE MINIMUM.
3. ALL GRASS-LINED DRAINAGE SWALES TO BE 2.00% MINIMUM.
4. OWNER/CONTRACTOR MUST OBTAIN N.P.D.E.S. STORM WATER DISCHARGE PERMIT FROM CO. DEPT. OF HEALTH IF REQUIRED.
5. HOUSES MAY REQUIRE STEPS BETWEEN GARAGE SLAB & FINISHED FLOOR OF HOME. NUMBER OF STEPS TO BE DETERMINED DURING PLOT PLAN PREPARATION. REFER TO PLOT PLAN FOR FINAL DRIVEWAY AND WALK INFORMATION.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
DETAIL GRADING

DATE 03/19/20

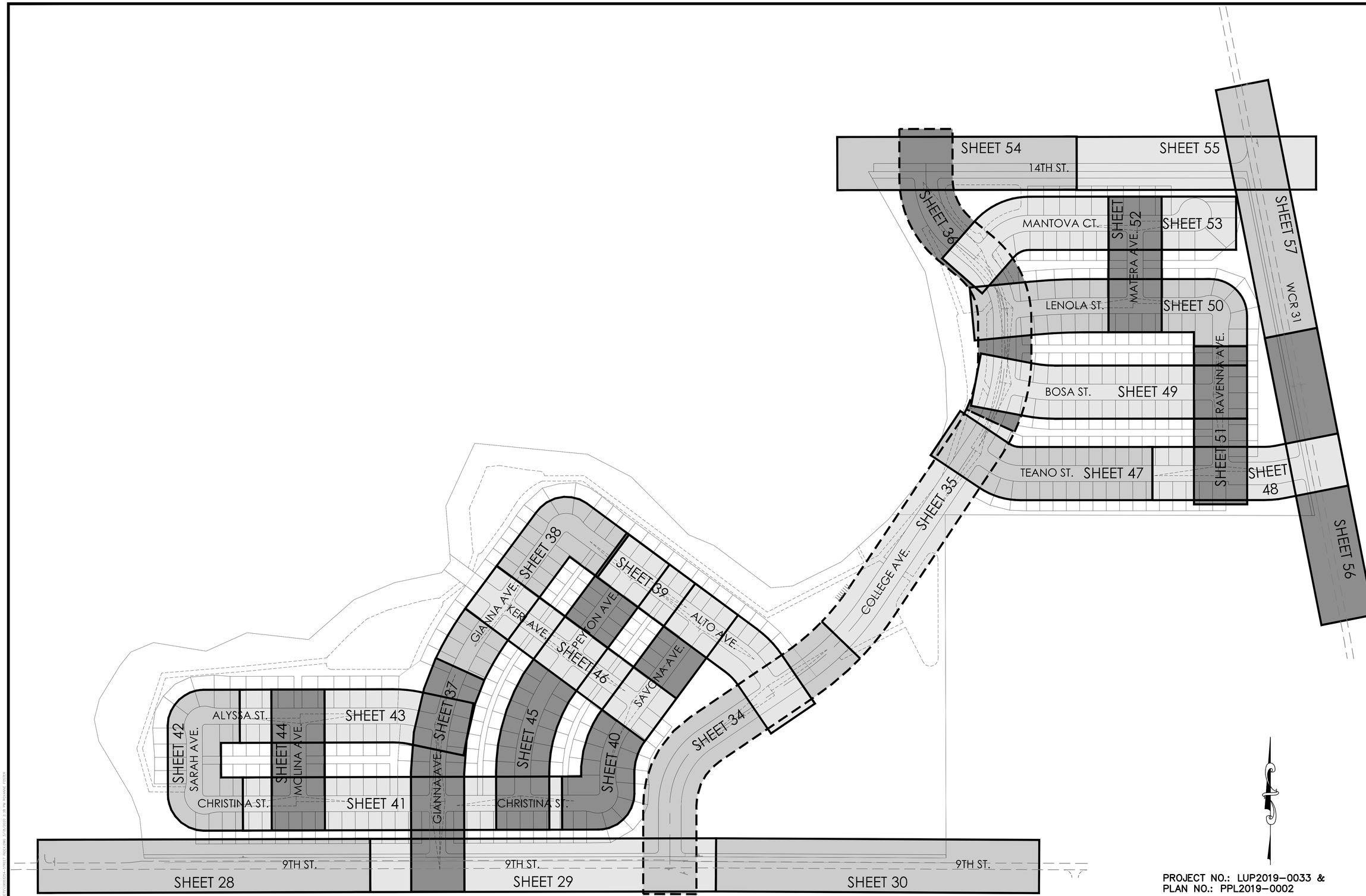
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 26

CAD FILE: 19003254-DETAIL GRADING.DWG



PROJECT NO.: LUP2019–0033 &
PLAN NO.: PPL2019–0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's **below.** **Call** before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303–905–3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
STREET INDEX

DATE
03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

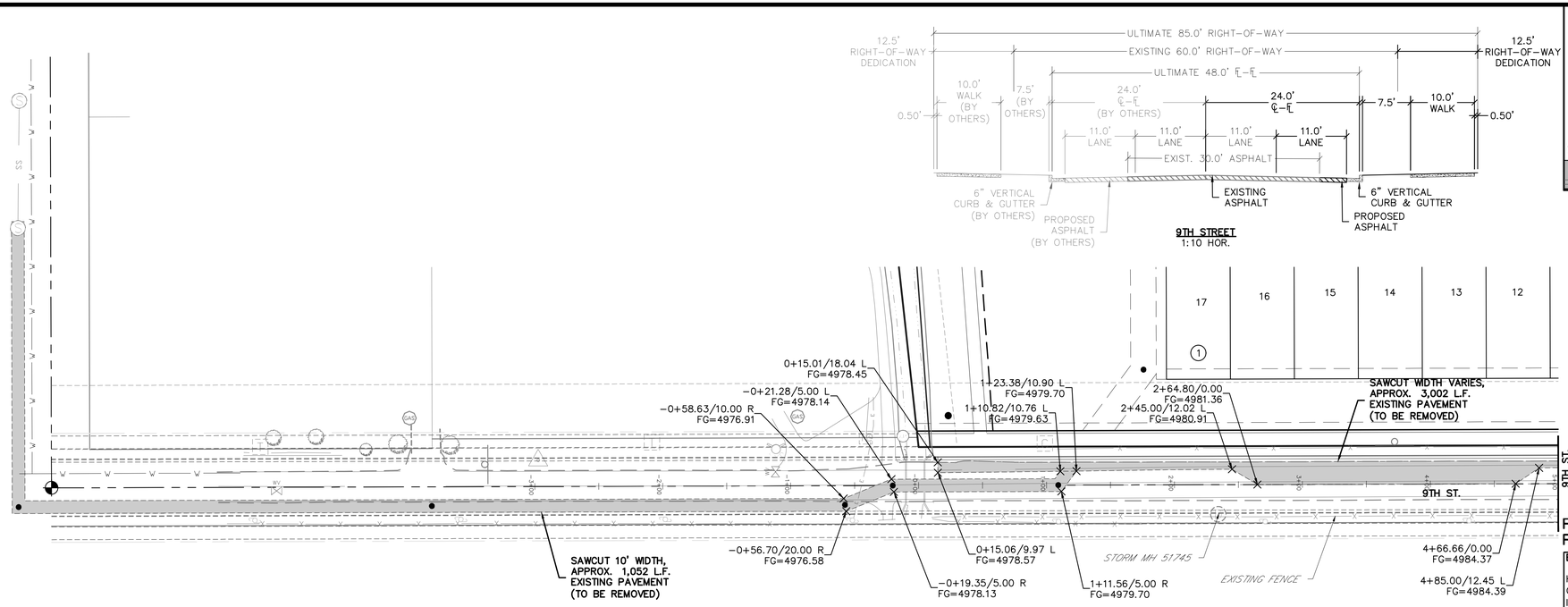
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

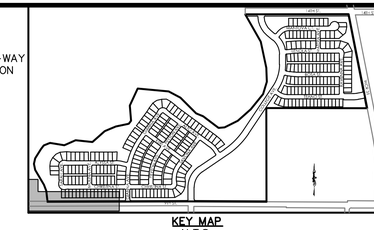
DR. RF CH. MAM
P.M. MAM

JOB 19003254
SHEET NO. 27

CAD FILE: 19003254-STREET INDEX.DWG



9TH ST.



KEY MAP
N.T.S.

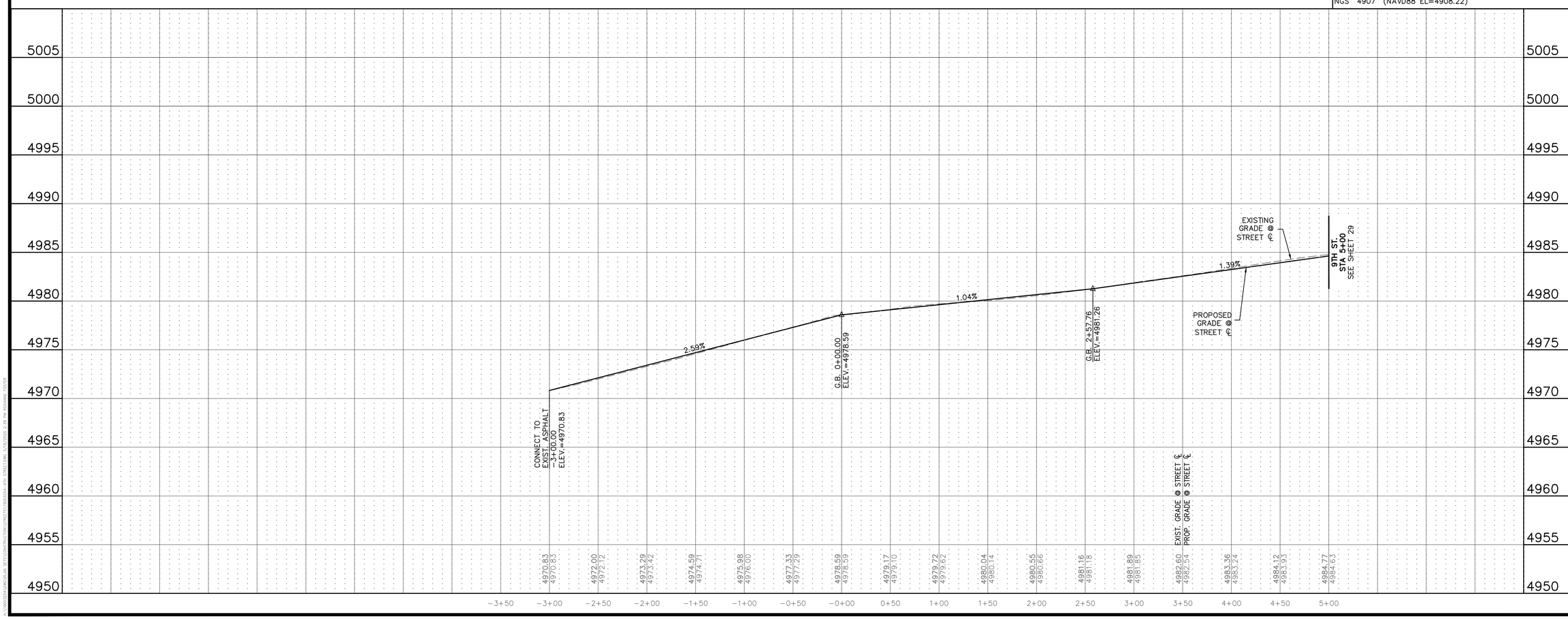
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD., SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
9TH ST.

DATE
03/19/20

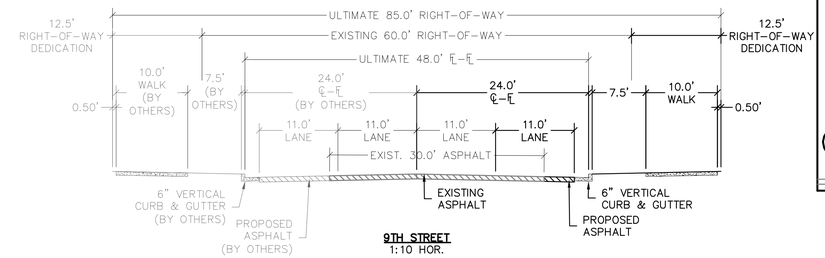
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

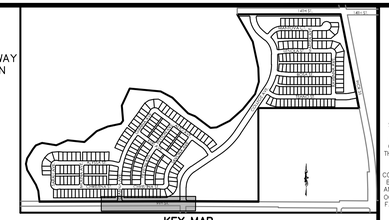
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

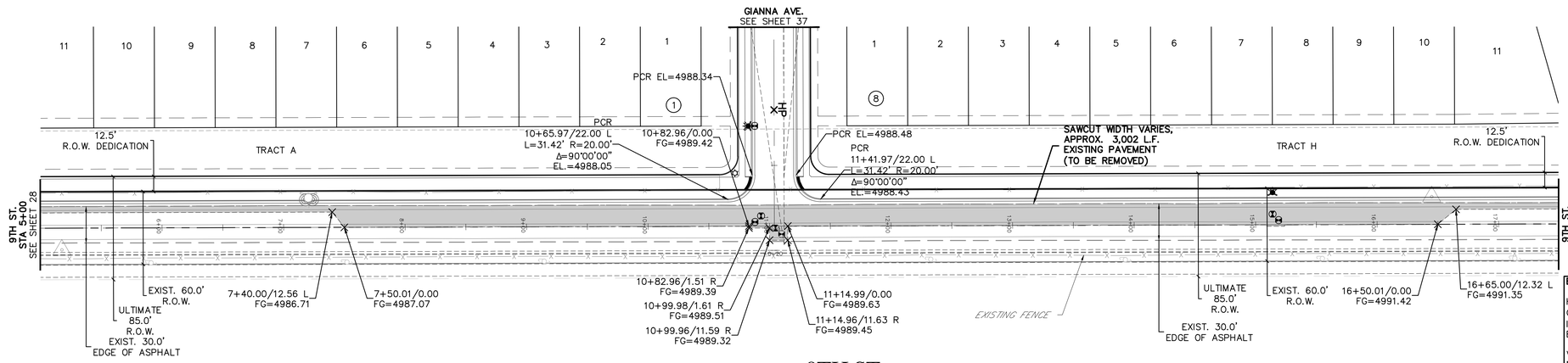
DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 28

CAD FILE: 19003254-9TH STREET.DWG





KEY MAP
N.T.S.



9TH ST.

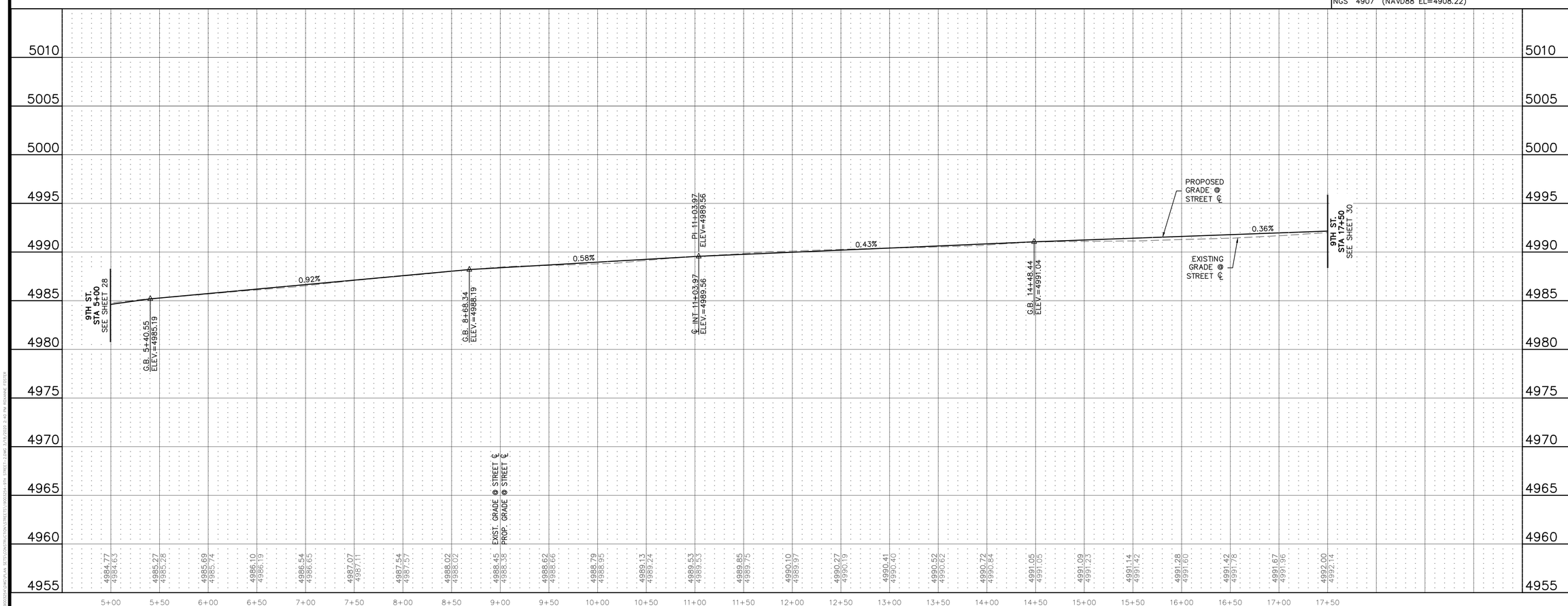
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
9TH ST.

DATE 03/19/20

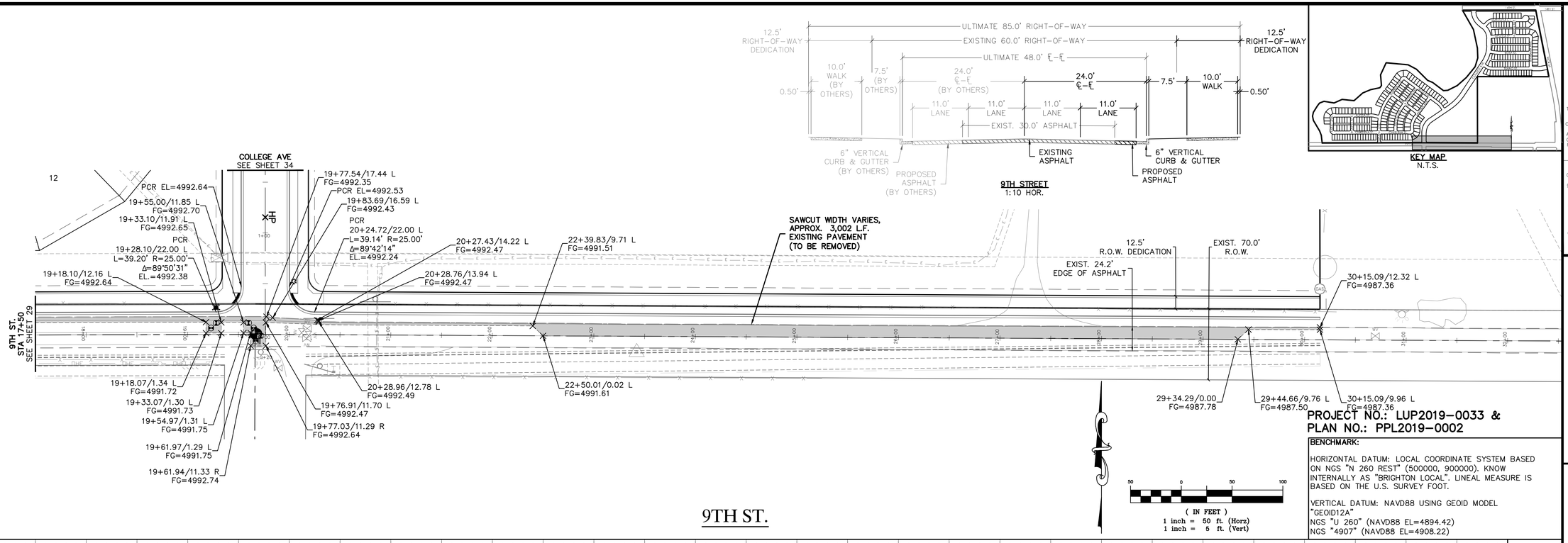
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

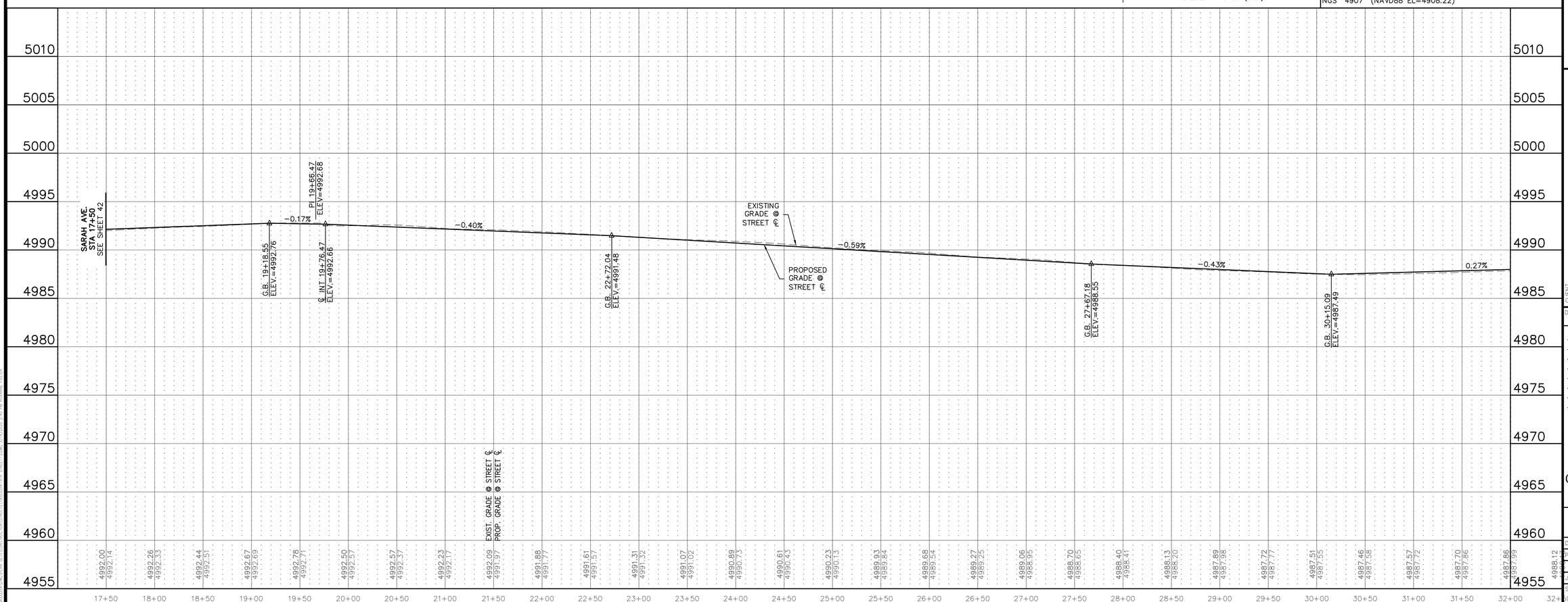
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 29

CAD FILE: 19003254-9TH STREET-2.DWG



9TH ST.



PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
9TH ST.

DATE
03/19/20

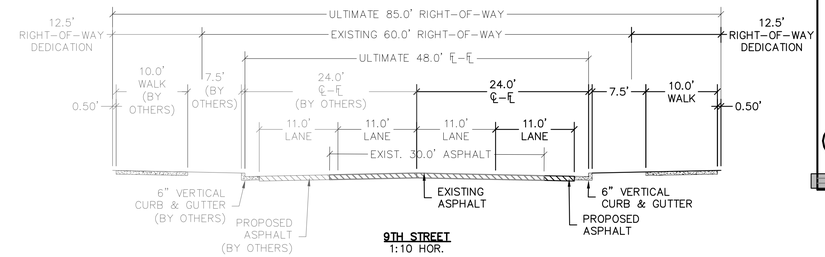
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

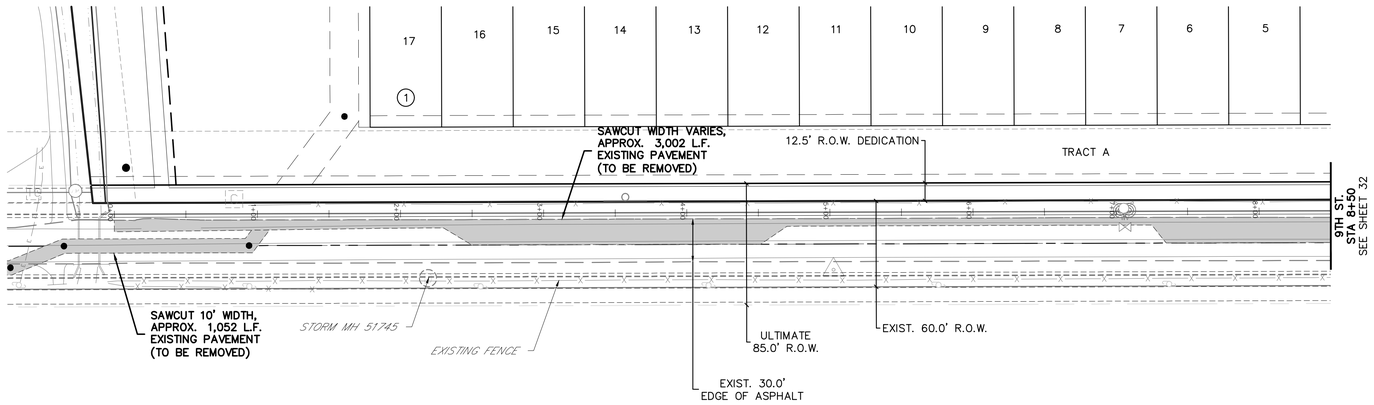
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19-005254
SHEET NO. 30

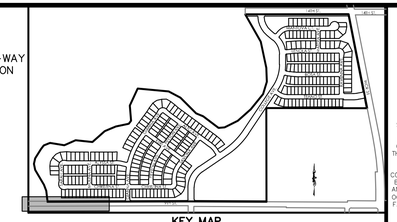
CAD FILE: 19005254-9TH STREET-3.DWG



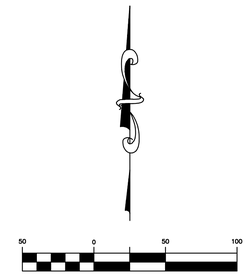
9TH STREET
1:10 HOR.



9TH STREET FLOWLINE



KEY MAP
N.T.S.

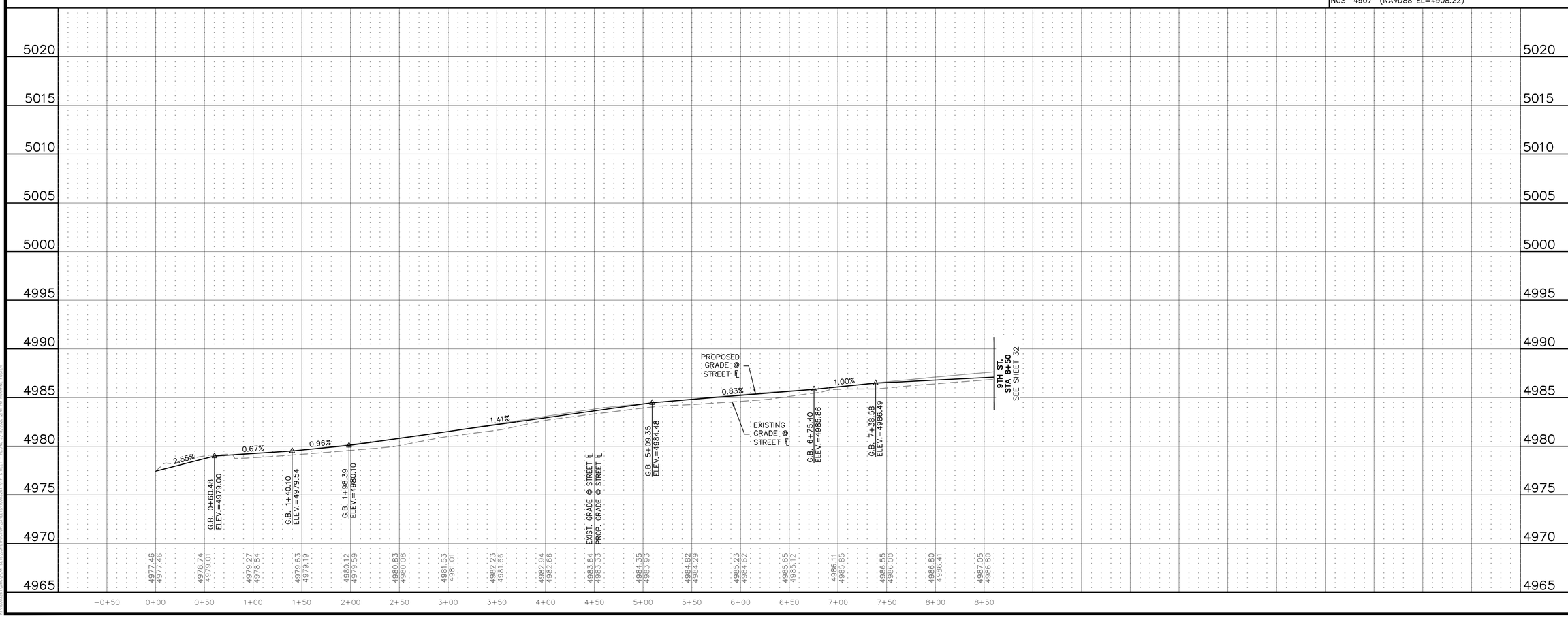


PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811
Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
9TH STREET FLOWLINE

DATE
03/19/20

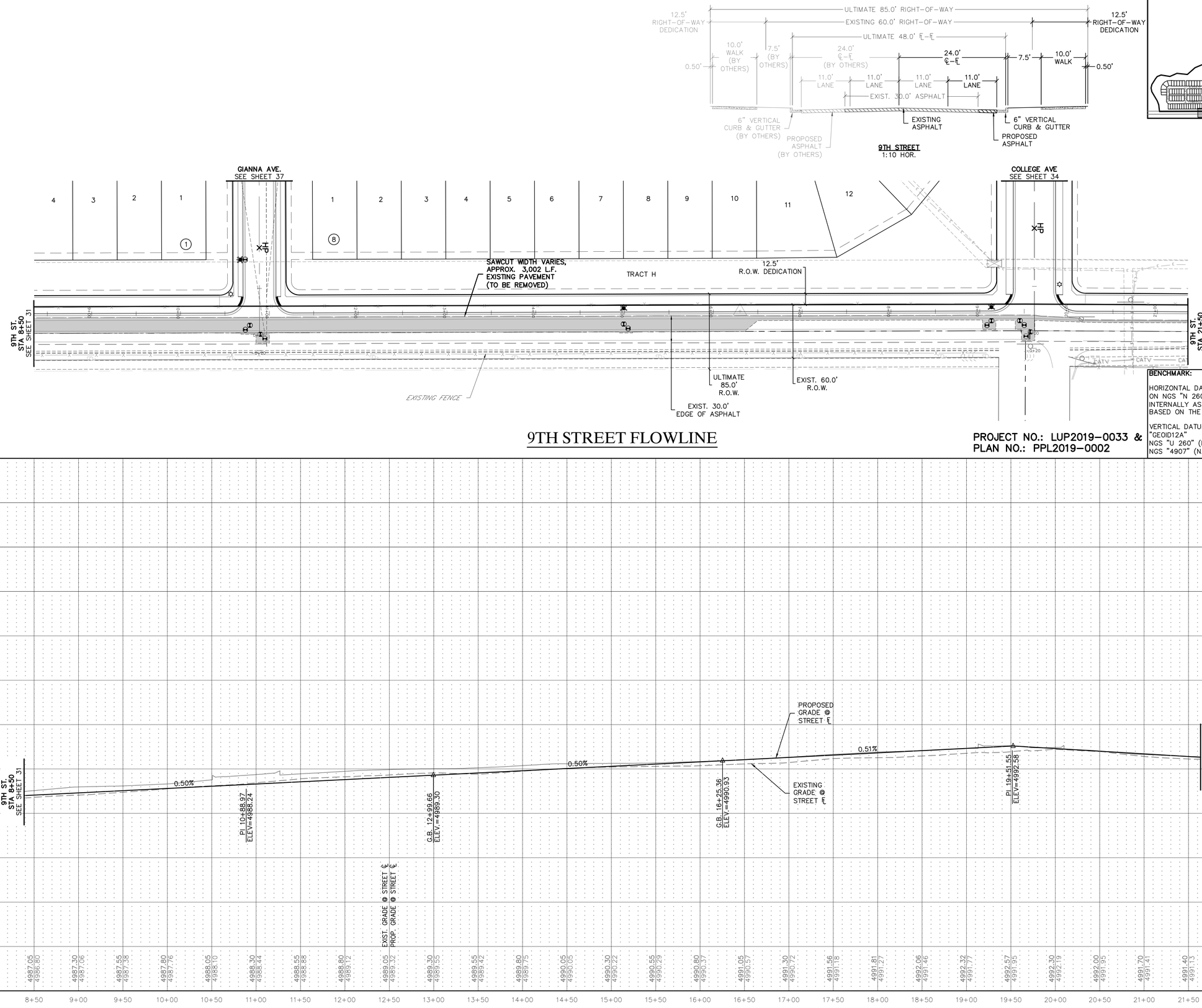
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
31

CAD FILE: 19003254-9TH STREET - FL.DWG



9TH STREET FLOWLINE

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

KEY MAP
N.T.S.

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
9TH STREET FLOWLINE

DATE 03/19/20

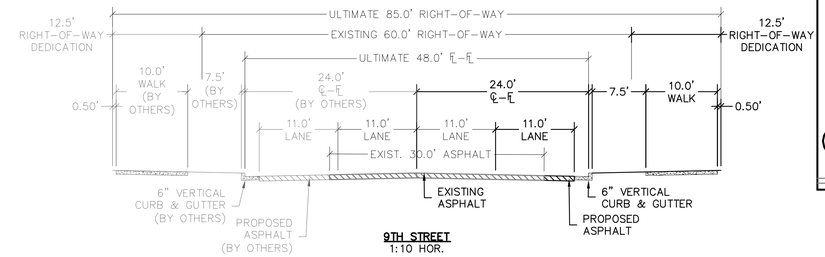
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

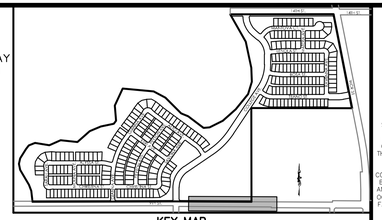
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 32

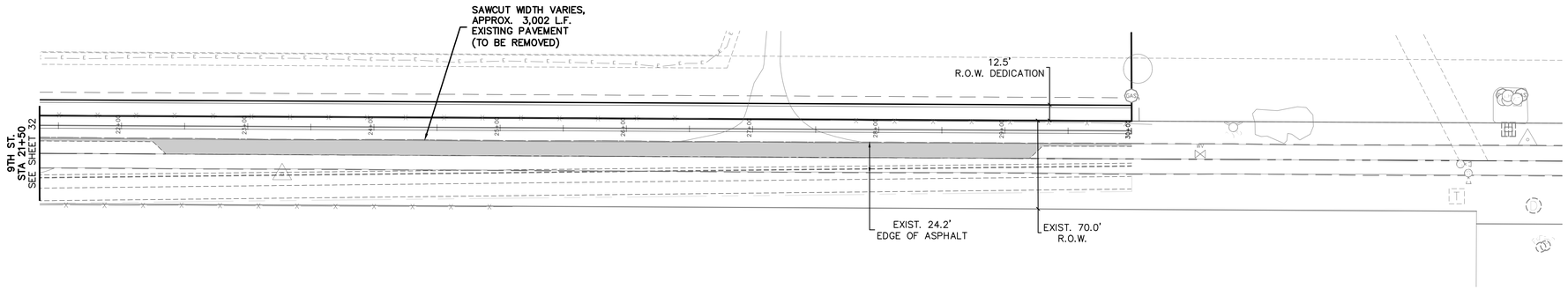
CAD FILE: 19003254-9TH STREET- PL2.DWG

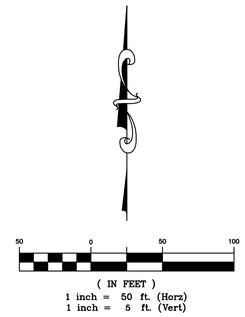


9TH STREET
1:10 HOR.



KEY MAP
N.T.S.





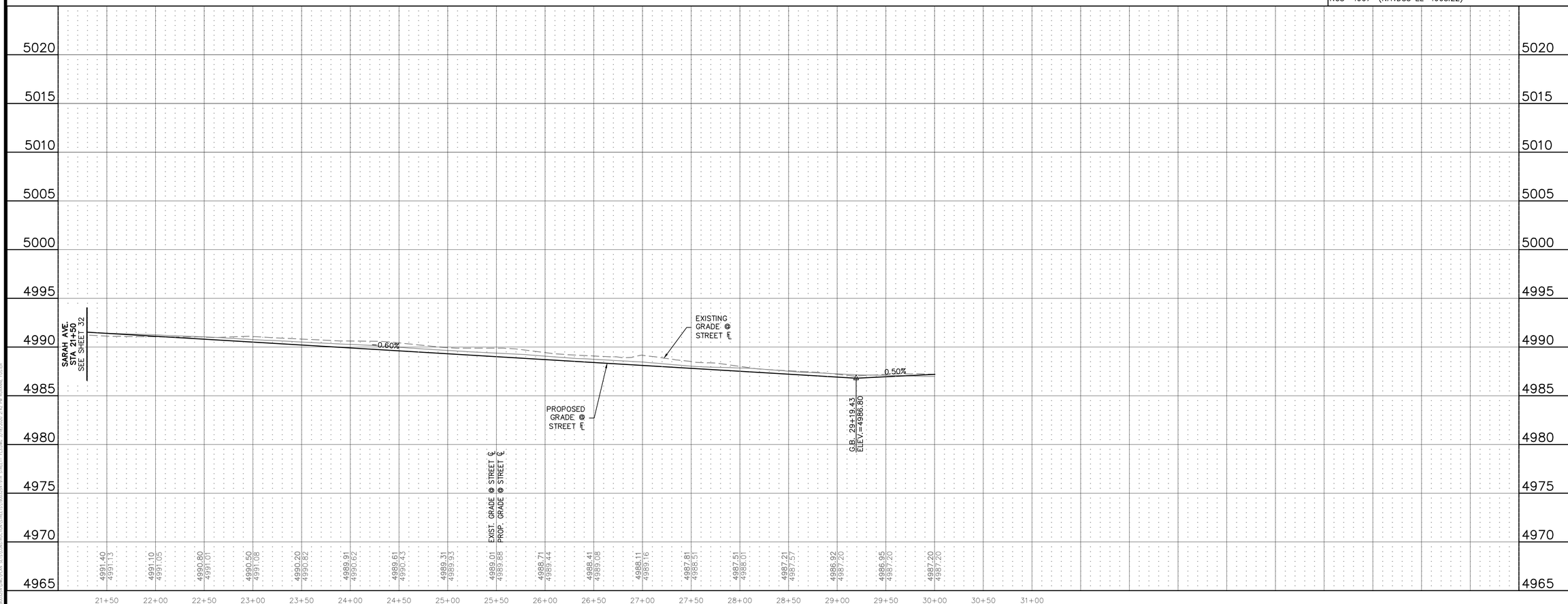
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

9TH STREET FLOWLINE



811
Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
9TH STREET FLOWLINE

DATE
03/19/20

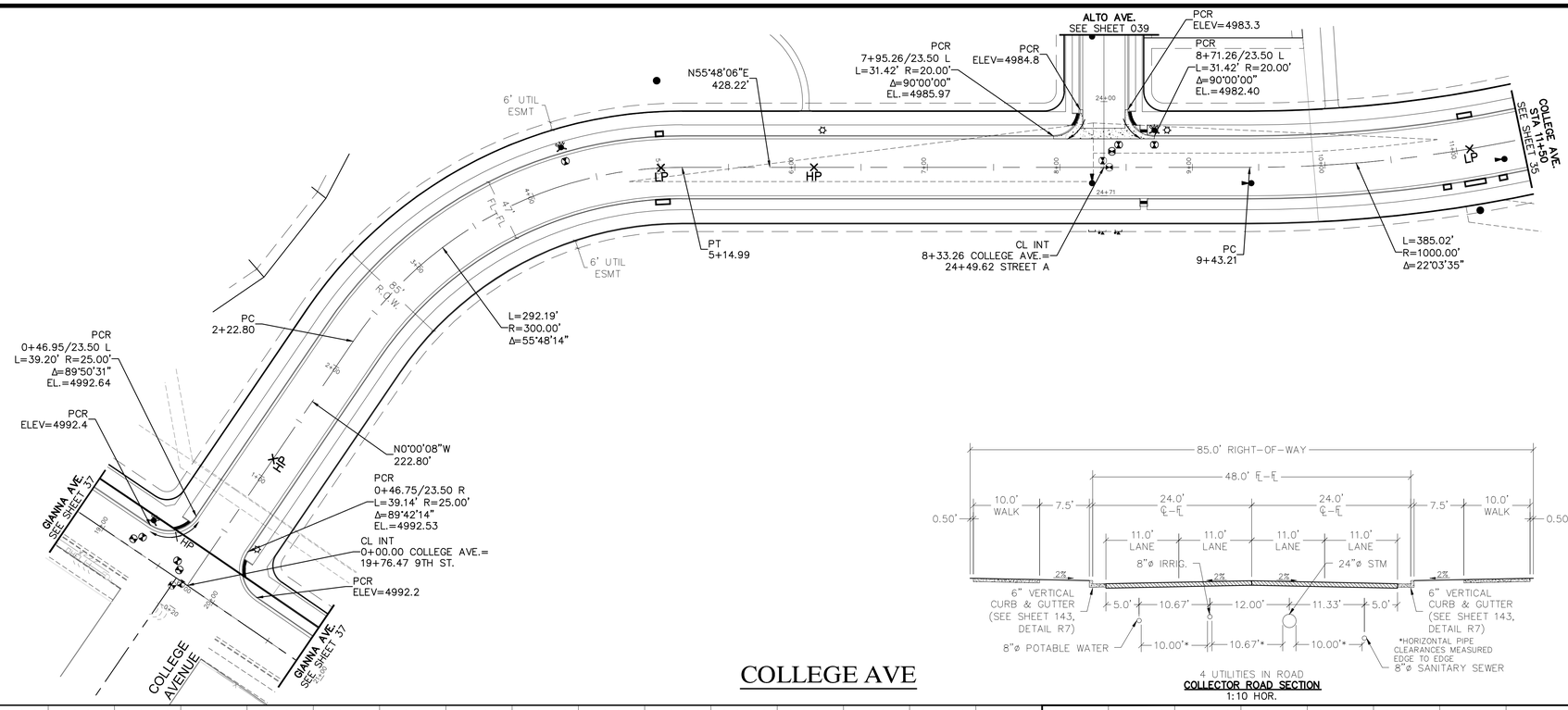
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

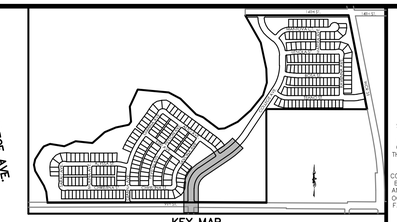
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
33

CAD FILE: 19003254-9TH STREET- PL3.DWG



COLLECTOR ROAD SECTION
1:10 HOR.



KEY MAP
N.T.S.

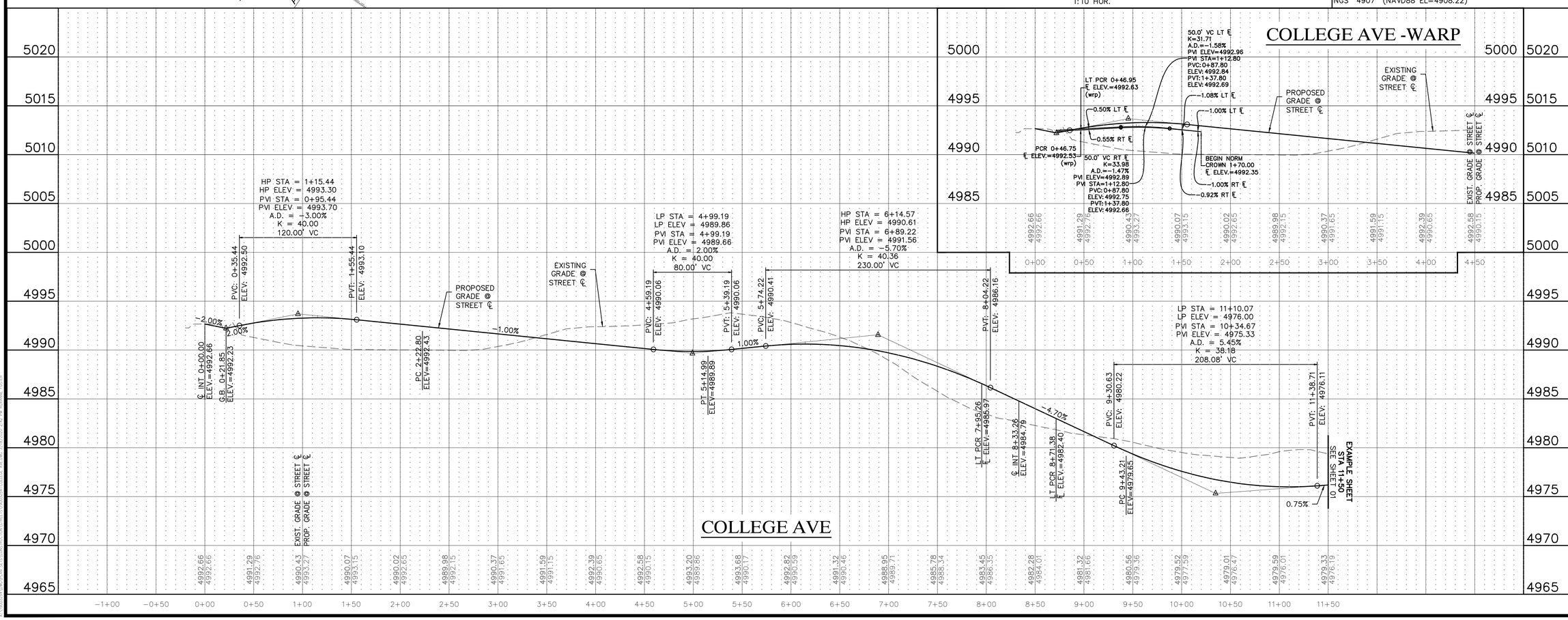
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811
Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
COLLEGE AVE

DATE
03/19/20

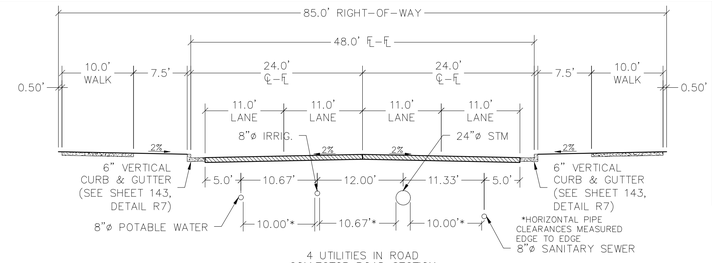
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

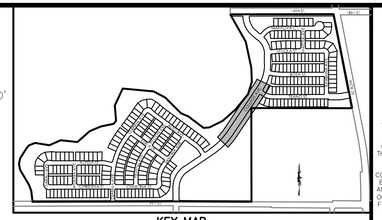
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF	CH. MAM
P.M. MAM	
JOB 19003254	
SHEET NO. 34	

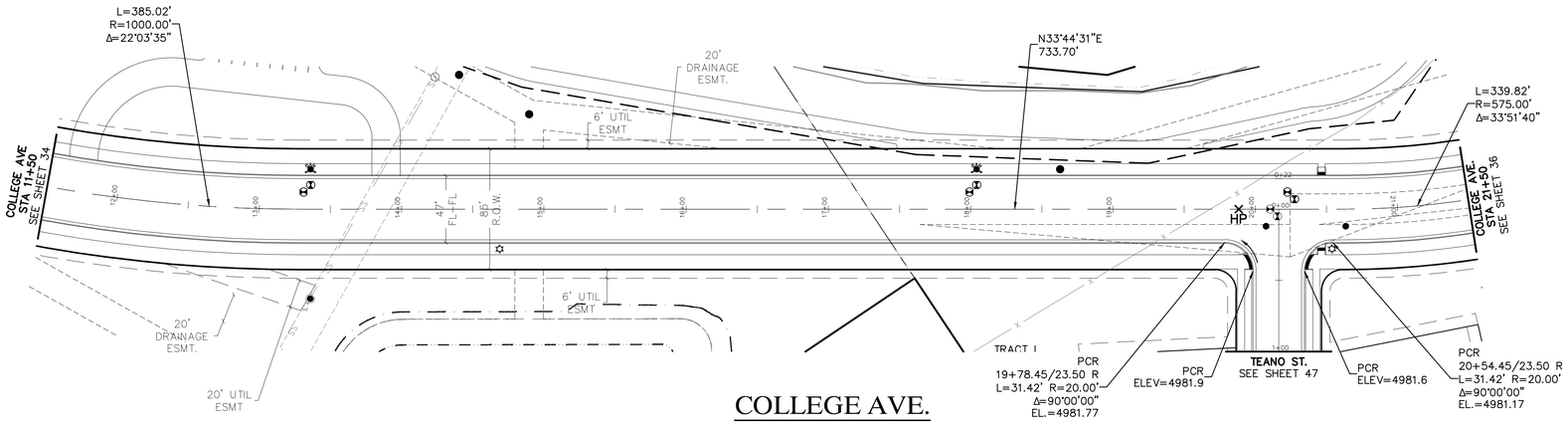
CAD FILE: 19003254-COLLEGE AVE.DWG



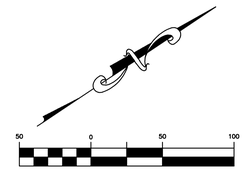
4 UTILITIES IN ROAD
COLLECTOR ROAD SECTION
1:10 HOR.



KEY MAP
N.T.S.



COLLEGE AVE.



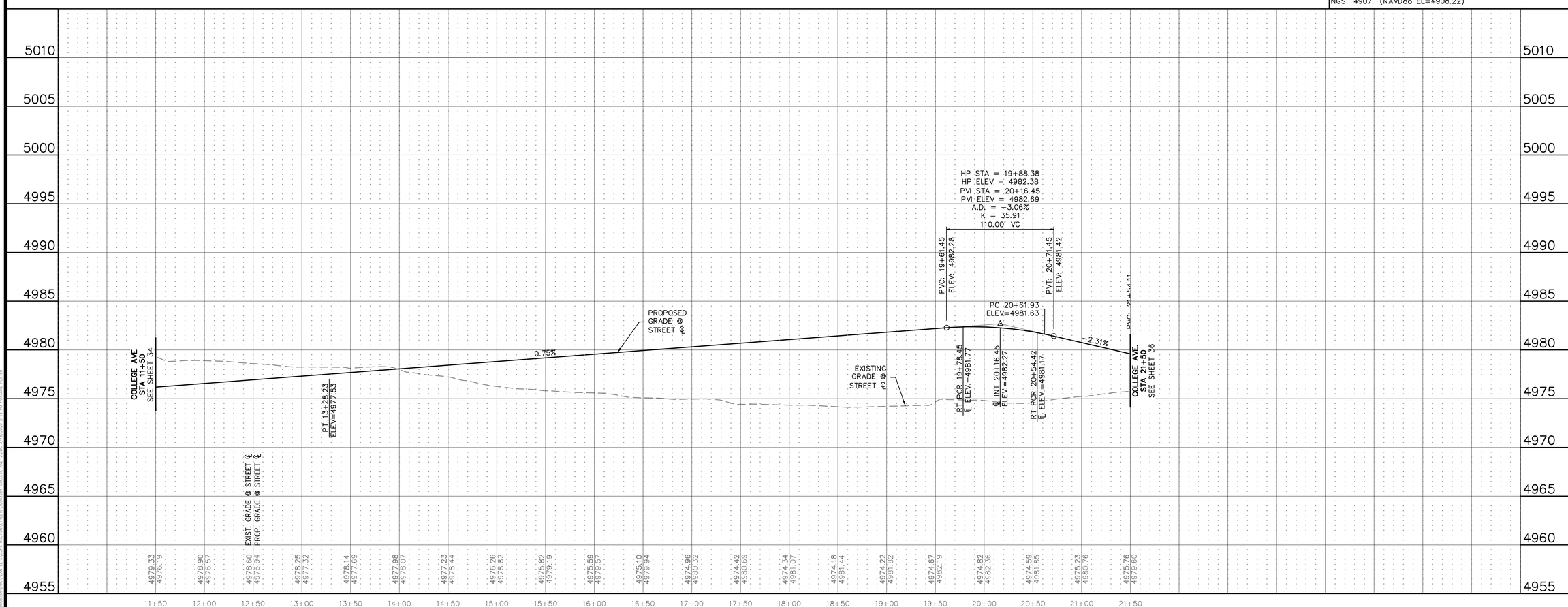
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
COLLEGE AVE.

DATE
03/19/20

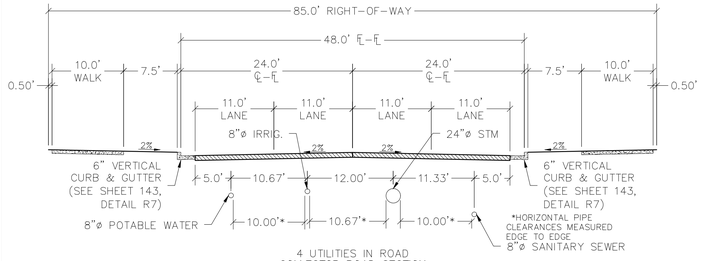
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

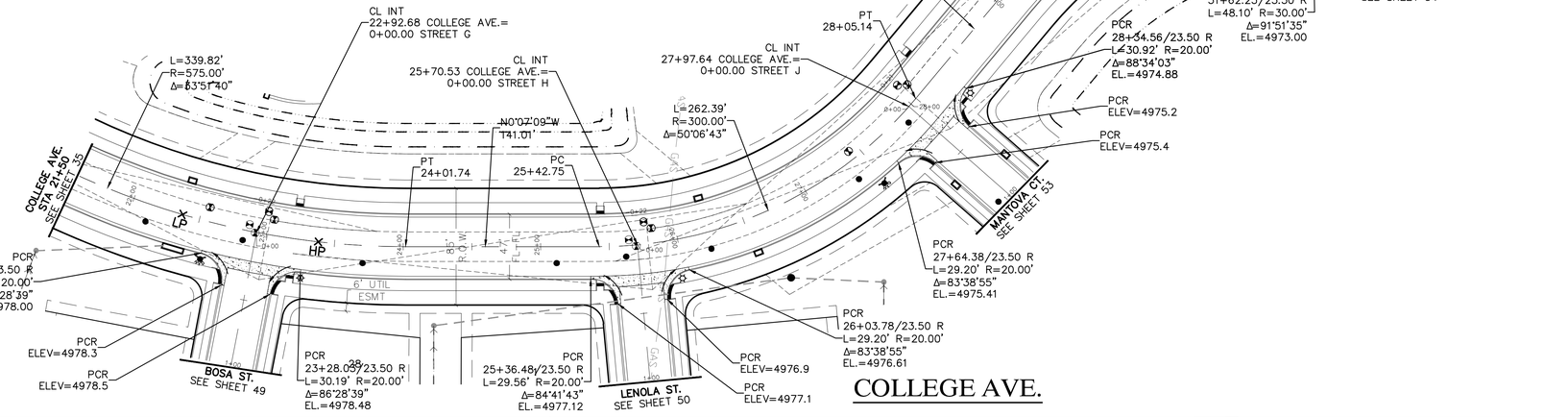
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
35

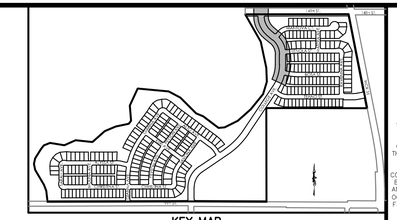
CAD FILE: 19003254-COLLEGE AVE-2.DWG



4 UTILITIES IN ROAD
COLLECTOR ROAD SECTION
1:10 HOR.



COLLEGE AVE.



KEY MAP
N.T.S.

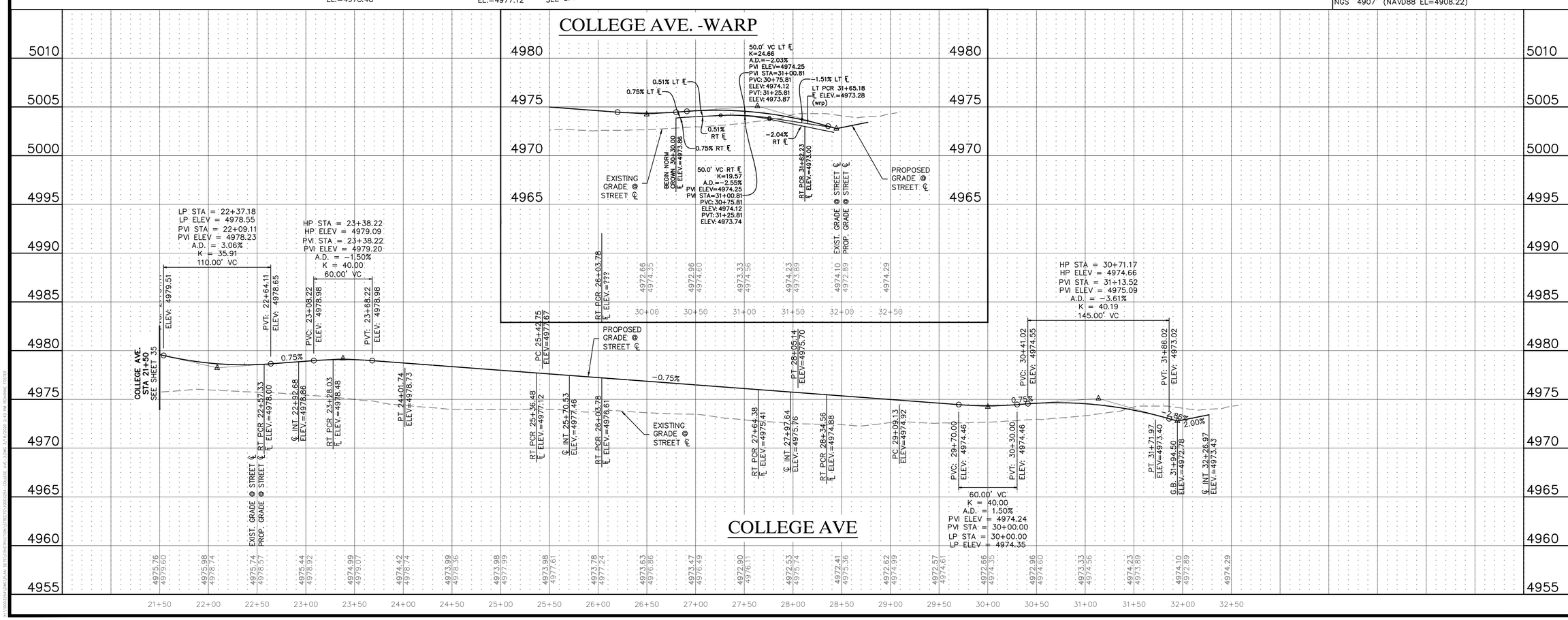
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
COLLEGE AVE.

DATE
03/19/20

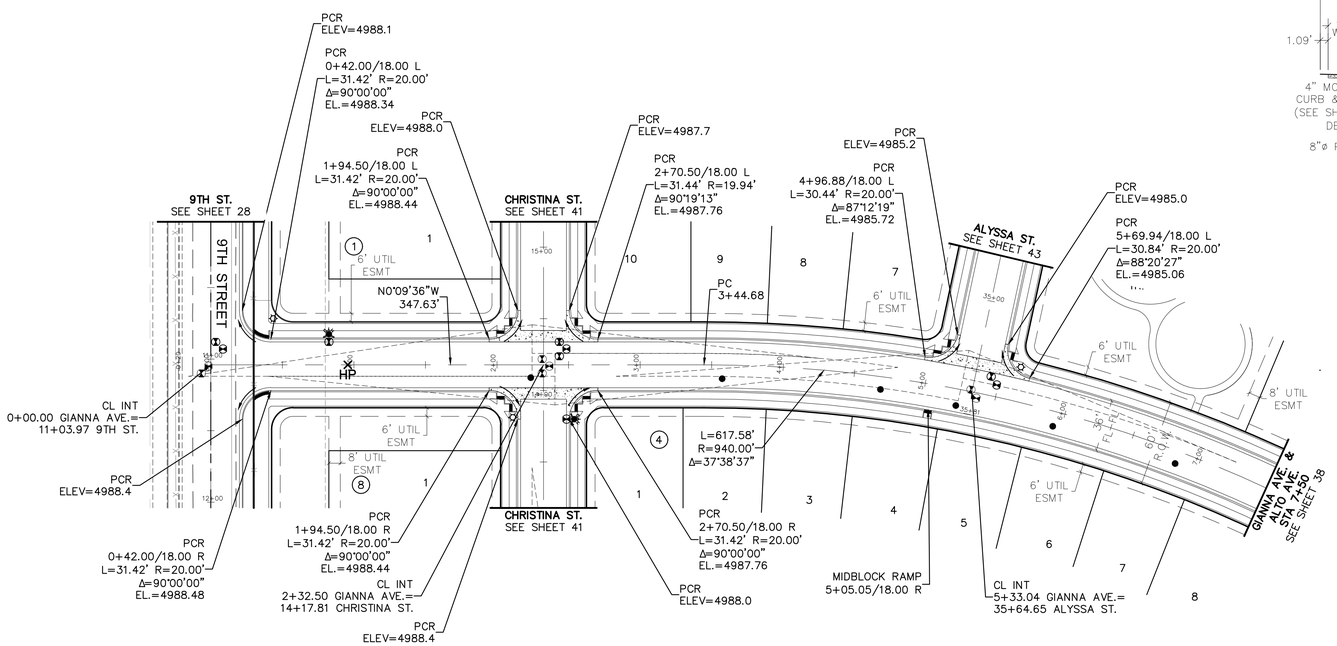
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

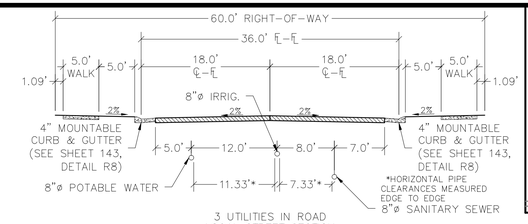
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 36

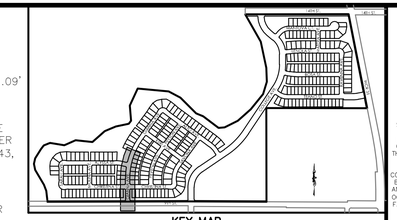
CAD FILE: 19003254-COLLEGE AVE-3.DWG



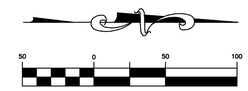
GIANNA AVE.



LOCAL STREET SECTION
1:10 HOR.



KEY MAP
N.T.S.



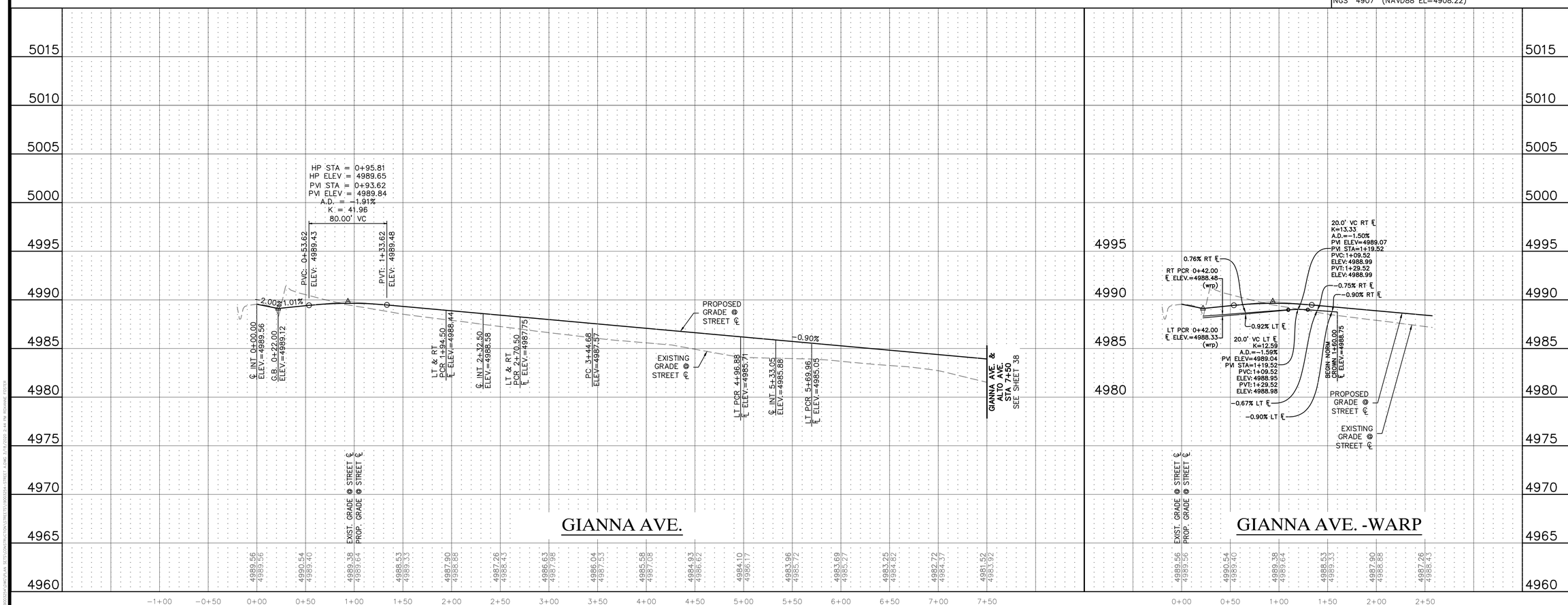
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



GIANNA AVE.

GIANNA AVE. -WARP

811
Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
GIANNA AVE.

DATE
03/19/20

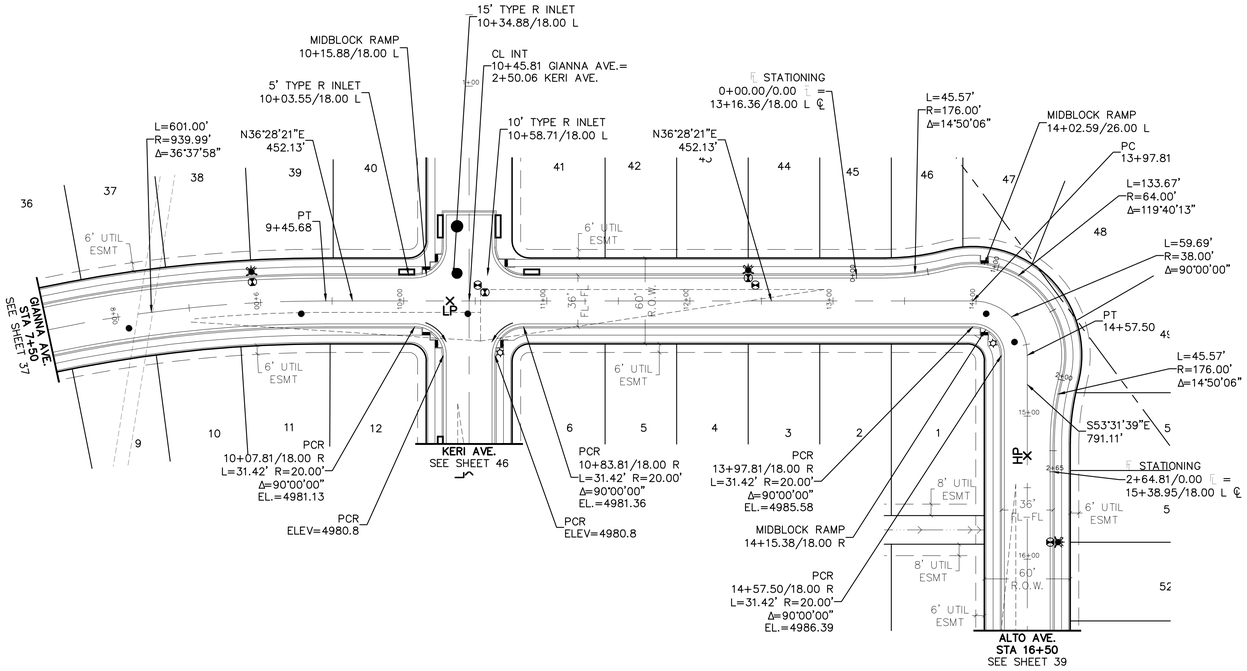
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

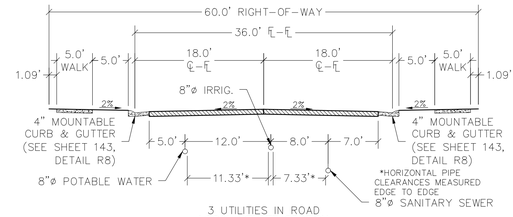
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
37

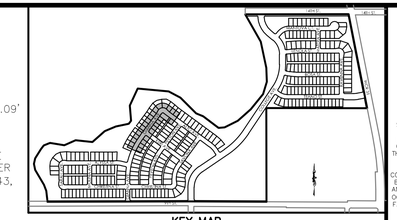
CAD FILE: 19003254-STREET ALDWG



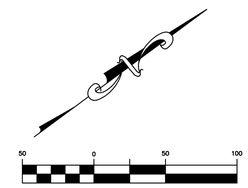
GIANNA AVE. & ALTO AVE.



3 UTILITIES IN ROAD
LOCAL STREET SECTION
1:10 HOR.



KEY MAP
N.T.S.



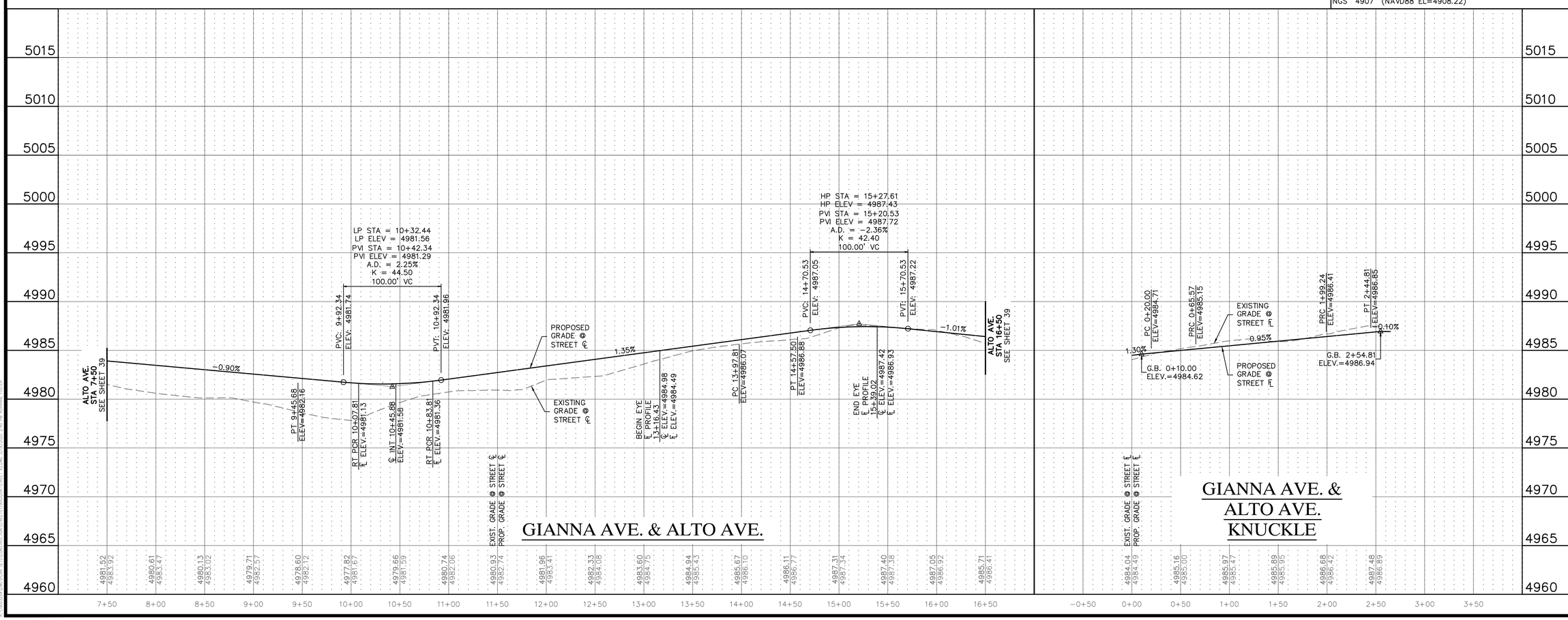
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



GIANNA AVE. & ALTO AVE.

GIANNA AVE. & ALTO AVE. KNUCKLE

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
GIANNA AVE. & ALTO AVE.

DATE
03/19/20

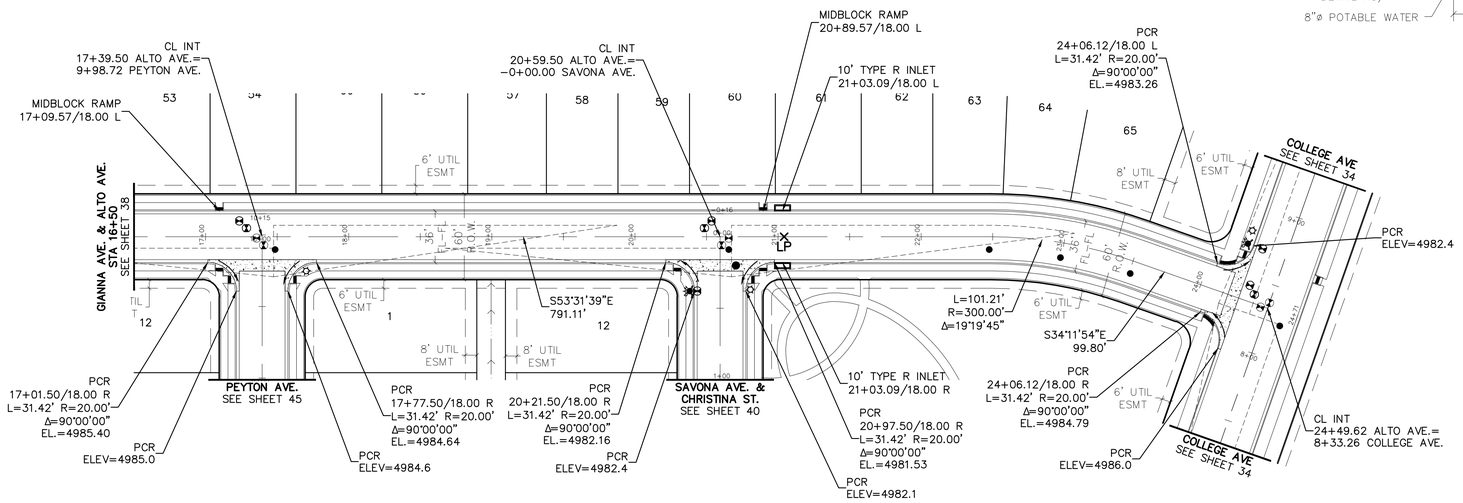
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

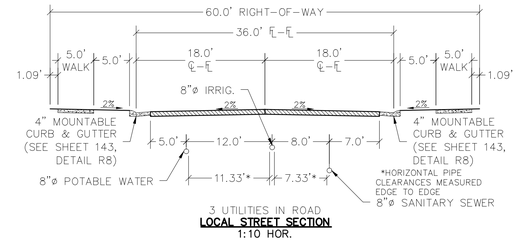
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
38

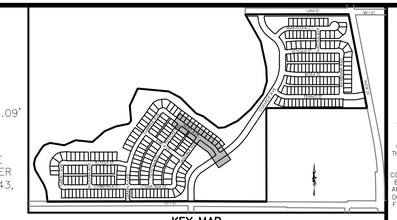
CAD FILE: 19003254-STREET A2.DWG



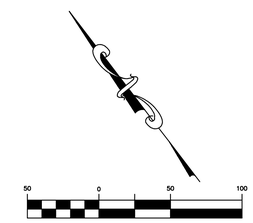
ALTO AVE.



LOCAL STREET SECTION
1:10 HOR.



KEY MAP
N.T.S.



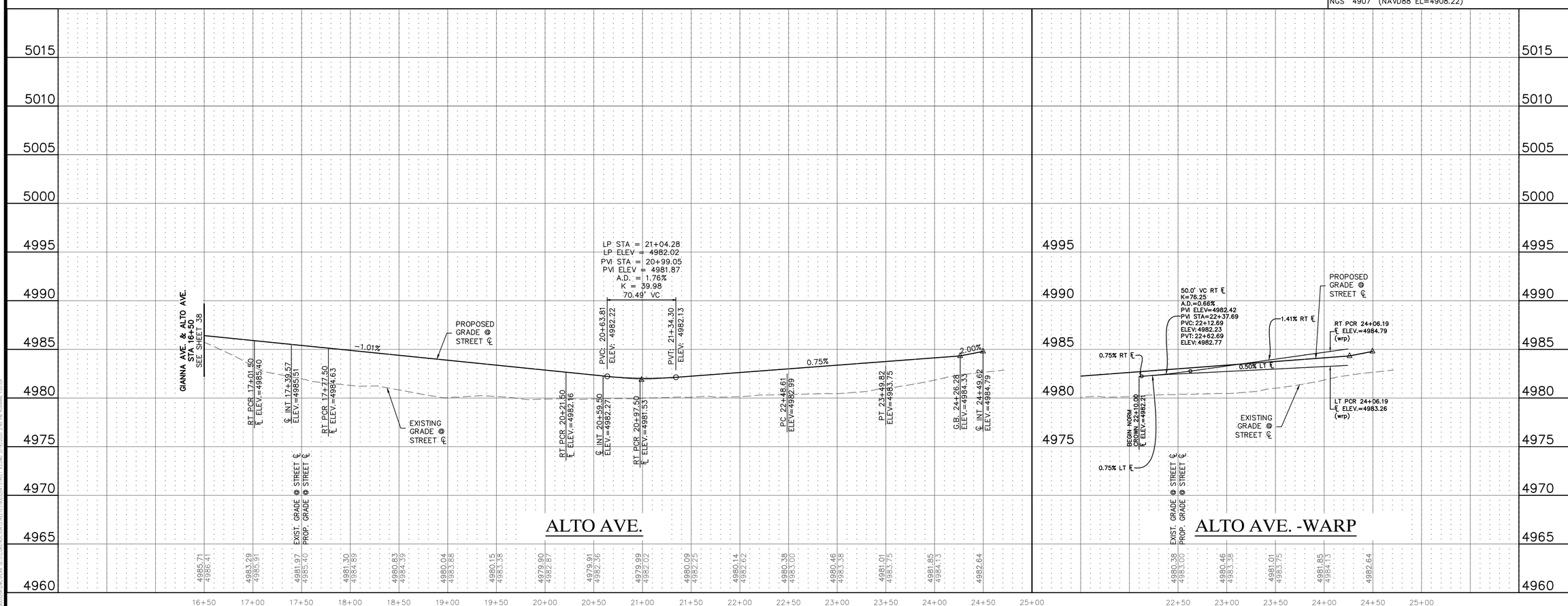
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



ALTO AVE.

ALTO AVE. -WARP

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
ALTO AVE.

DATE
03/19/20

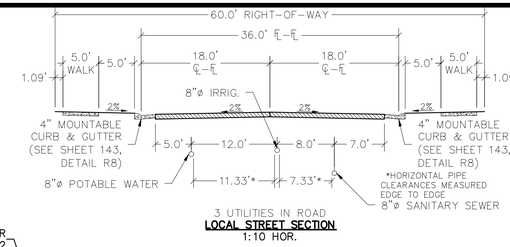
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

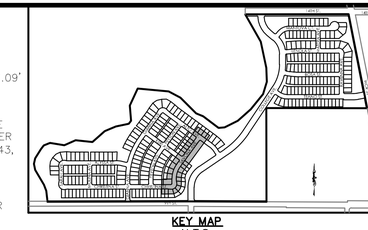
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
39

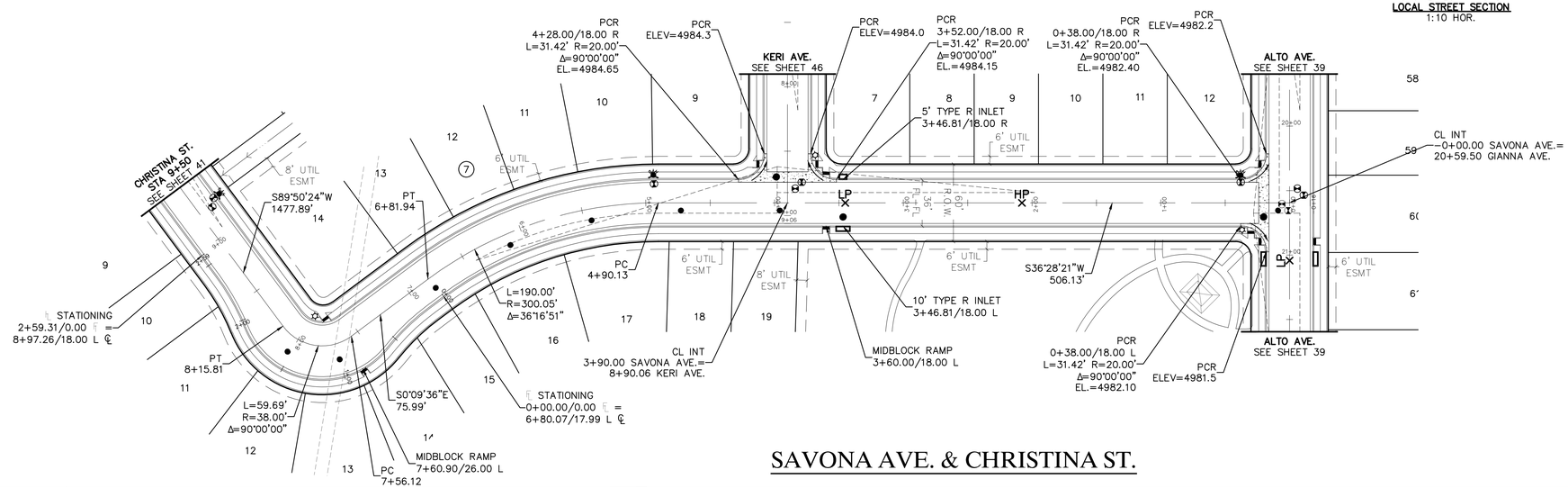
CAD FILE: 19003254-STREET A3.DWG



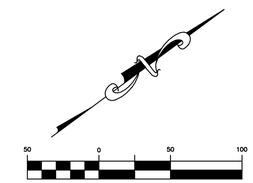
LOCAL STREET SECTION
1:10 HOR.



KEY MAP
N.T.S.



SAVONA AVE. & CHRISTINA ST.

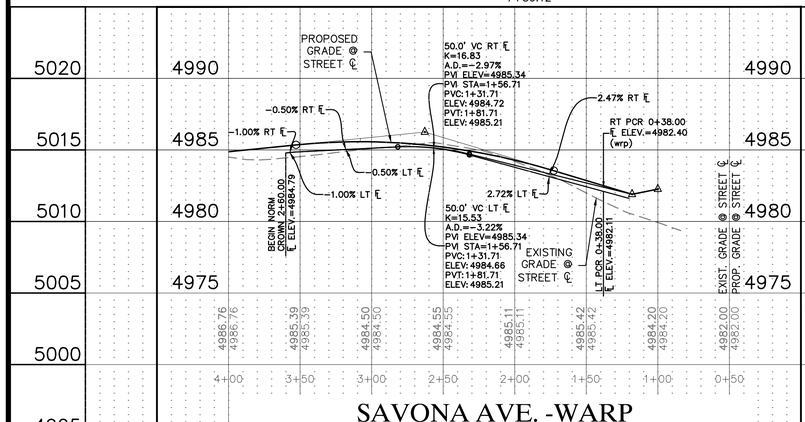


PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

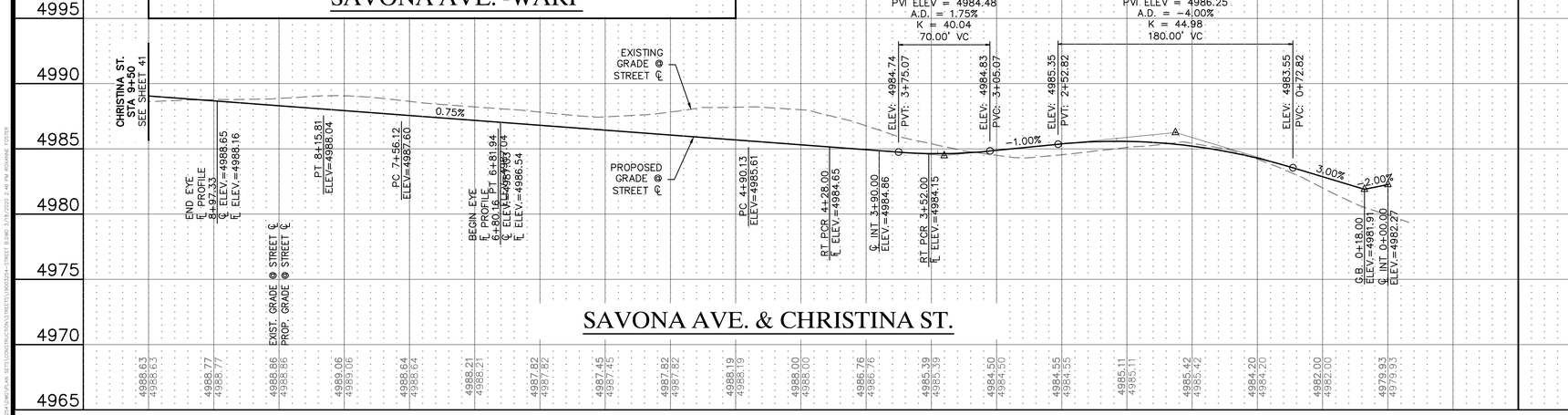
BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

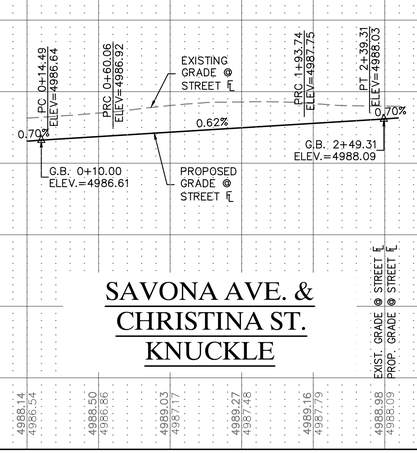
VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



SAVONA AVE. -WARP



SAVONA AVE. & CHRISTINA ST.



SAVONA AVE. & CHRISTINA ST. KNUCKLE

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
ARBOR CAPITAL PARTNERS, LLC
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
SAVONA AVE. & CHRISTINA ST.

DATE 03/19/20

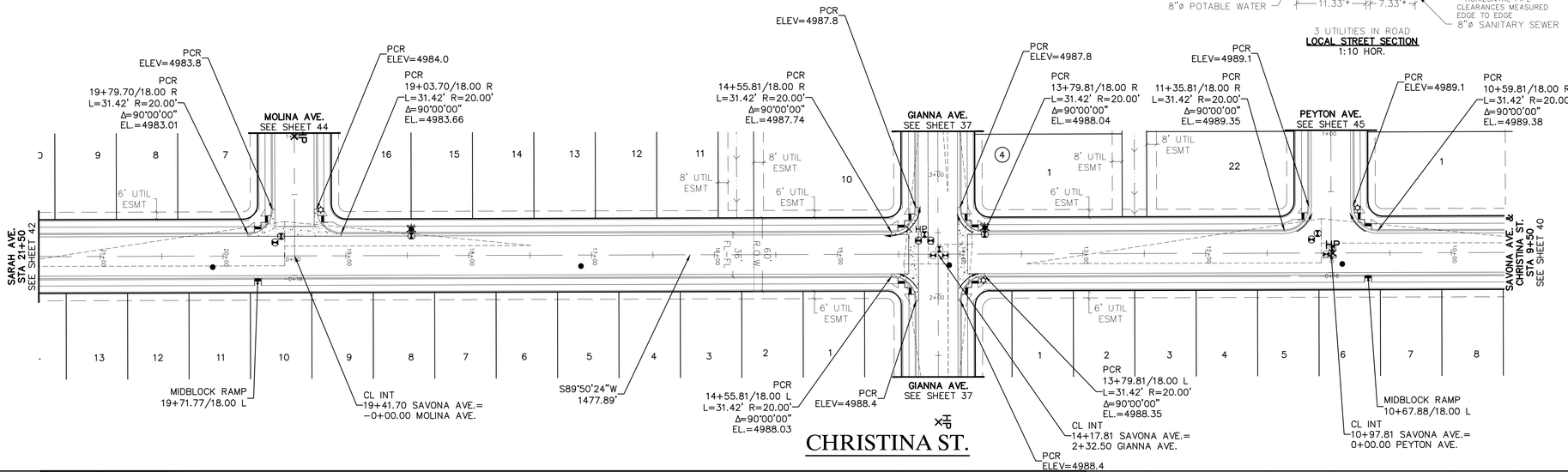
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

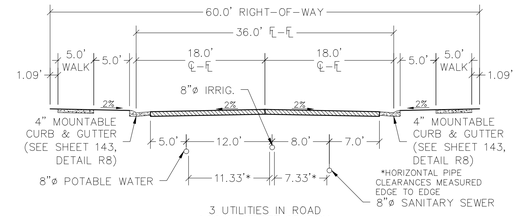
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

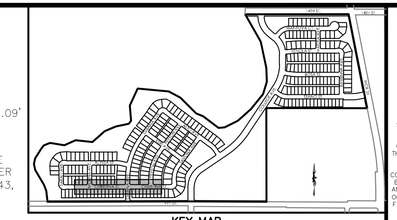
DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 40

CAD FILE: 19003254-STREET BLDWG

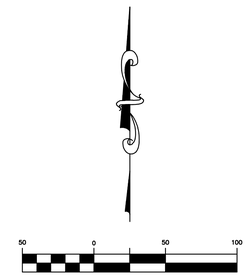




LOCAL STREET SECTION
1:10 HOR.



KEY MAP
N.T.S.

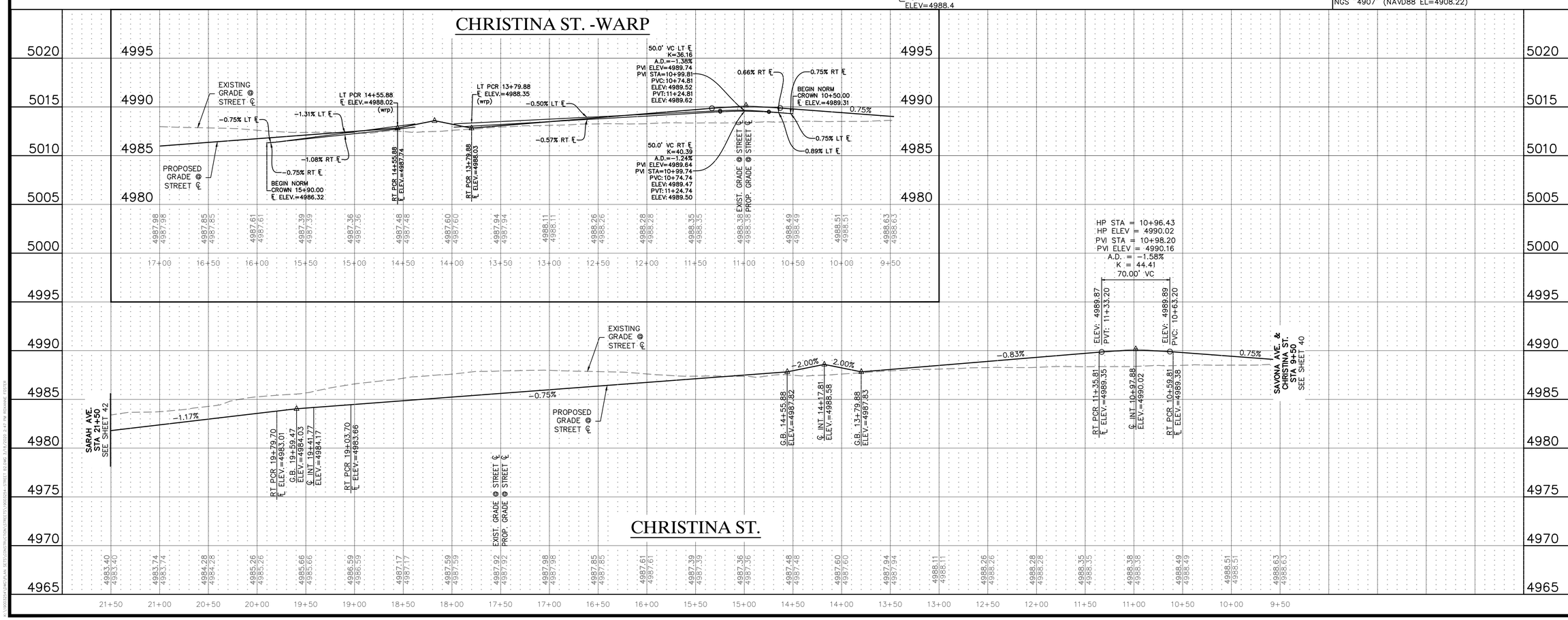


PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
CHRISTINA ST.

DATE 03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 41

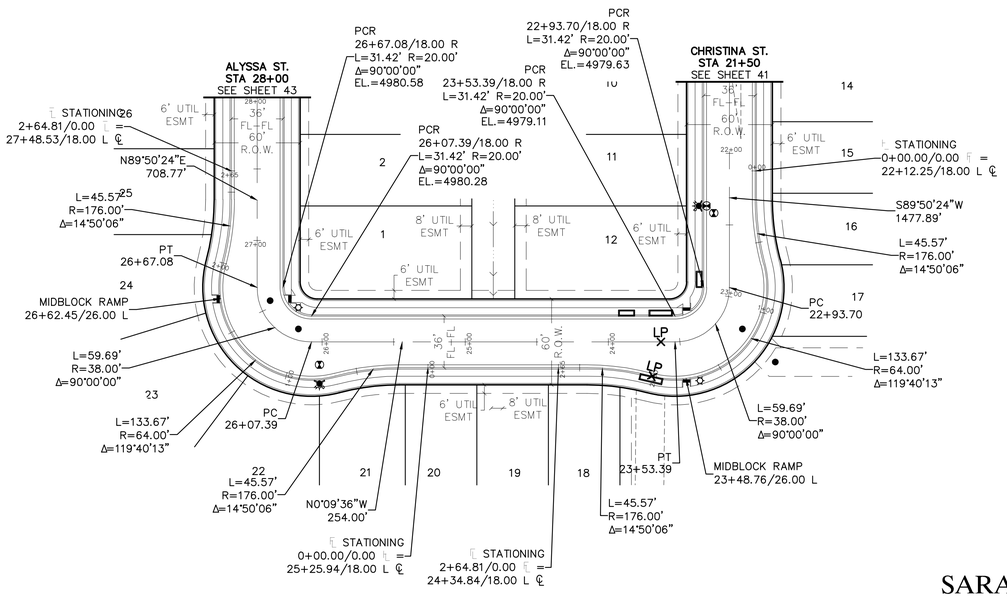
CAD FILE: 19003254-STREET B2.DWG

Know what's below. Call before you dig.
THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

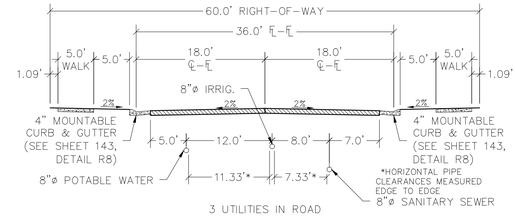
NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

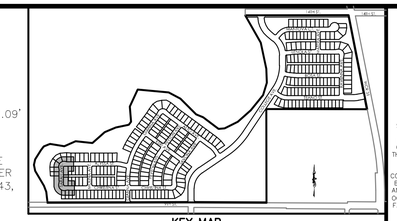
ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100



SARAH AVE.



3 UTILITIES IN ROAD
LOCAL STREET SECTION
1:10 HOR.



KEY MAP
N.T.S.

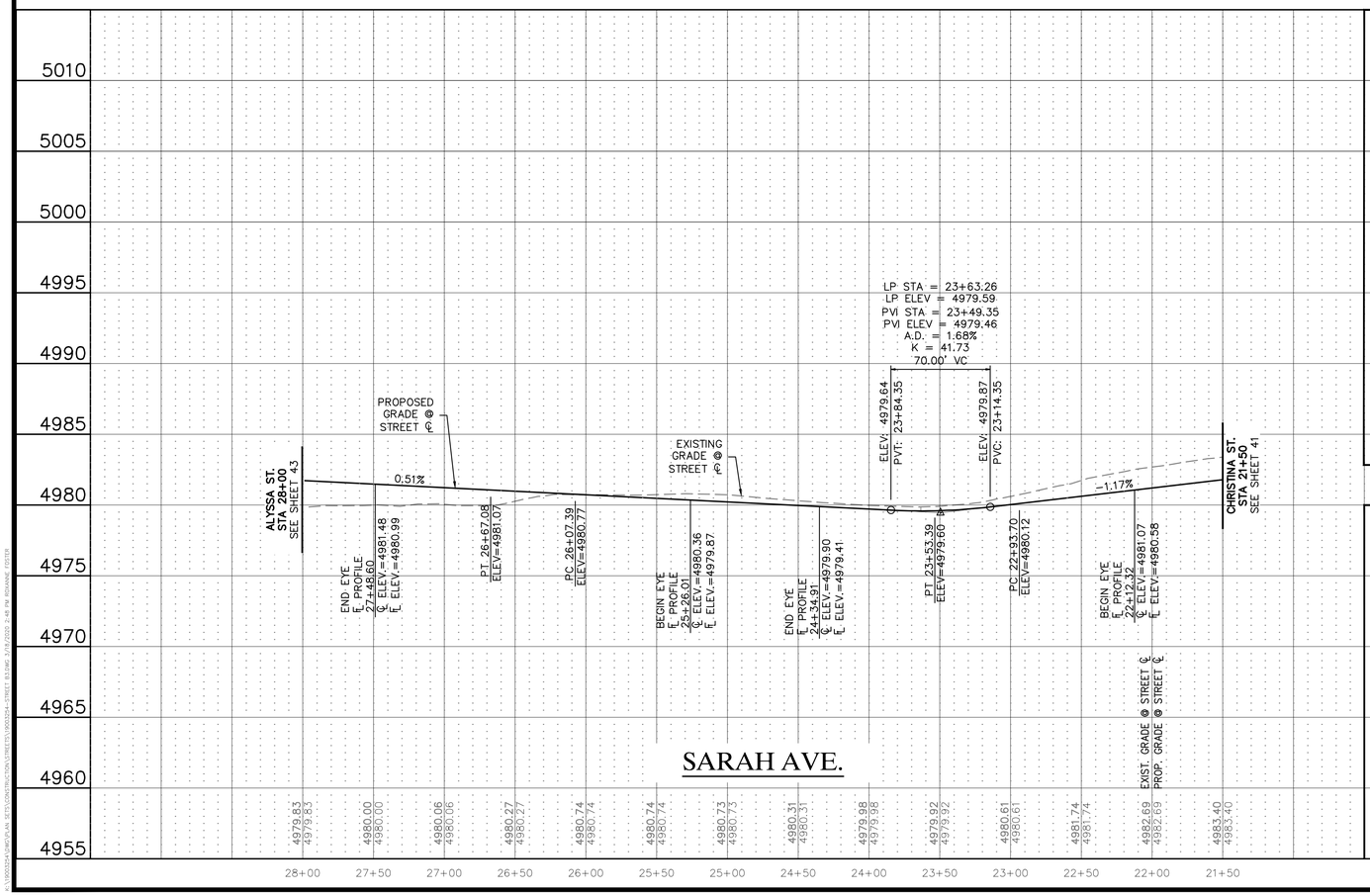
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

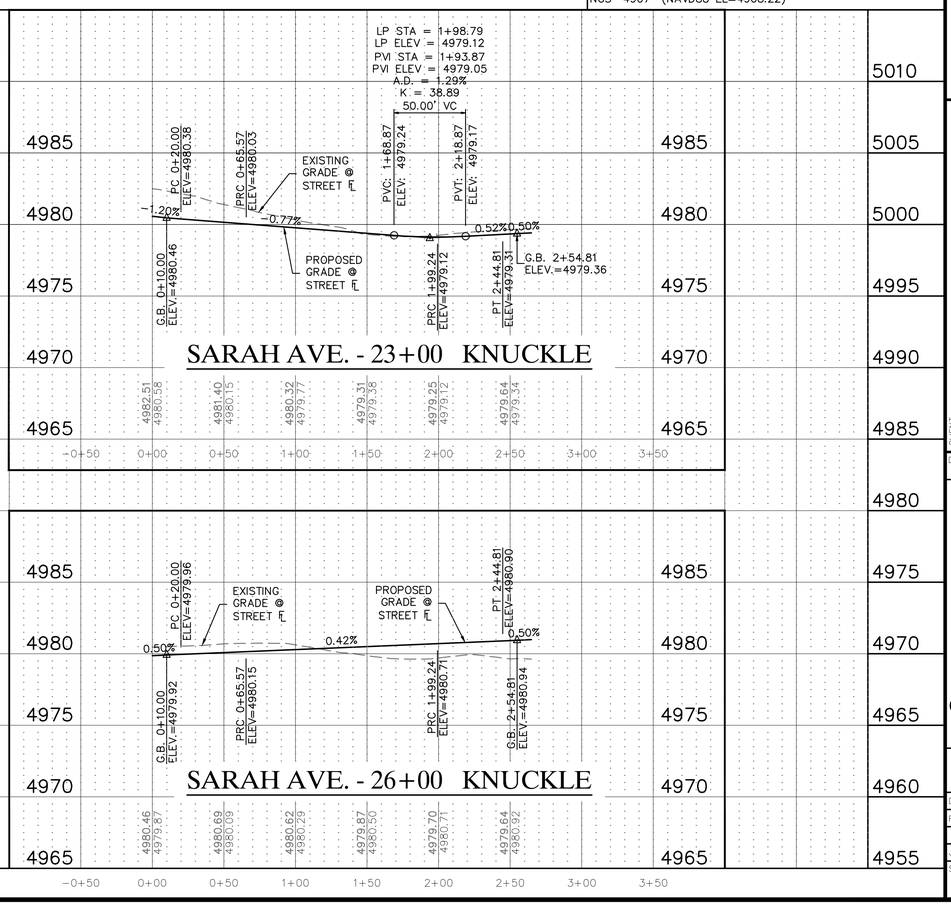
BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



SARAH AVE.



SARAH AVE. - 23+00 KNUCKLE

SARAH AVE. - 26+00 KNUCKLE

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
STREET PLAN & PROFILE
SARAH AVE.

DATE 03/19/20

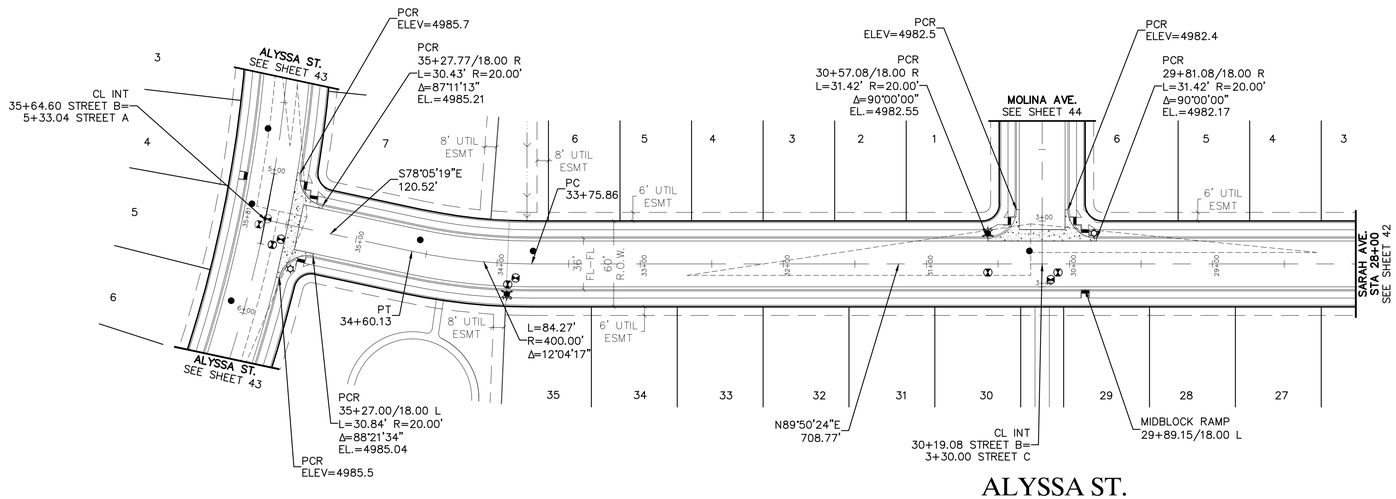
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

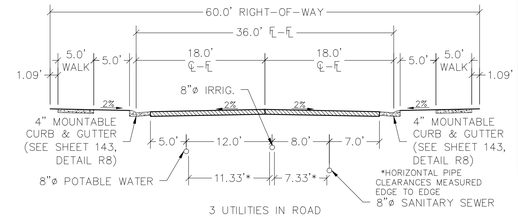
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 42

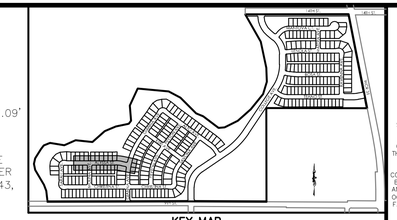
CAD FILE: 19003254-STREET B3.DWG



ALYSSA ST.



LOCAL STREET SECTION
1:10 HOR.



KEY MAP
N.T.S.

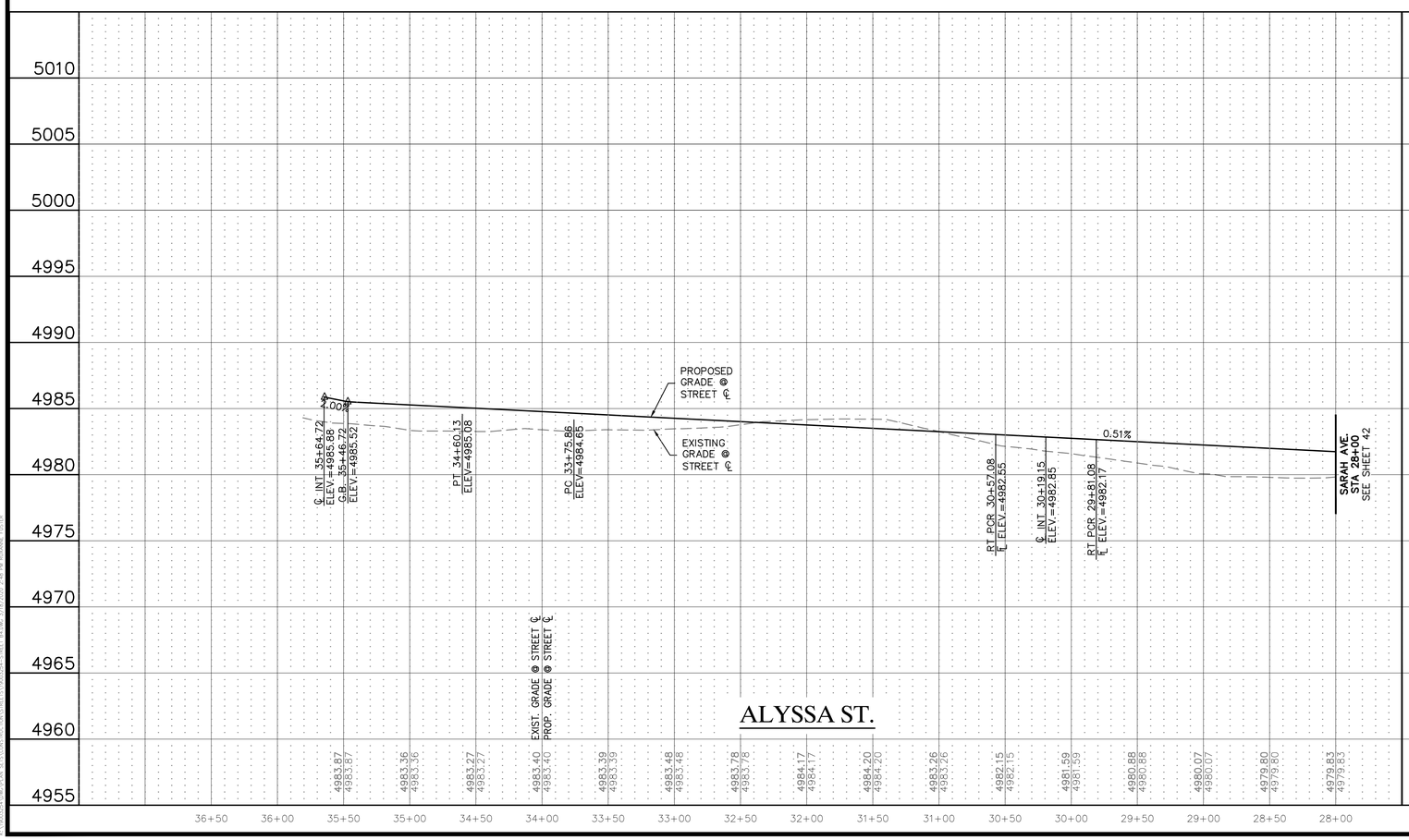
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

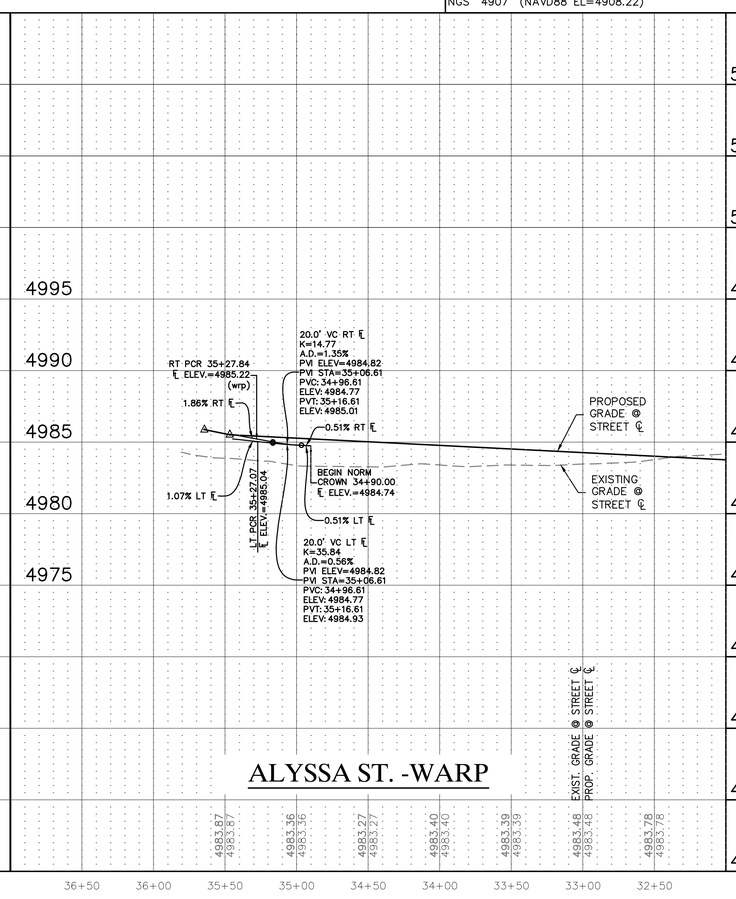
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)





811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
ALYSSA ST.

DATE 03/19/20

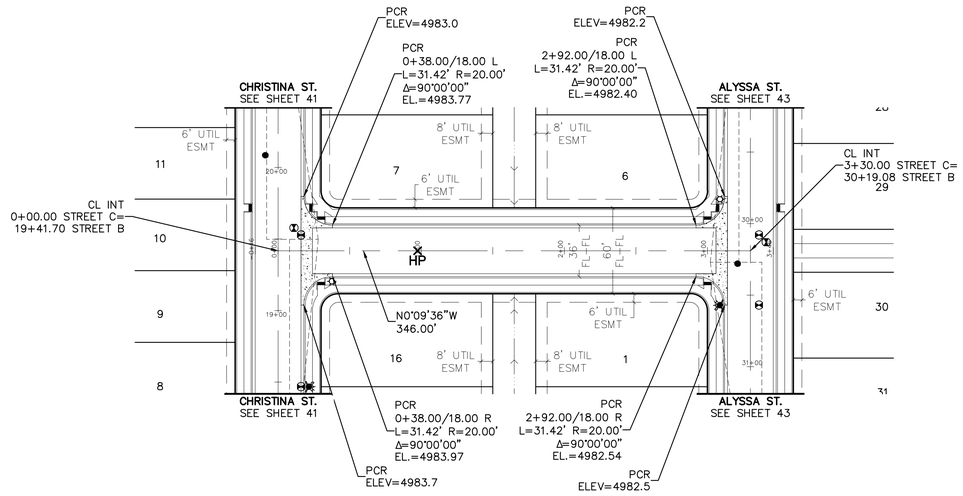
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

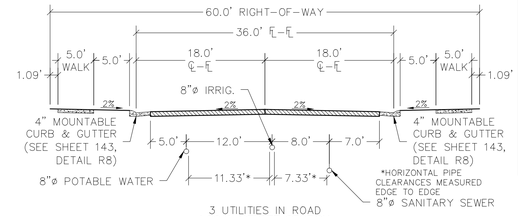
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 43

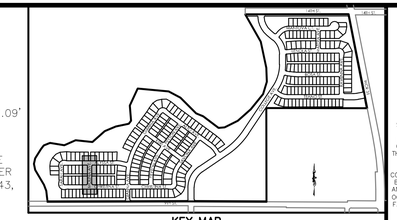
CAD FILE: 19003254-STREET B4.DWG



MOLINA AVE.



LOCAL STREET SECTION
1:10 HOR.



KEY MAP
N.T.S.

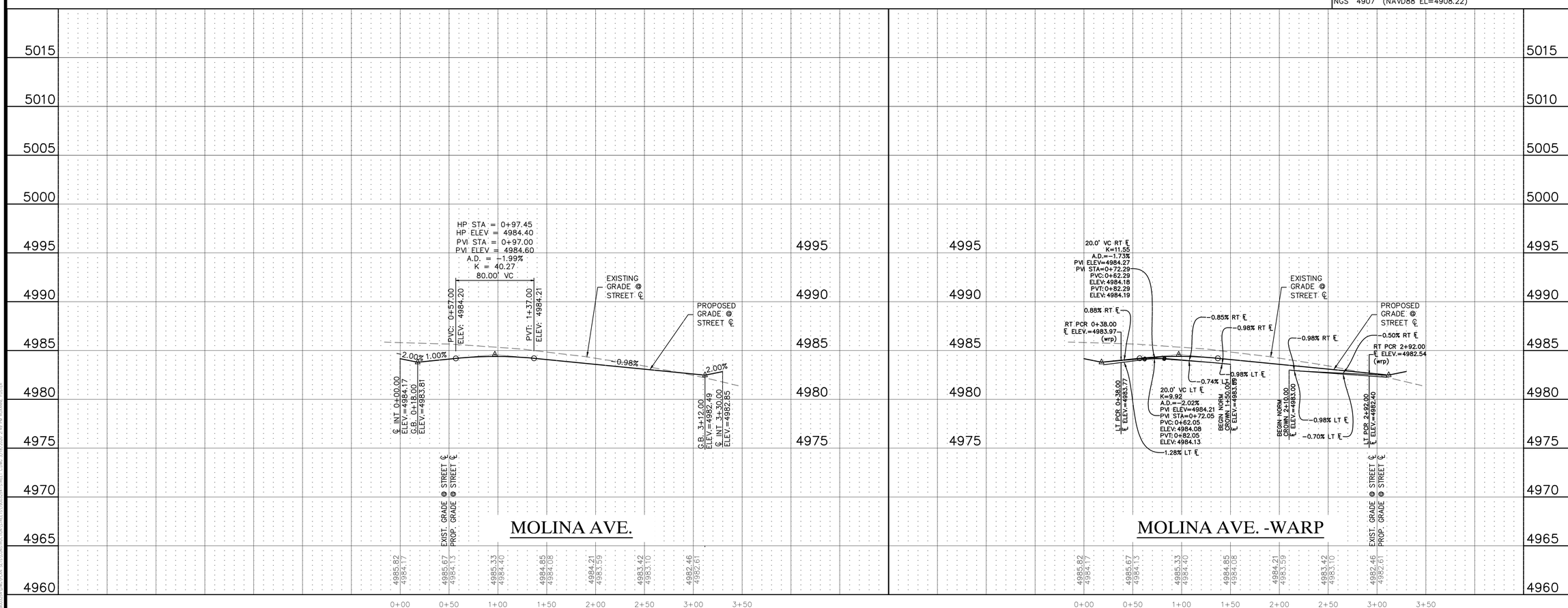
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



MOLINA AVE.

MOLINA AVE. -WARP

Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
MOLINA AVE.

DATE 03/19/20

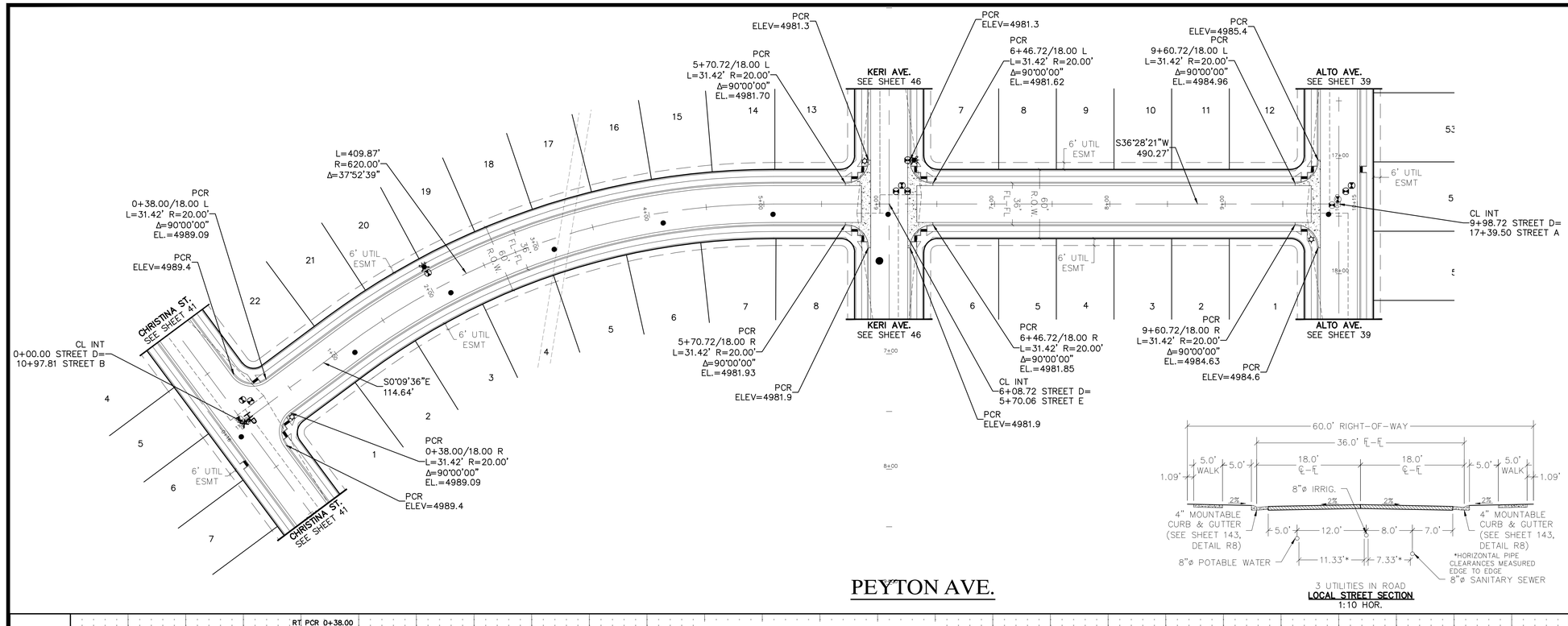
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

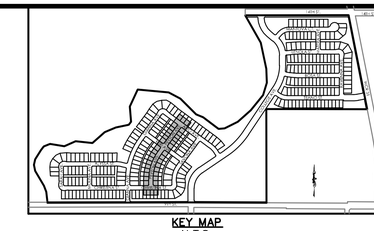
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 44

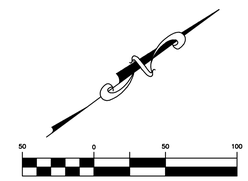
CAD FILE: 19003254-STREET CLWG



3 UTILITIES IN ROAD
LOCAL STREET SECTION
1:10 HOR.



KEY MAP
N.T.S.



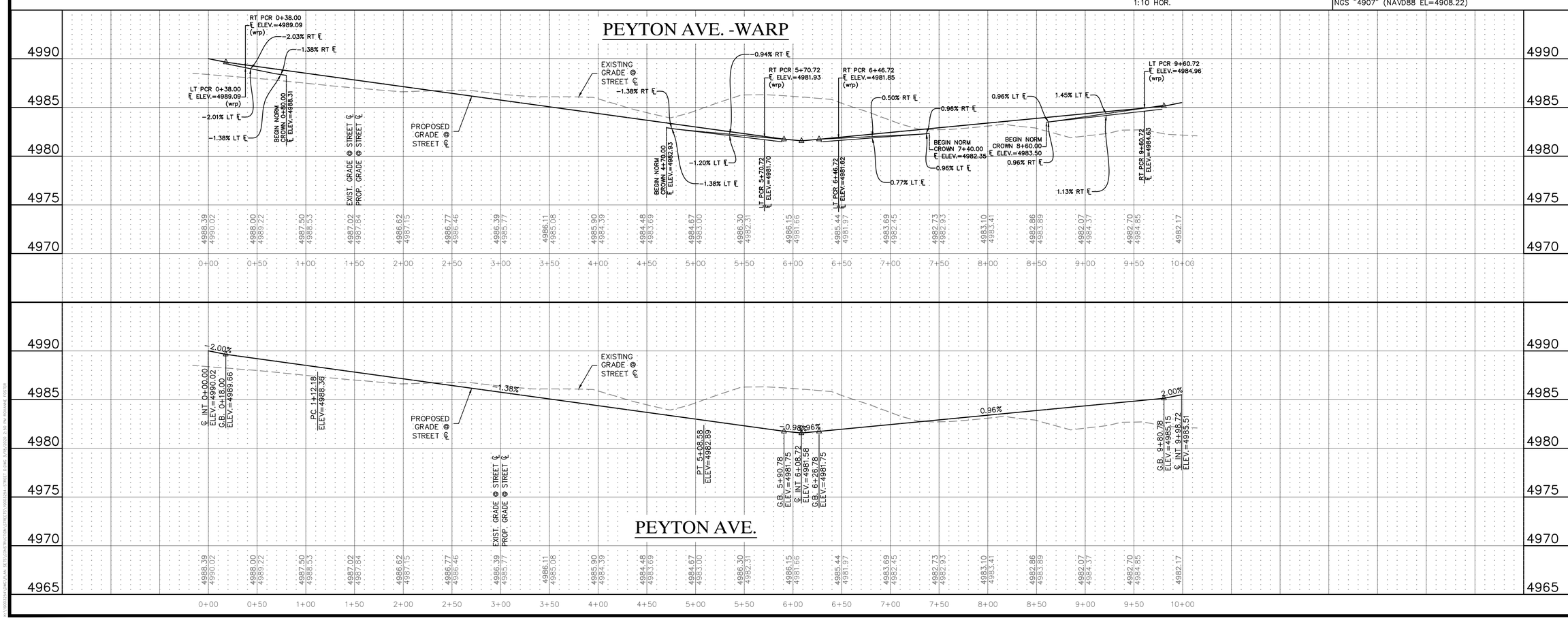
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
ARBOR CAPITAL PARTNERS, LLC
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
PEYTON AVE.

DATE 03/19/20

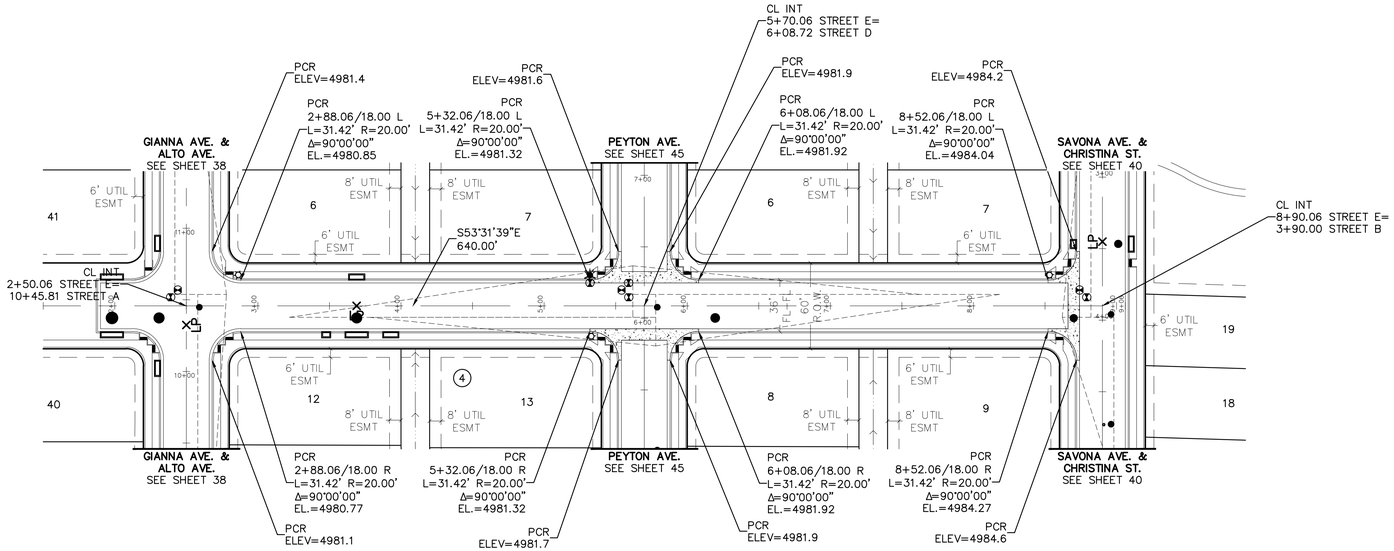
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

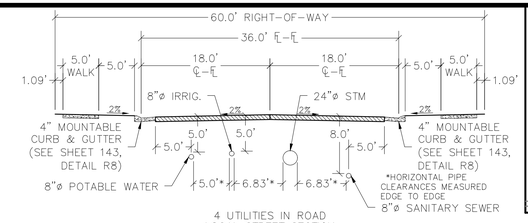
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

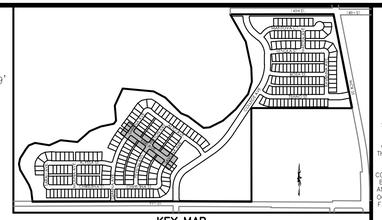
DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 45

CAD FILE: 19003254-STREET D.DWG

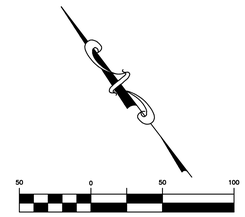




LOCAL STREET SECTION
1:10 HOR.



KEY MAP
N.T.S.



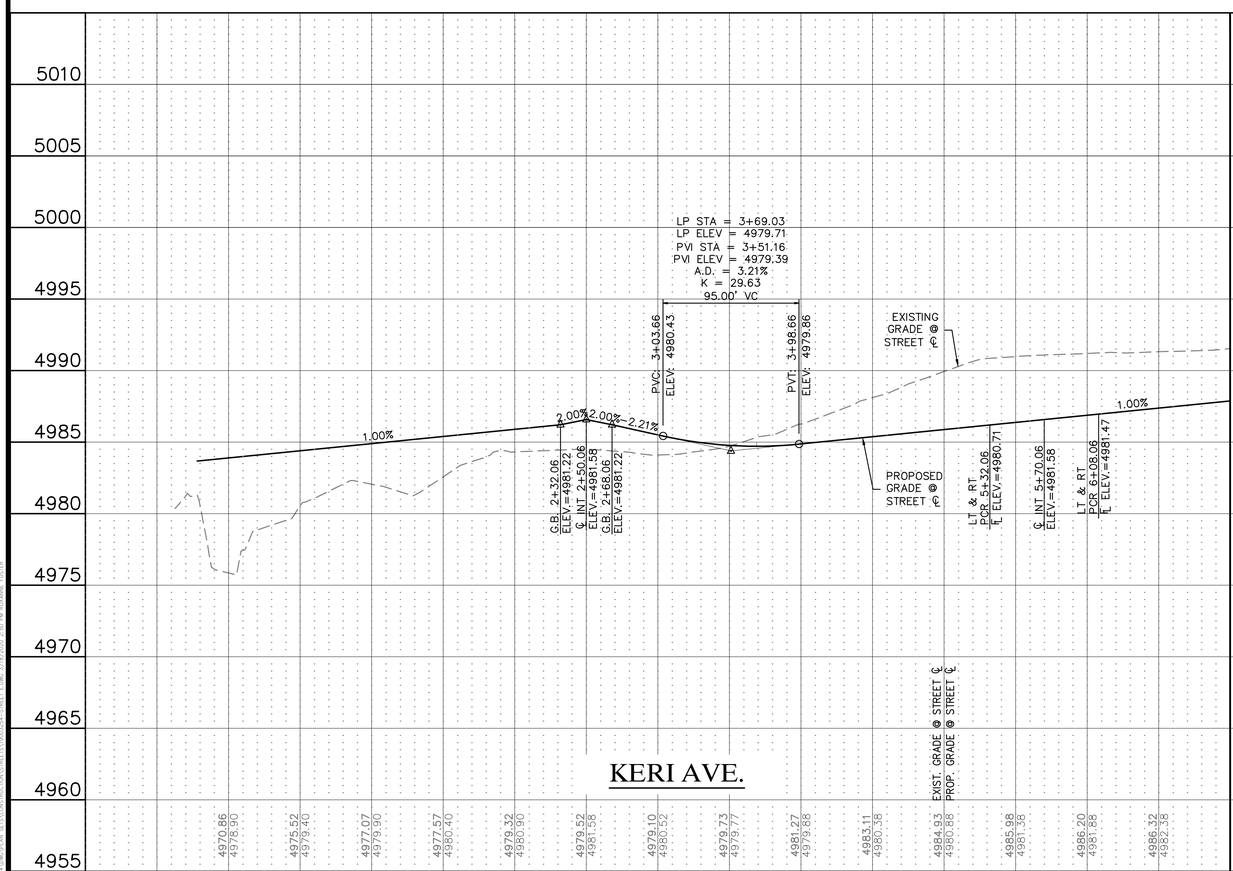
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
KERI AVE.

DATE 03/19/20

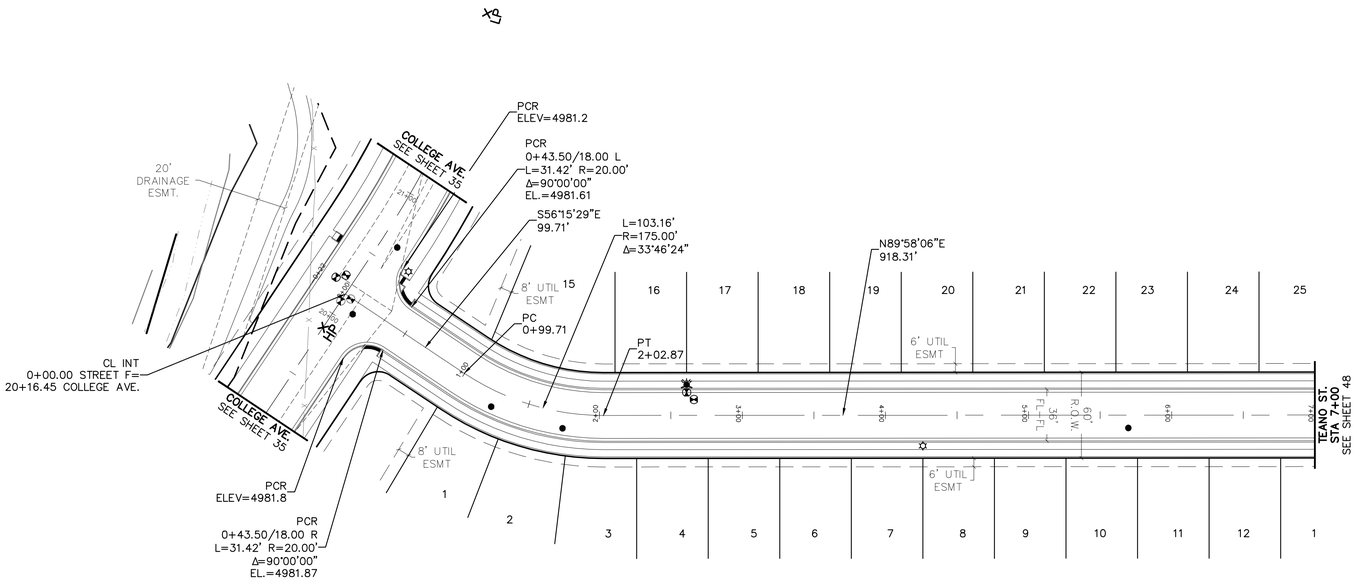
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

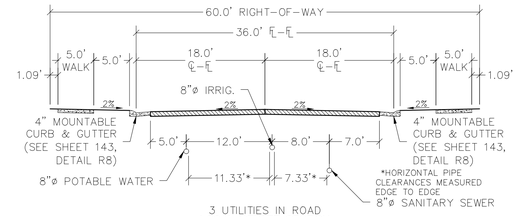
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

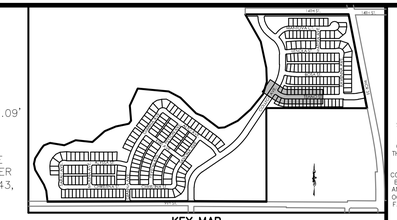
DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 46

CAD FILE: 19003254-STREET ELEVNG

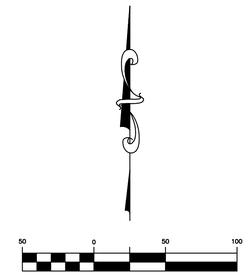




LOCAL STREET SECTION
1:10 HOR.



KEY MAP
N.T.S.



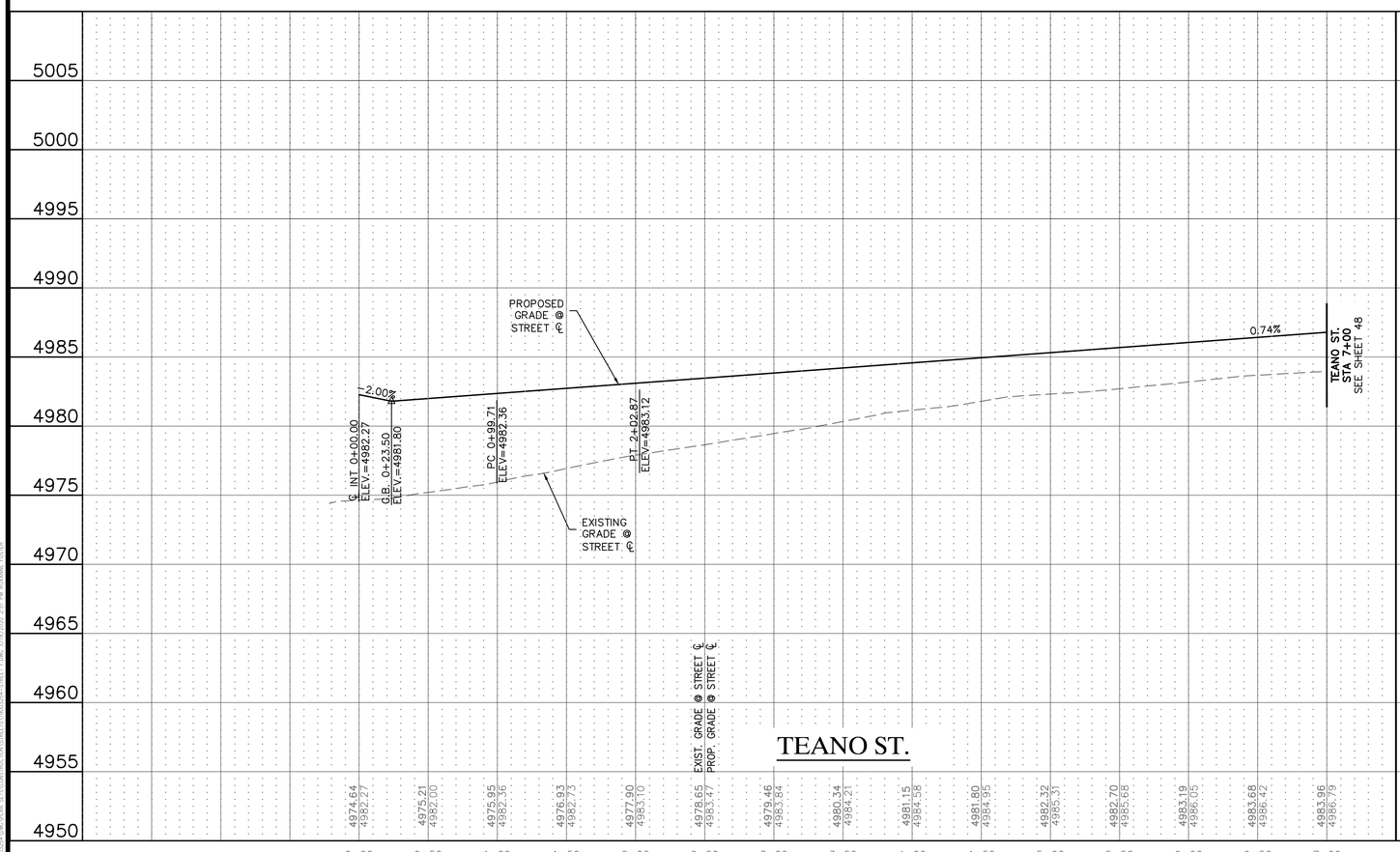
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

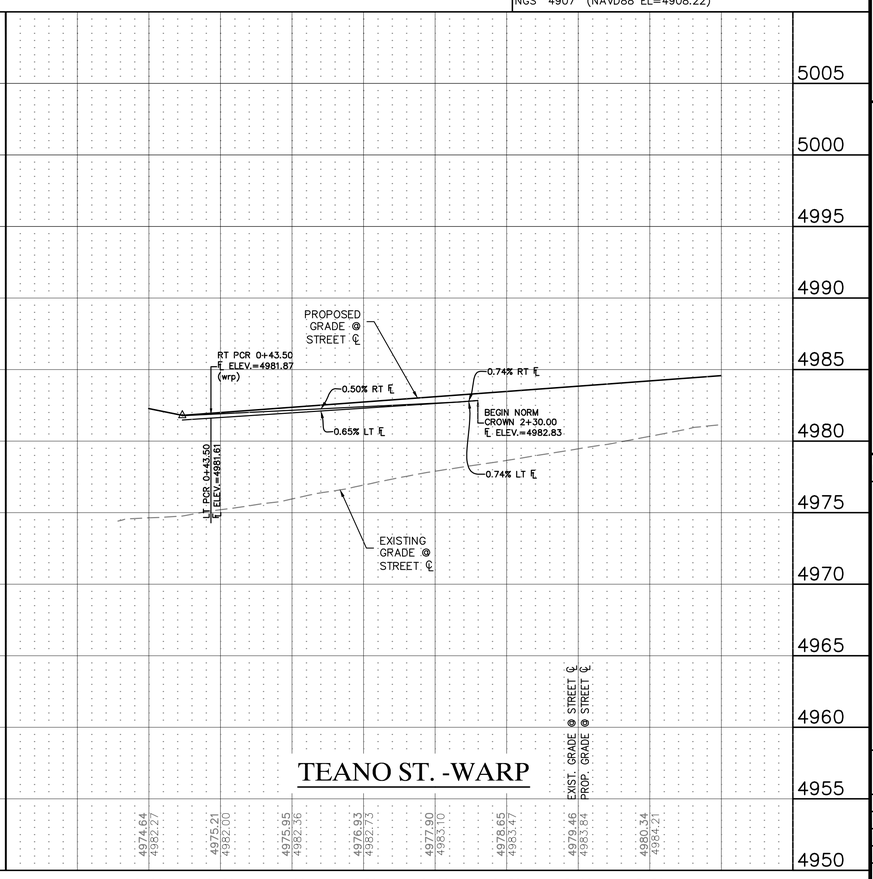
HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

TEANO ST.



TEANO ST.



TEANO ST. -WARP

811
Know what's below.
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
TEANO ST.

DATE
03/19/20

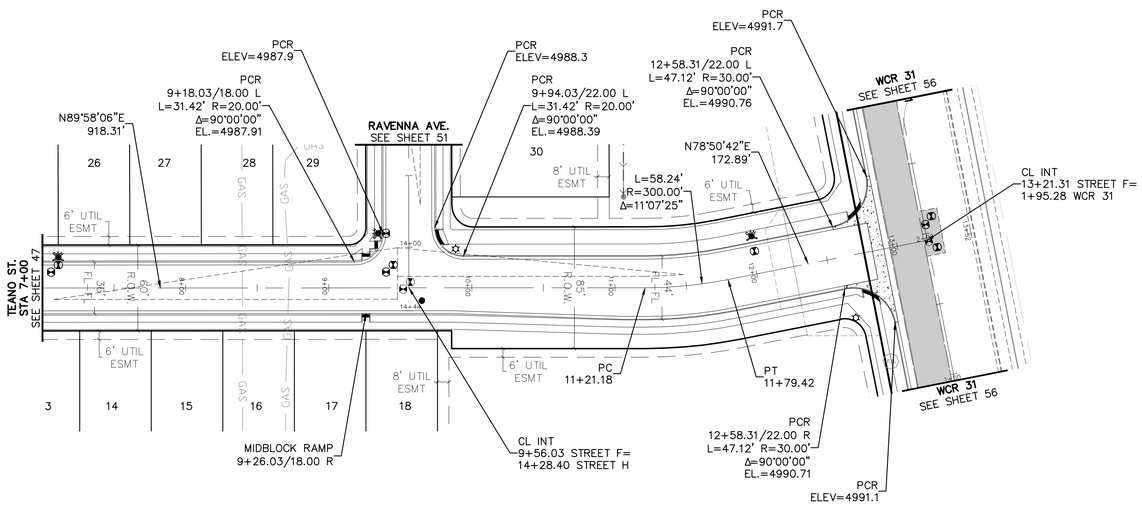
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

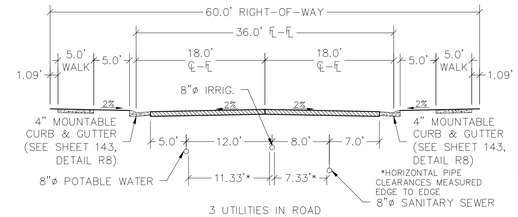
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
47

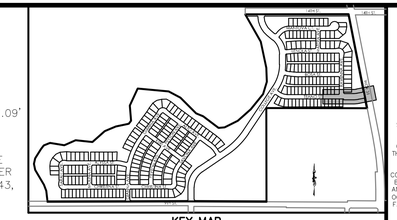
CAD FILE: 19003254-STREET PLDWG



TEANO ST.



LOCAL STREET SECTION
1:10 HOR.



KEY MAP
N.T.S.

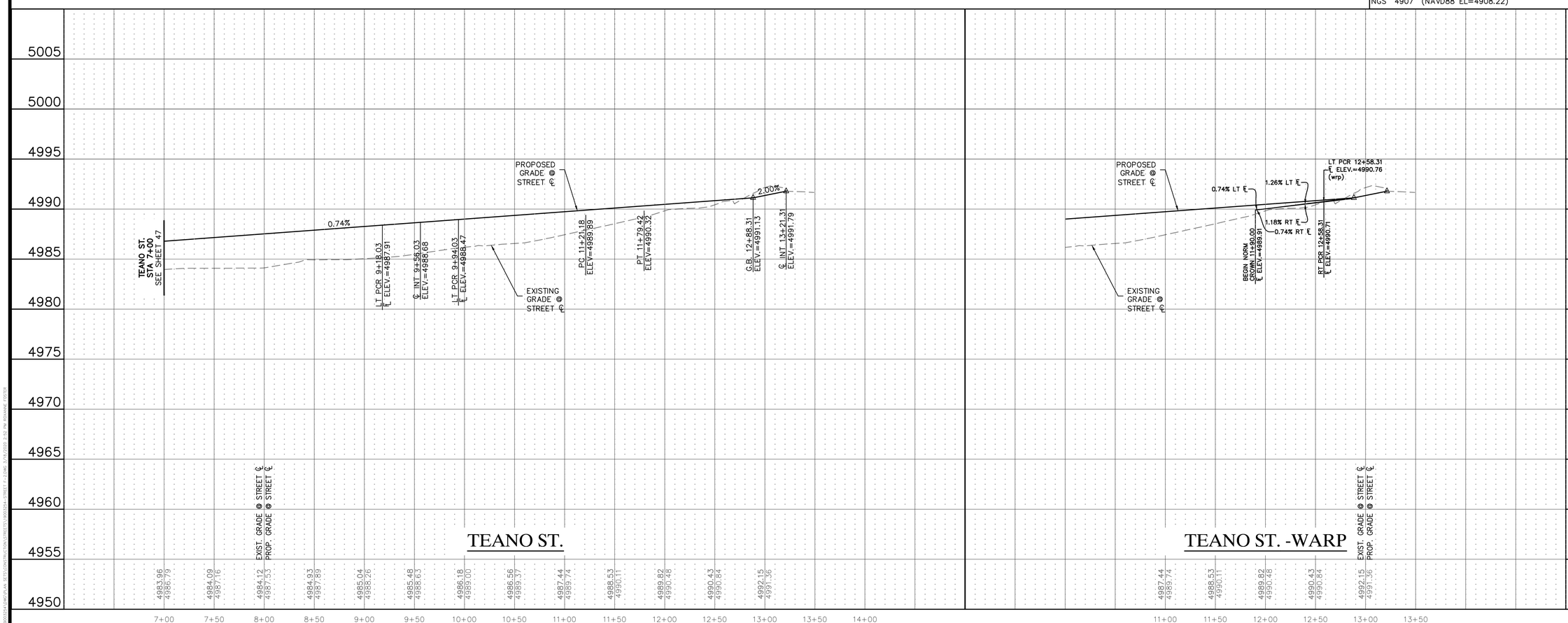
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
TEANO ST.

DATE
03/19/20

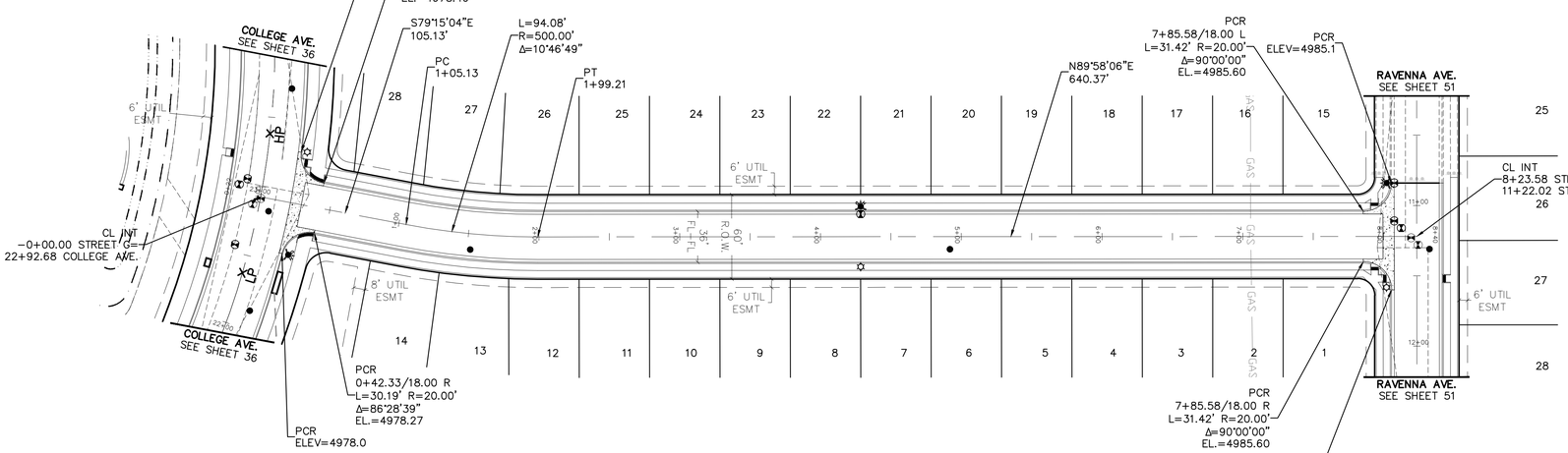
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

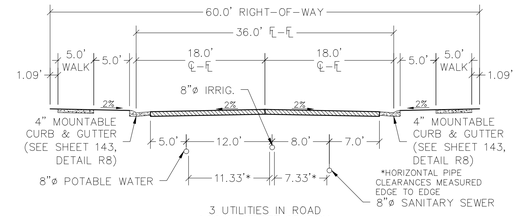
REVISIONS

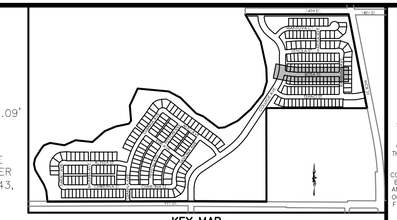
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
48

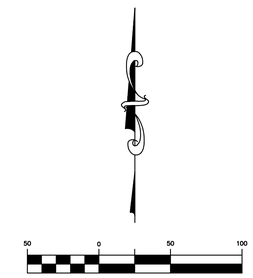
CAD FILE: 19003254-STREET F-2.DWG







KEY MAP
N.T.S.



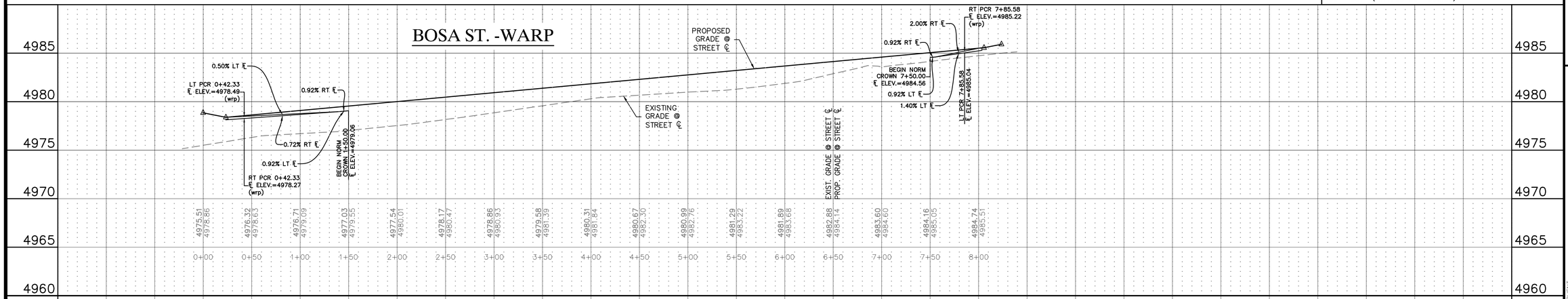
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

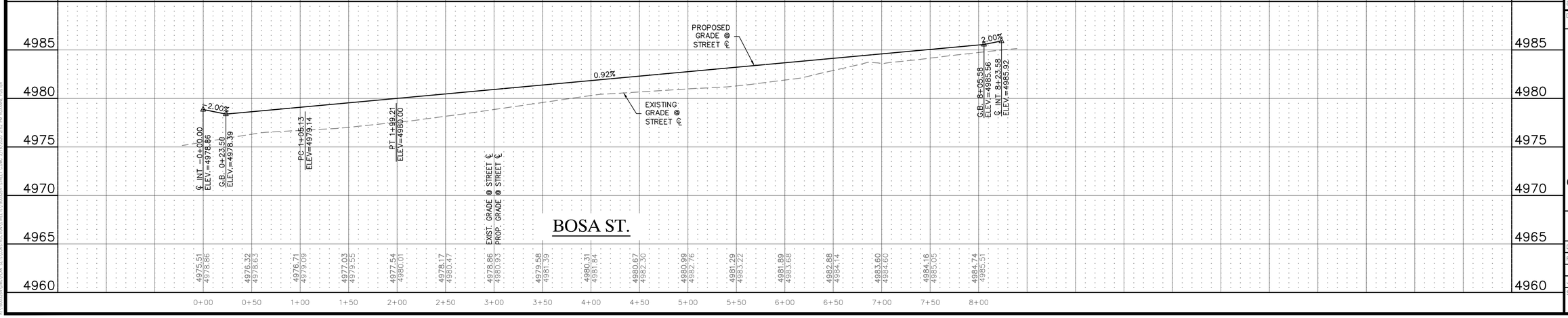
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)





811
Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
BOSA ST.

DATE
03/19/20

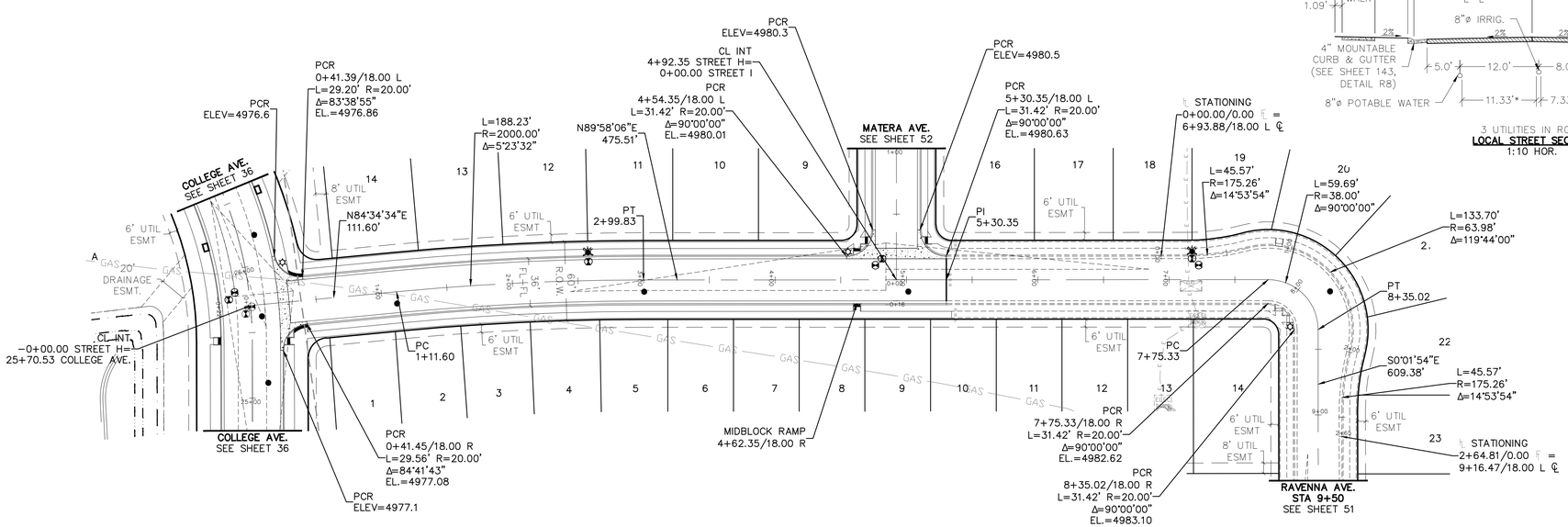
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

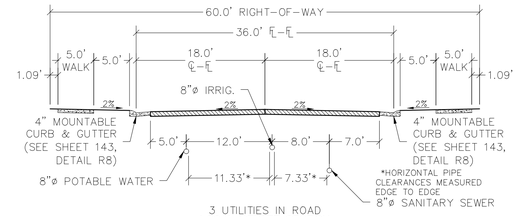
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

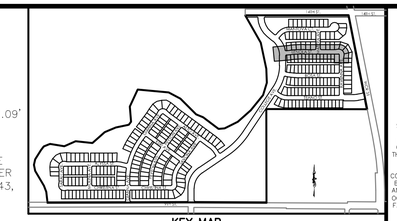
DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 49

CAD FILE: 19003254-STREET G.DWG

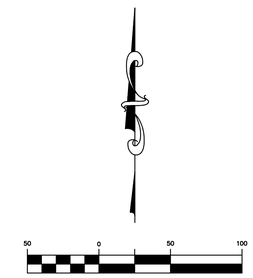




LOCAL STREET SECTION
1:10 HOR.



KEY MAP
N.T.S.



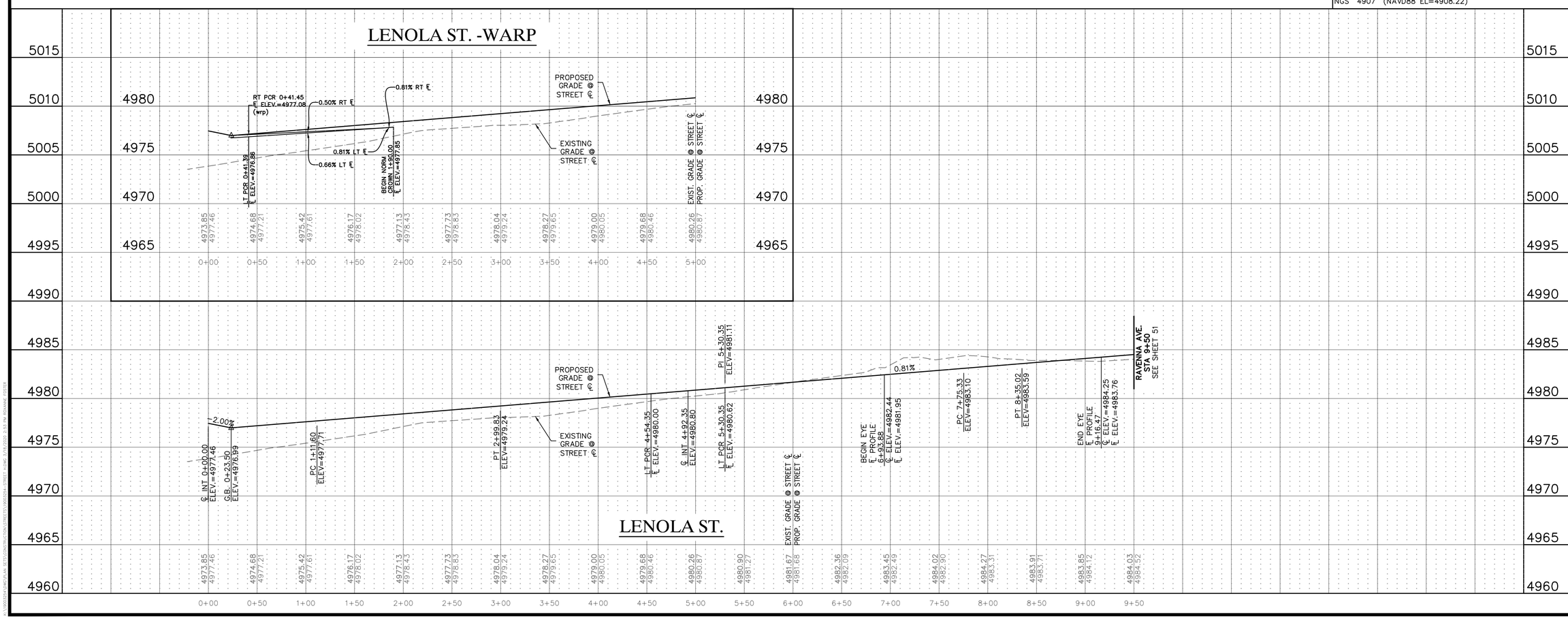
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
LENOLA ST.

DATE
03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 50

Know what's below. Call before you dig.

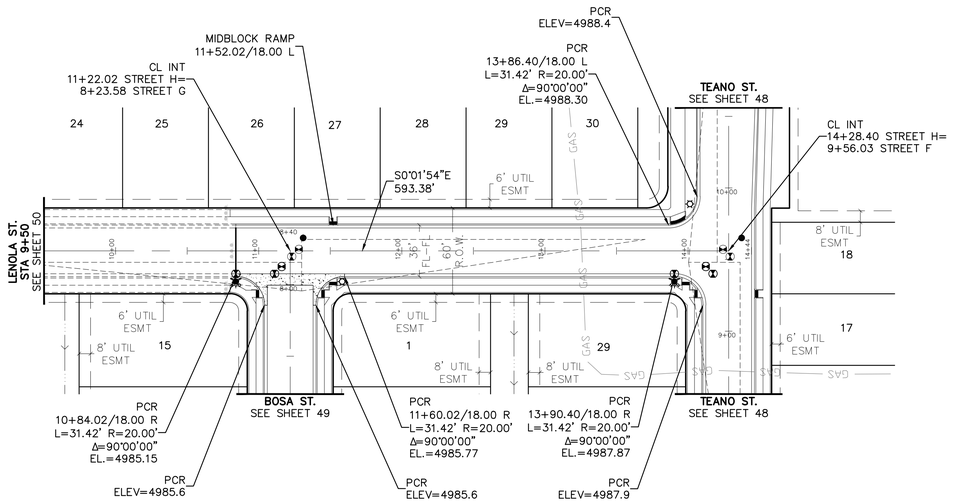
THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

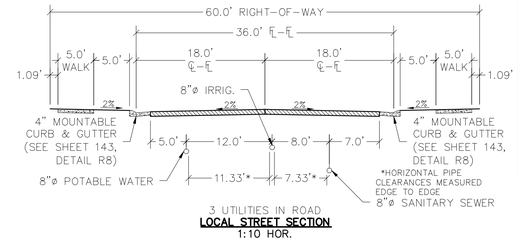
NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

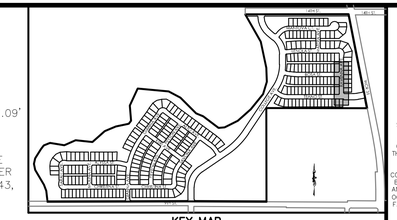
ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

CAD FILE: 19003254-STREET HLDWG





3 UTILITIES IN ROAD
LOCAL STREET SECTION
1:10 HOR.



KEY MAP
N.T.S.

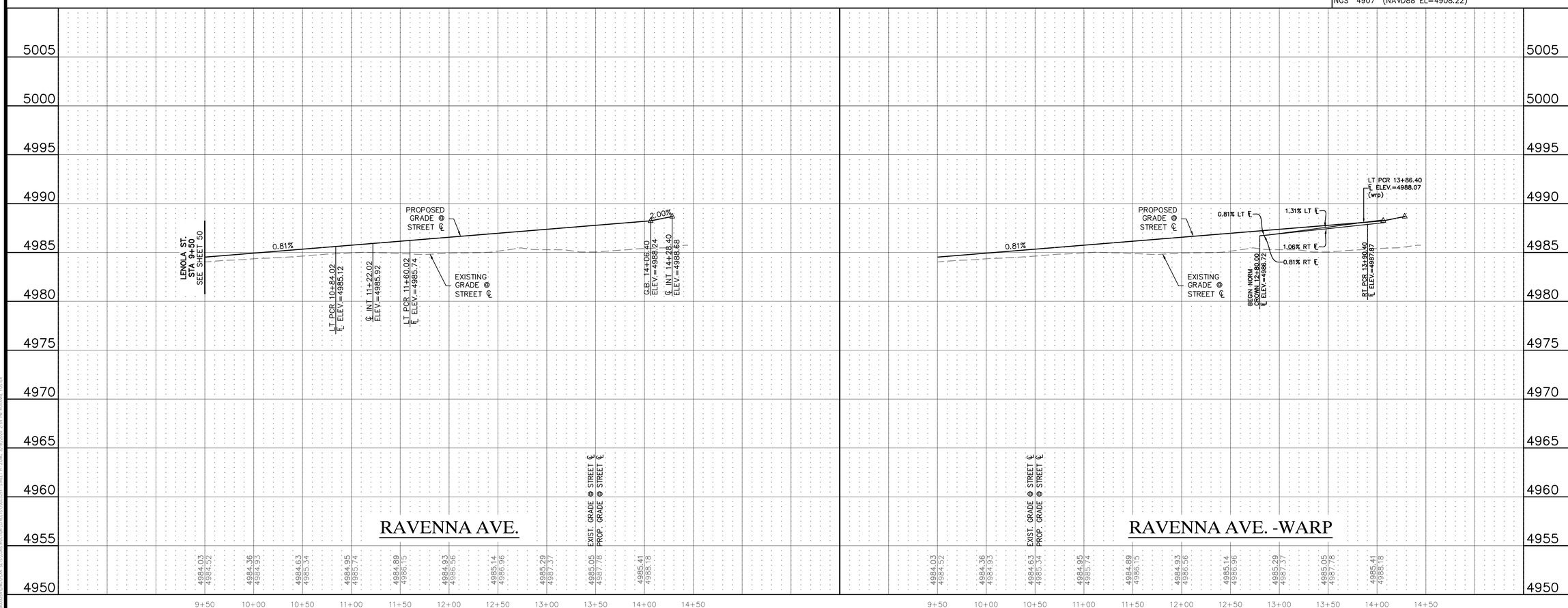
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
RAVENNA AVE.

DATE
03/19/20

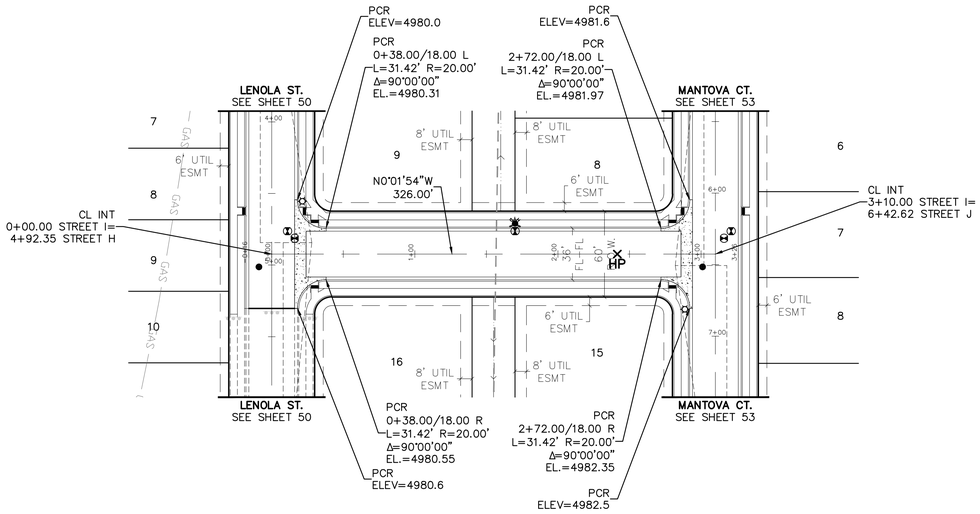
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

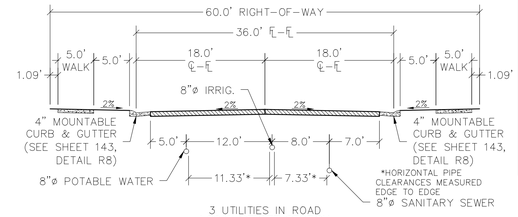
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

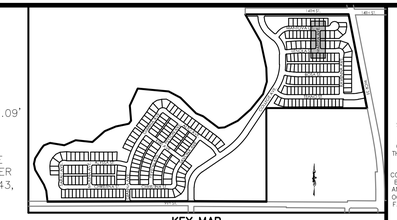
DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
51

CAD FILE: 19003254-STREET H-2.DWG





LOCAL STREET SECTION
1:10 HOR.



KEY MAP
N.T.S.

(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

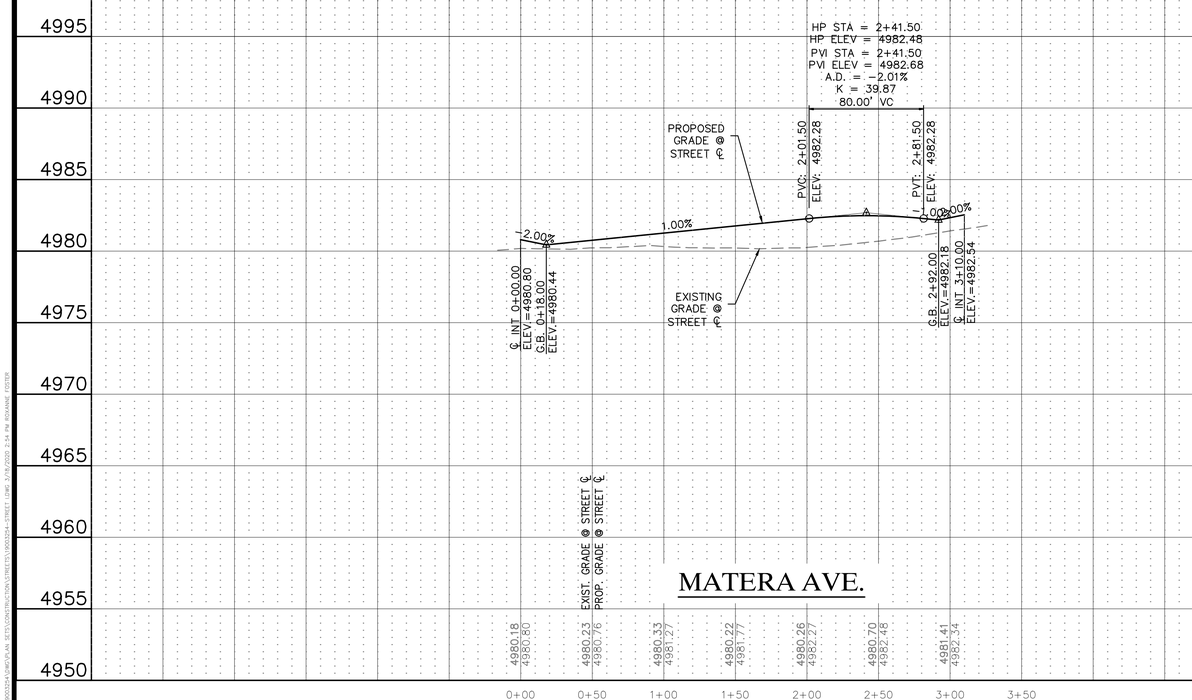
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

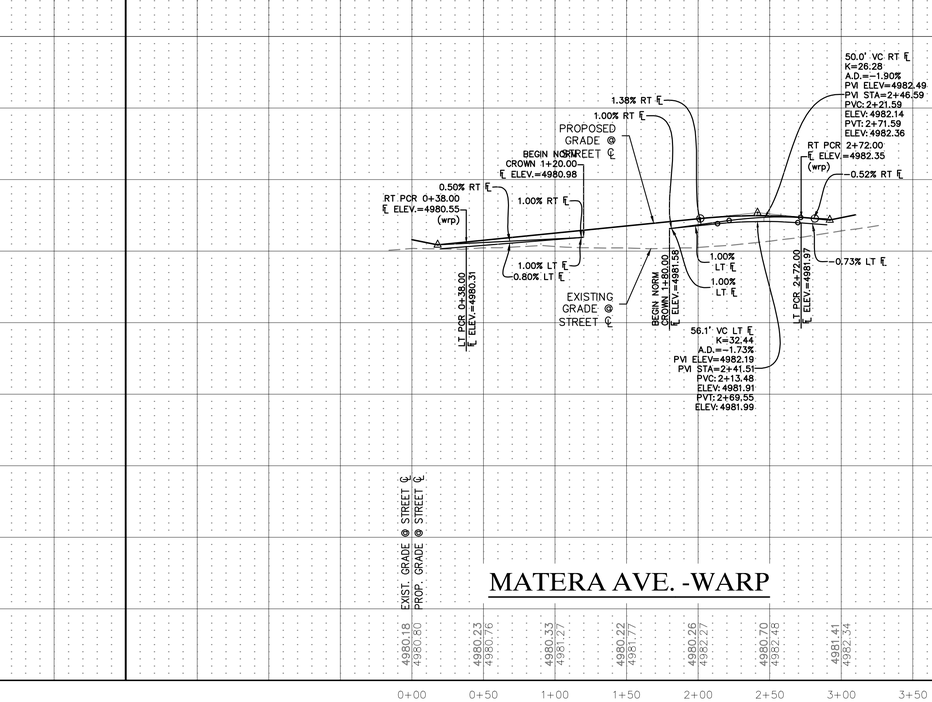
HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

MATERA AVE.



MATERA AVE.



MATERA AVE. -WARP

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
MATERA AVE.

DATE 03/19/20

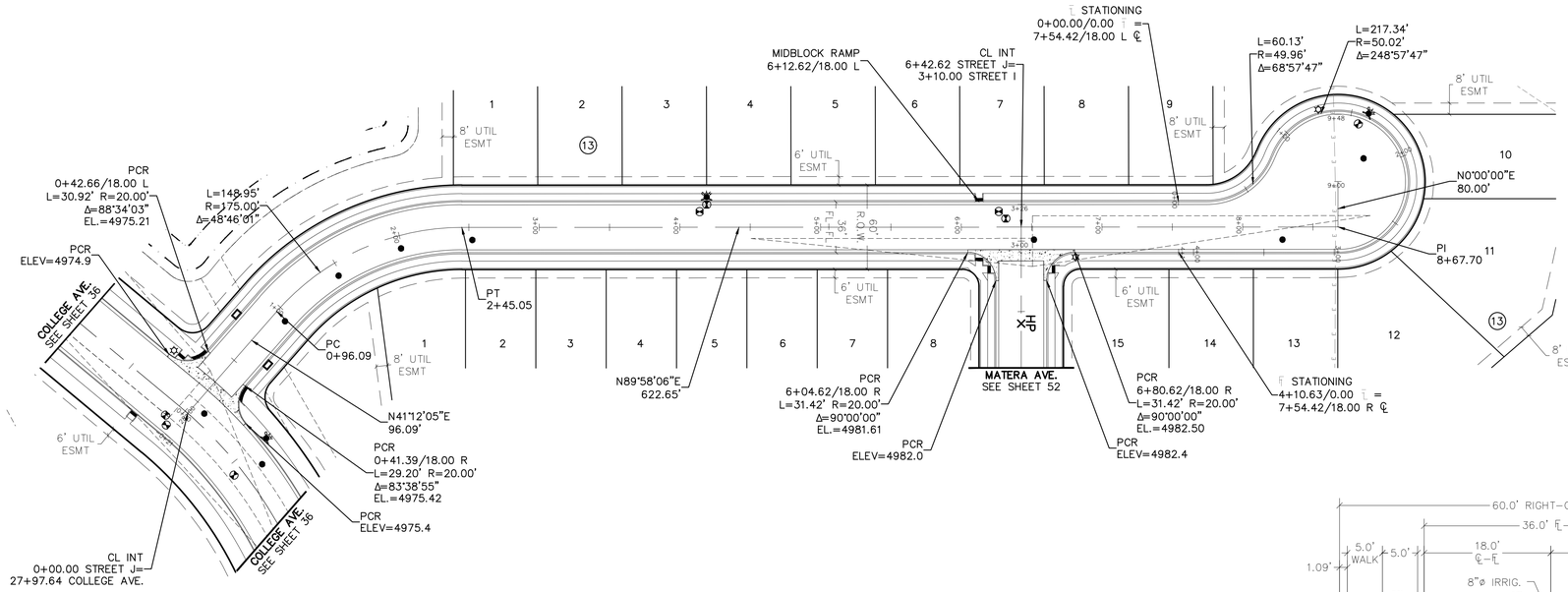
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

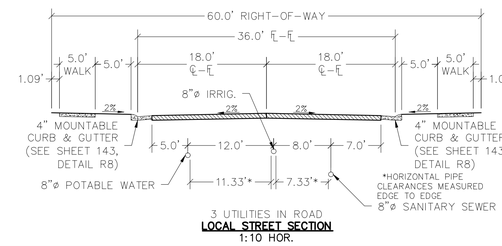
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 52

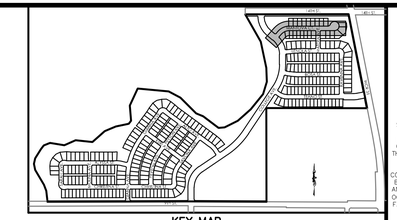
CAD FILE: 19003254-STREET 1.DWG



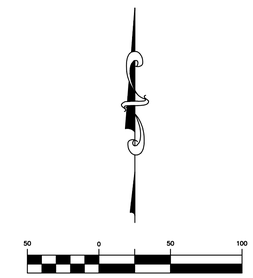
MANTOVA CT.



3. UTILITIES IN ROAD
LOCAL STREET SECTION
1:10 HOR.



KEY MAP
N.T.S.

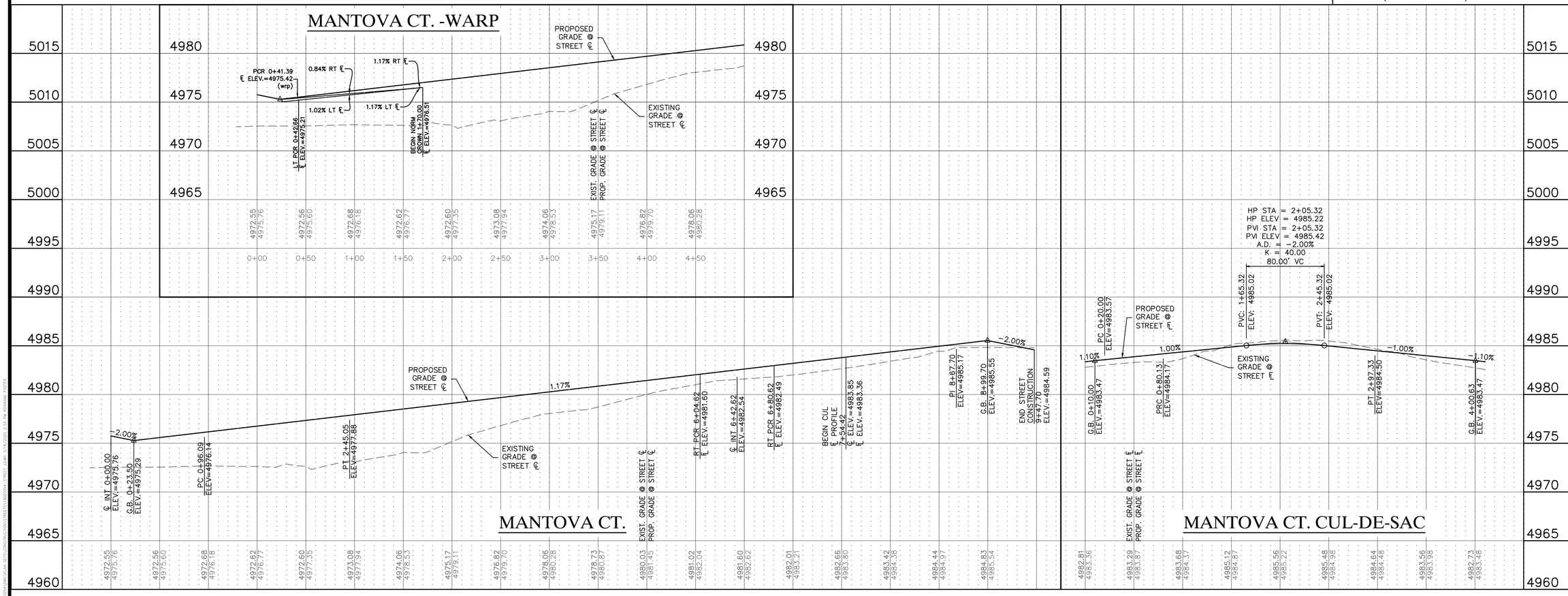


PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
ARBOR CAPITAL PARTNERS, LLC
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
MANTOVA CT.

DATE 03/19/20

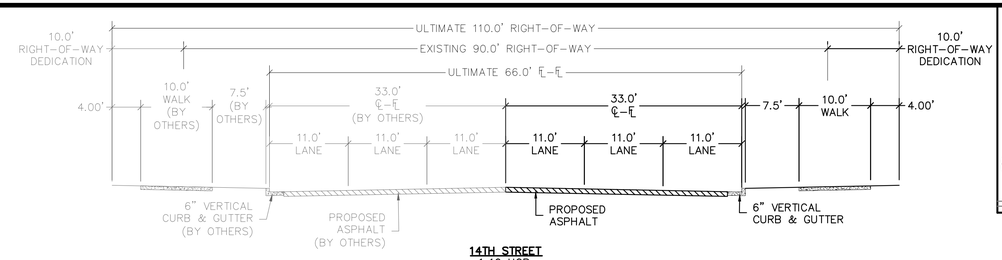
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

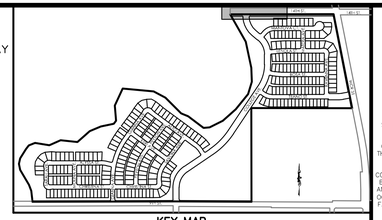
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 53

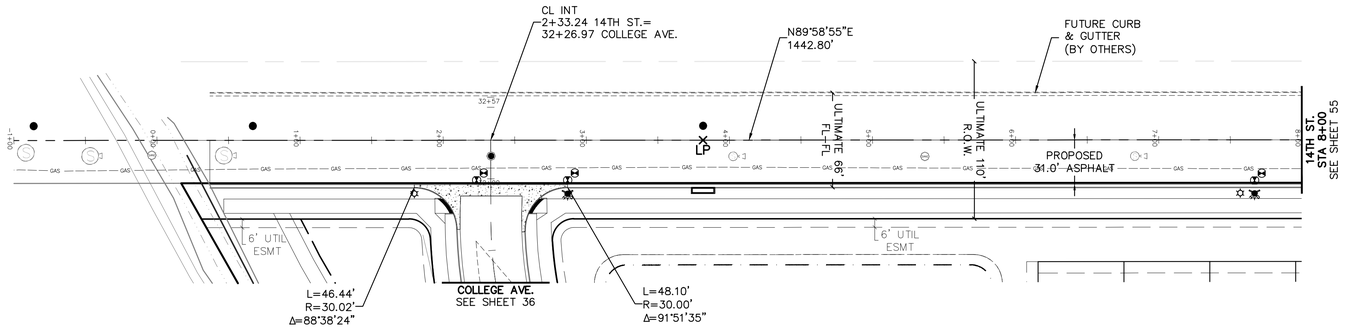
CAD FILE: 19003254-STREET.DWG



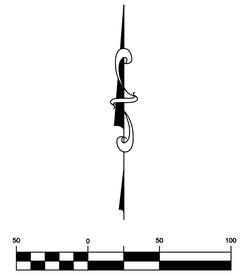
14TH STREET
1:10 HOR.



KEY MAP
N.T.S.



14TH ST.



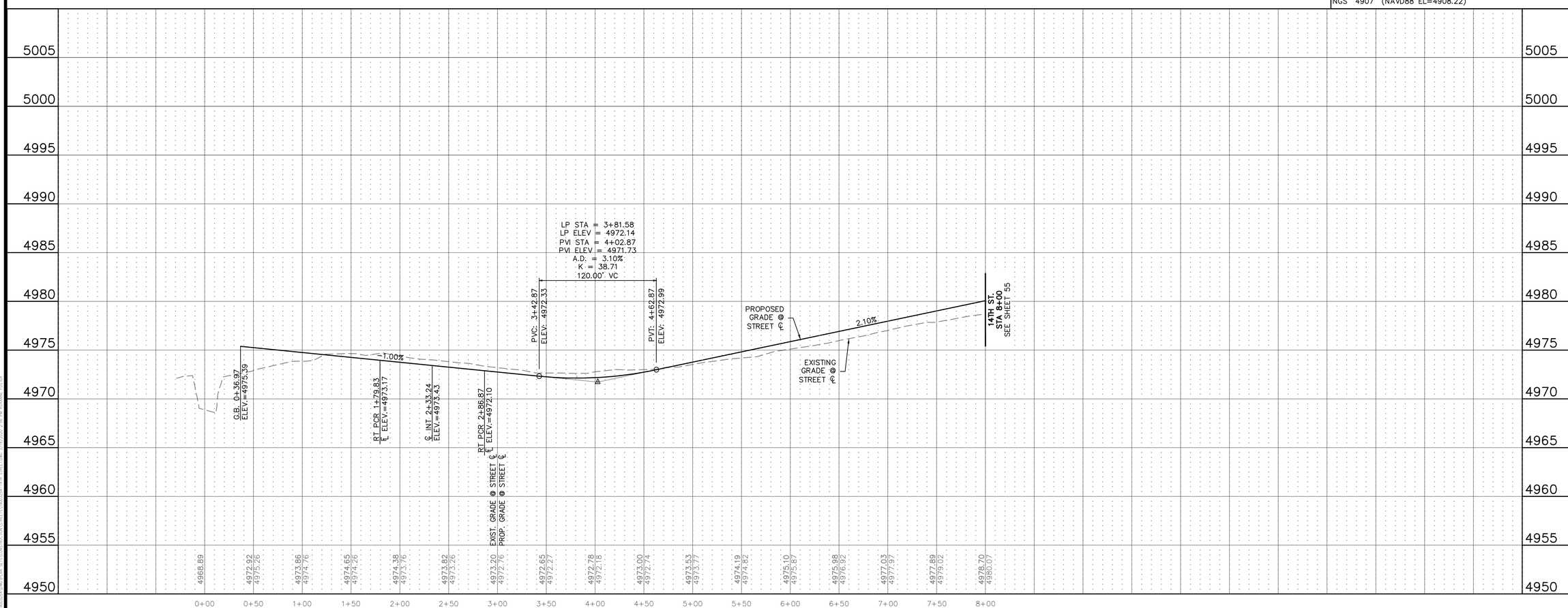
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811
Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
14TH ST.

DATE
03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

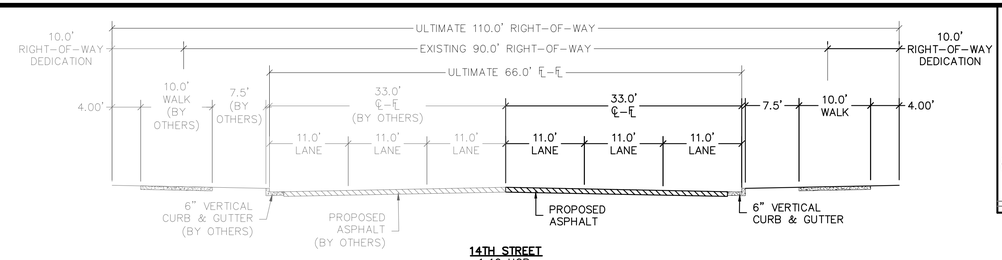
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

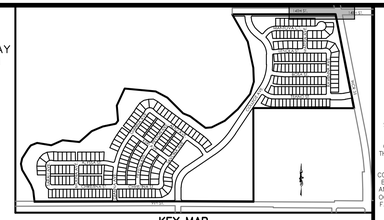
DR. RF | CH. MAM
P.M. MAM

JOB 19003254
SHEET NO.
54

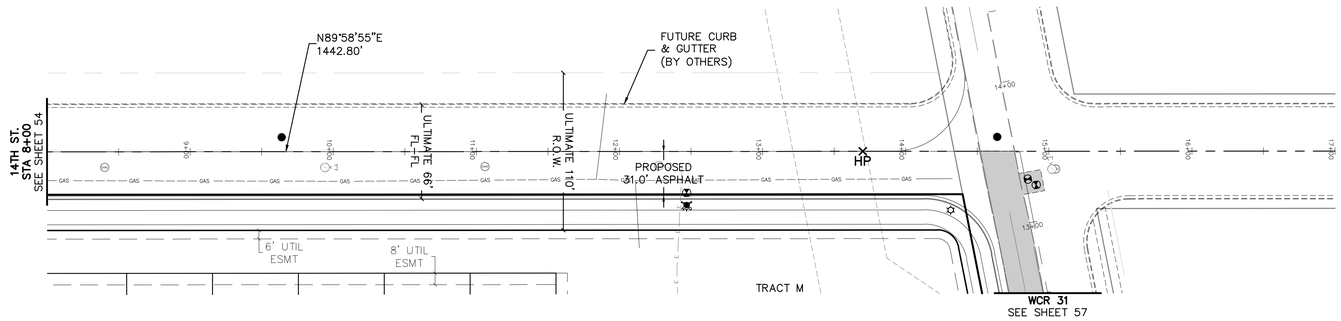
CAD FILE: 19003254-14TH STREET.DWG



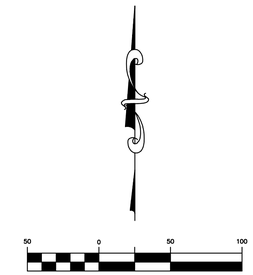
14TH STREET
1:10 HOR.



KEY MAP
N.T.S.



14TH ST.

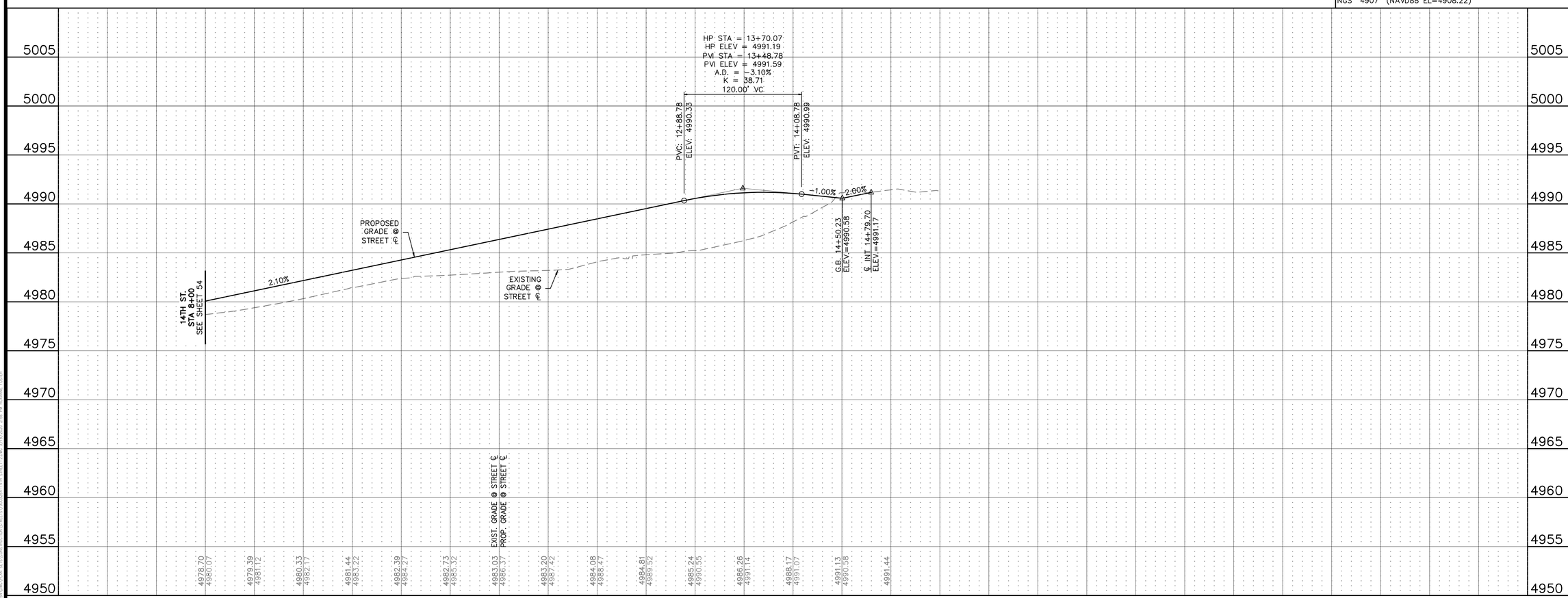


PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811
Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
14TH ST.

DATE
03/19/20

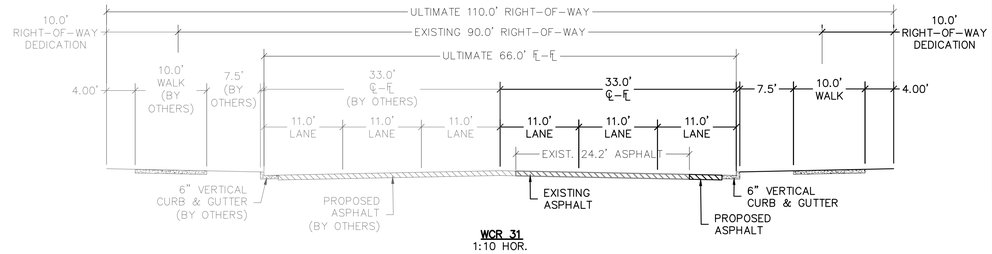
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

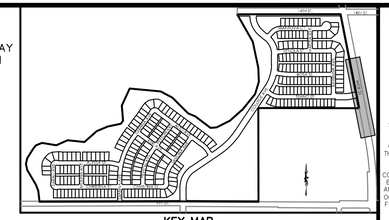
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
55

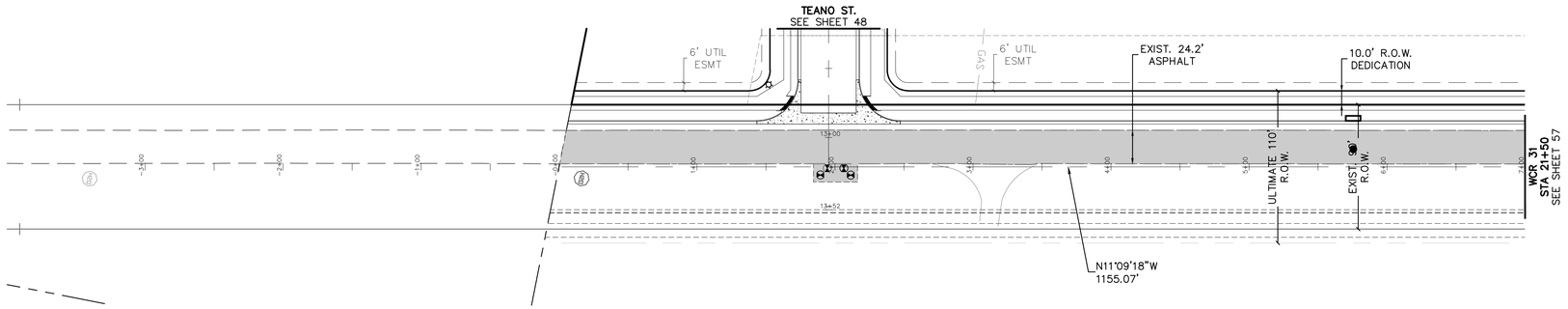
CAD FILE: 19003254-14TH STREET-2.DWG



WCR 31
1:10 HOR.



KEY MAP
N.T.S.



WCR 31

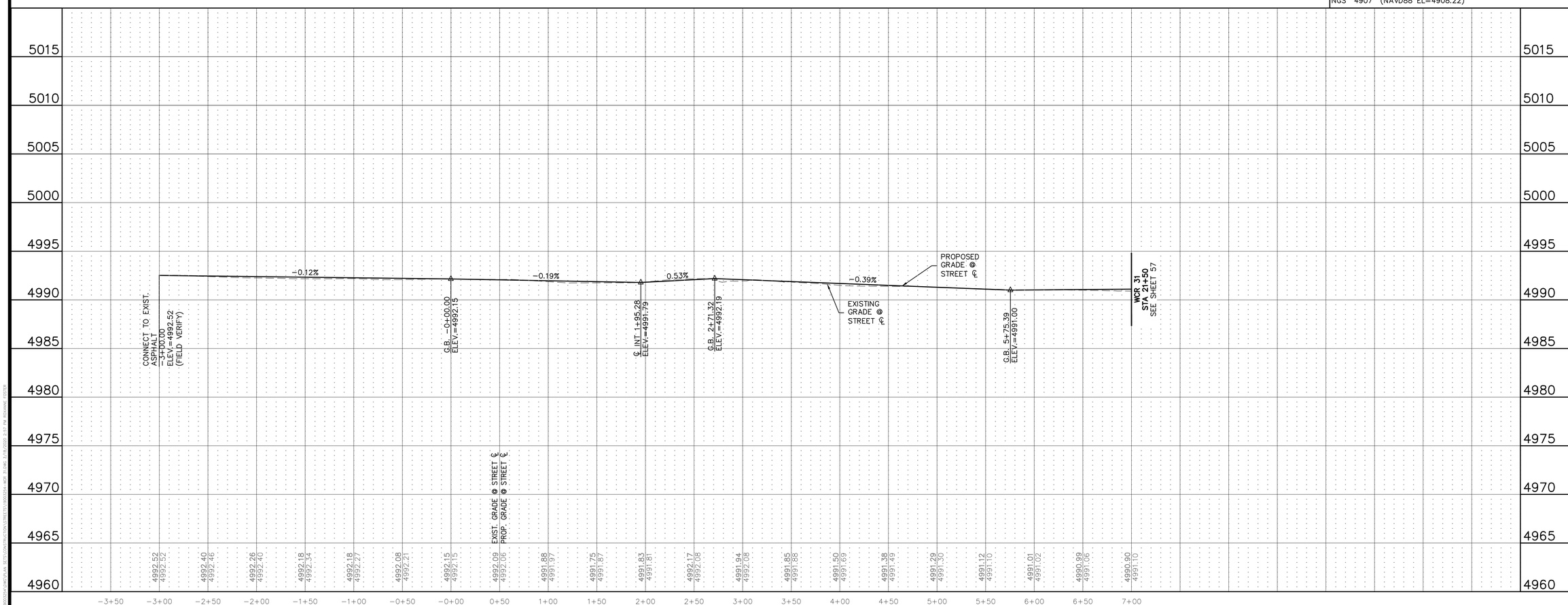
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
WCR 31

DATE 03/19/20

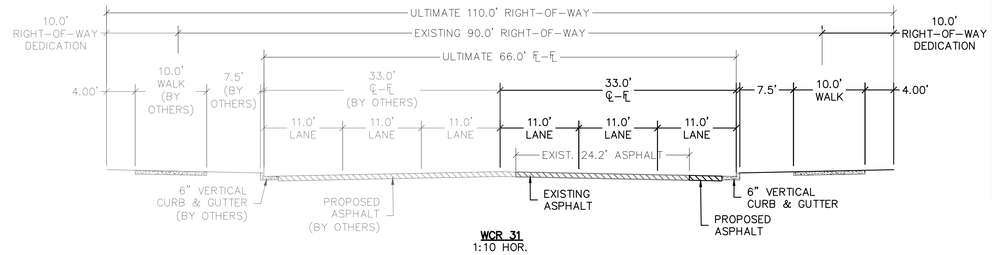
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

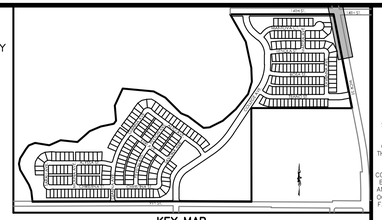
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 56

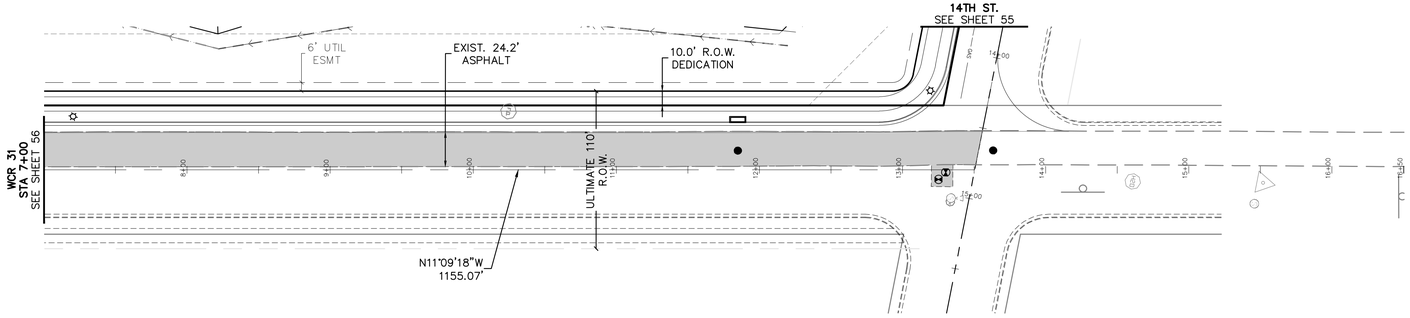
CAD FILE: 19003254-WCR 31.DWG



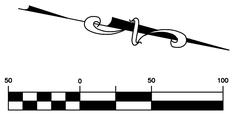
WCR 31
1:10 HOR.



KEY MAP
N.T.S.



WCR 31



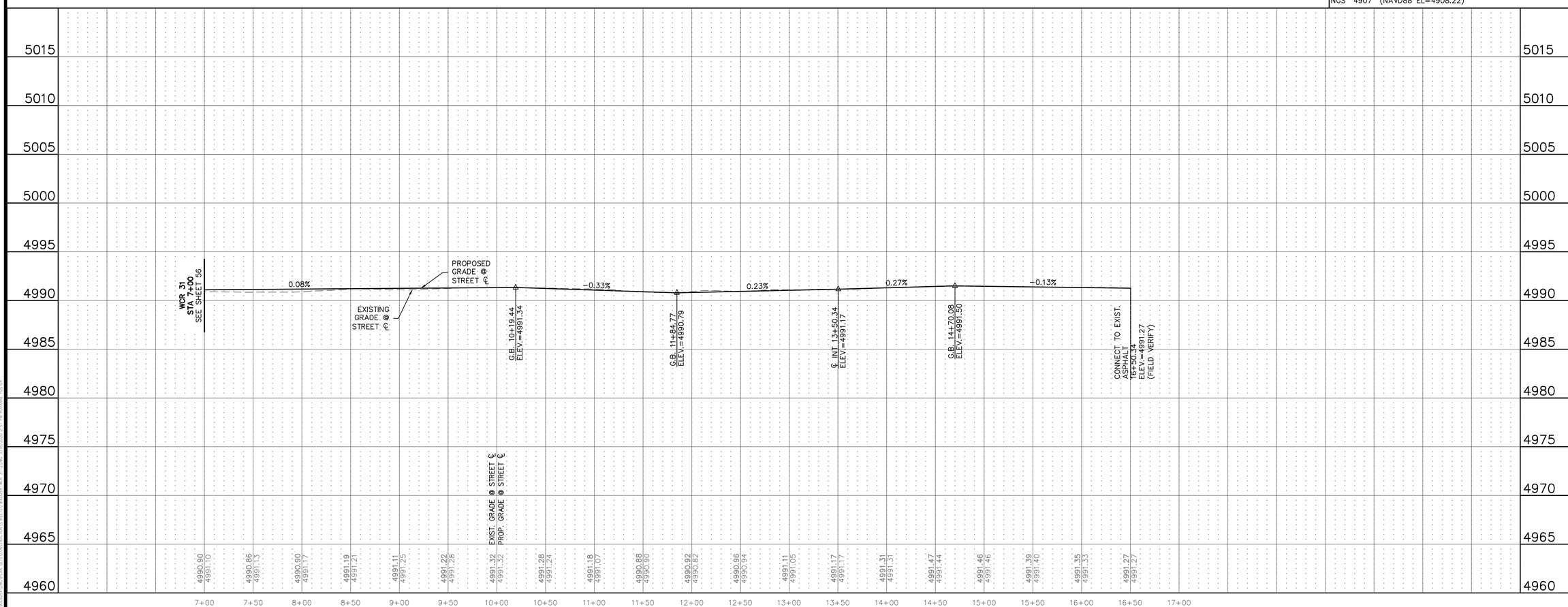
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811
Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
WCR 31

DATE
03/19/20

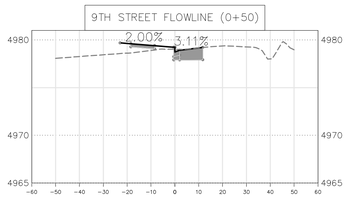
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

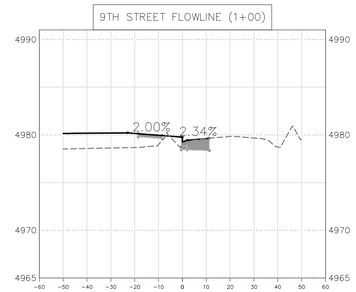
REVISIONS

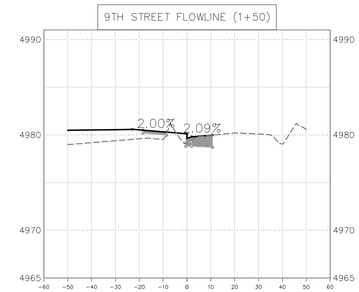
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

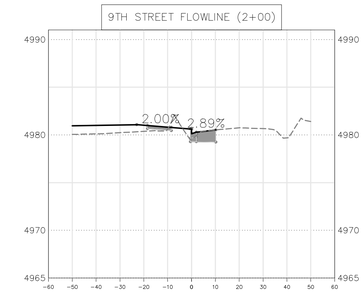
DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
57

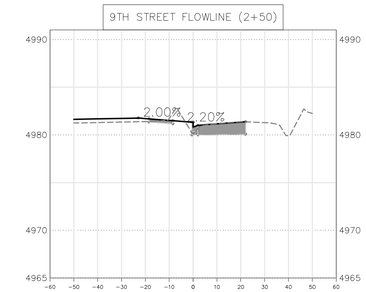
CAD FILE: 19003254-WCR 31-2.DWG

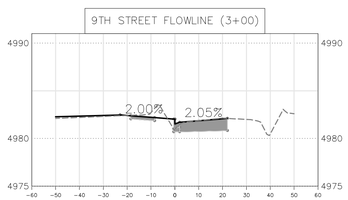


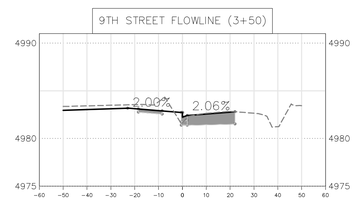


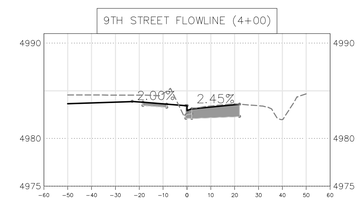


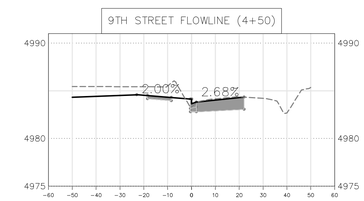


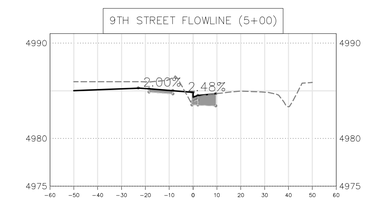


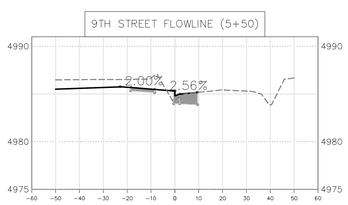


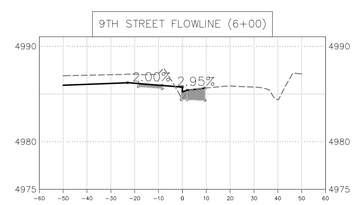


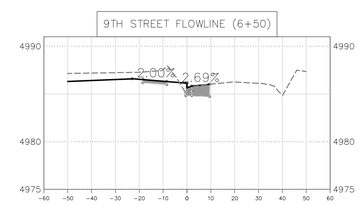


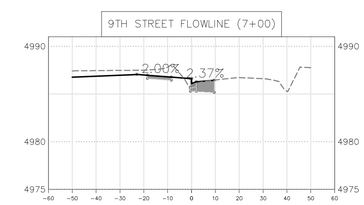


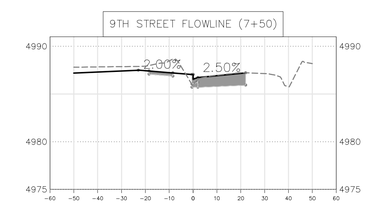


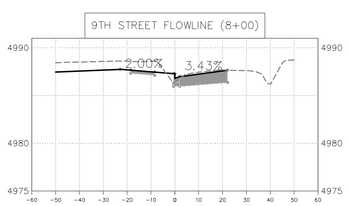


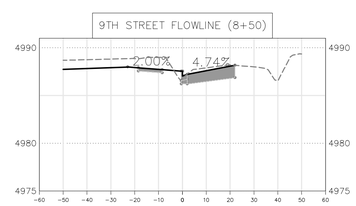


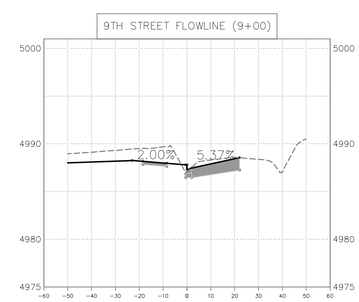


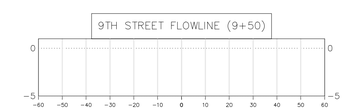


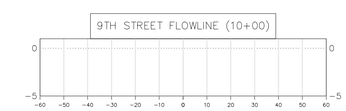












PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE. 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
9TH ST. SECTIONS

DATE
03/19/20

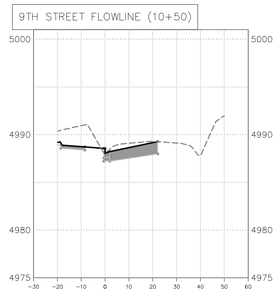
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

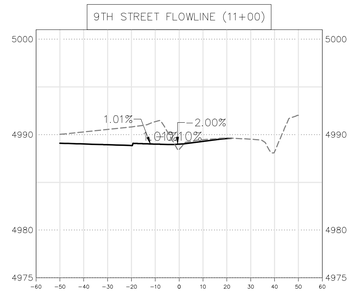
REVISIONS

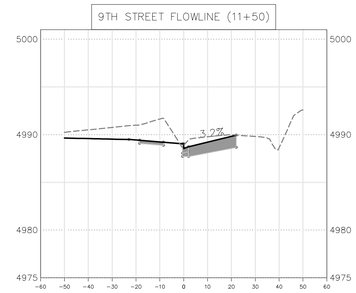
PLANS UNDER REVIEW
NOT FOR CONSTRUCTION

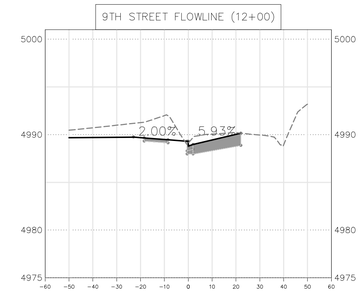
DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
58

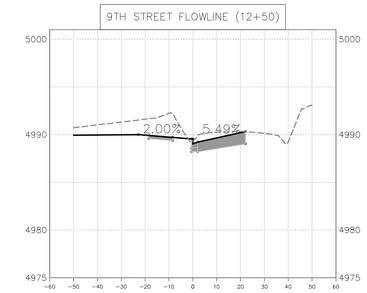
CAD FILE: 19003254 – STREET SECTIONS.DWG

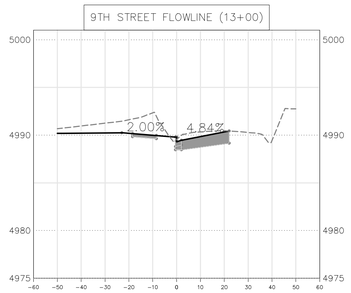


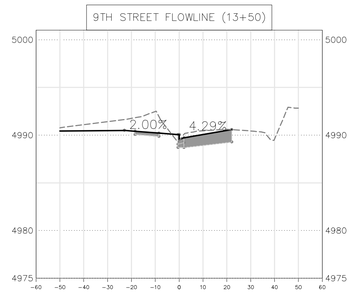


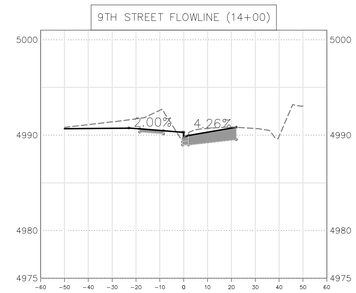


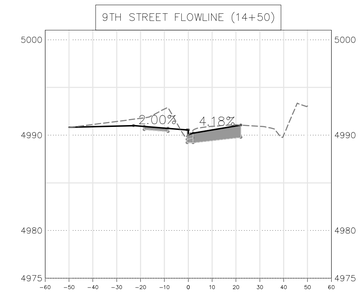


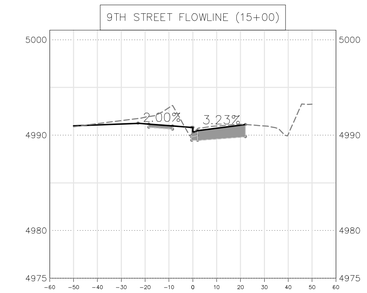


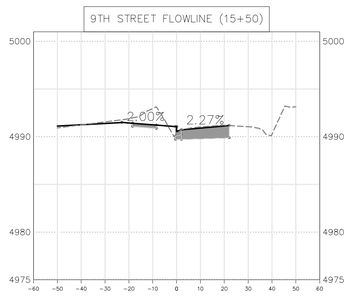


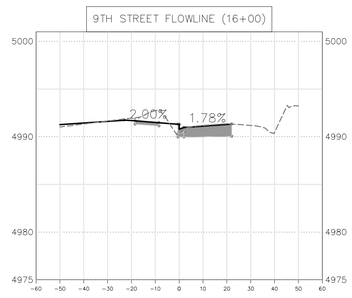


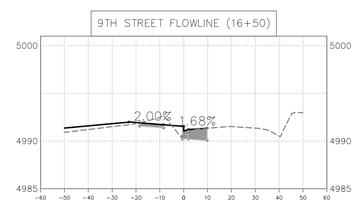


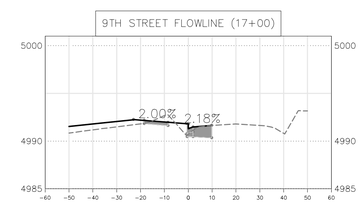


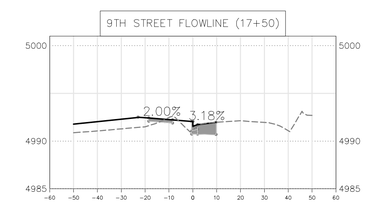


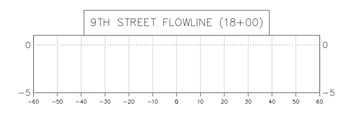


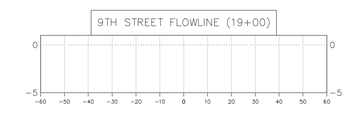


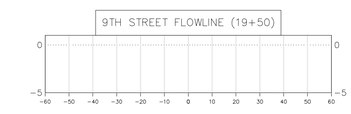


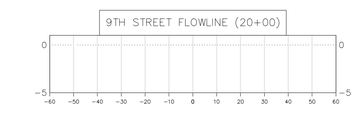












PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

811 Know what's **below.** **Call** before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
9TH ST. SECTIONS

DATE 03/19/20

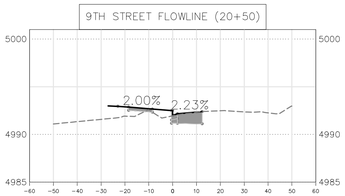
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

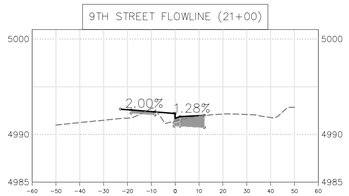
REVISIONS

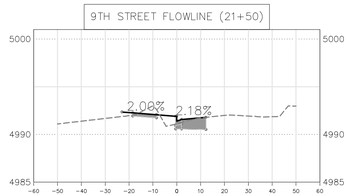
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

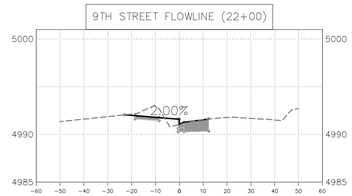
DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 59

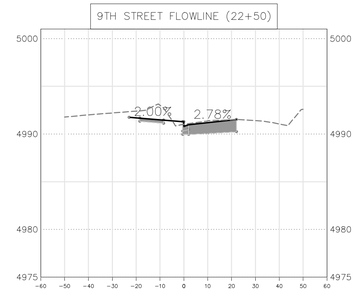
CAD FILE: 19003254 – STREET SECTIONS.DWG

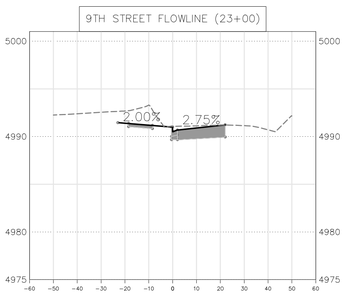


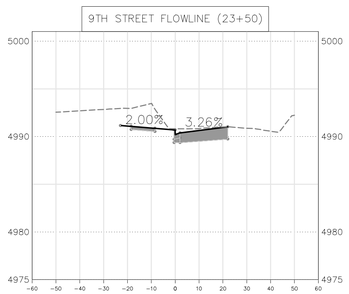


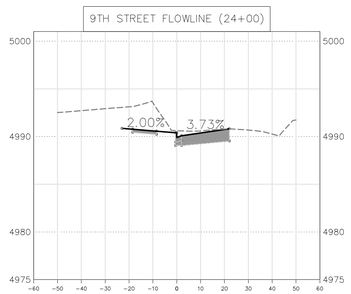


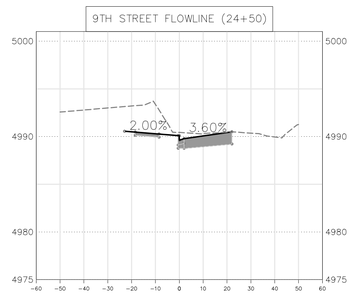


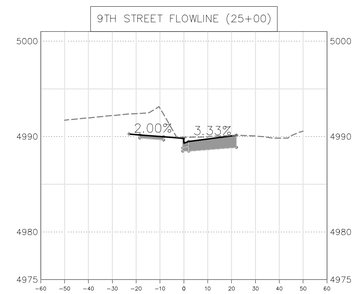


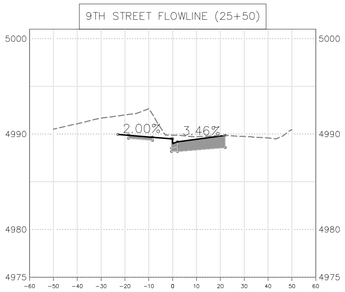


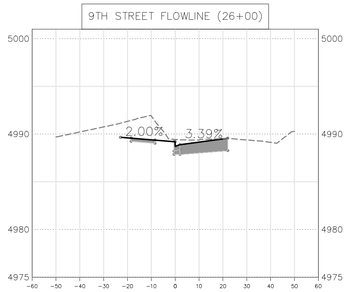


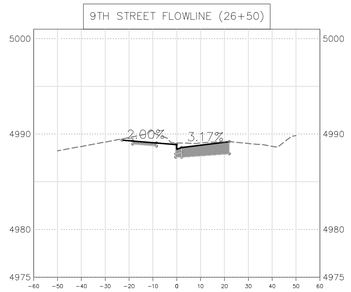


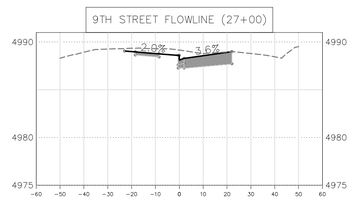


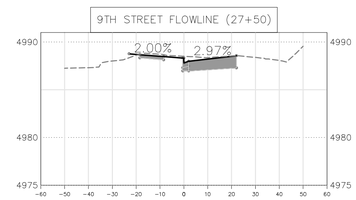


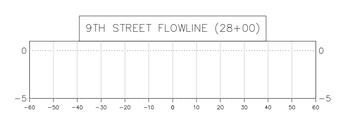


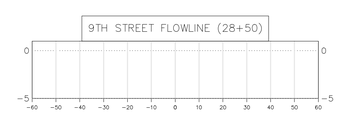


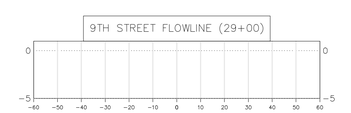


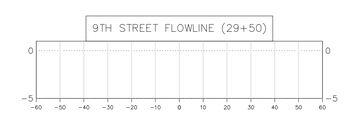


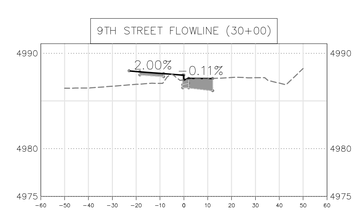












PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

811 Know what's **below.** **Call** before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STREET PLAN & PROFILE
9TH ST. SECTIONS

DATE 03/19/20

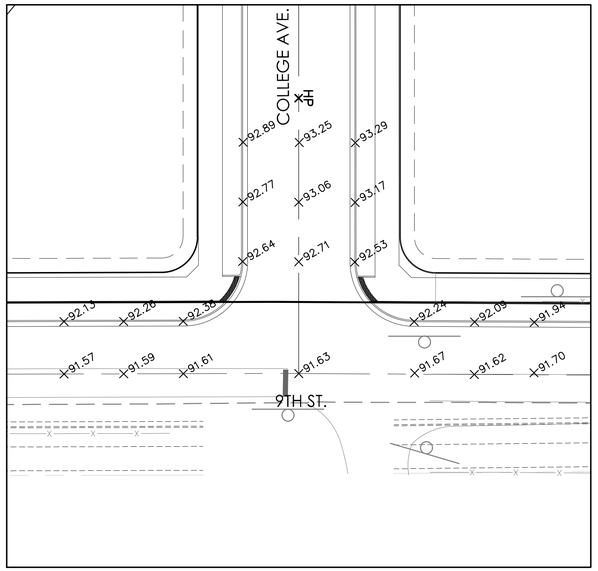
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

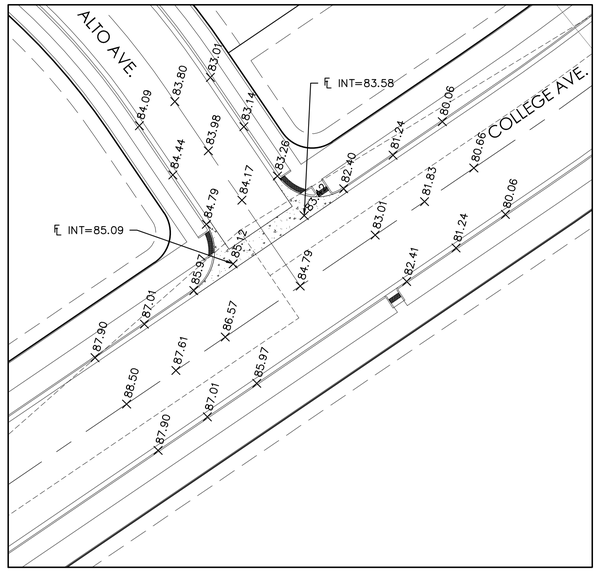
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 60

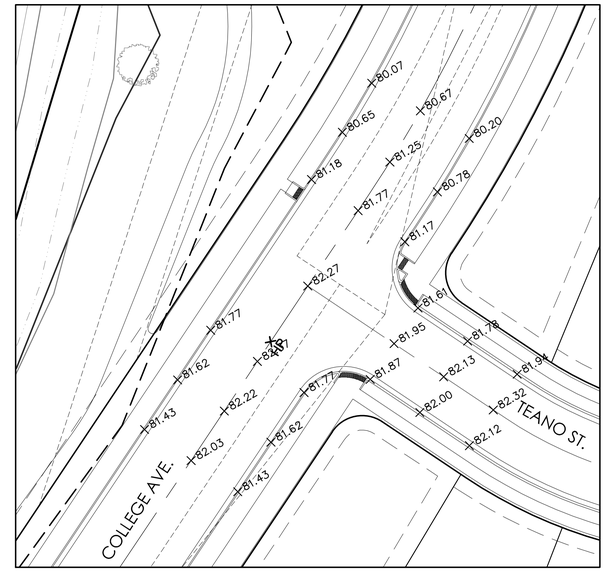
CAD FILE: 19003254 – STREET SECTIONS.DWG



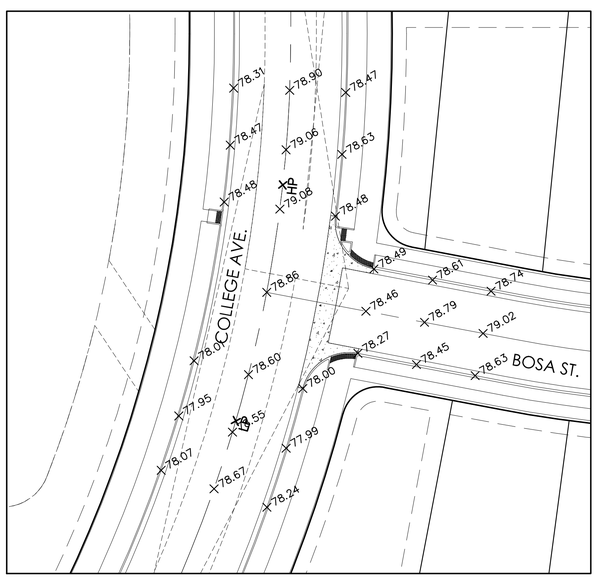
COLLEGE AVE. & 9TH ST.



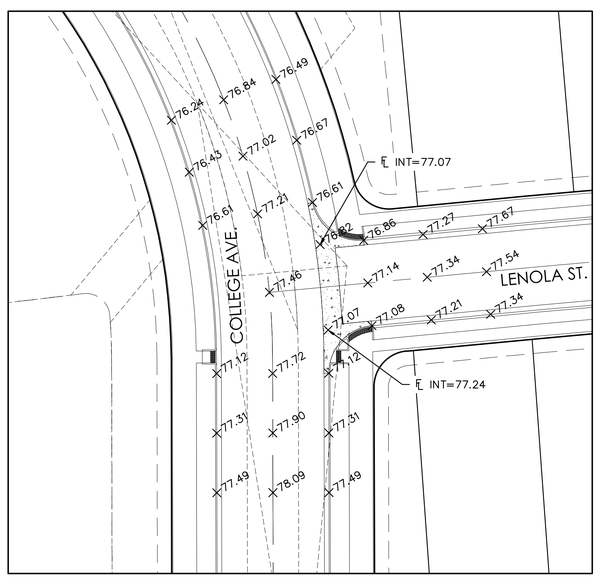
COLLEGE AVE. & ALTO AVE.



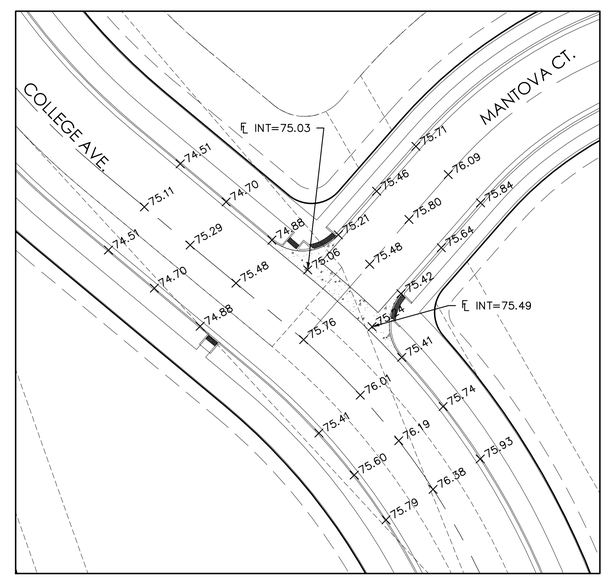
COLLEGE AVE. & TEANO ST.



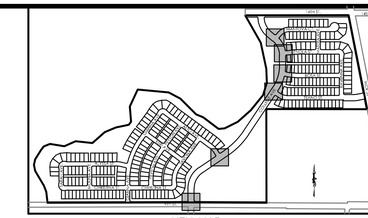
COLLEGE AVE. & BOSA ST.



COLLEGE AVE. & LENOLA ST.



COLLEGE AVE. & MANTOVA CT.



KEY MAP
N.T.S.

(IN FEET)
1 inch = 30 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
STREET INTERSECTIONS

DATE 03/19/20

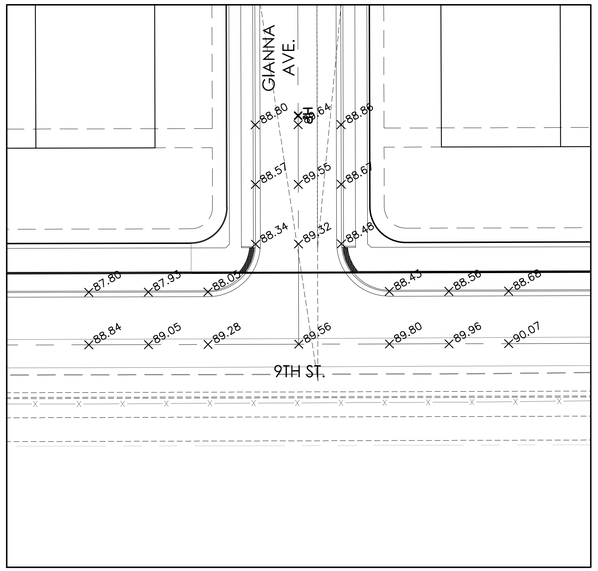
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

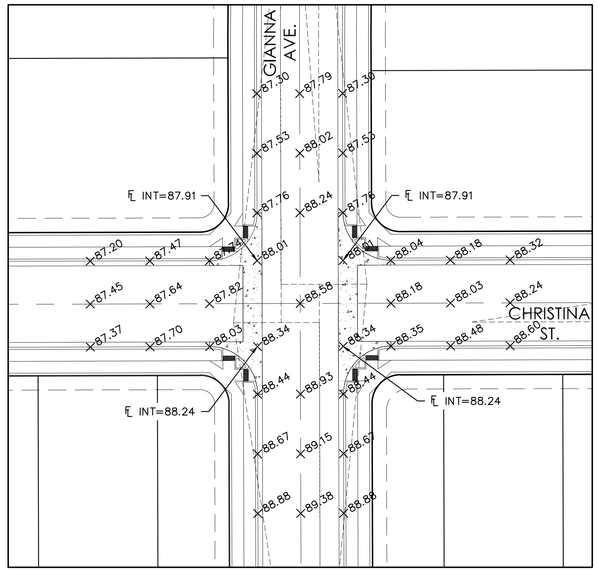
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 61

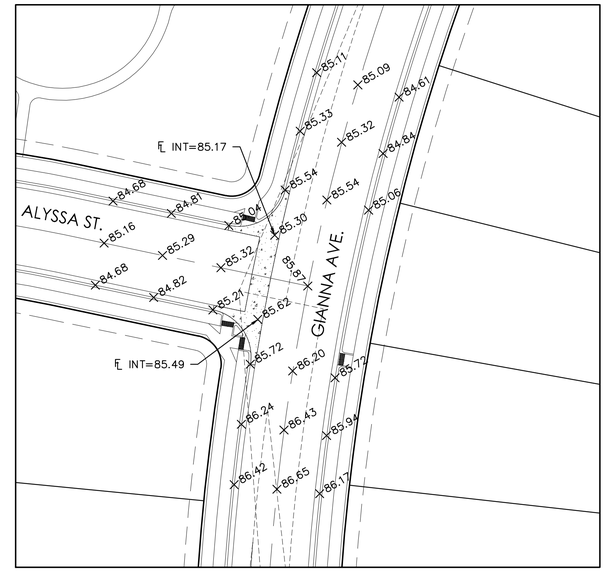
CAD FILE: 19003254-INTERSECTIONS.DWG



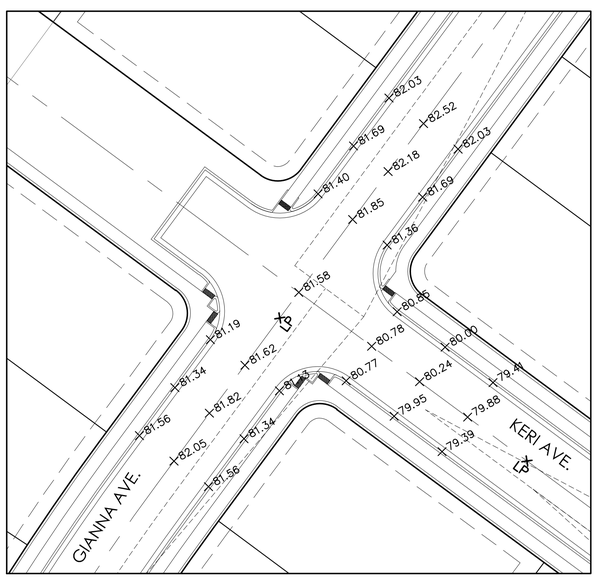
GIANNA AVE. & 9TH ST.



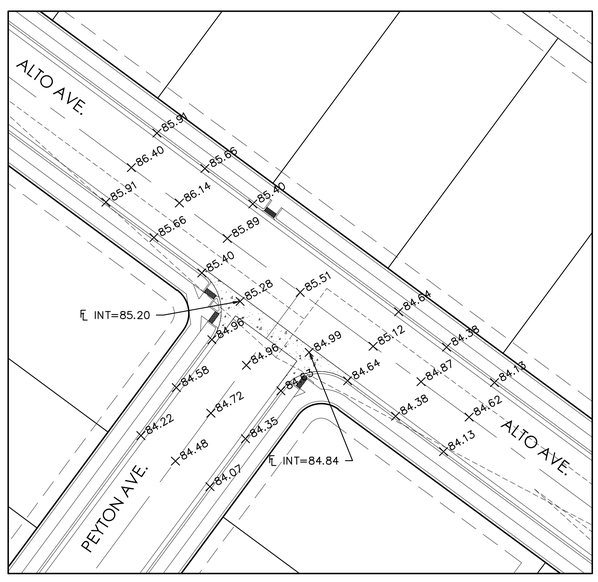
GIANNA AVE. & CHRISTINA ST.



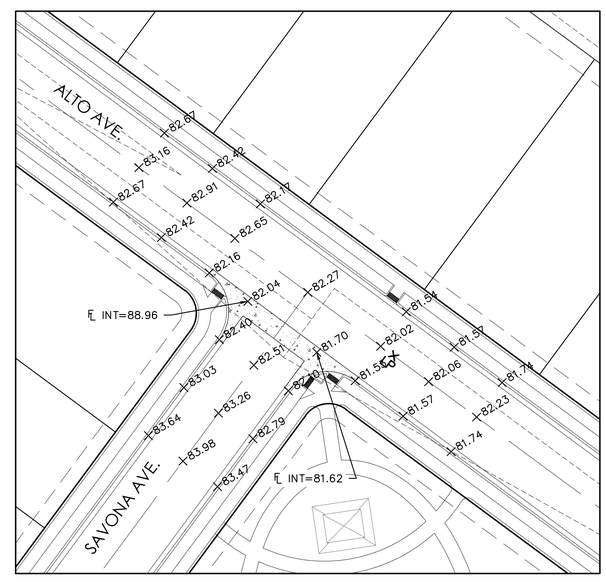
GIANNA AVE. & ALYSSA ST.



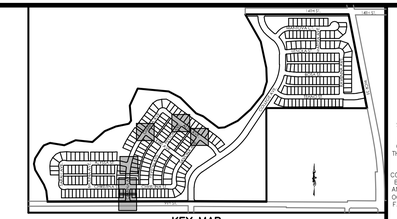
GIANNA AVE. & KERI AVE.



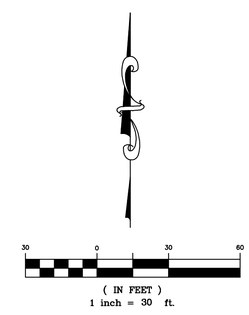
ALTO AVE. & PEYTON AVE.



ALTO AVE. & SAVONA AVE.



KEY MAP
N.T.S.



PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS

STREET INTERSECTIONS

DATE 03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

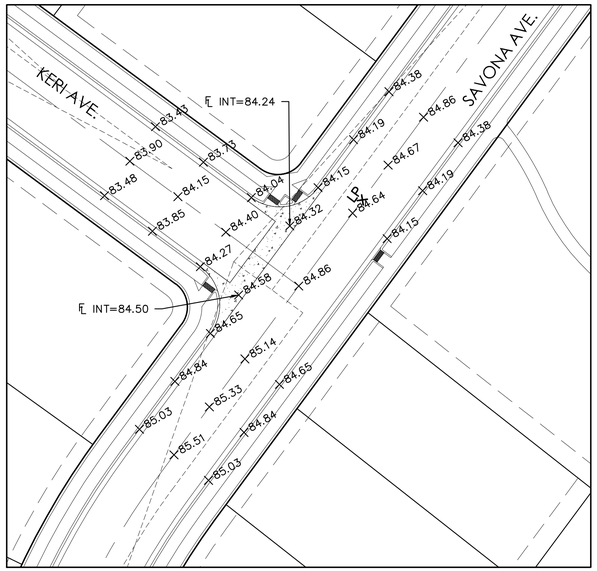
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM

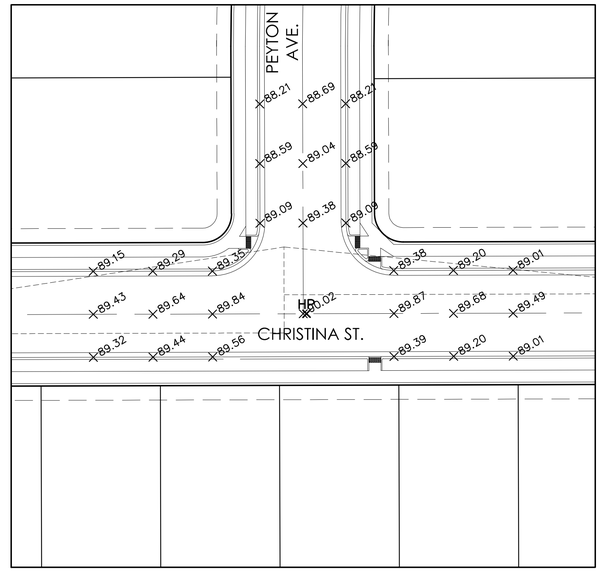
JOB 19003254

SHEET NO. 62

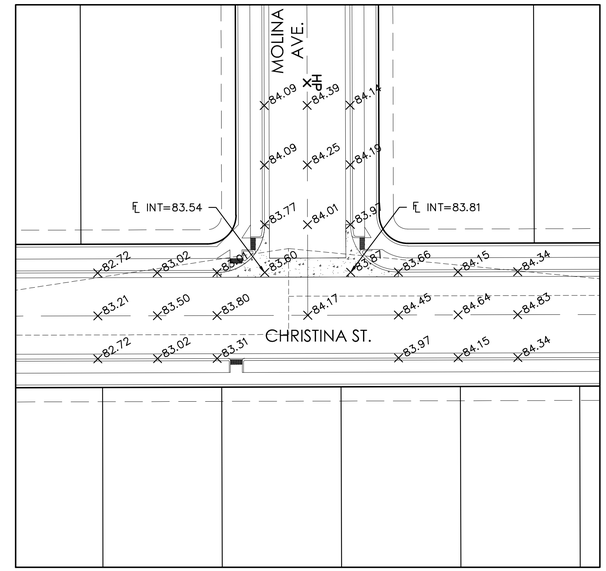
CAD FILE: 19003254-INTERSECTIONS.DWG



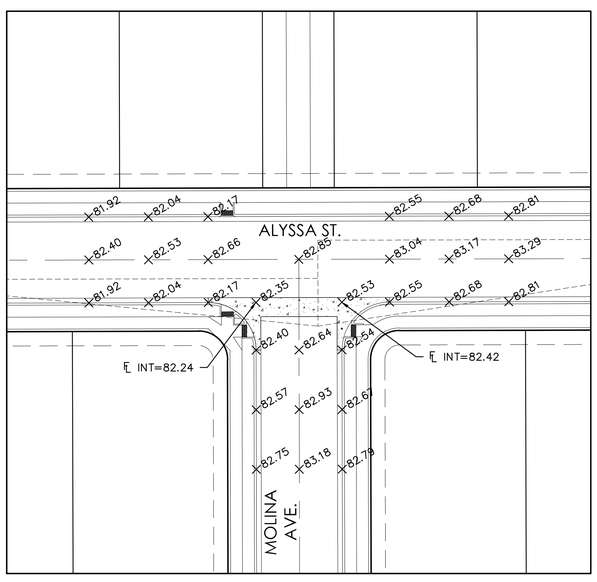
SAVONA AVE. & KERI AVE.



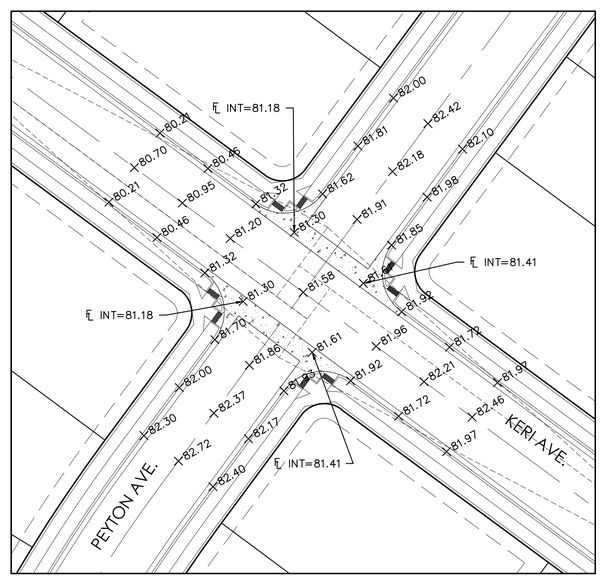
CHRISTINA ST. & PEYTON AVE.



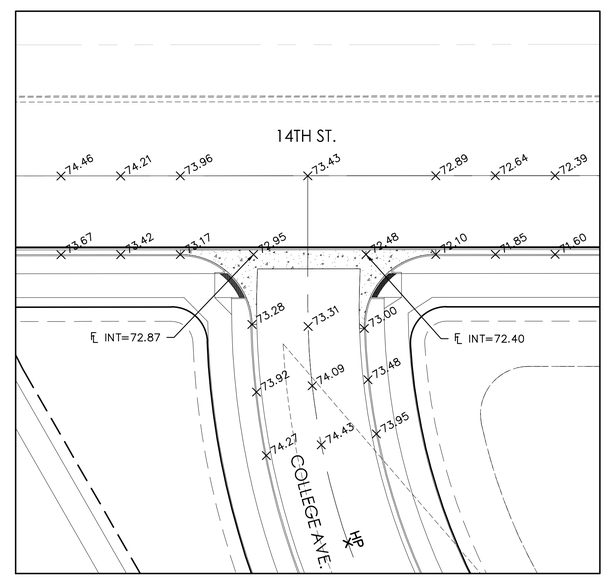
CHRISTINA ST. & MOLINA AVE.



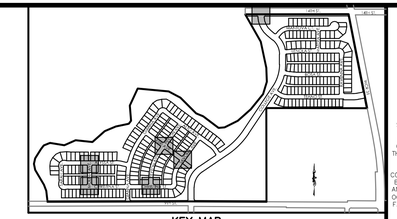
ALYSSA ST. & MOLINA AVE.



PEYTON AVE. & KERI AVE.



COLLEGE AVE. & 14TH ST.



KEY MAP
N.T.S.

(IN FEET)
1 inch = 30 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
STREET INTERSECTIONS

DATE 03/19/20

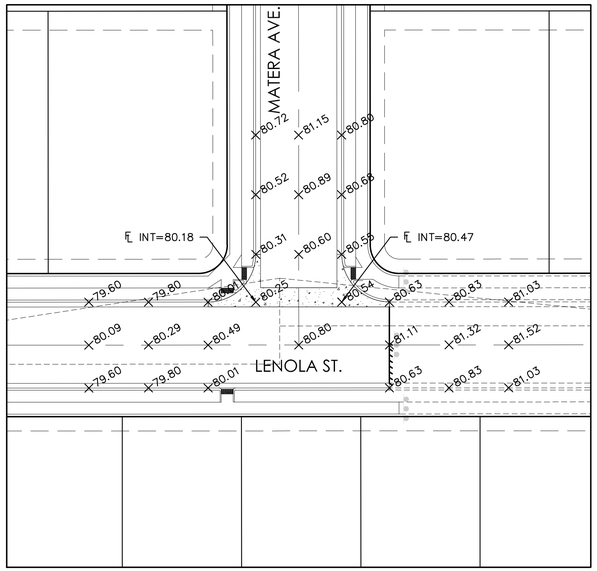
A	1st SUBMITTAL TO FT. LUPTON	03/19/2020 – MAM

REVISIONS

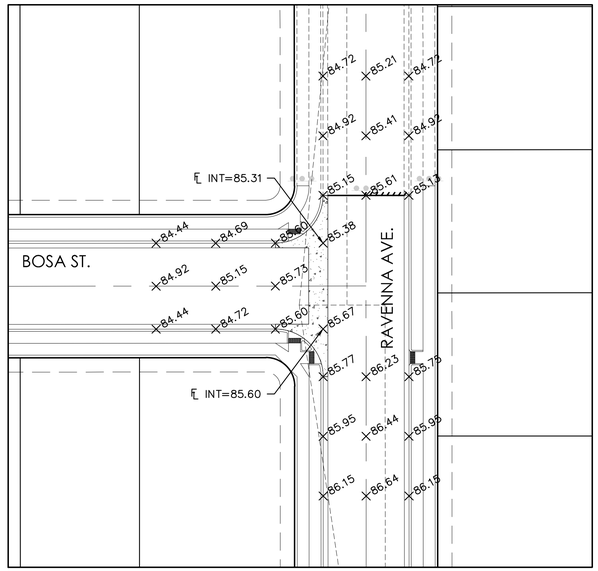
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 63

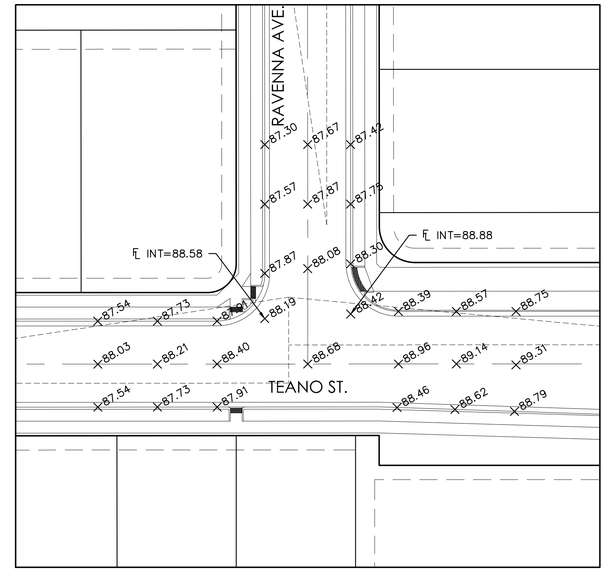
CAD FILE: 19003254-INTERSECTIONS.DWG



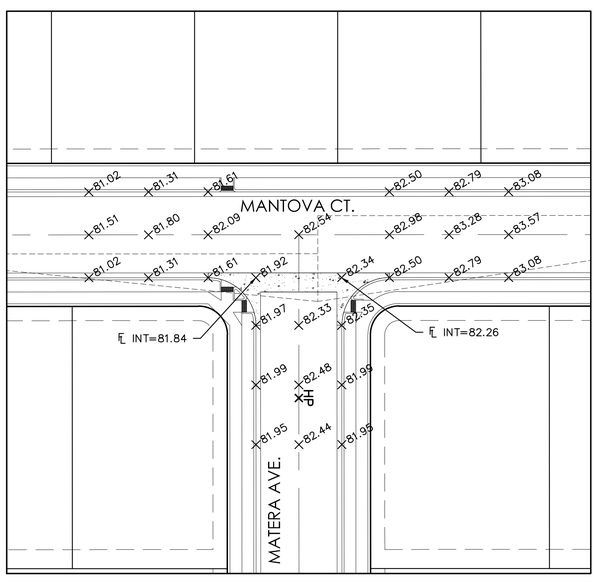
LENOLA ST. & MATERA AVE.



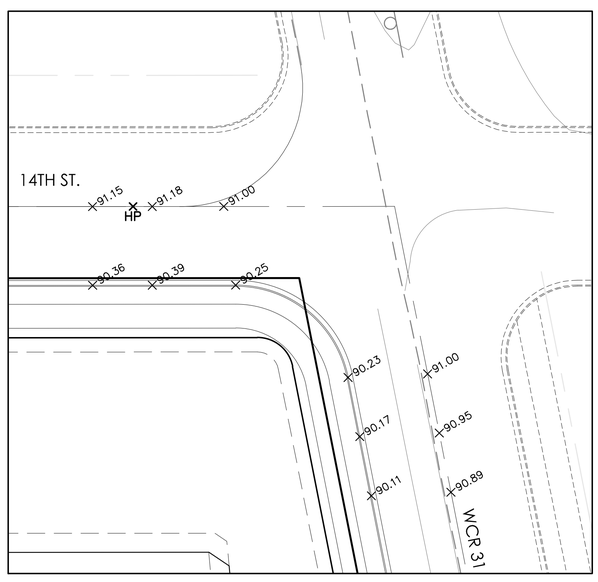
RAVENNA AVE. & BOSA ST.



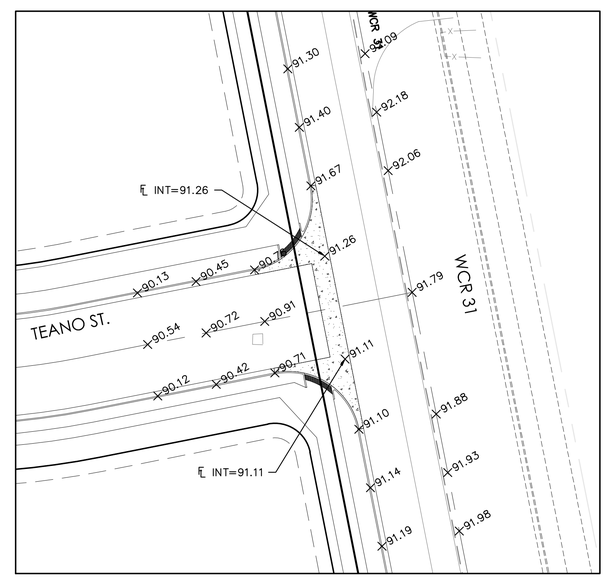
RAVENNA AVE. & TEANO ST.



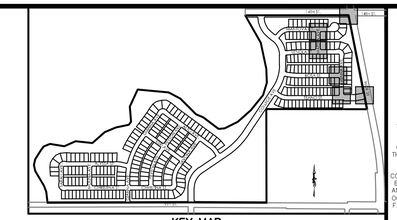
MANTOVA CT.& MATERA AVE.



WCR 31 & 14TH ST.



WCR 31 & TEANO ST.



KEY MAP
N.T.S.

(IN FEET)
1 inch = 30 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
STREET INTERSECTIONS

DATE 03/19/20

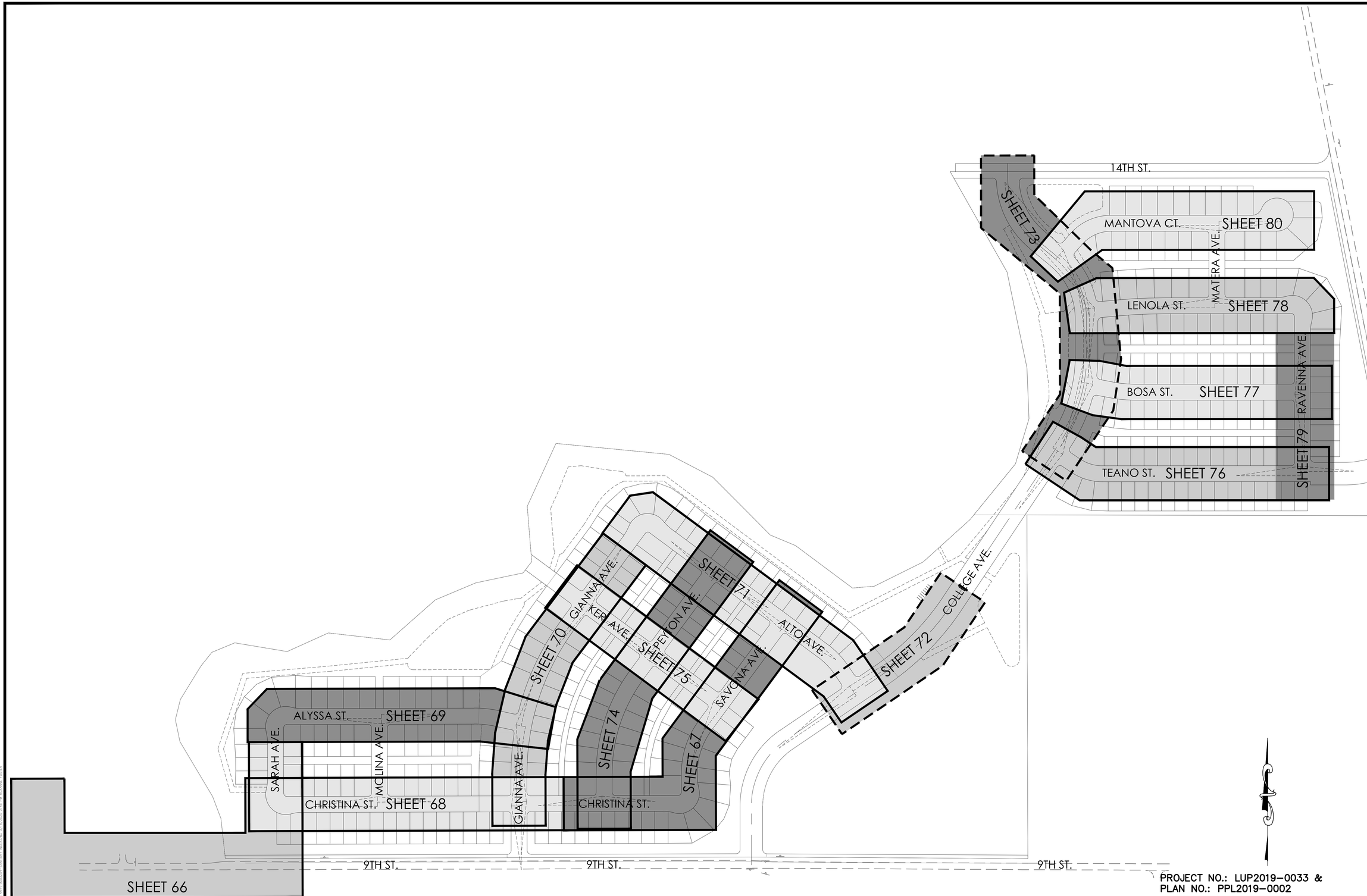
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 64

CAD FILE: 19003254-INTERSECTIONS.DWG



PROJECT NO.: LUP2019–0033 &
PLAN NO.: PPL2019–0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's **below.** **Call** before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, WEST, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303–905–3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
SANITARY INDEX

DATE
03/19/20

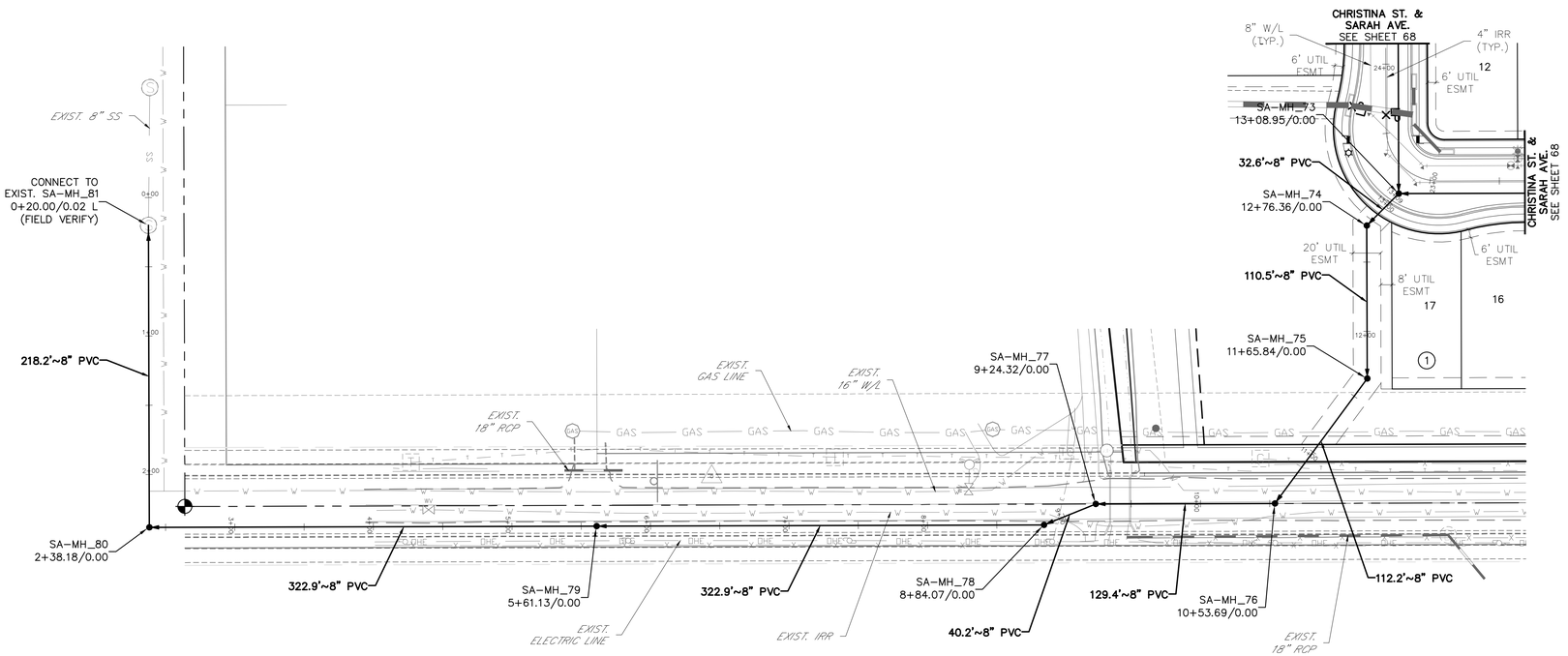
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

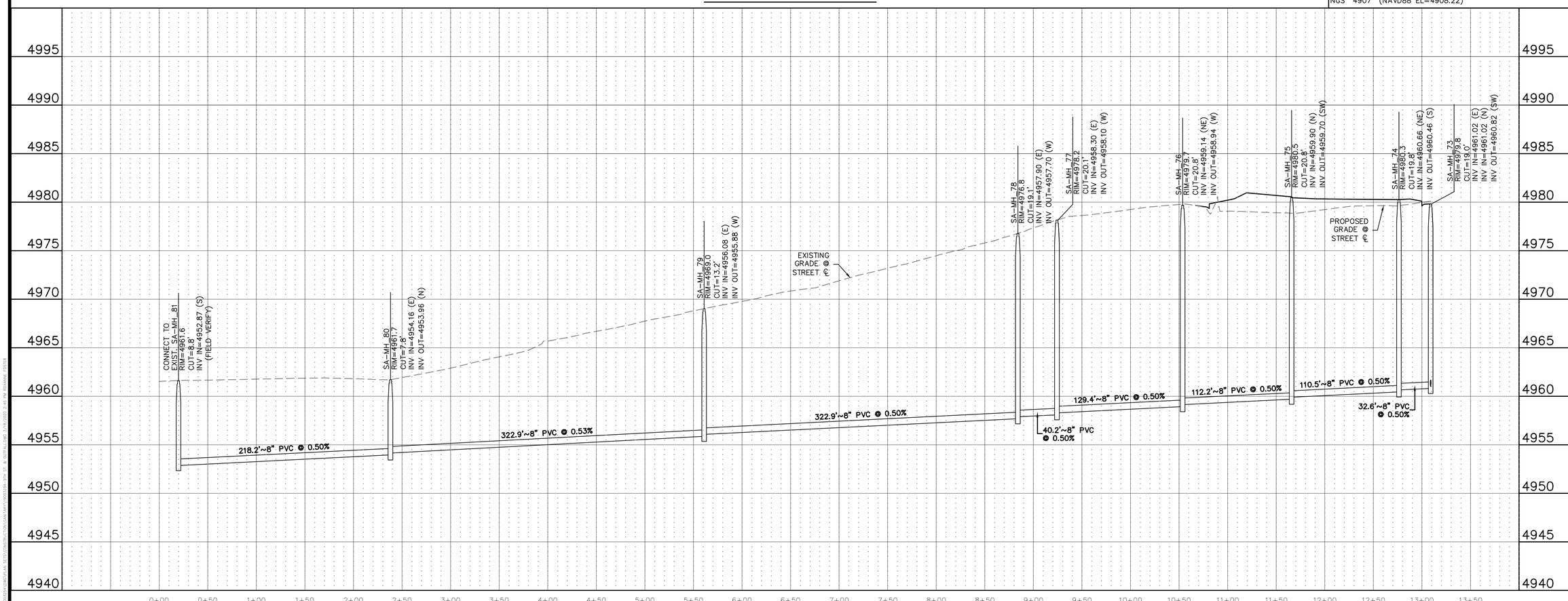
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

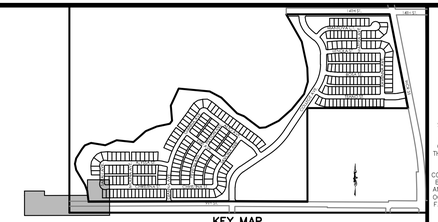
DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
65

CAD FILE: 19003254-SANITARY INDEX.DWG

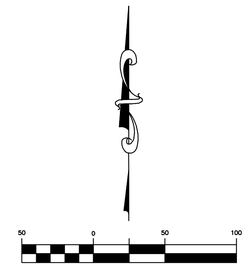


9TH ST. & OUTFALL





KEY MAP
N.T.S.



PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
SANITARY SEWER PLAN & PROFILE
9TH ST. & OUTFALL

DATE 03/19/20

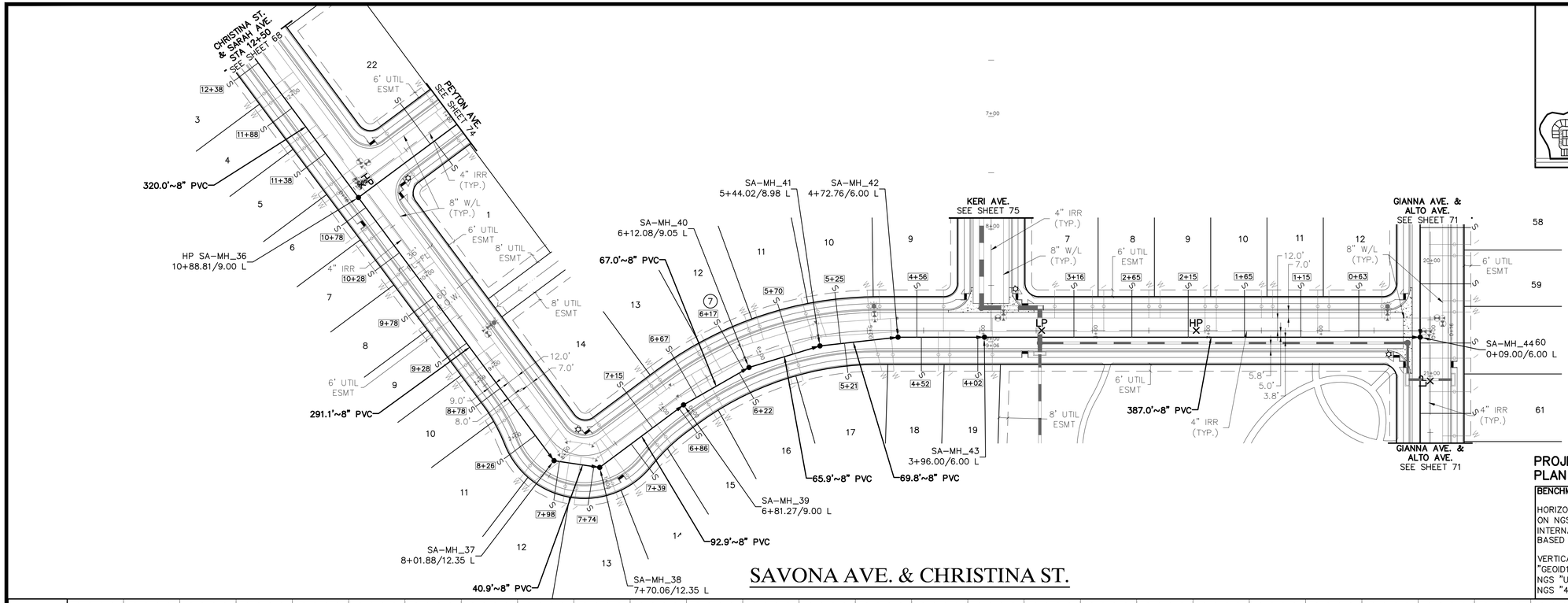
A	1st SUBMITTAL TO FT. LUPTON	03/19/2020 – MAM

REVISIONS

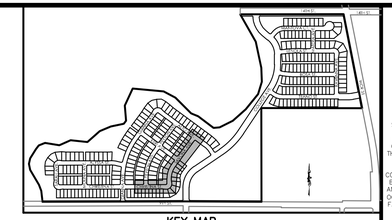
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 66

CAD FILE: 19003254-9TH ST. & OUTFALL.DWG



SAVONA AVE. & CHRISTINA ST.



KEY MAP
N.T.S.

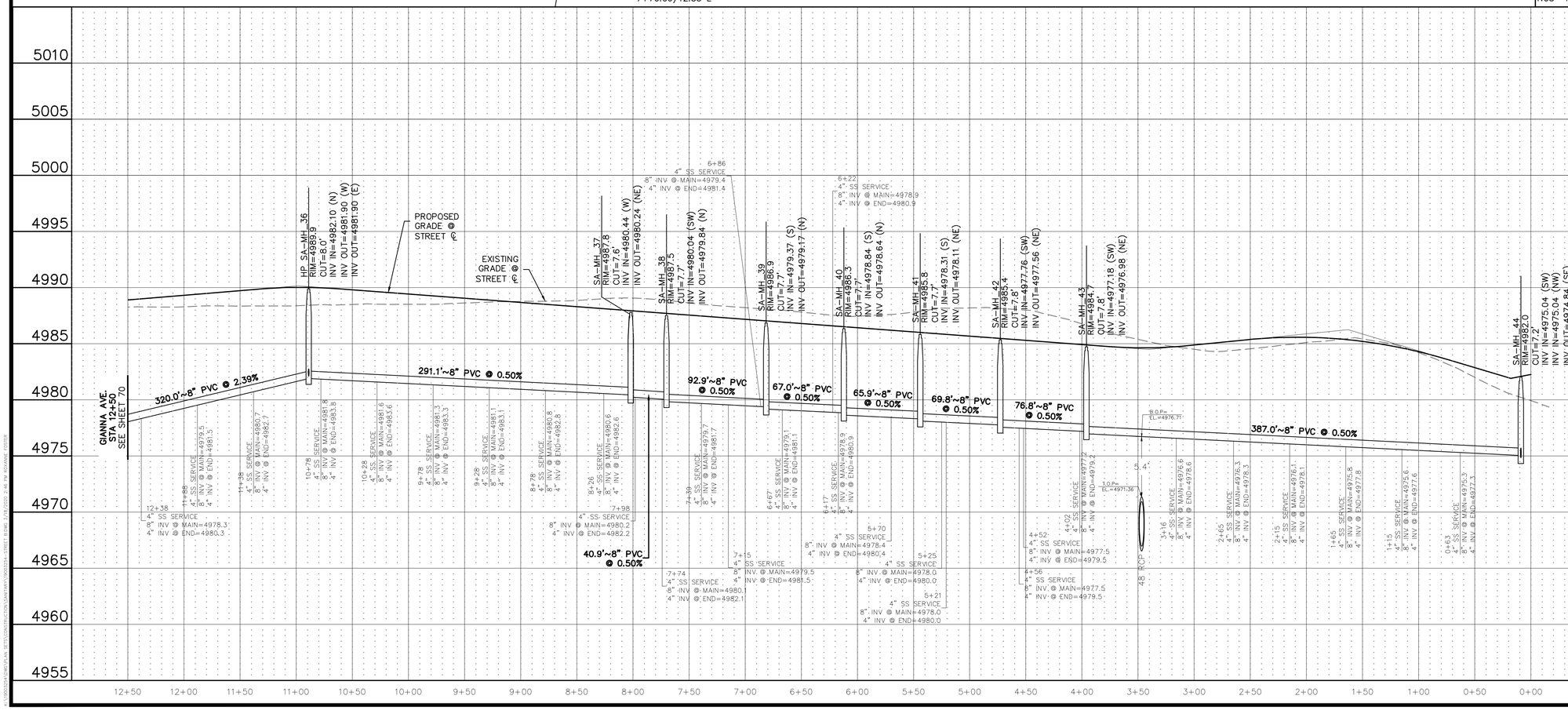
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
SANITARY SEWER PLAN & PROFILE
SAVONA AVE. & CHRISTINA ST.

DATE 03/19/20

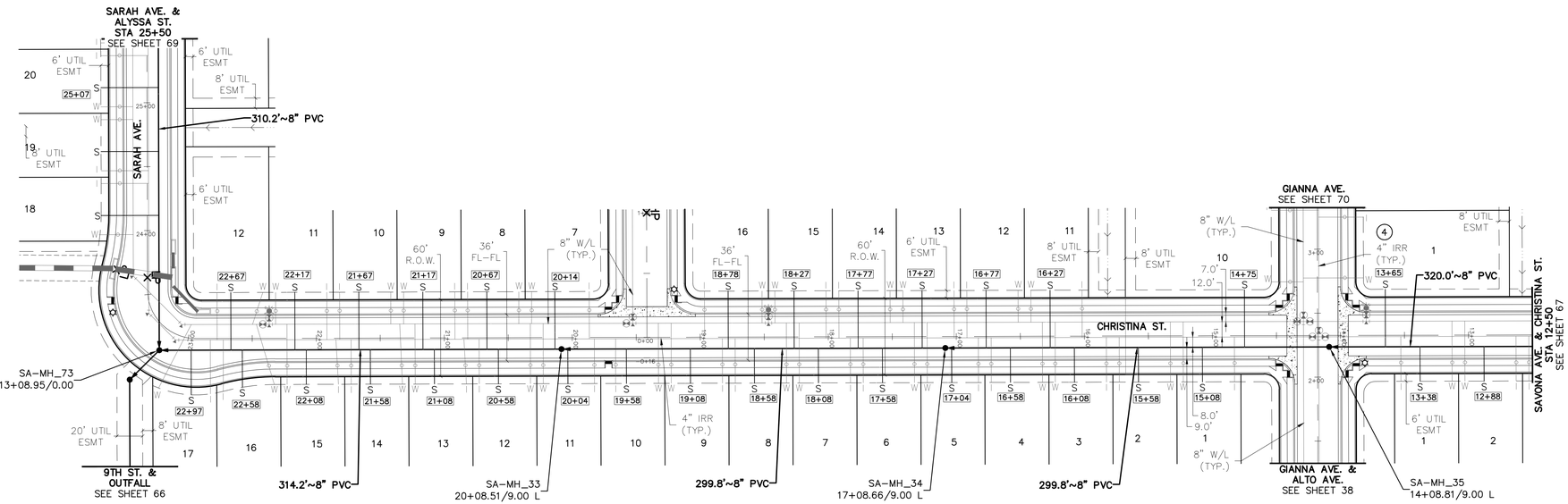
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

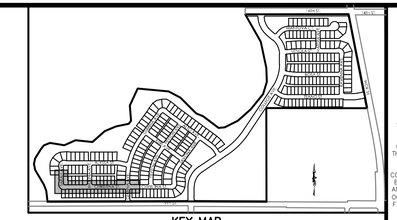
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

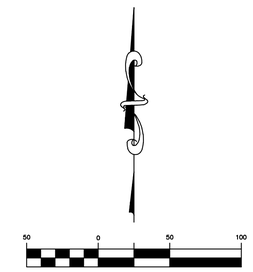
DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 67

CAD FILE: 19003254-STREET B.DWG





KEY MAP
N.T.S.



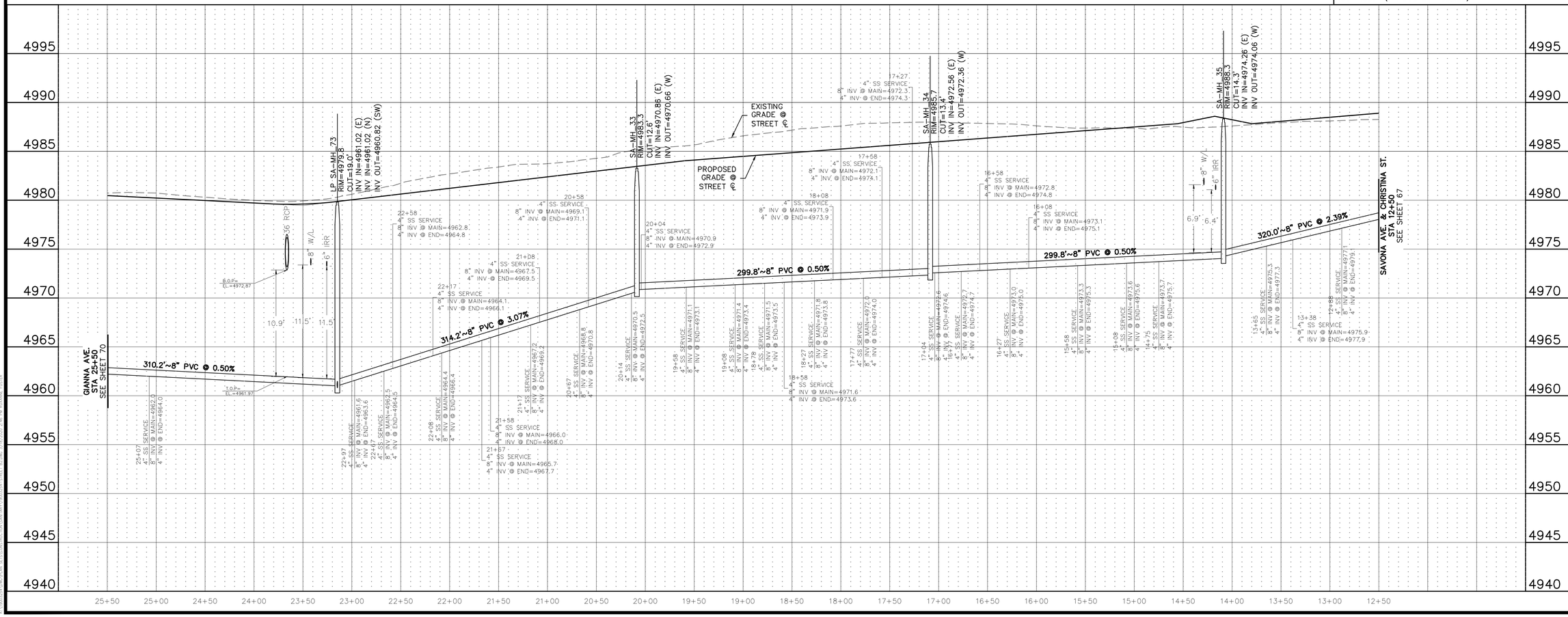
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

CHRISTINA ST. & SARAH AVE.



ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
ARBOR CAPITAL PARTNERS, LLC
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
SANITARY SEWER PLAN & PROFILE
CHRISTINA ST. & SARAH AVE.

DATE
03/19/20

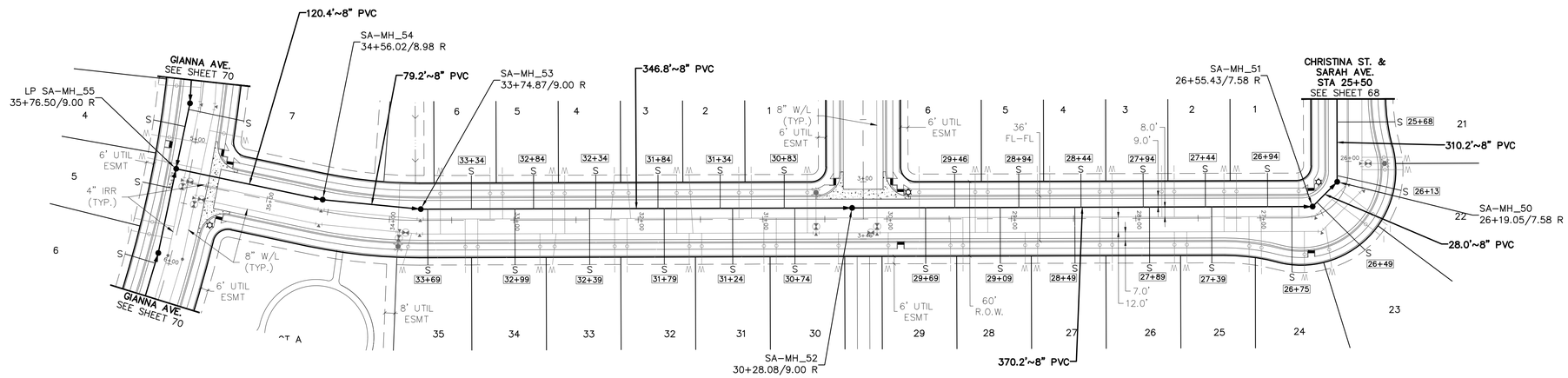
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

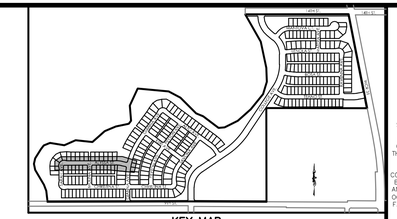
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 68

CAD FILE: 19003254-STREET B2.DWG





KEY MAP
N.T.S.

(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

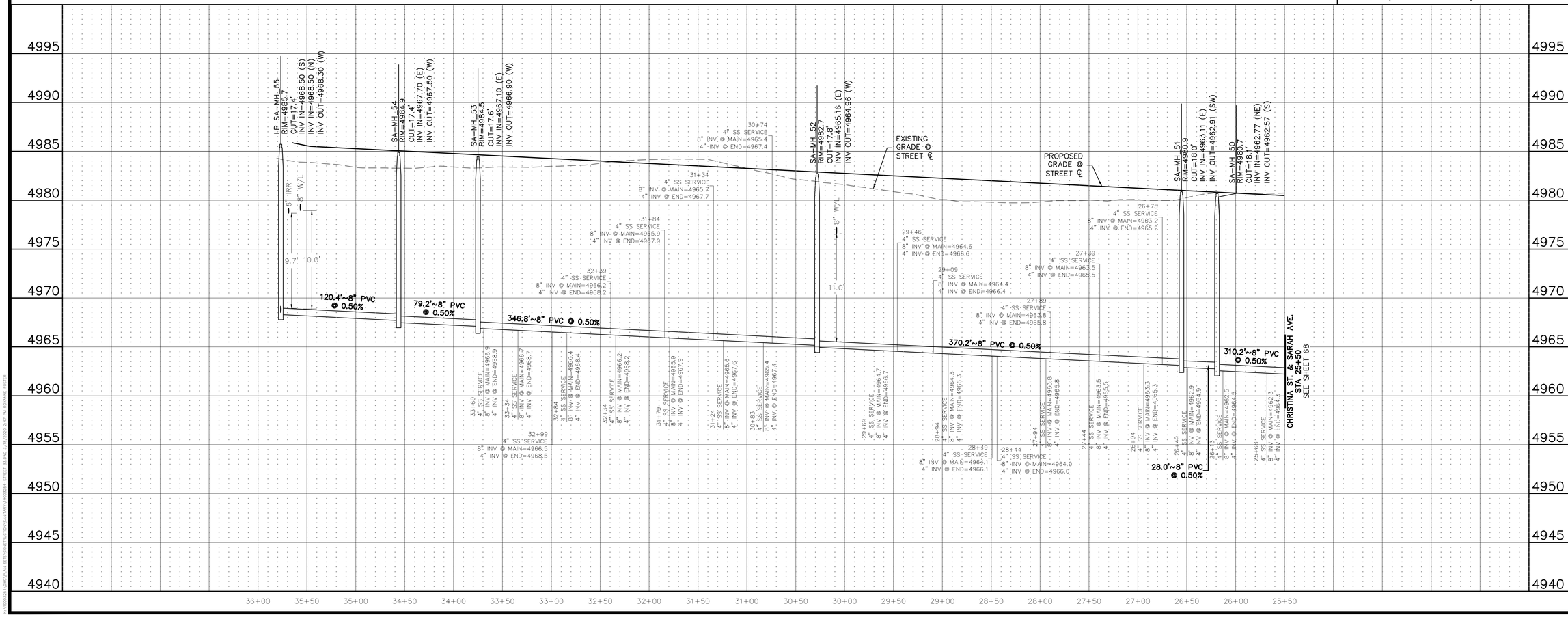
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

SARAH AVE. & ALYSSA ST.



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
SANITARY SEWER PLAN & PROFILE
SARAH AVE. & ALYSSA ST.

DATE
03/19/20

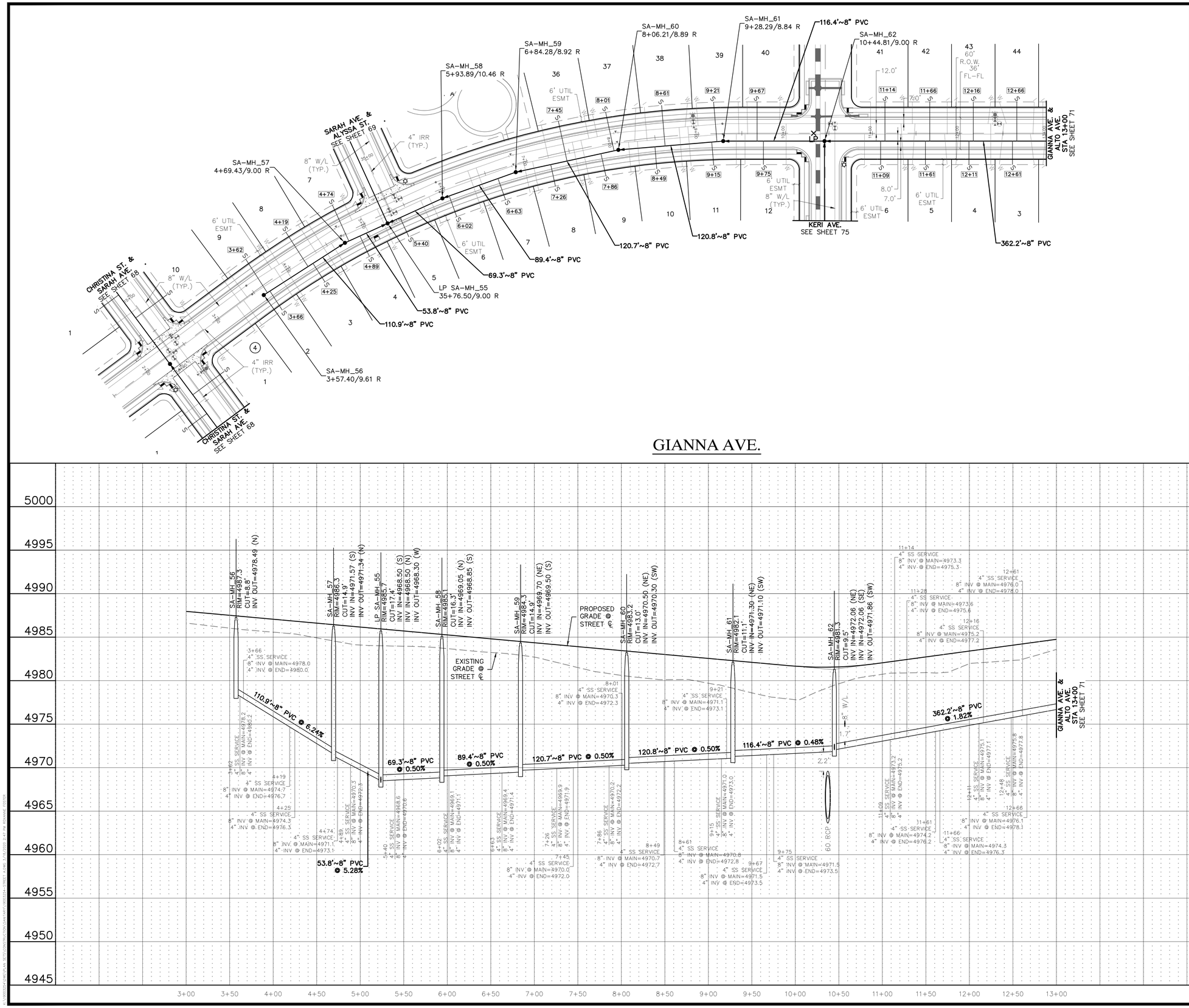
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

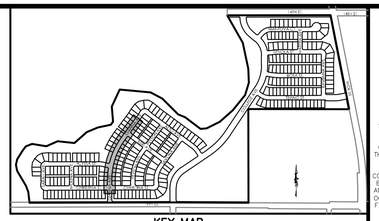
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 69

CAD FILE: 19003254-STREET B3.DWG





KEY MAP
N.T.S.

(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
SANITARY SEWER PLAN & PROFILE
GIANNA AVE.

DATE
03/19/20

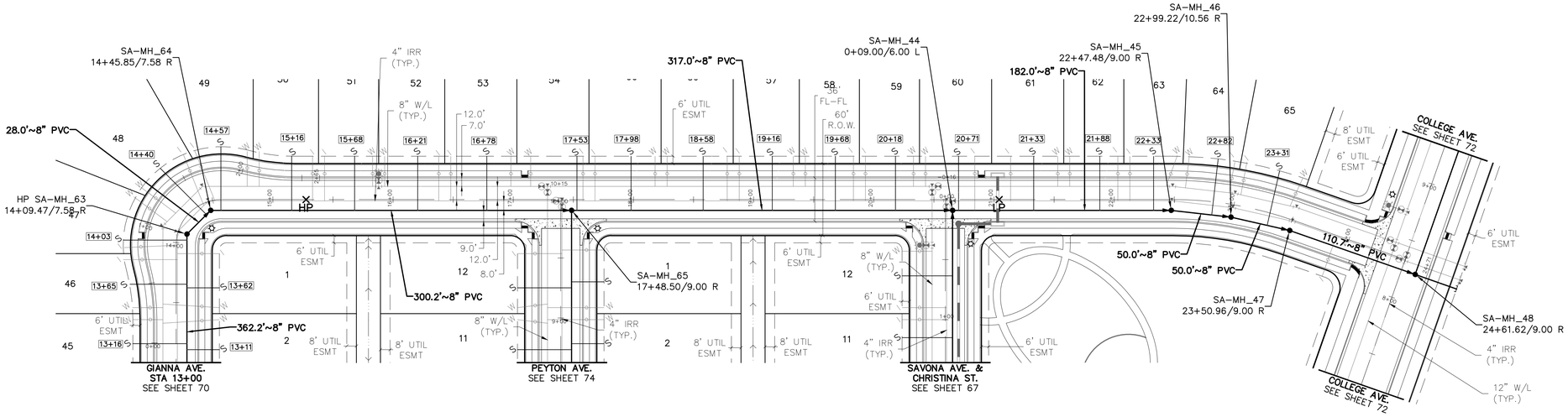
A	1st SUBMITTAL TO FT. LUPTON	03/19/2020 - MAM

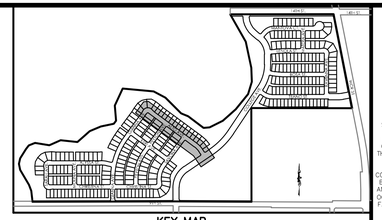
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

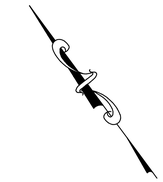
DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 70

CAD FILE: 19003254-STREET ALONG





KEY MAP
N.T.S.



50 0 50 100
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

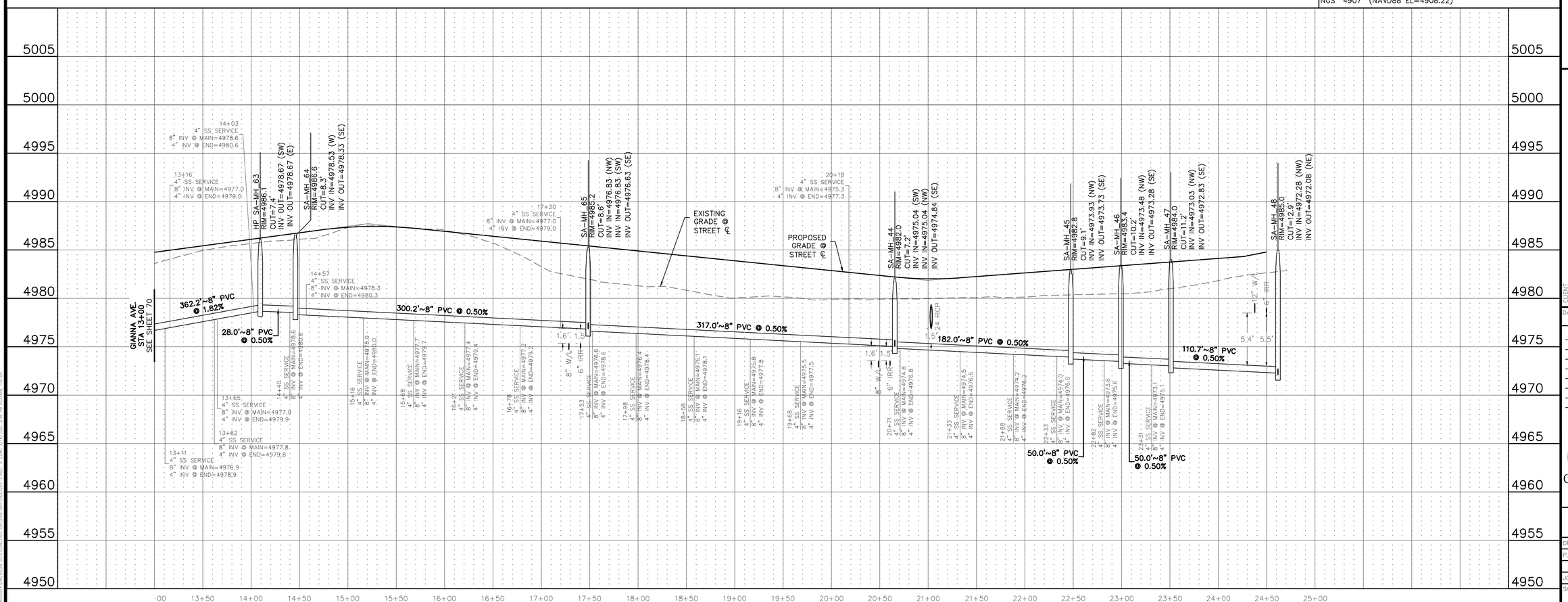
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

GIANNA AVE. & ALTO AVE.



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
SANITARY SEWER PLAN & PROFILE
GIANNA AVE. & ALTO AVE.

DATE
03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

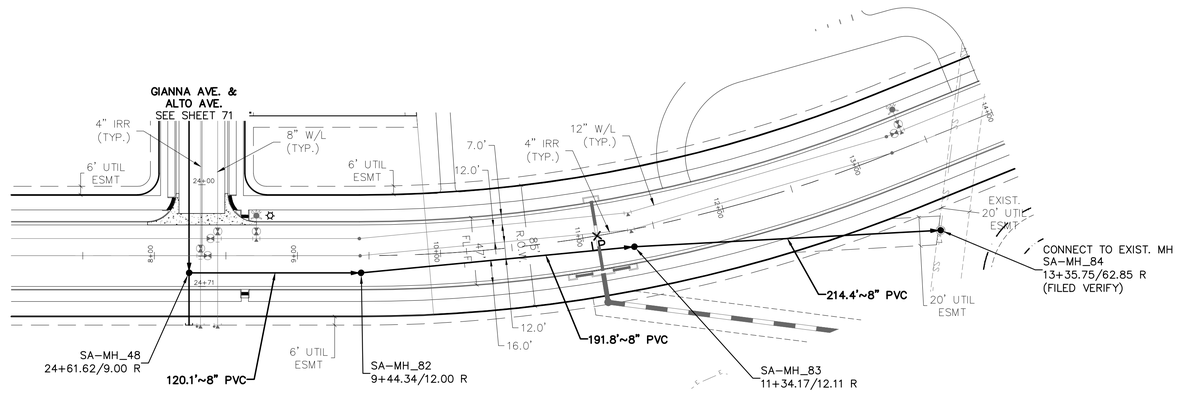
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

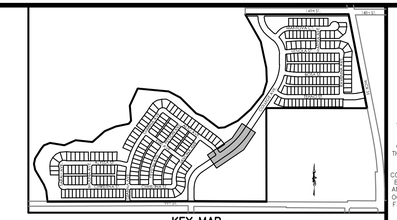
DR. RF CH. MAM
P.M. MAM

JOB 19003254

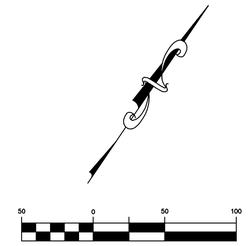
SHEET NO.
71

CAD FILE: 19003254-STREET A 2.DWG





KEY MAP
N.T.S.



(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

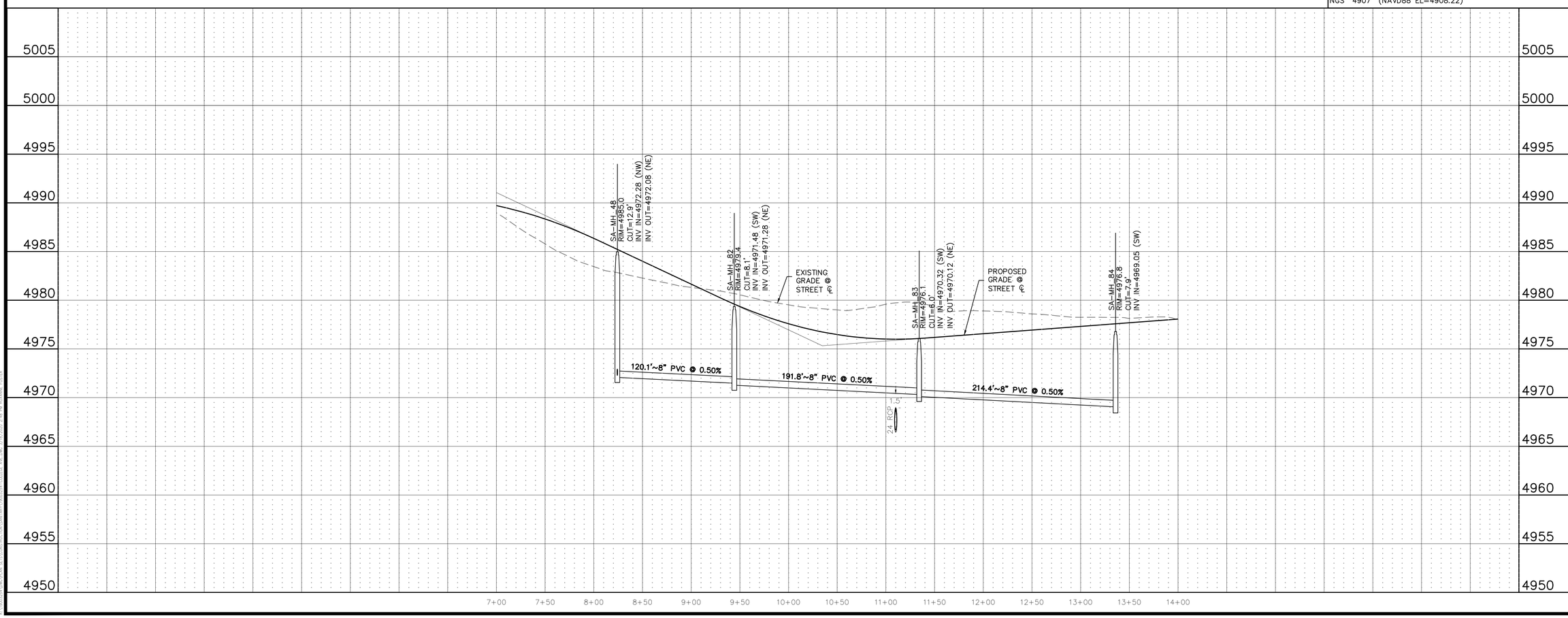
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

COLLEGE AVE.



811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
SANITARY SEWER PLAN & PROFILE
COLLEGE AVE.

DATE
03/19/20

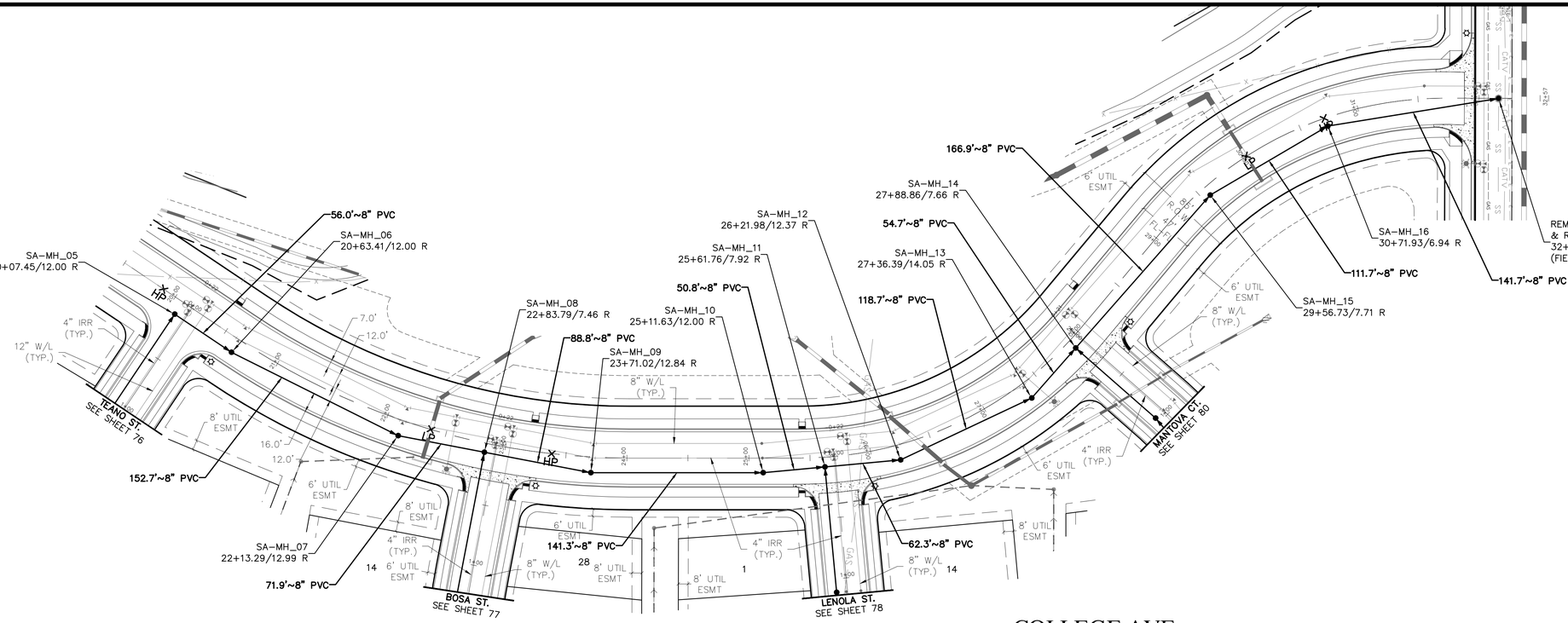
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

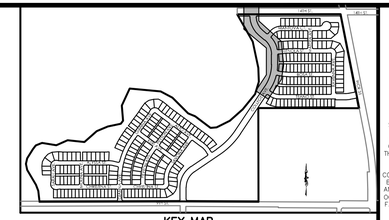
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
72

CAD FILE: 19003254-COLLEGE AVE.DWG





KEY MAP
N.T.S.

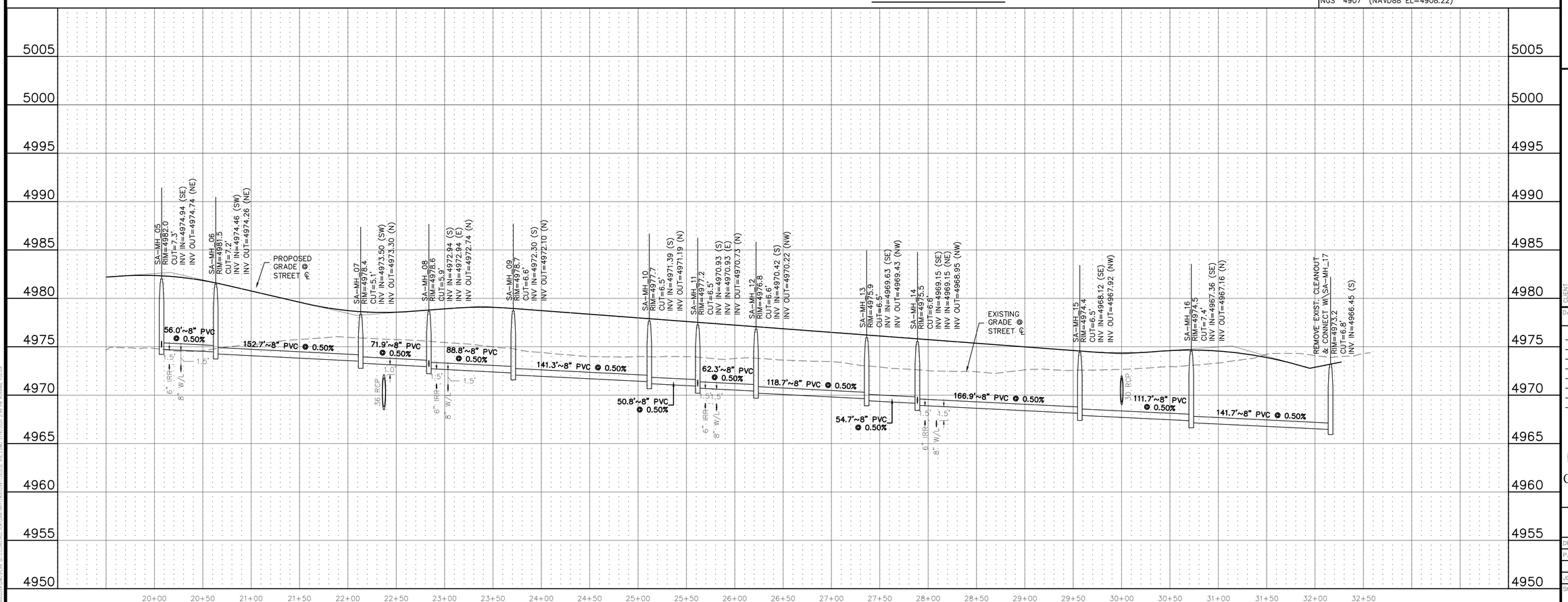
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
SANITARY SEWER PLAN & PROFILE
COLLEGE AVE.

DATE 03/19/20

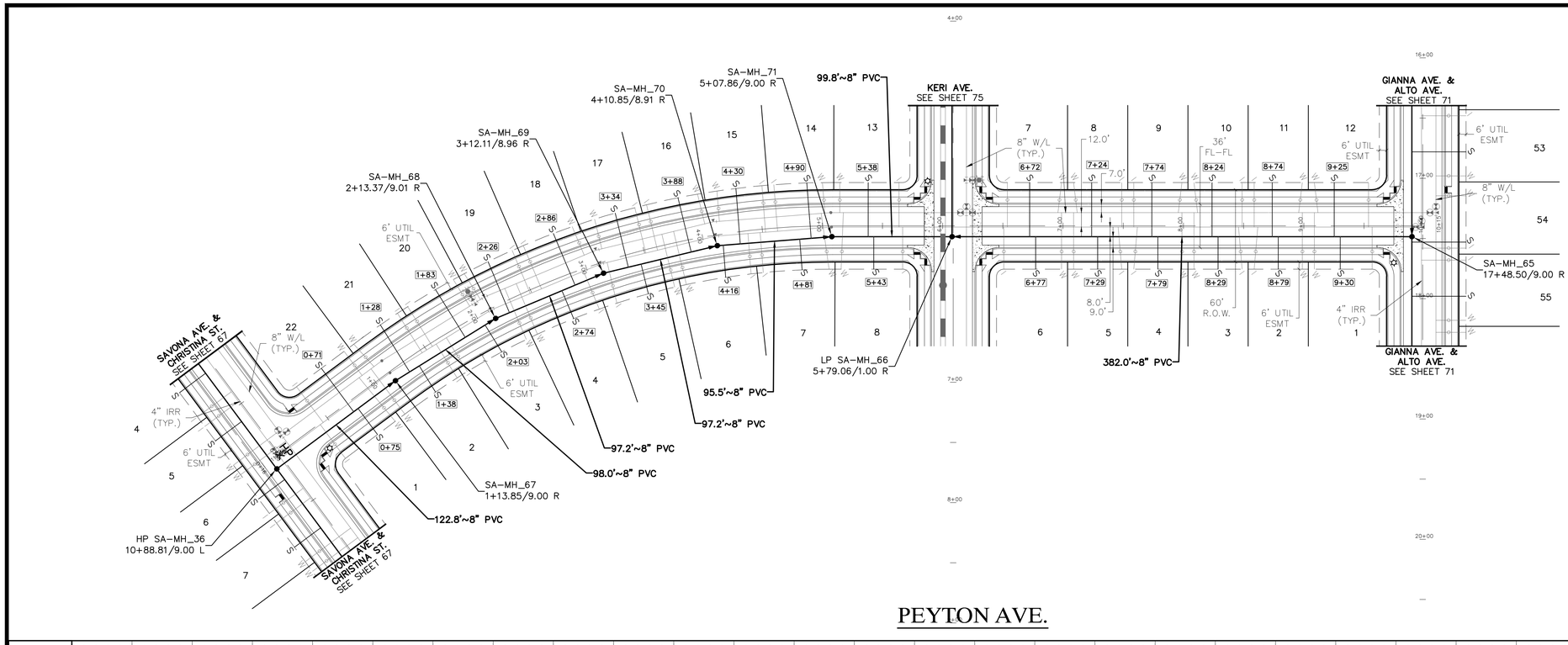
A	1st SUBMITTAL TO FT. LUPTON	03/19/2020 - MAM

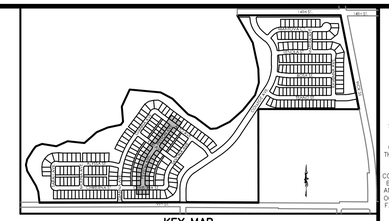
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

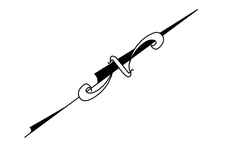
DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 73

CAD FILE: 19003254-COLLEGE AVE.2.DWG





KEY MAP
N.T.S.



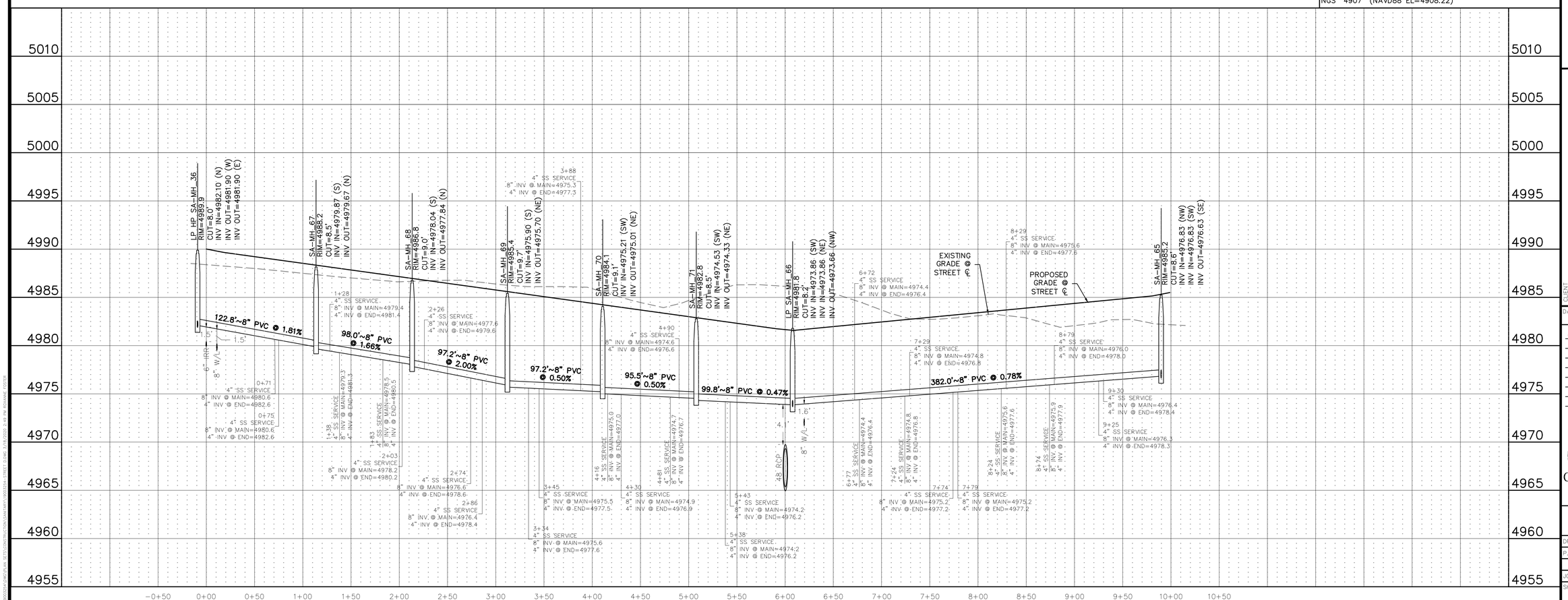
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
SANITARY SEWER PLAN & PROFILE
PEYTON AVE.

DATE 03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

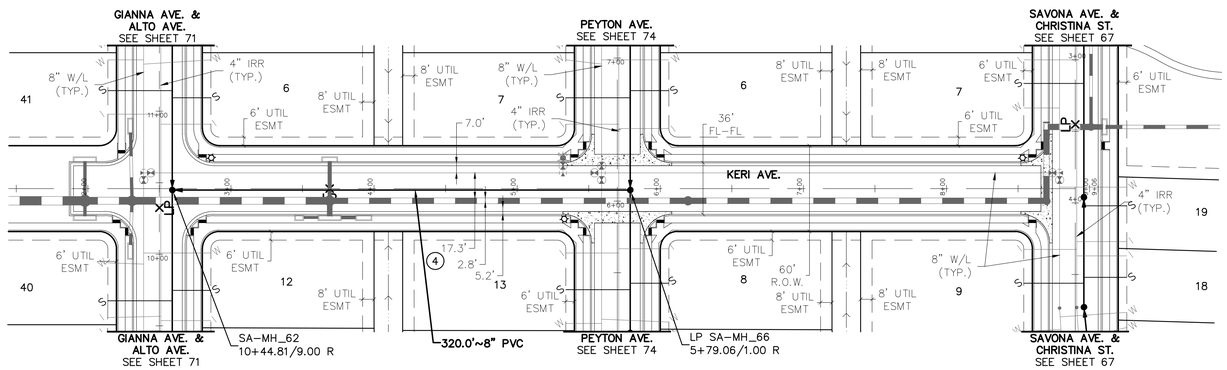
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

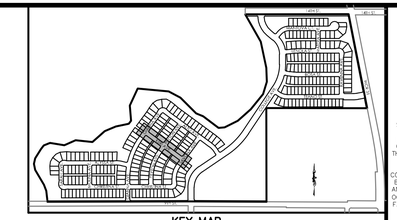
DR. RF | CH. MAM
P.M. MAM

JOB 19003254

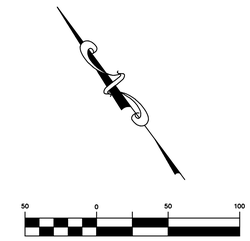
SHEET NO. 74

CAD FILE: 19003254-STREET DLDWG





KEY MAP
N.T.S.



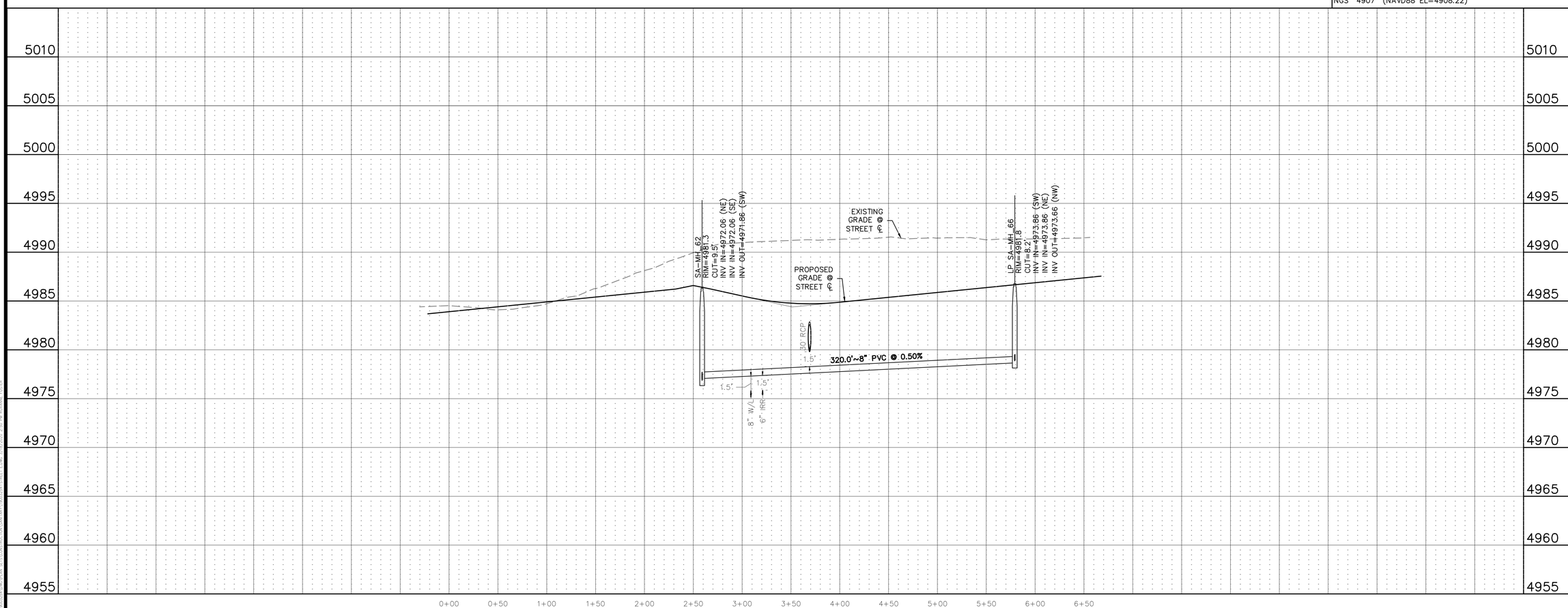
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

KERI AVE.



Know what's **below.** **Call** before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
SANITARY SEWER PLAN & PROFILE
KERI AVE.

DATE
03/19/20

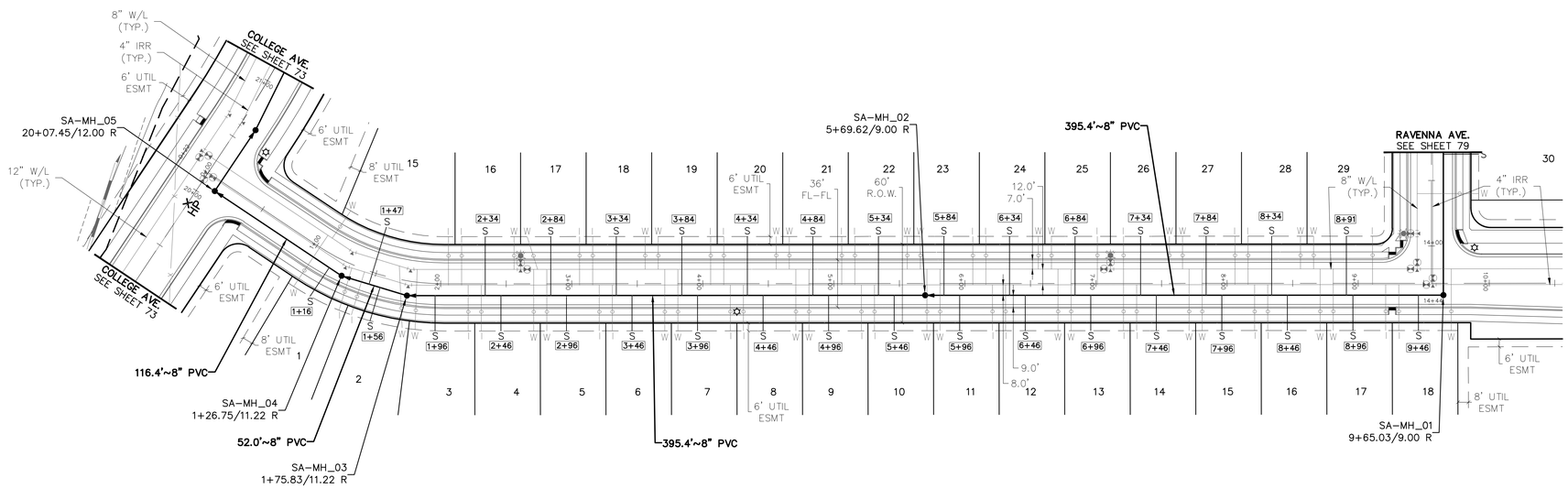
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

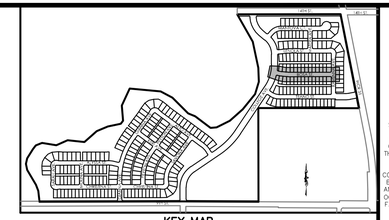
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
75

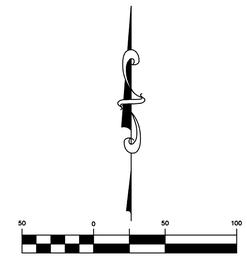
CAD FILE: 19003254-STREET ELEVNG



TEANO ST.



KEY MAP
N.T.S.



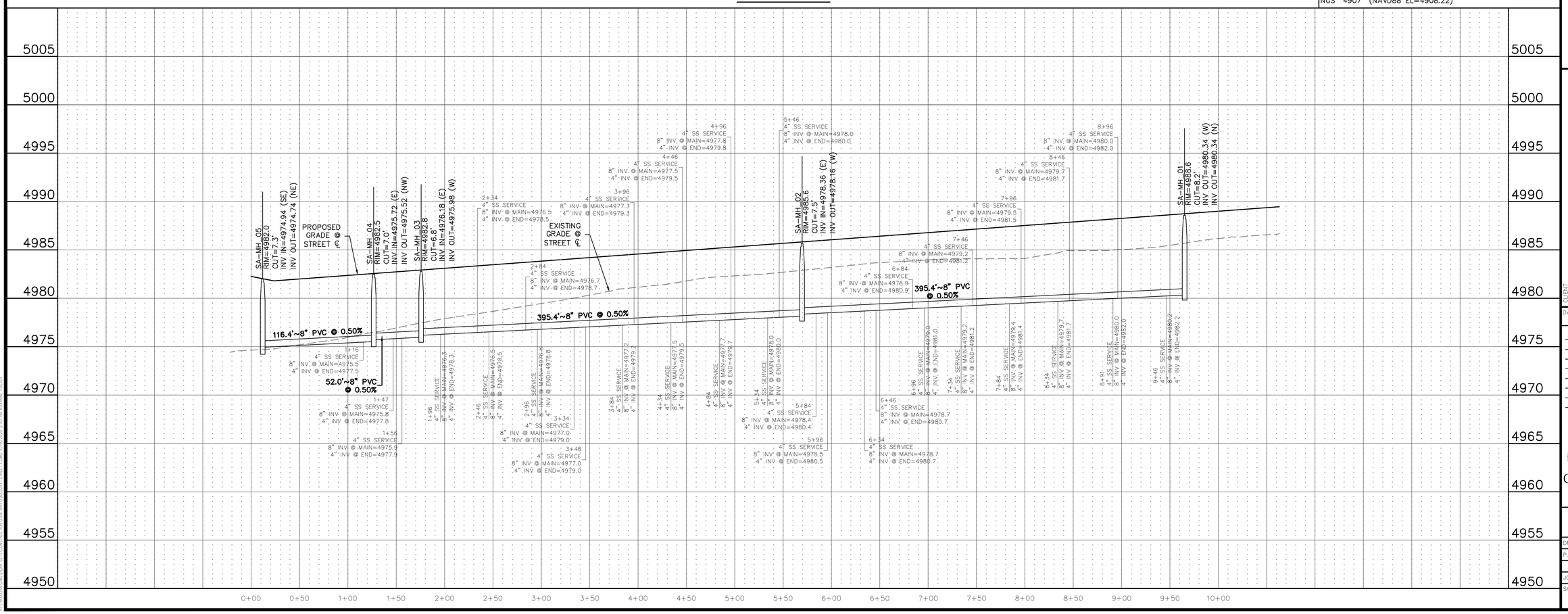
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811
Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
SANITARY SEWER PLAN & PROFILE
TEANO ST.

DATE
03/19/20

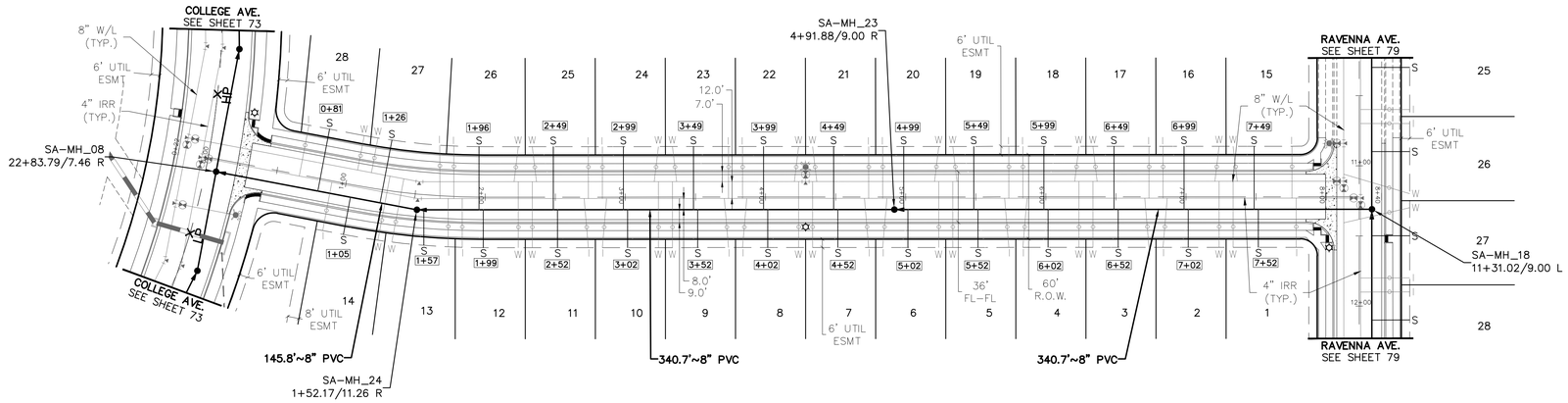
A	1st SUBMITTAL TO FT. LUPTON	03/19/2020 – MAM

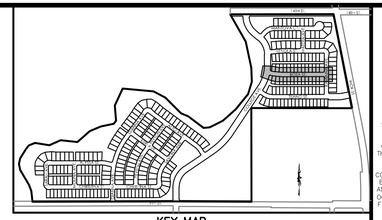
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

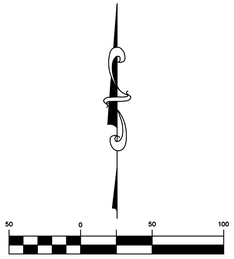
DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 76

CAD FILE: 19003254-STREET FLOWG





KEY MAP
N.T.S.



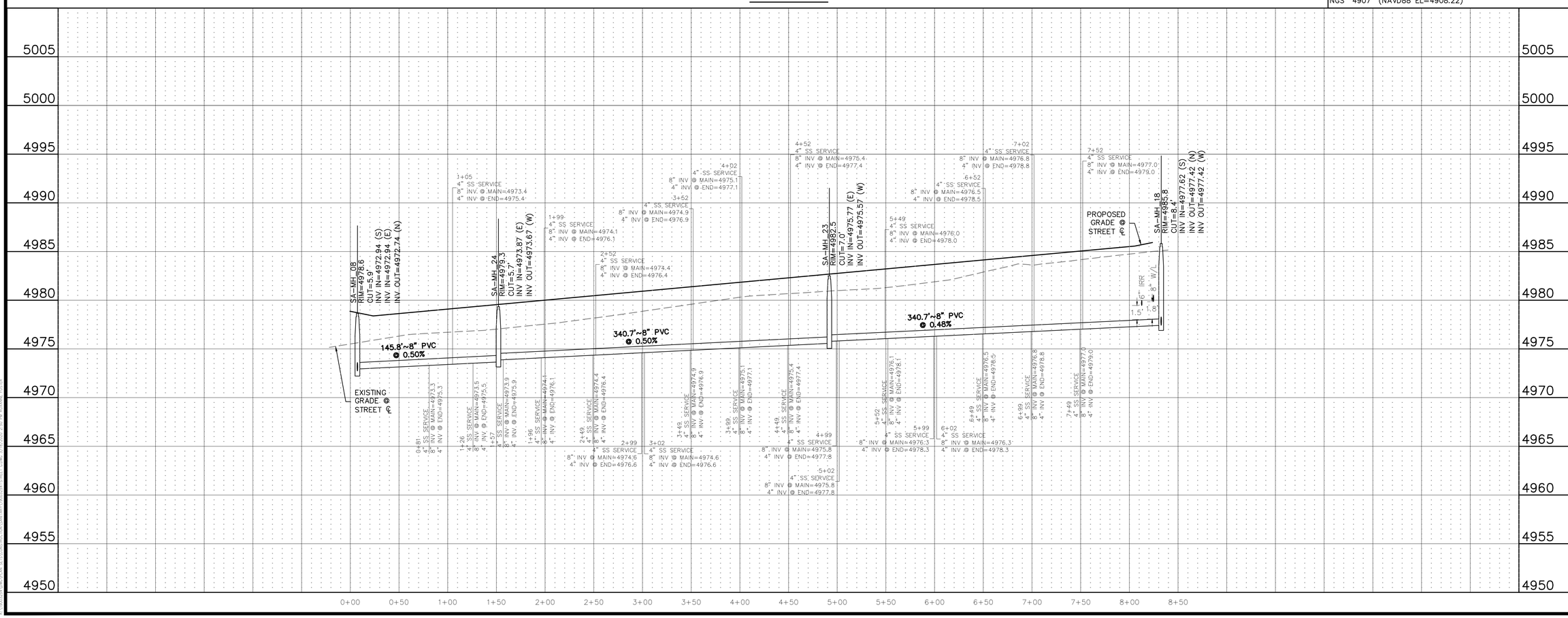
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

BOSA ST.



811
Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
SANITARY SEWER PLAN & PROFILE
BOSA ST.

DATE
03/19/20

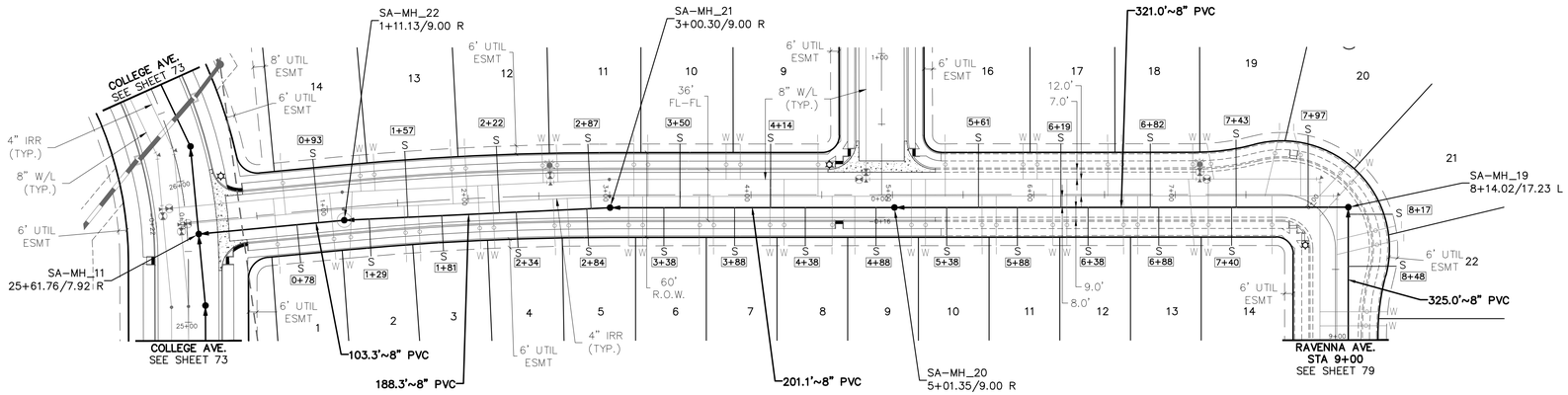
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

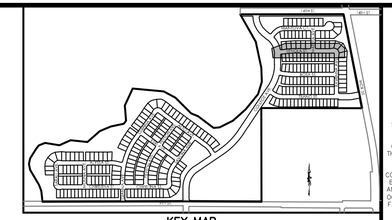
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 77

CAD FILE: 19003254-STREET GLWG



LENOLA ST.



KEY MAP
N.T.S.

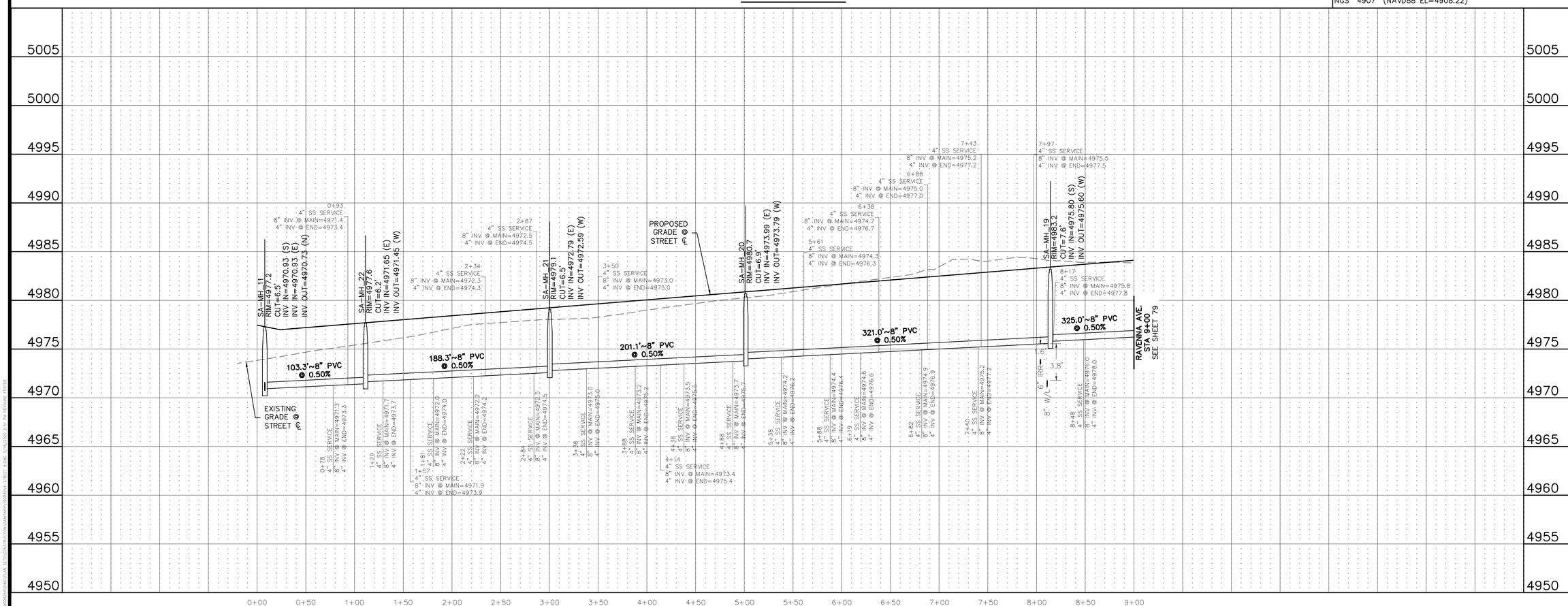
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811
Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
SANITARY SEWER PLAN & PROFILE
LENOLA ST.

DATE
03/19/20

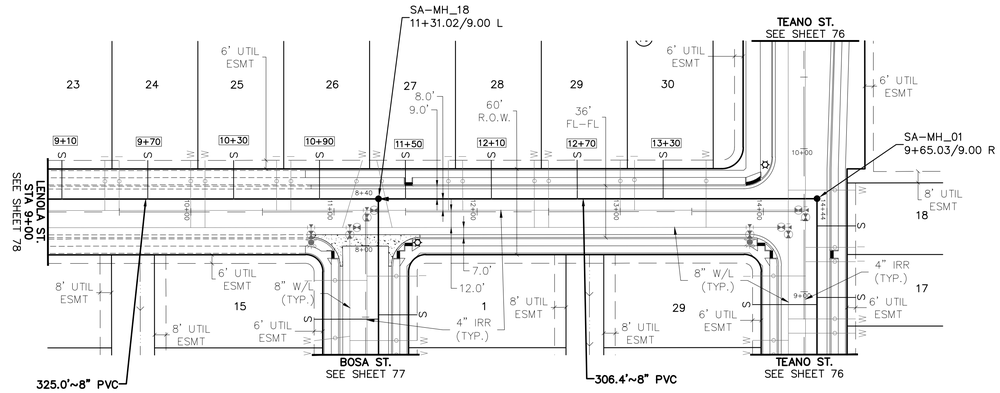
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

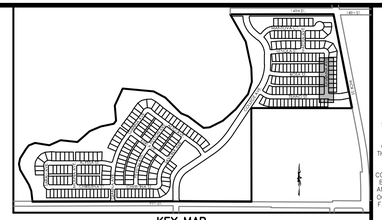
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
78

CAD FILE: 19003254-STREET HLDWG





KEY MAP
N.T.S.

(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

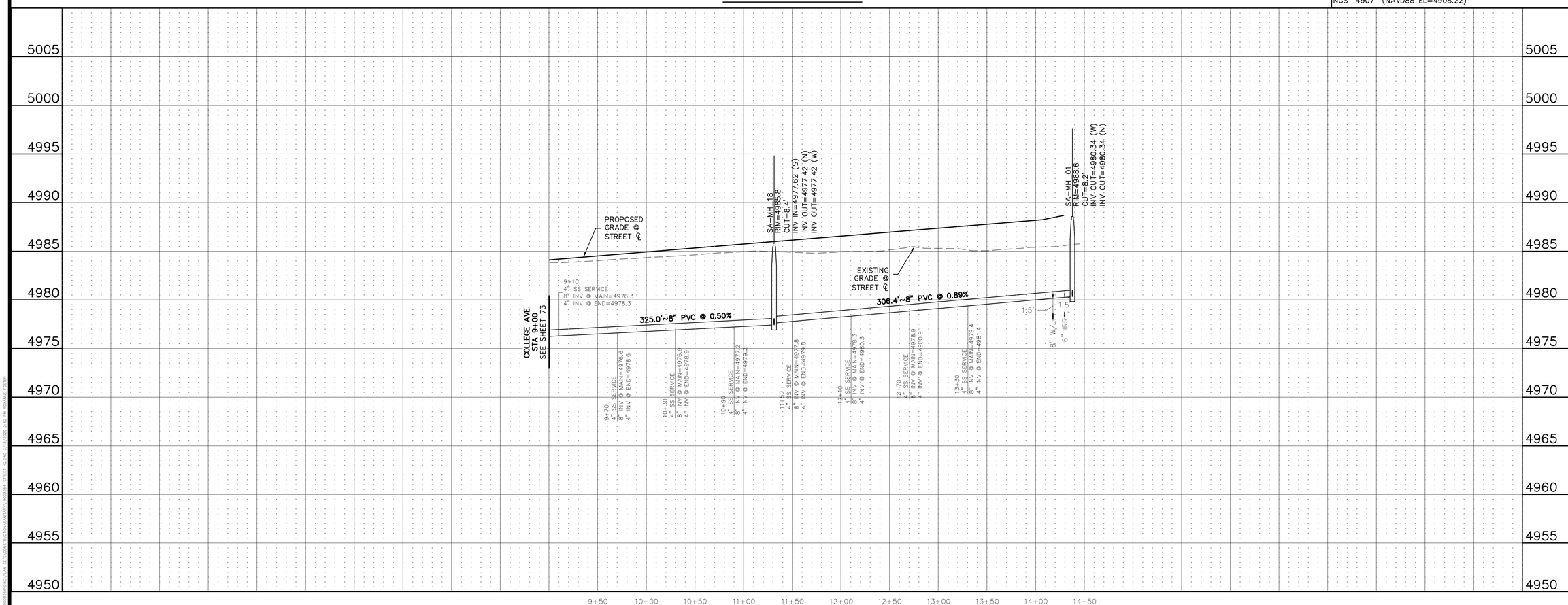
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

RAVENNA AVE.



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
SANITARY SEWER PLAN & PROFILE
RAVENNA AVE.

DATE
03/19/20

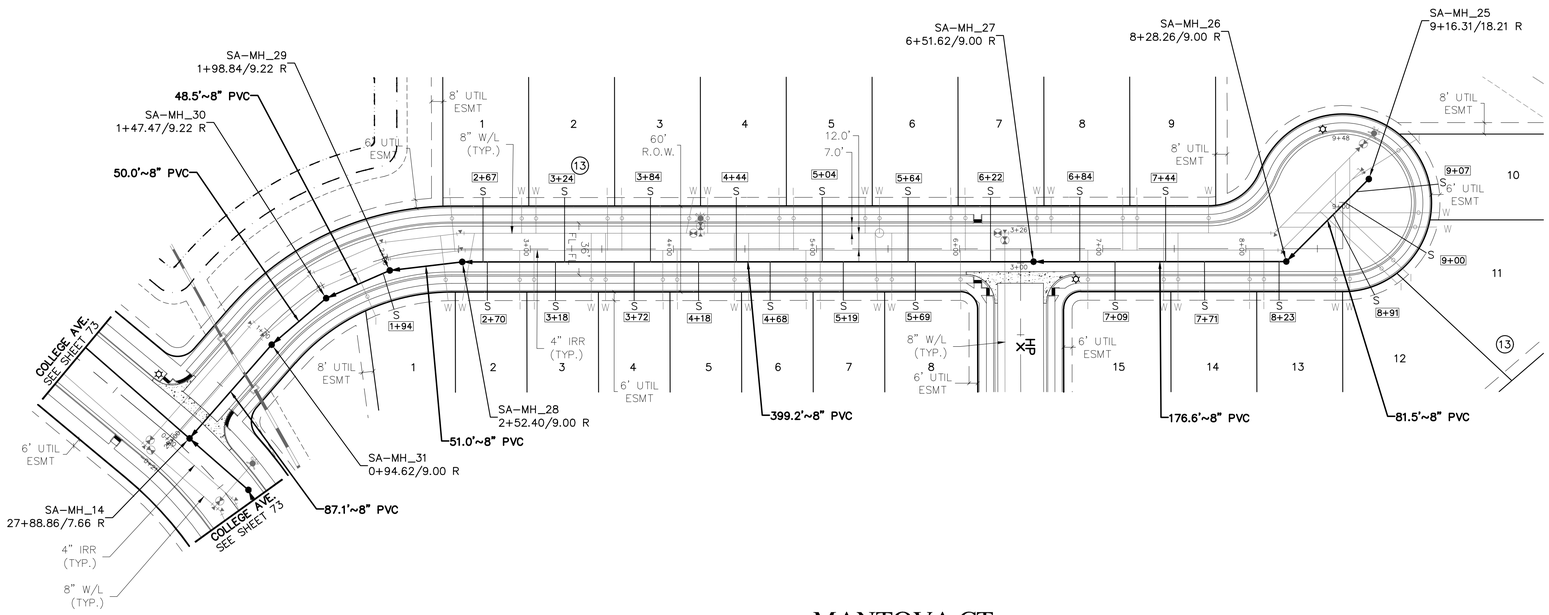
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

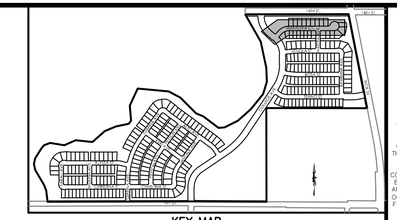
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
79

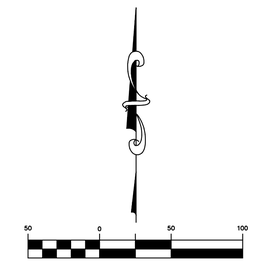
CAD FILE: 19003254-STREET H2.DWG



MANTOVA CT.



KEY MAP
N.T.S.

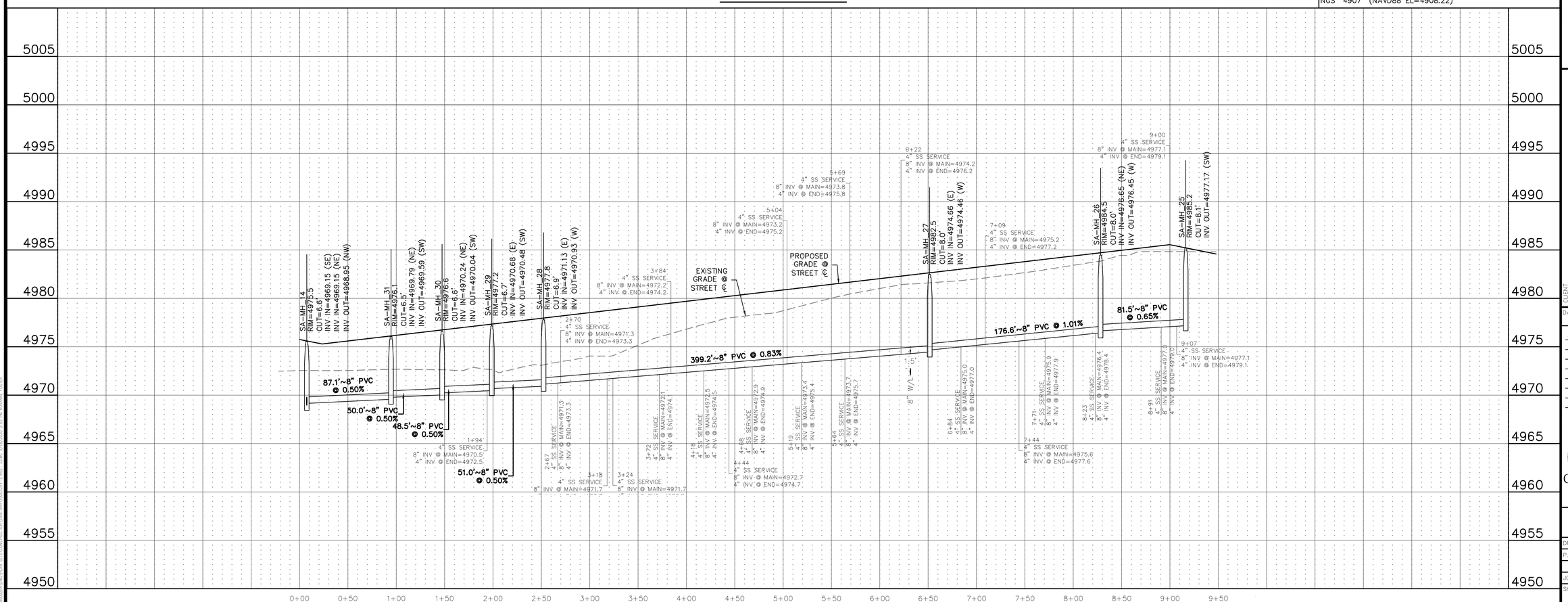


PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
SANITARY SEWER PLAN & PROFILE
MANTOVA CT.

DATE
03/19/20

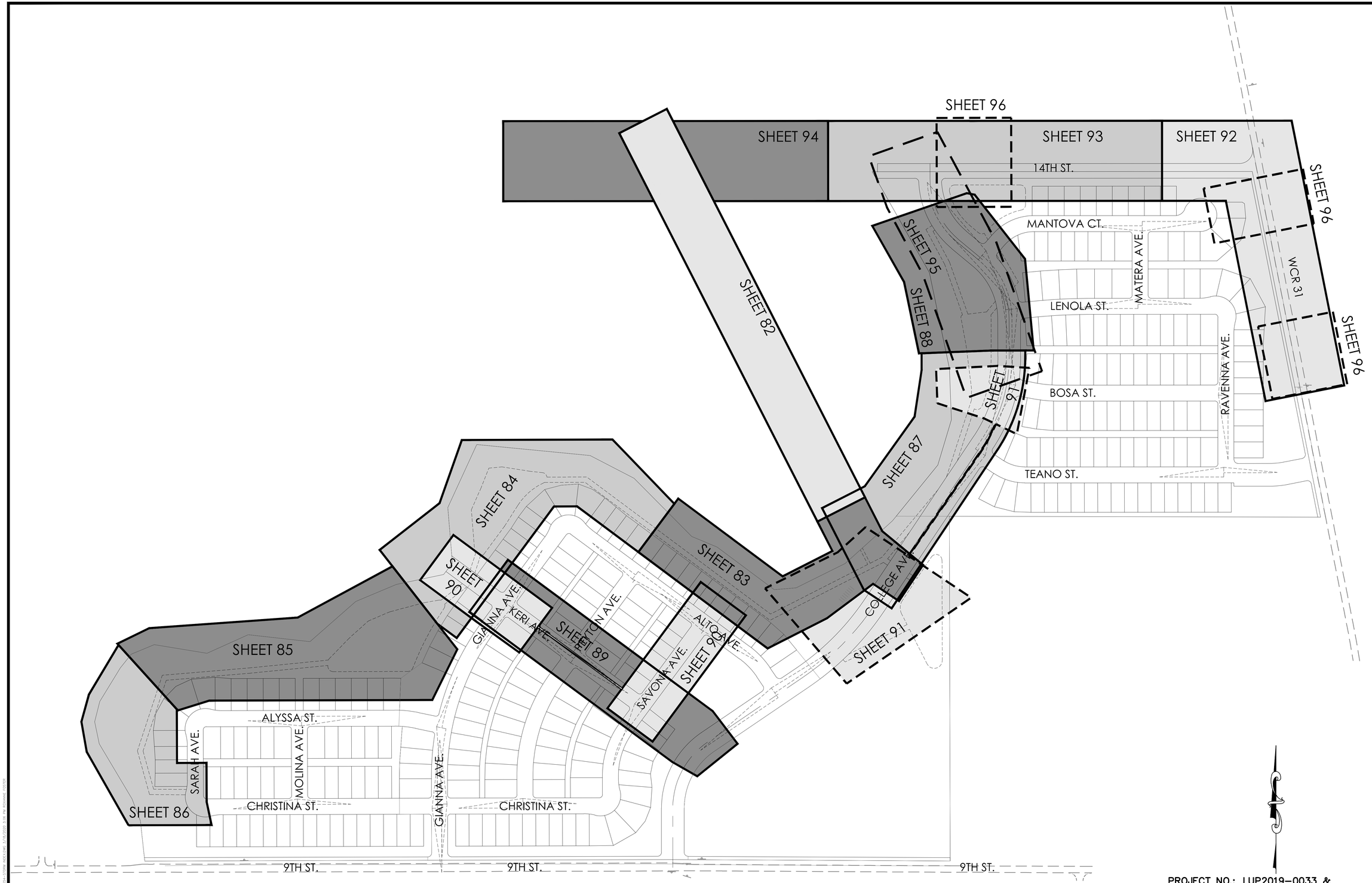
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 80

CAD FILE: 19003254-STREET.DWG



PROJECT NO.: LUP2019–0033 &
PLAN NO.: PPL2019–0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's **below.** **Call** before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
STORM INDEX

DATE
03/19/20

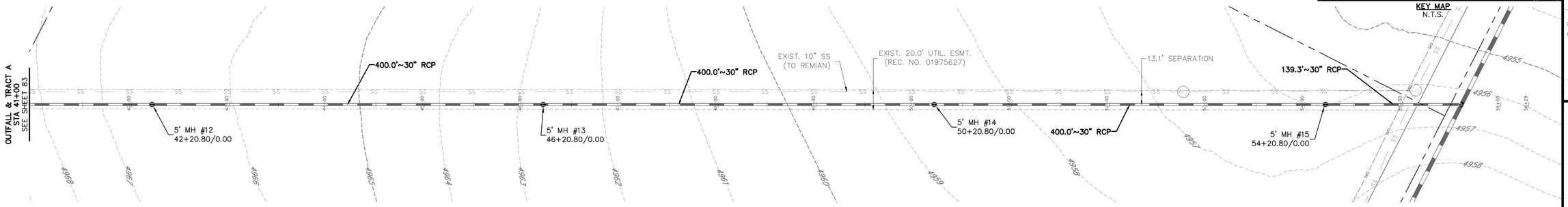
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

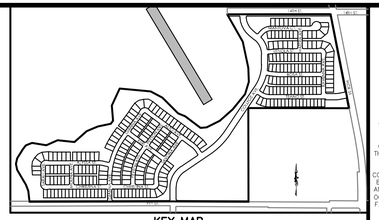
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 81

CAD FILE: 19003254-STORM INDEX.DWG





KEY MAP
N.T.S.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

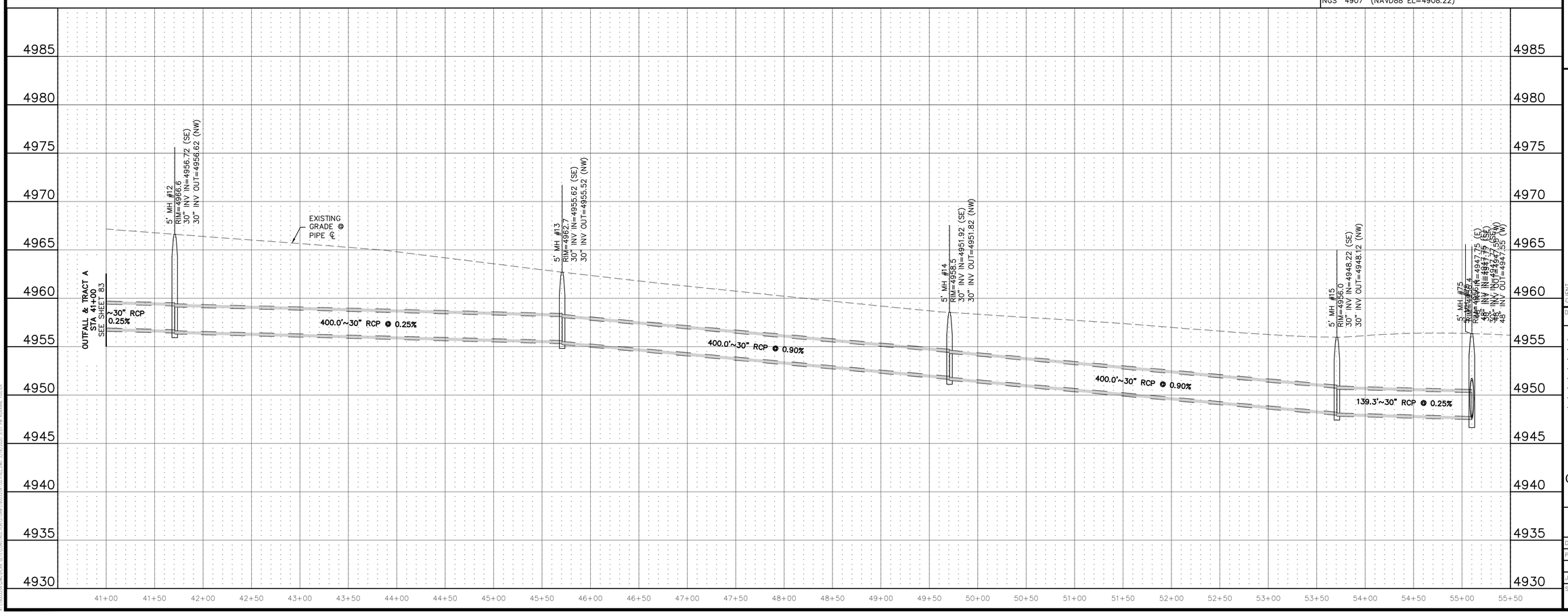
BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

50 0 50 100
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

OFF-SITE OUTFALL



811
Know what's below.
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STORM SEWER PLAN & PROFILE
OFF-SITE OUTFALL

DATE
03/19/20

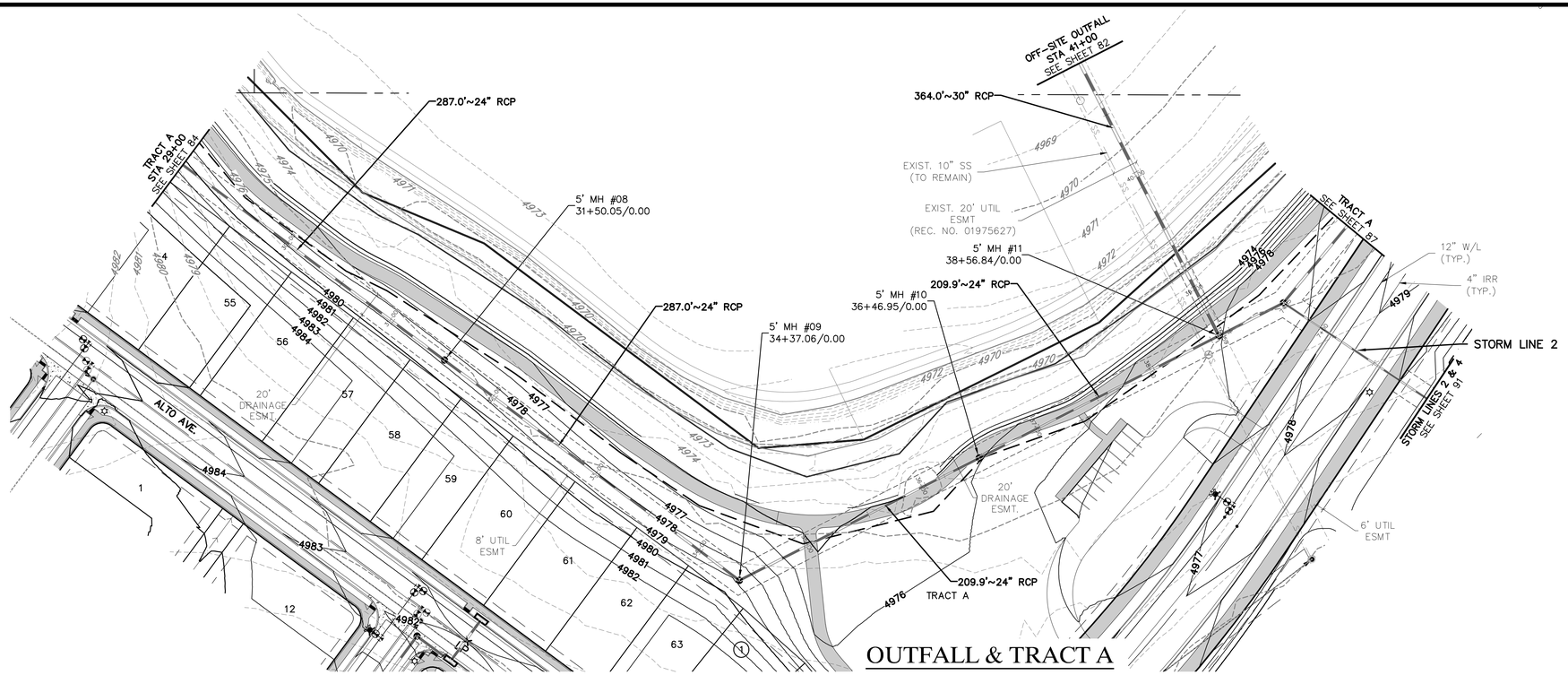
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

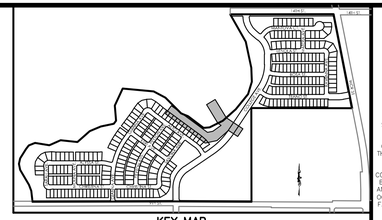
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
82

CAD FILE: 19003254-OUTFALL.DWG



OUTFALL & TRACT A



KEY MAP
N.T.S.

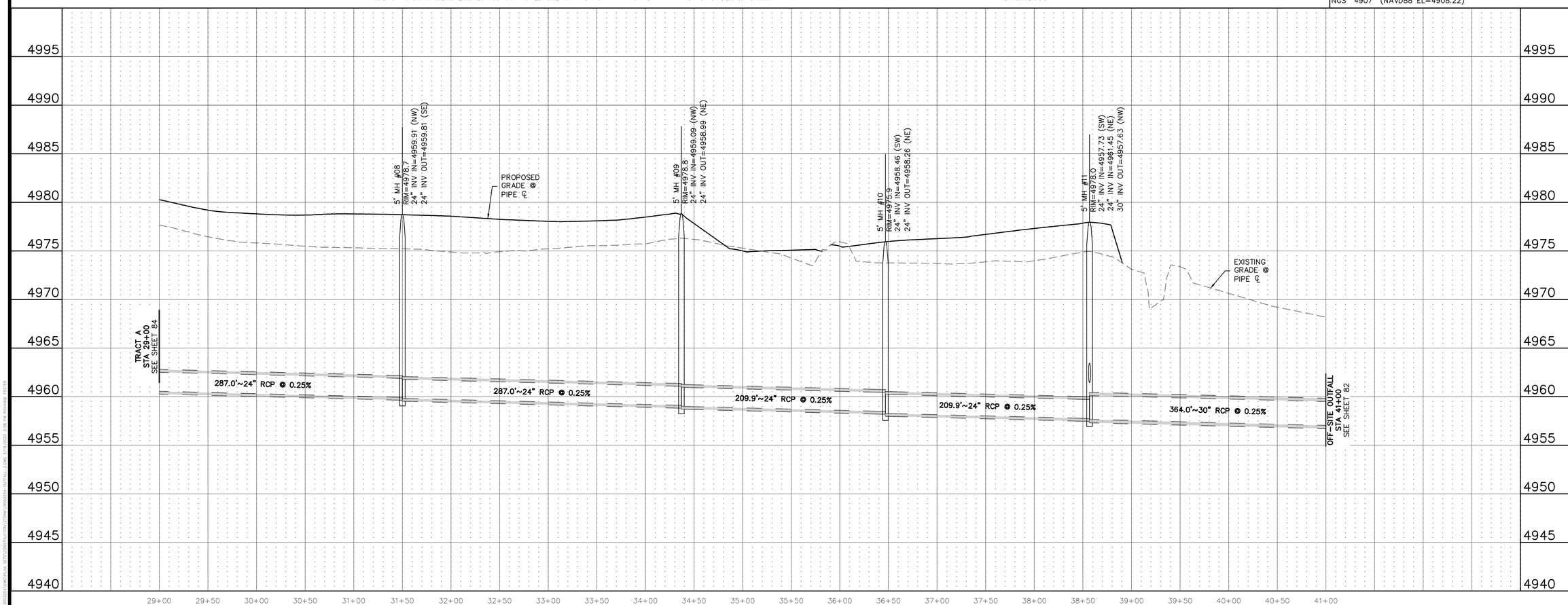
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STORM SEWER PLAN & PROFILE
OUTFALL & TRACT A

DATE
03/19/20

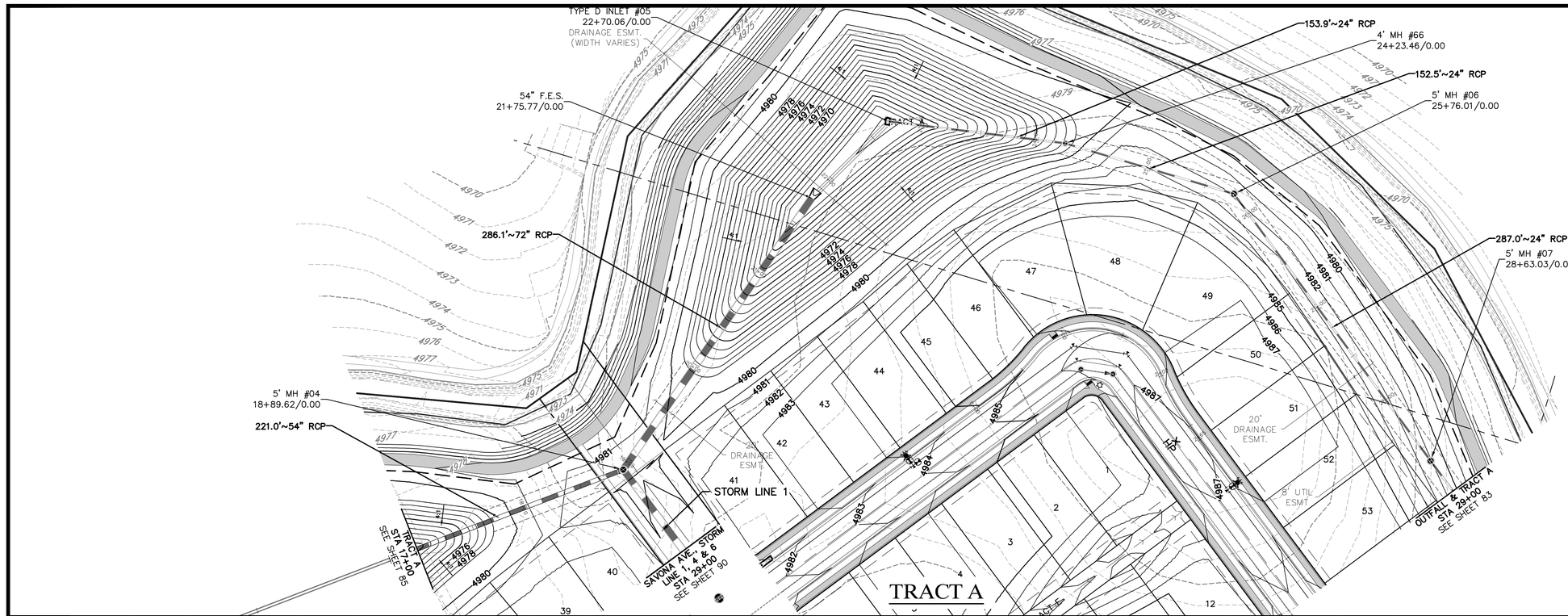
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

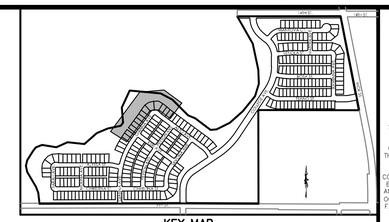
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
83

CAD FILE: 19003254-OUTFALL-2.DWG





KEY MAP
N.T.S.

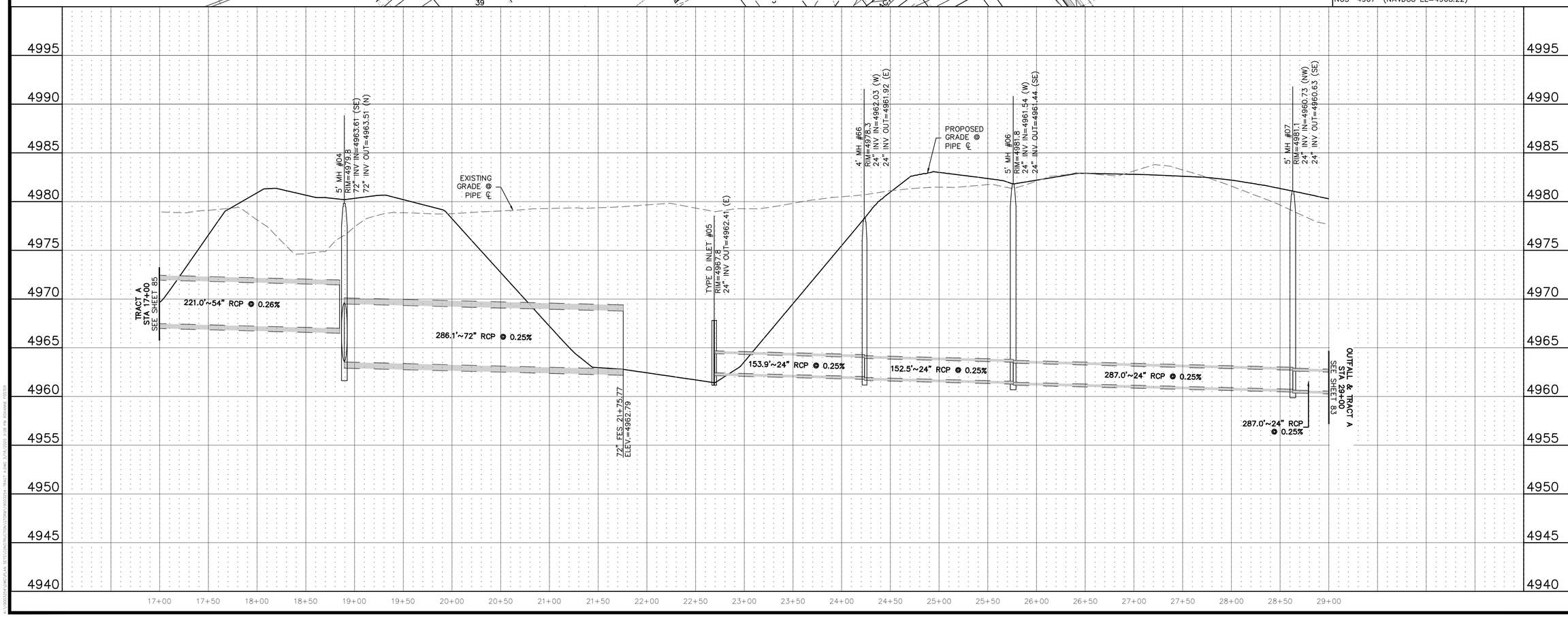
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STORM SEWER PLAN & PROFILE
TRACT A

DATE
03/19/20

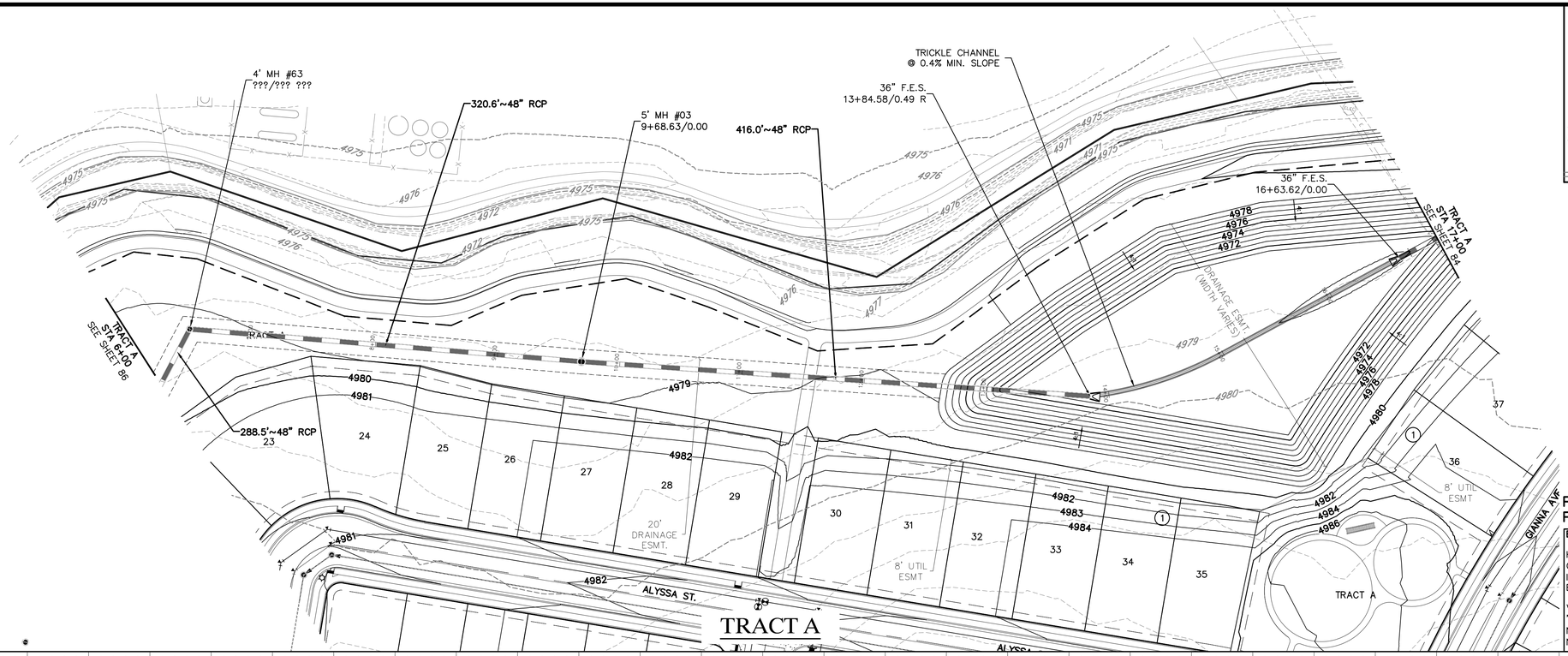
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

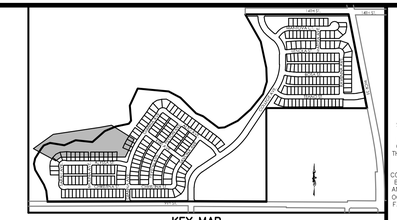
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 84

CAD FILE: 19003254-TRACT A.DWG





KEY MAP
N.T.S.

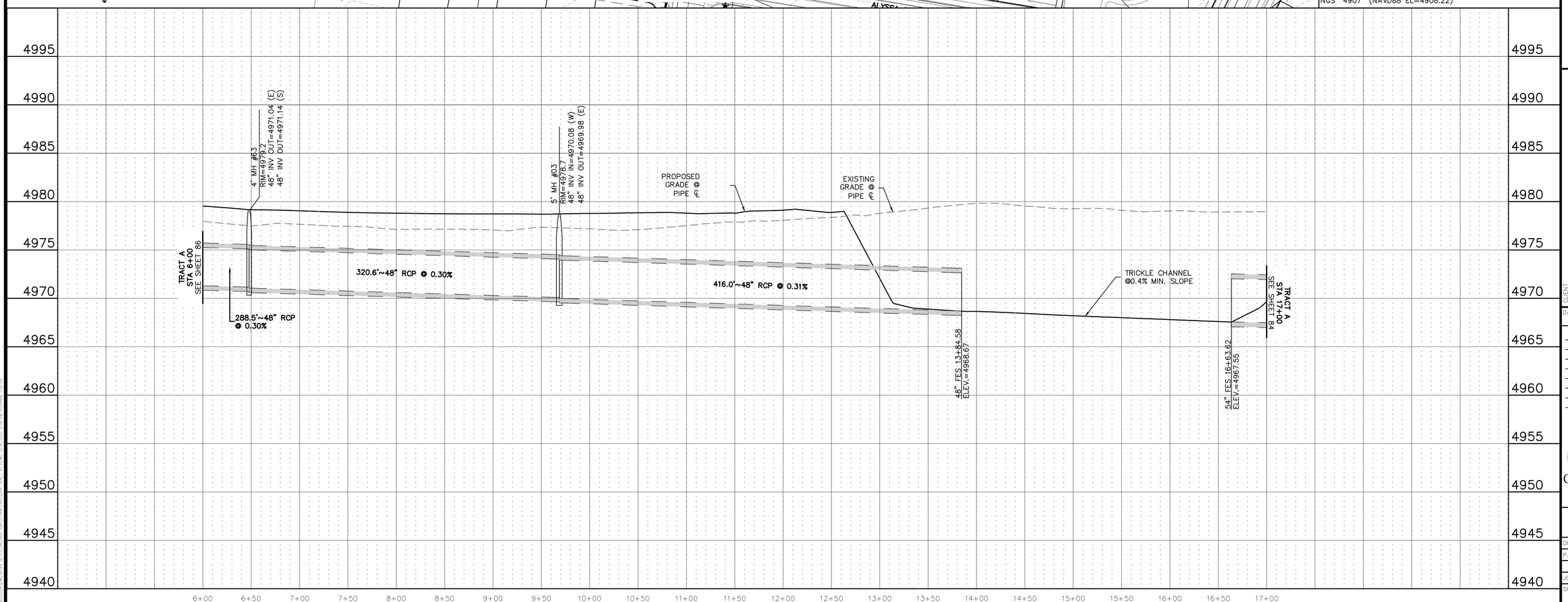
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STORM SEWER PLAN & PROFILE
TRACT A

DATE
03/19/20

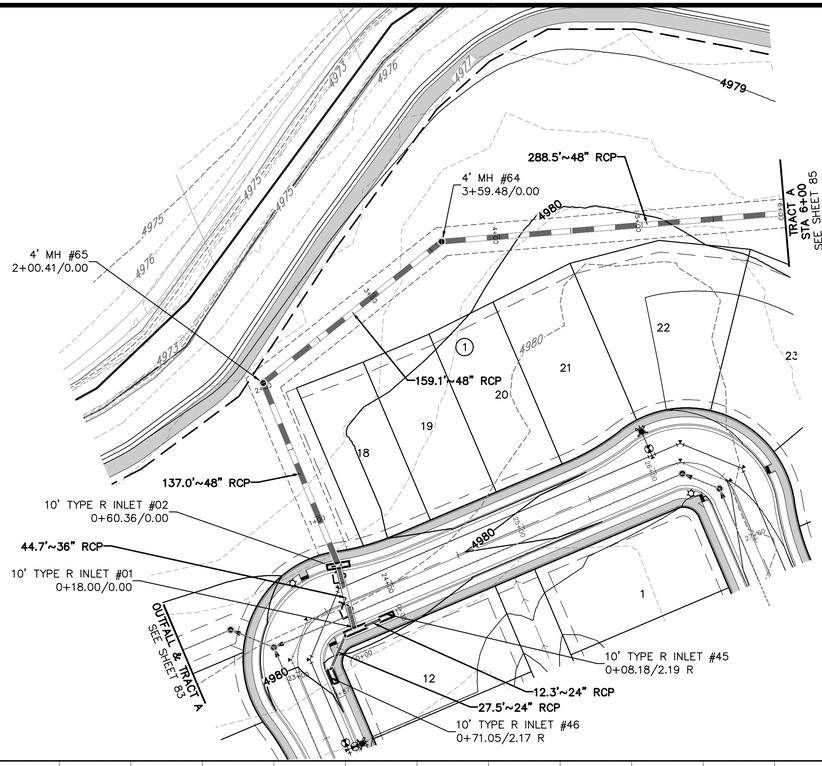
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

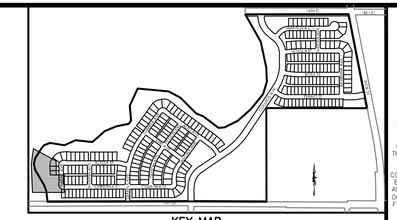
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 85

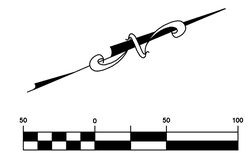
CAD FILE: 19003254-TRACT A-3.DWG



TRACT A



KEY MAP
N.T.S.



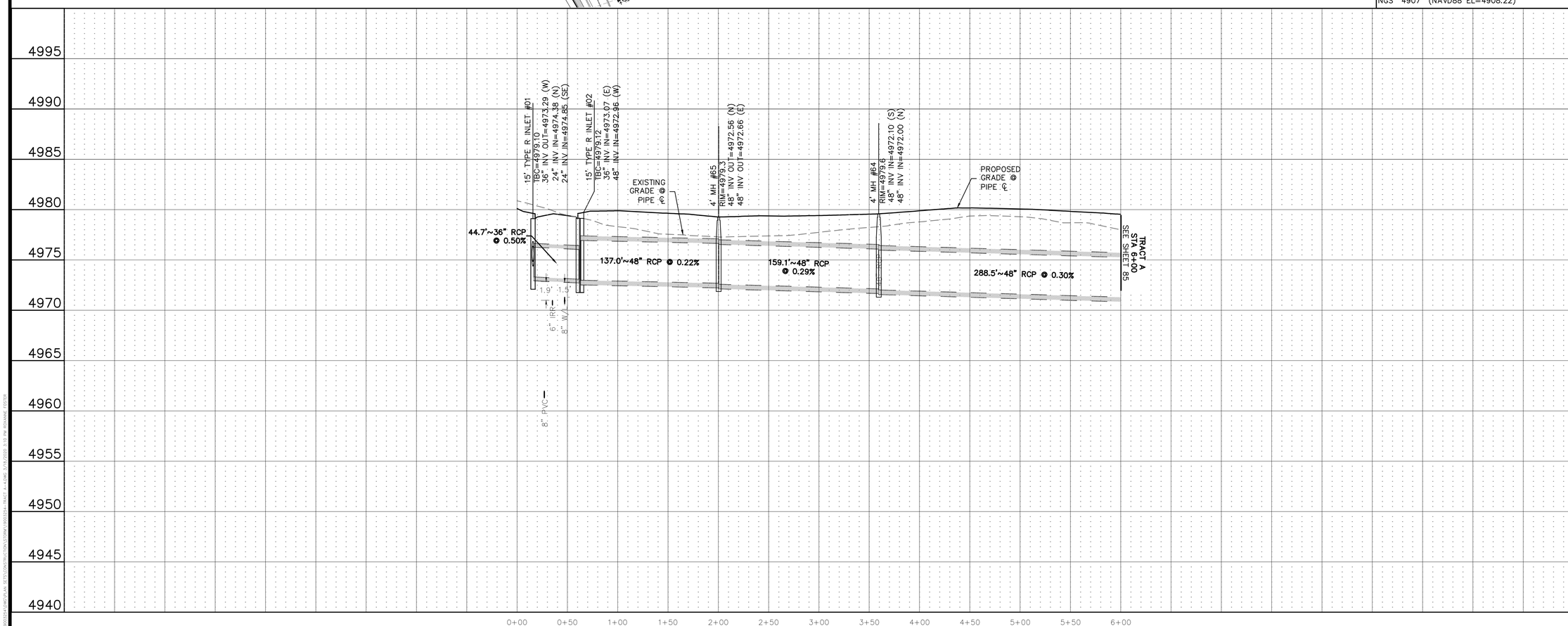
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811
Know what's below.
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STORM SEWER PLAN & PROFILE
TRACT A

DATE
03/19/20

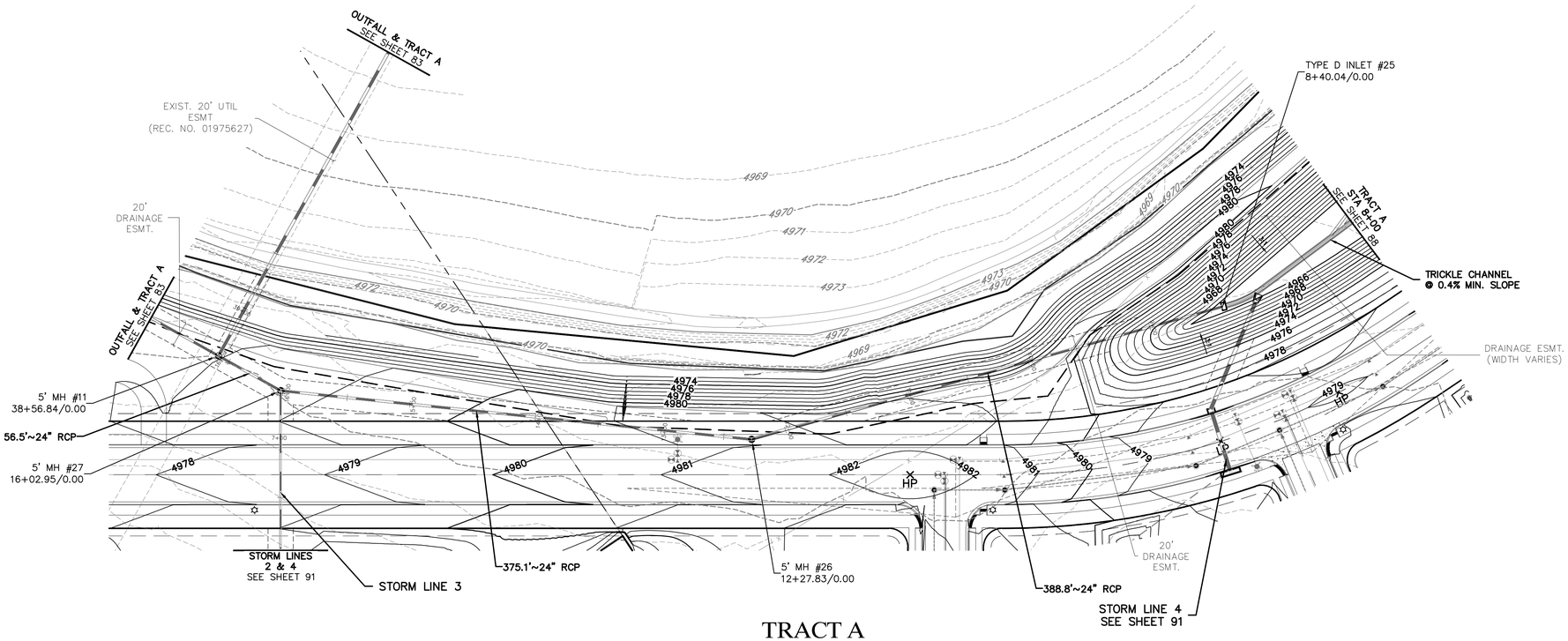
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

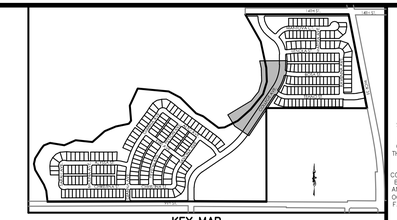
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
86

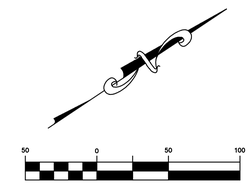
CAD FILE: 19003254-TRACT A-4.DWG



TRACT A



KEY MAP
N.T.S.

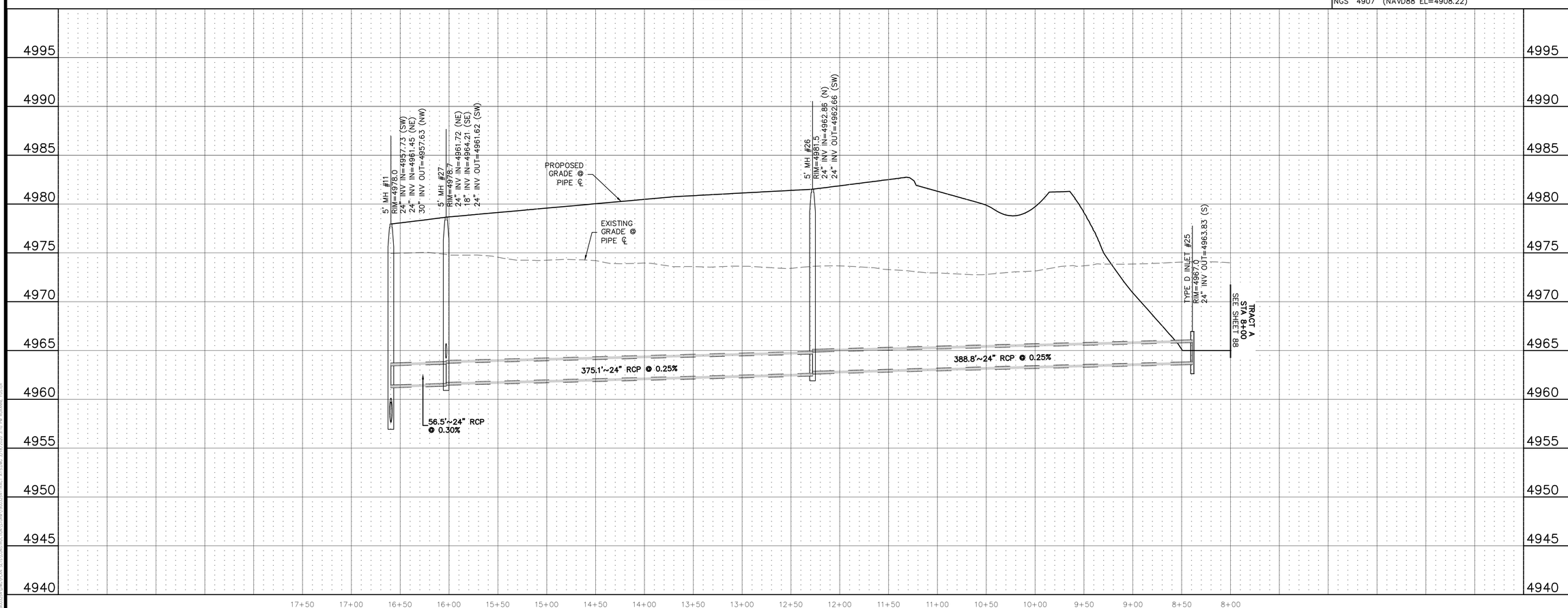


PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STORM SEWER PLAN & PROFILE
TRACT A

DATE
03/19/20

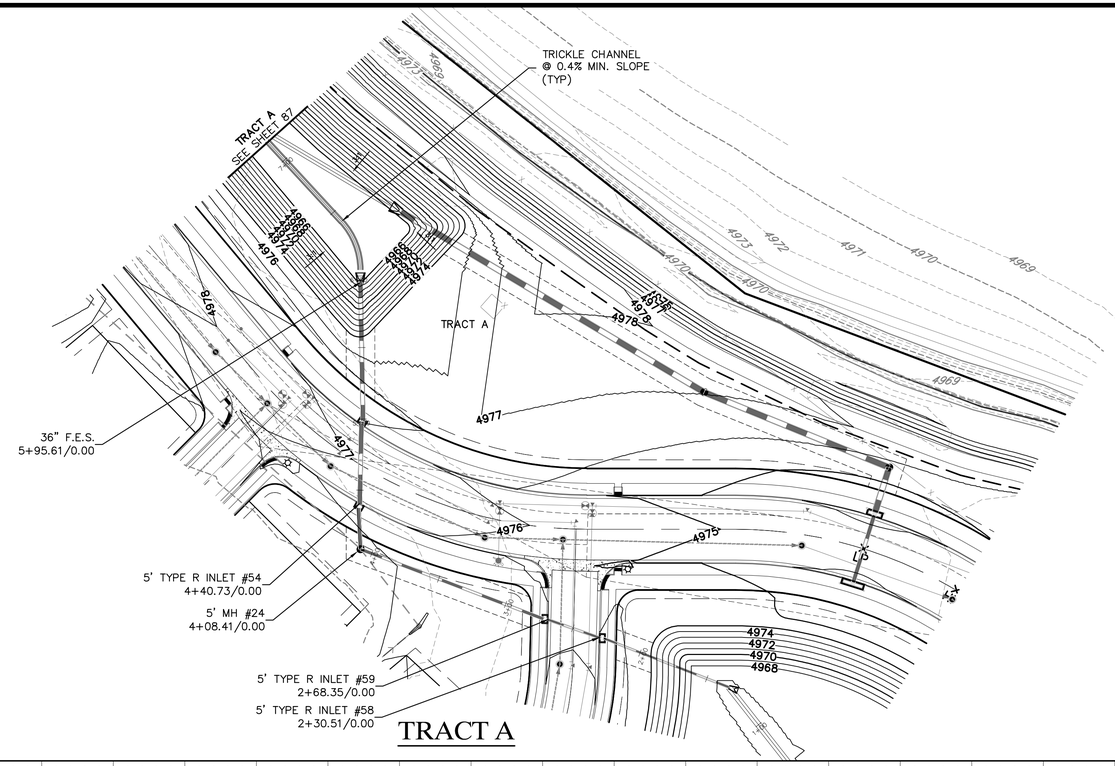
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

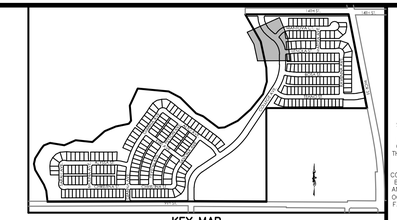
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
87

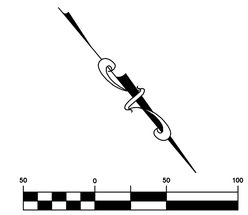
CAD FILE: 19003254-TRACT A-SD.DWG



TRACT A



KEY MAP
N.T.S.

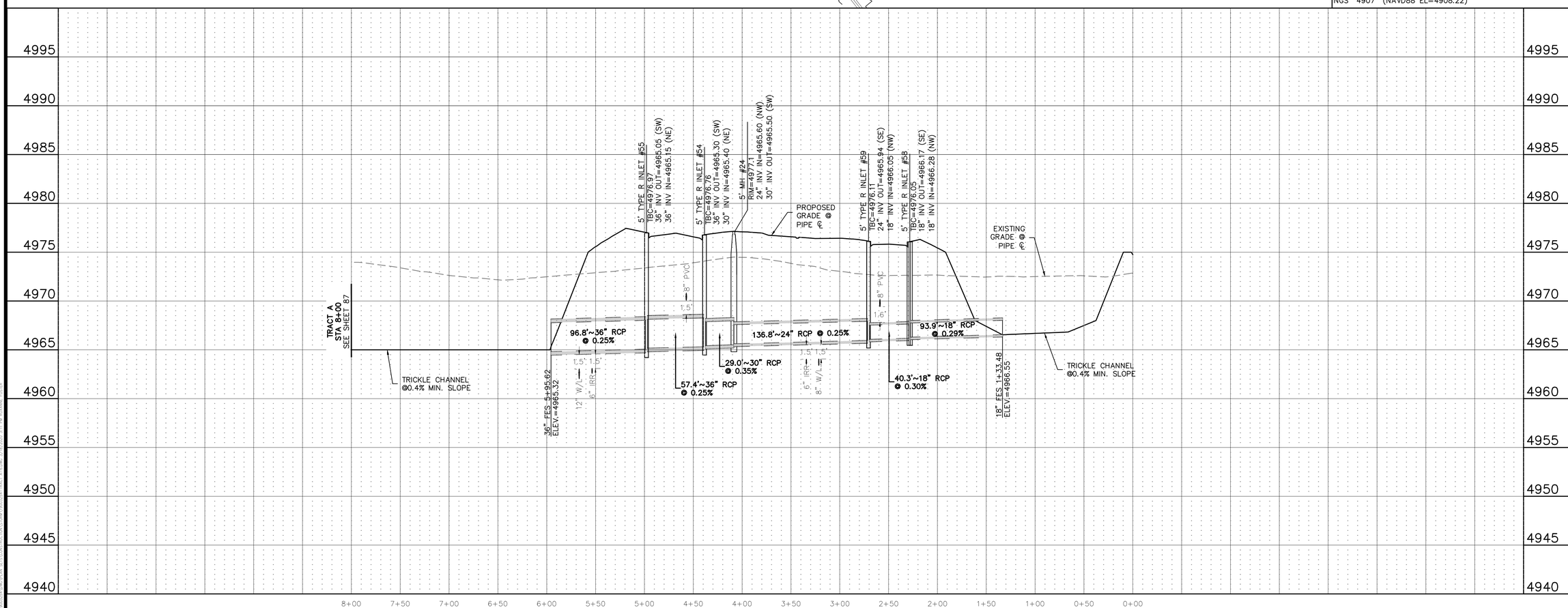


PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STORM SEWER PLAN & PROFILE
TRACT A

DATE
03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

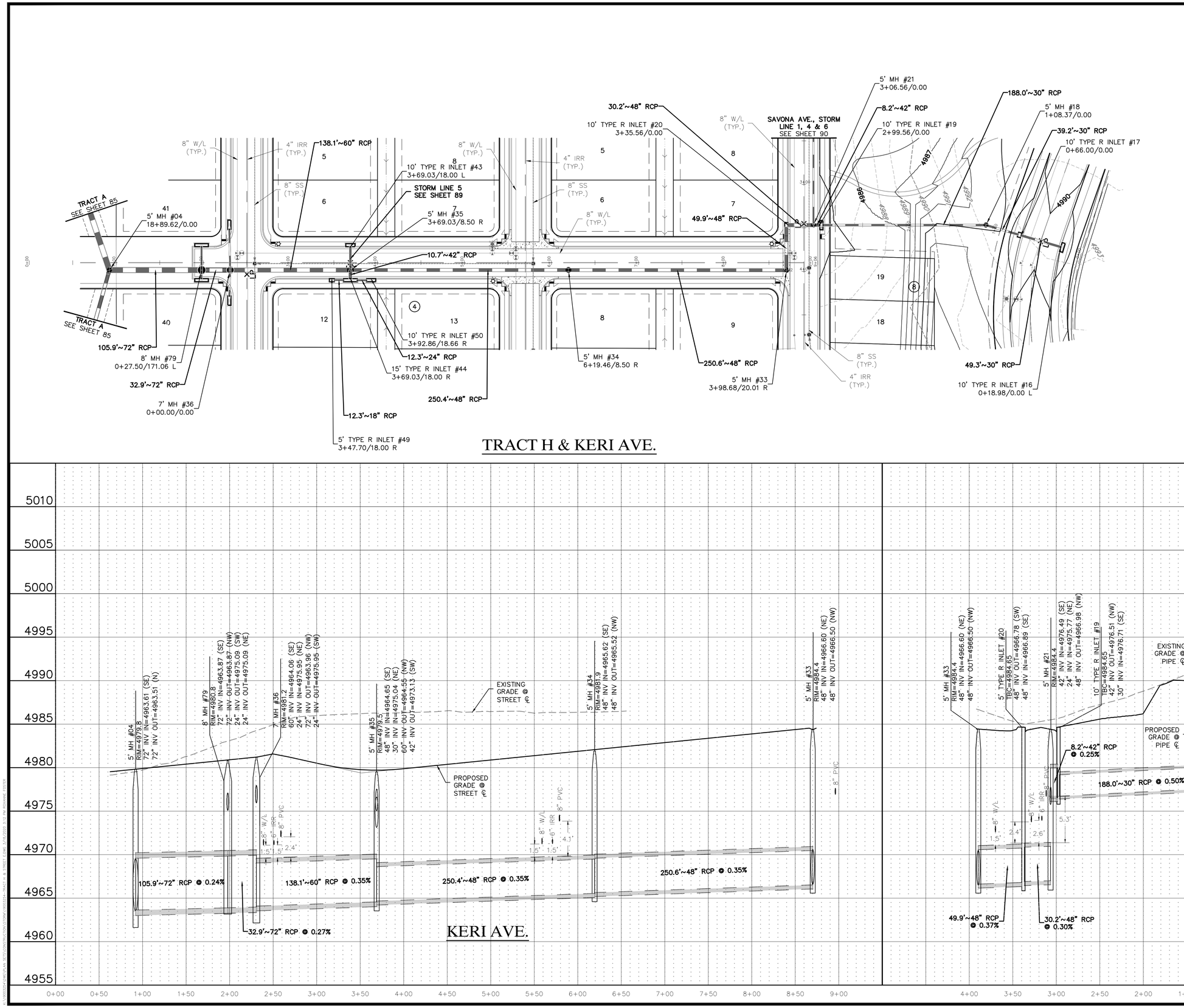
REVISIONS

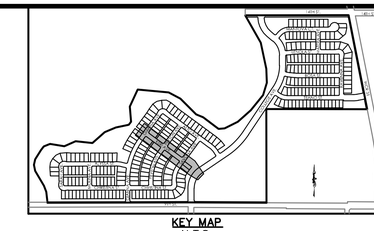
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM

JOB 19003254
SHEET NO.
88

CAD FILE: 19003254-TRACT A-6.DWG





KEY MAP
N.T.S.

(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STORM SEWER PLAN & PROFILE
TRACT H & KERI AVE.

DATE 03/19/20

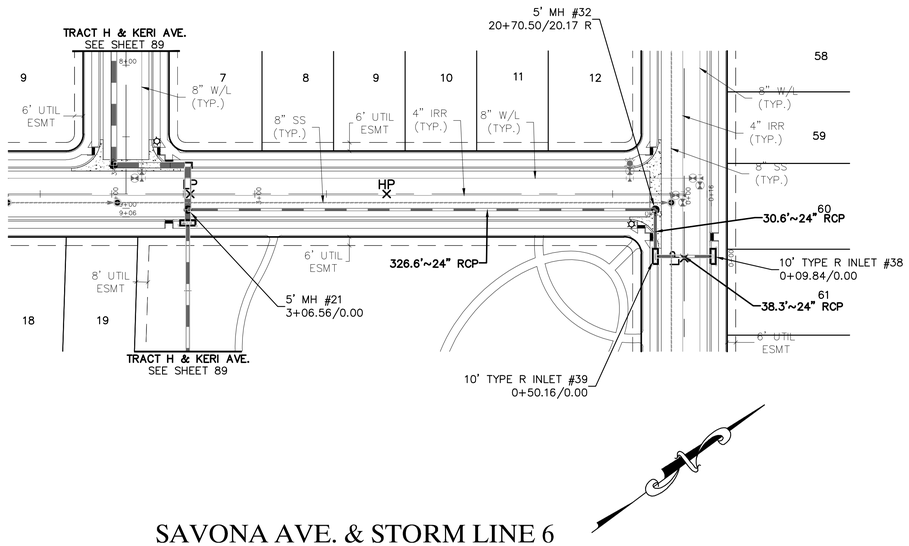
A	1st SUBMITTAL TO FT. LUPTON	03/19/2020 – MAM

REVISIONS

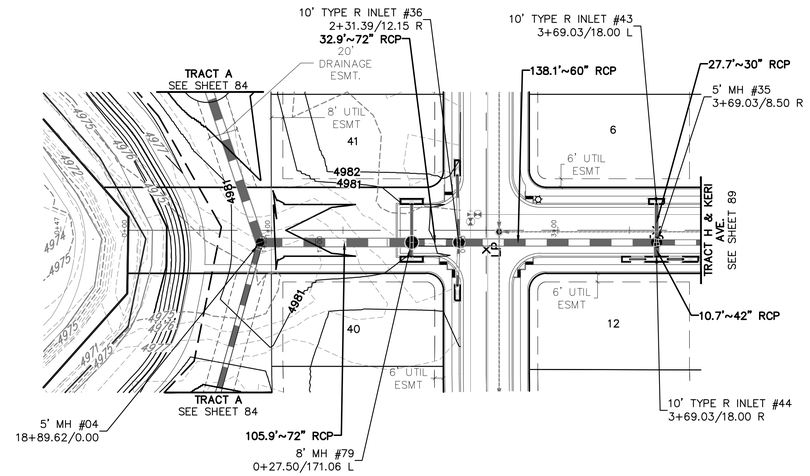
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 89

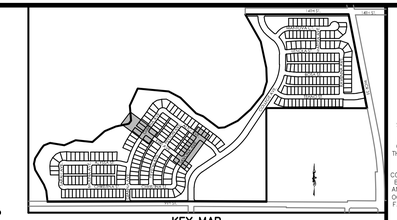
CAD FILE: 19003254-TRACT H & STREET EDWG



SAVONA AVE. & STORM LINE 6



STORM LINE 1 & STORM LINE 5



KEY MAP
N.T.S.

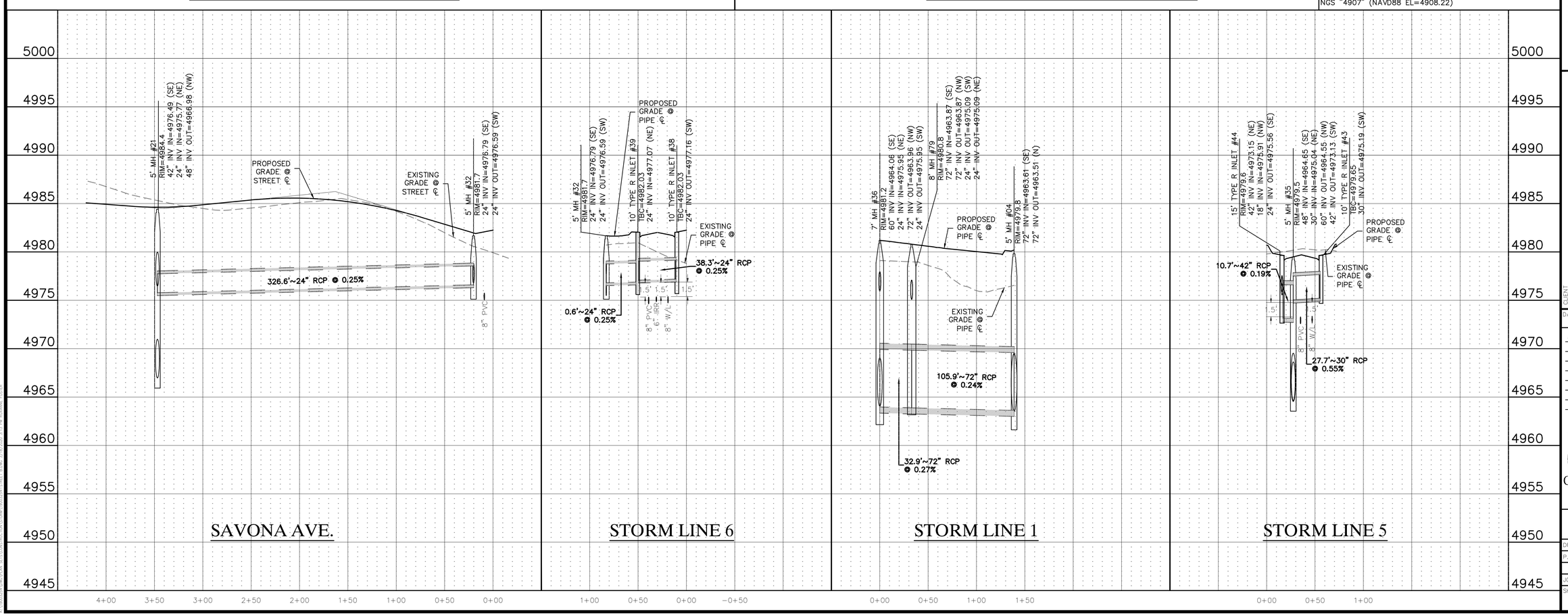
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STORM SEWER PLAN & PROFILE
SAVONA AVE., STORM LINE 1, 4 & 6

DATE
03/19/20

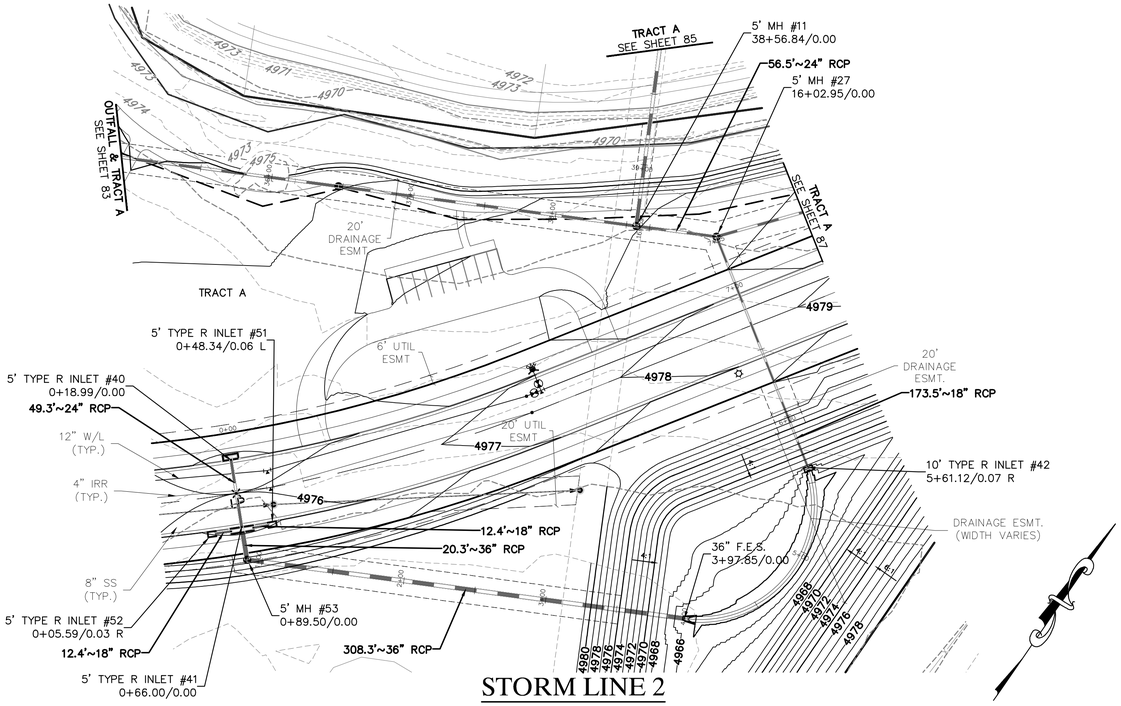
A	1st SUBMITTAL TO FT. LUPTON	03/19/20 – MAM

REVISIONS

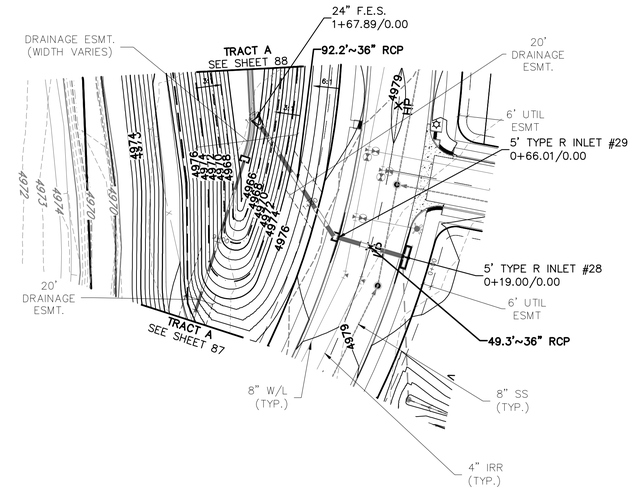
PLANS UNDER REVIEW
NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
90

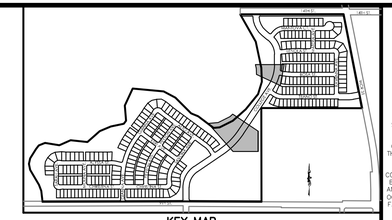
CAD FILE: 19003254-STREET B.DWG



STORM LINE 2



STORM LINE 4



KEY MAP
N.T.S.

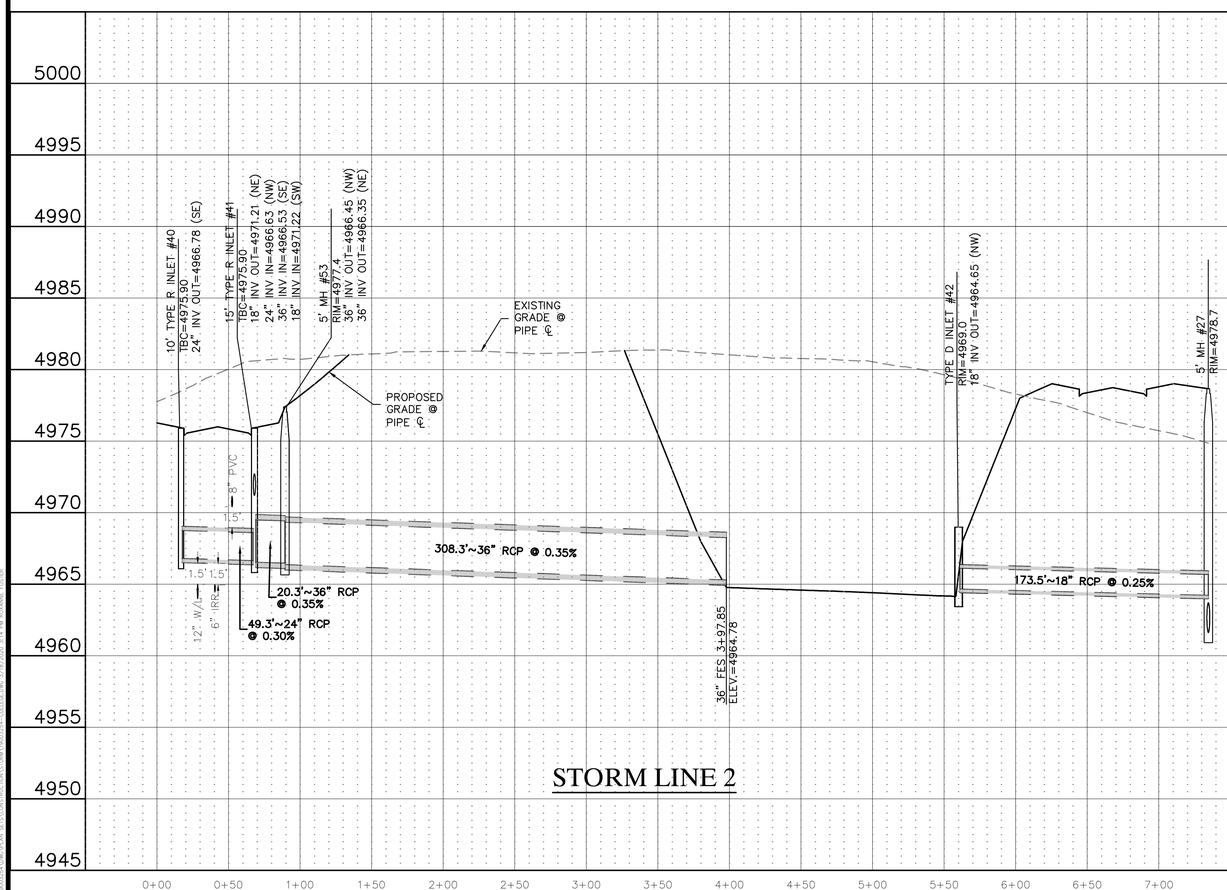
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

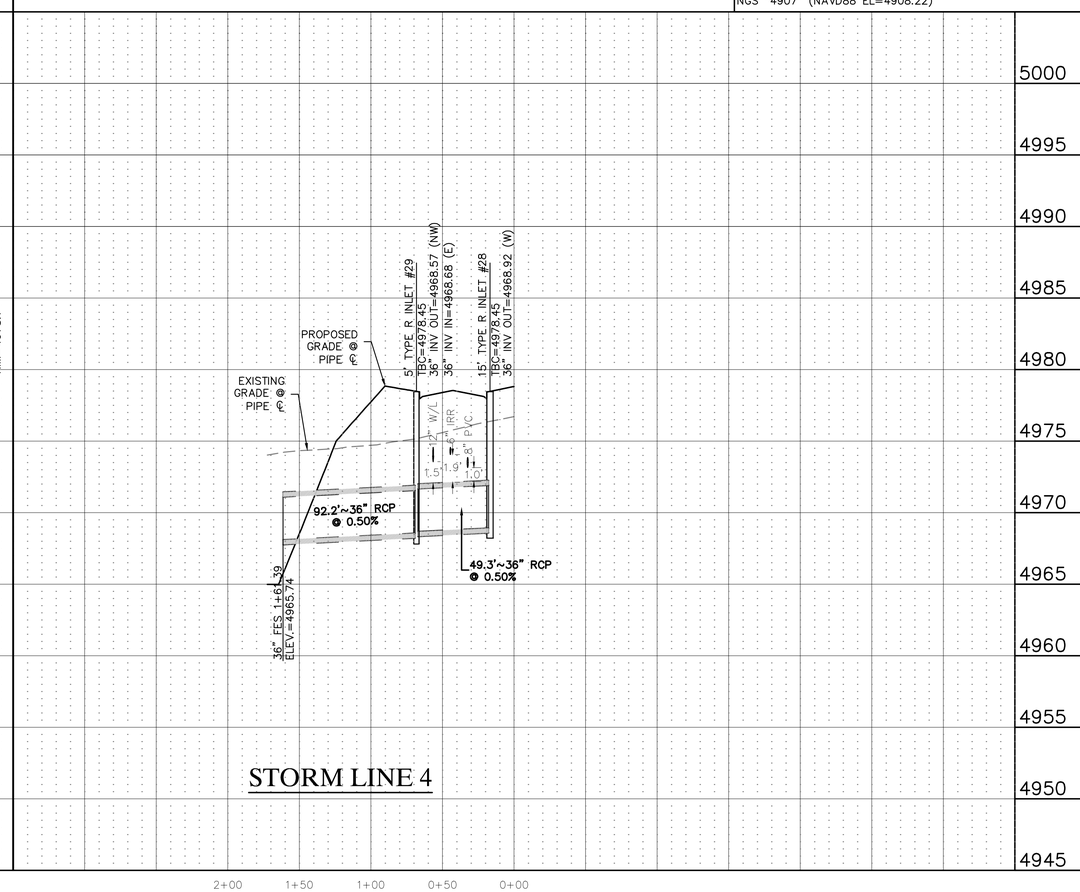
BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



STORM LINE 2



STORM LINE 4

811
Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STORM SEWER PLAN & PROFILE
STORM LINES 2 & 4

DATE 03/19/20

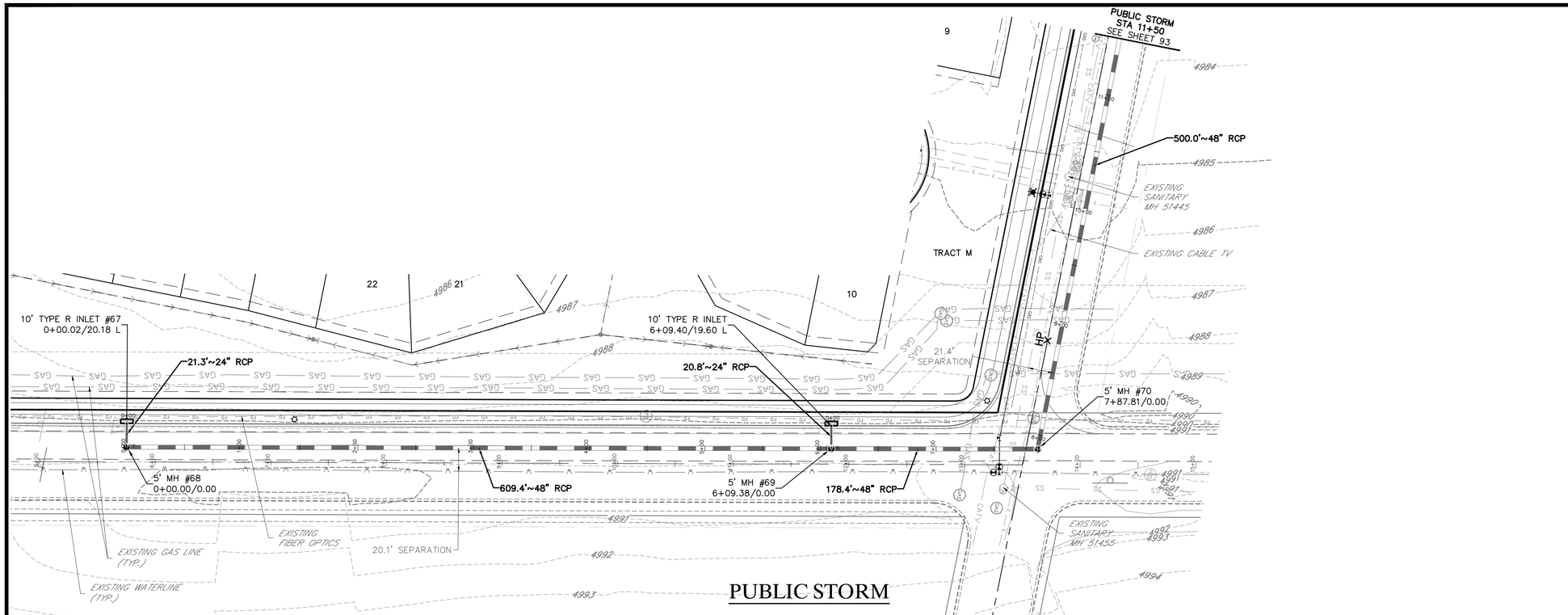
A	1st SUBMITTAL TO FT. LUPTON	03/19/2020 – MAM

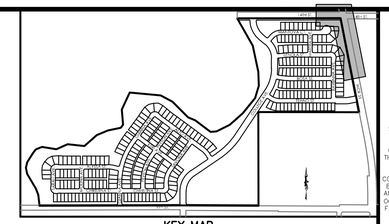
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 91

CAD FILE: 19003254-COLLEGE.DWG





KEY MAP
N.T.S.

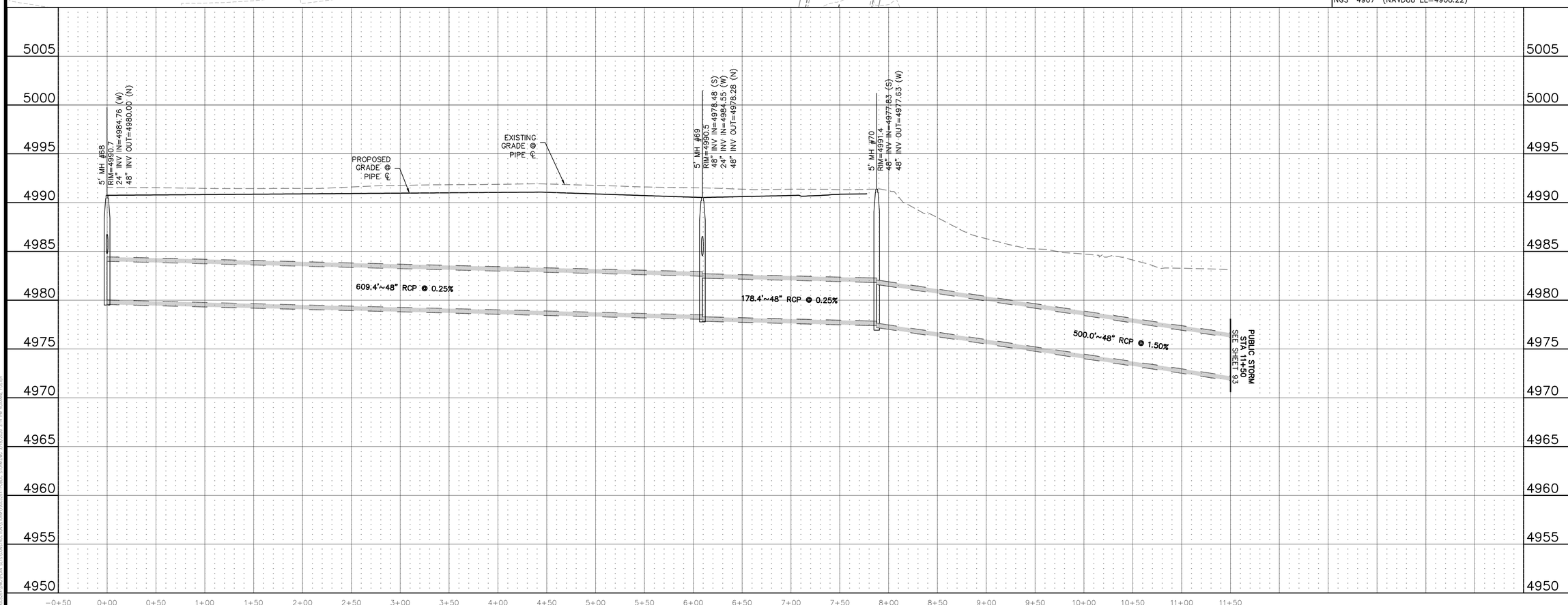
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



PUBLIC STORM

Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
STORM SEWER PLAN & PROFILE
PUBLIC STORM

DATE 03/19/20

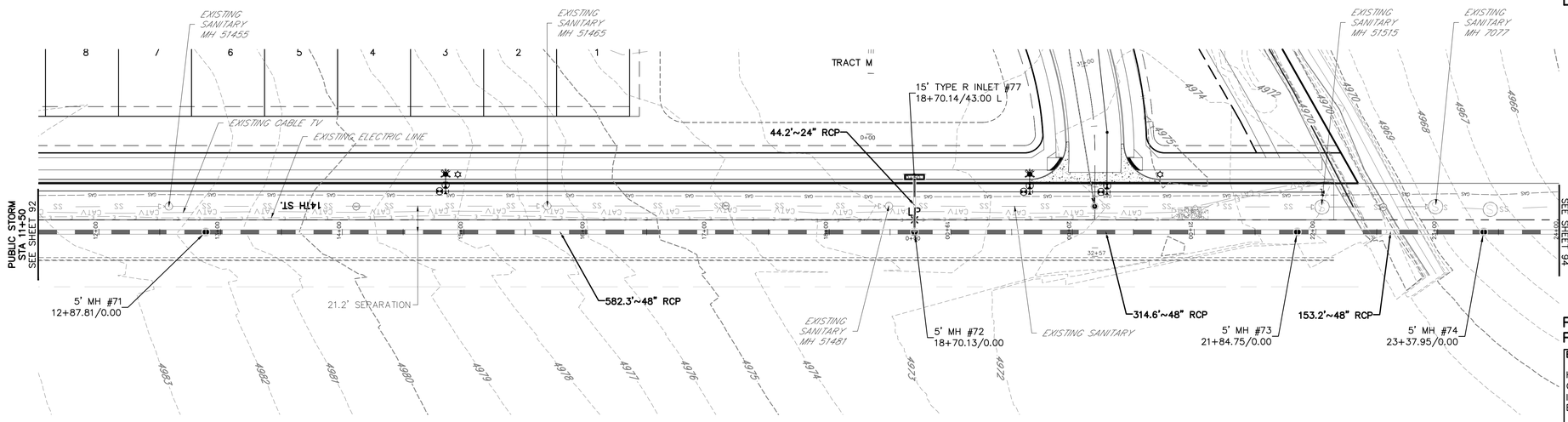
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

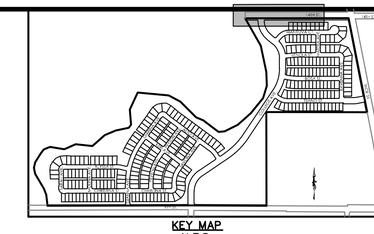
REVISIONS

PLANS UNDER REVIEW
NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 92

CAD FILE: 19003254-PUBLIC STORM.DWG





KEY MAP
N.T.S.

(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

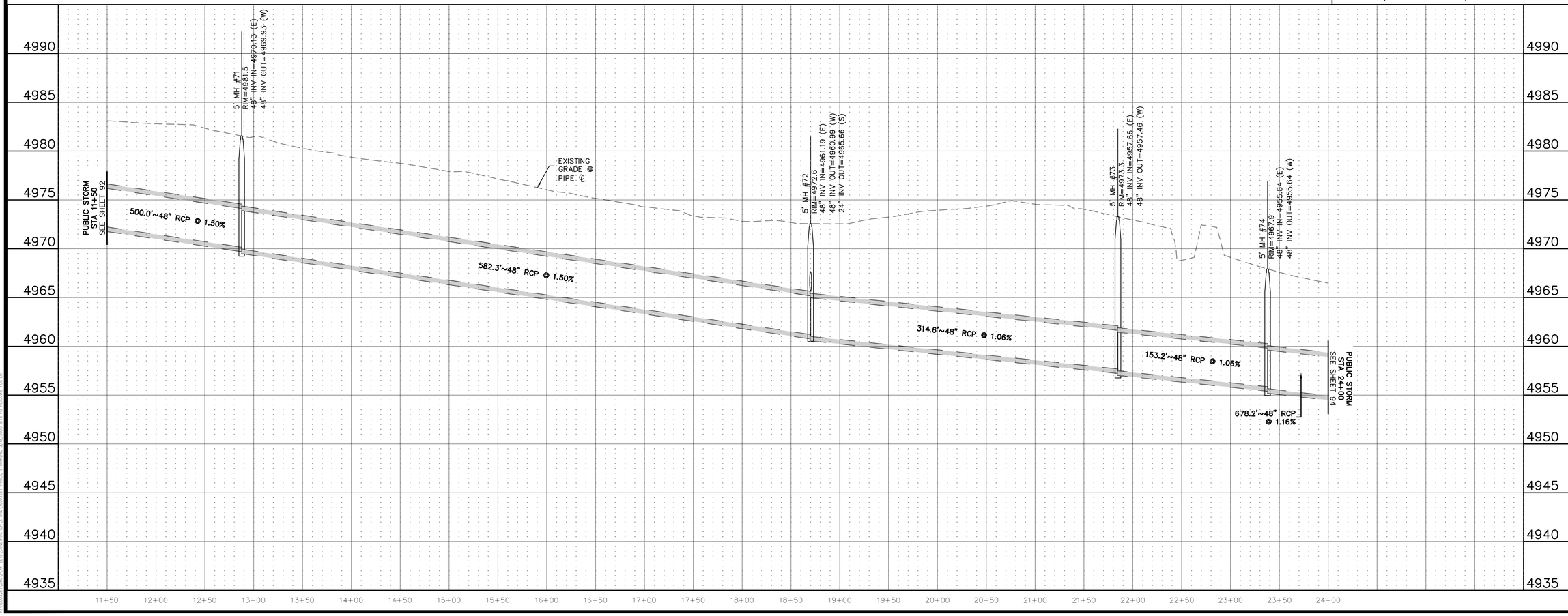
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

PUBLIC STORM



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STORM SEWER PLAN & PROFILE
PUBLIC STORM

DATE
03/19/20

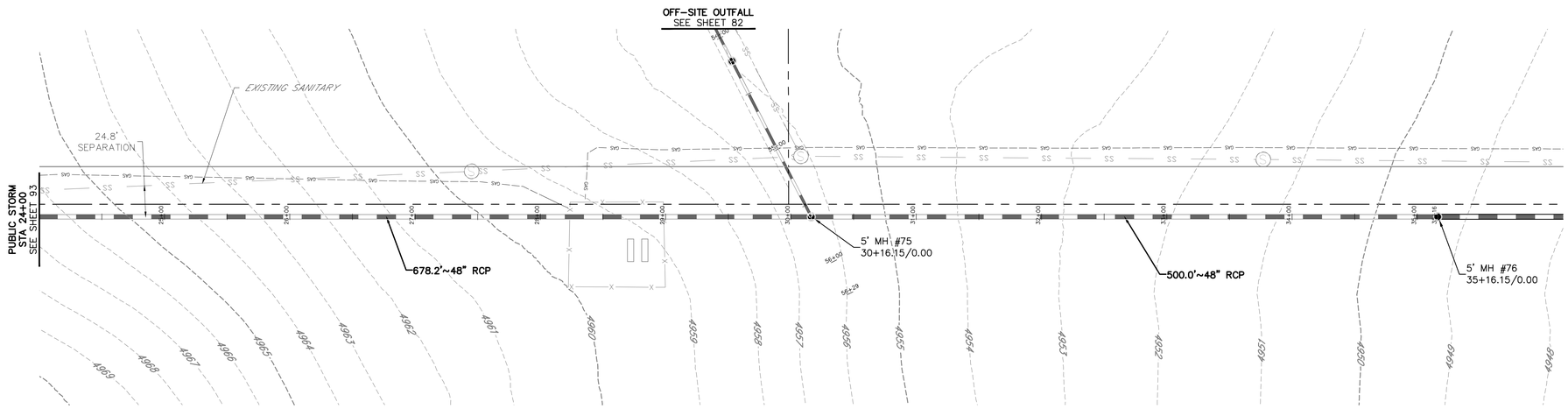
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

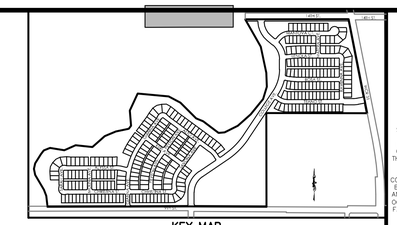
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 93

CAD FILE: 19003254-PUBLIC STORM.DWG



PUBLIC STORM



KEY MAP
N.T.S.

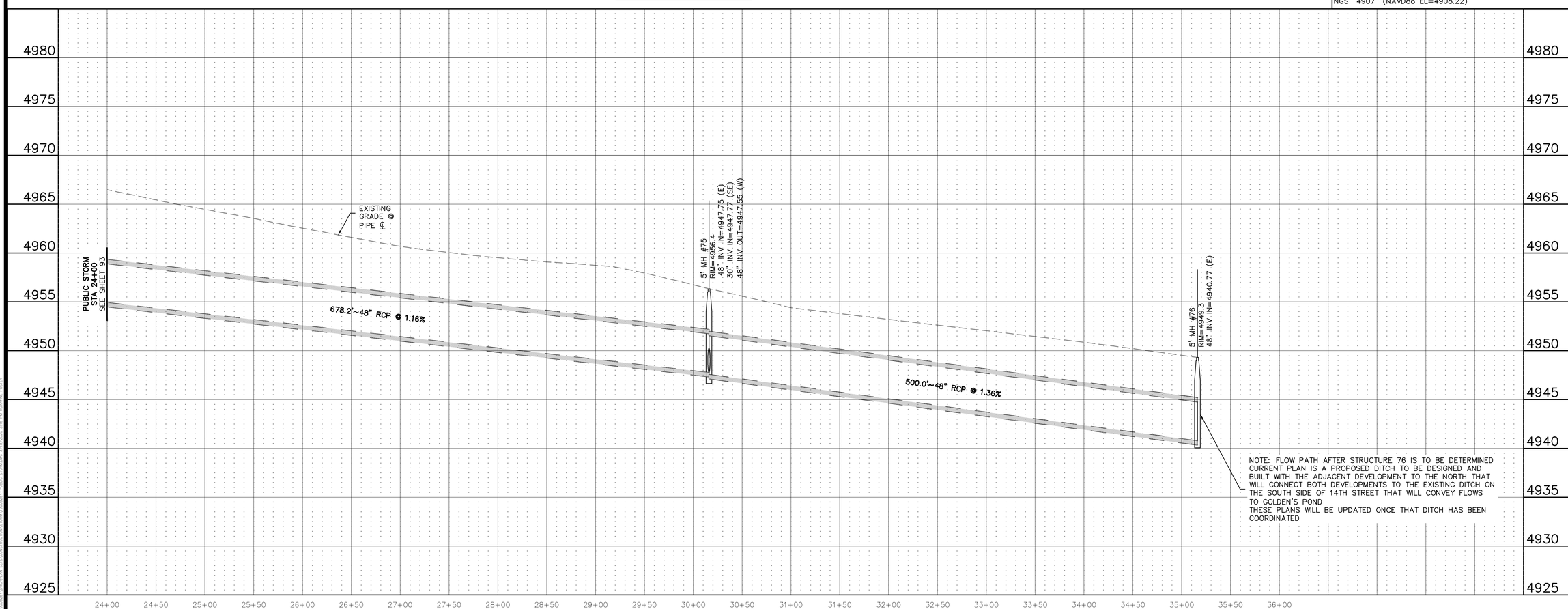
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



NOTE: FLOW PATH AFTER STRUCTURE 76 IS TO BE DETERMINED
CURRENT PLAN IS A PROPOSED DITCH TO BE DESIGNED AND BUILT WITH THE ADJACENT DEVELOPMENT TO THE NORTH THAT WILL CONNECT BOTH DEVELOPMENTS TO THE EXISTING DITCH ON THE SOUTH SIDE OF 14TH STREET THAT WILL CONVEY FLOWS TO GOLDEN'S POND
THESE PLANS WILL BE UPDATED ONCE THAT DITCH HAS BEEN COORDINATED

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STORM SEWER PLAN & PROFILE
PUBLIC STORM

DATE
03/19/20

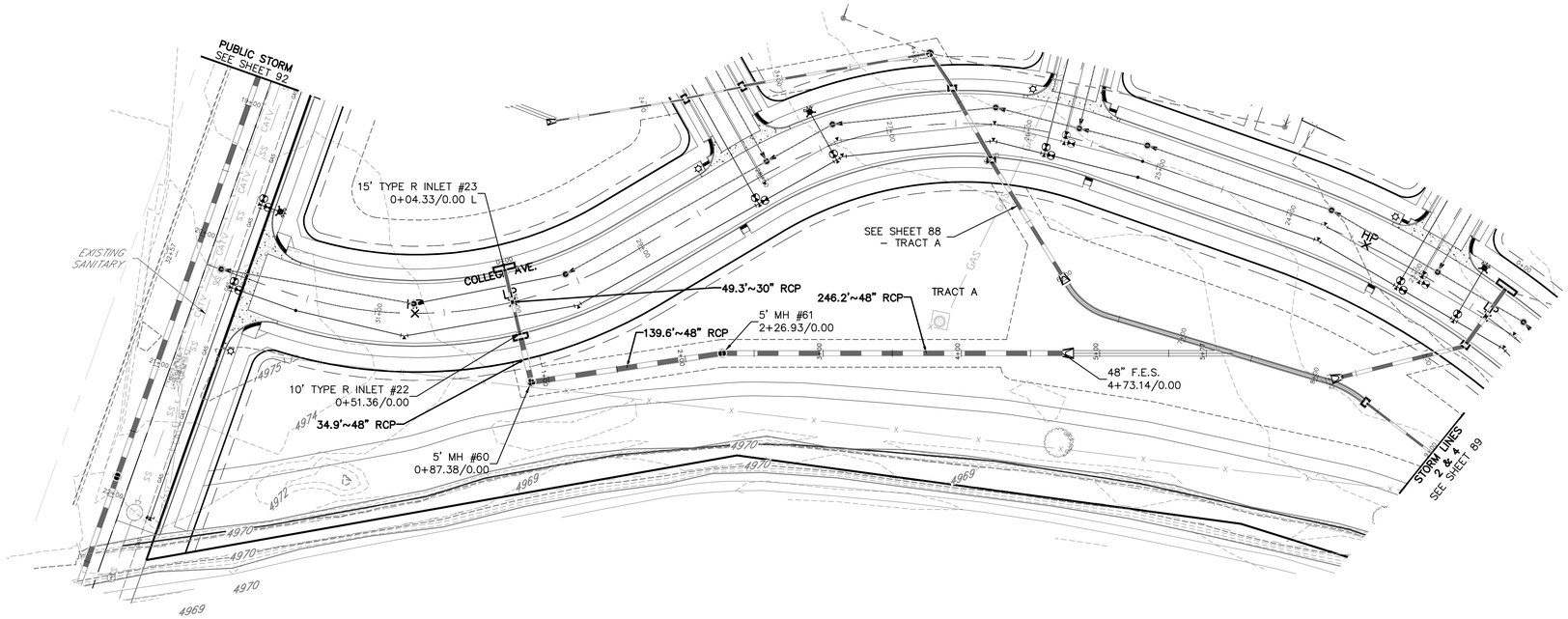
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

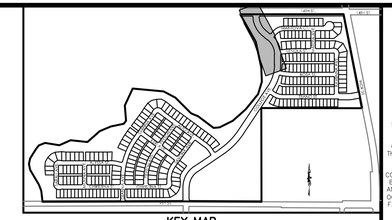
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 94

CAD FILE: 19003254-PUBLIC STORM.DWG



NE 100-YEAR



KEY MAP
N.T.S.

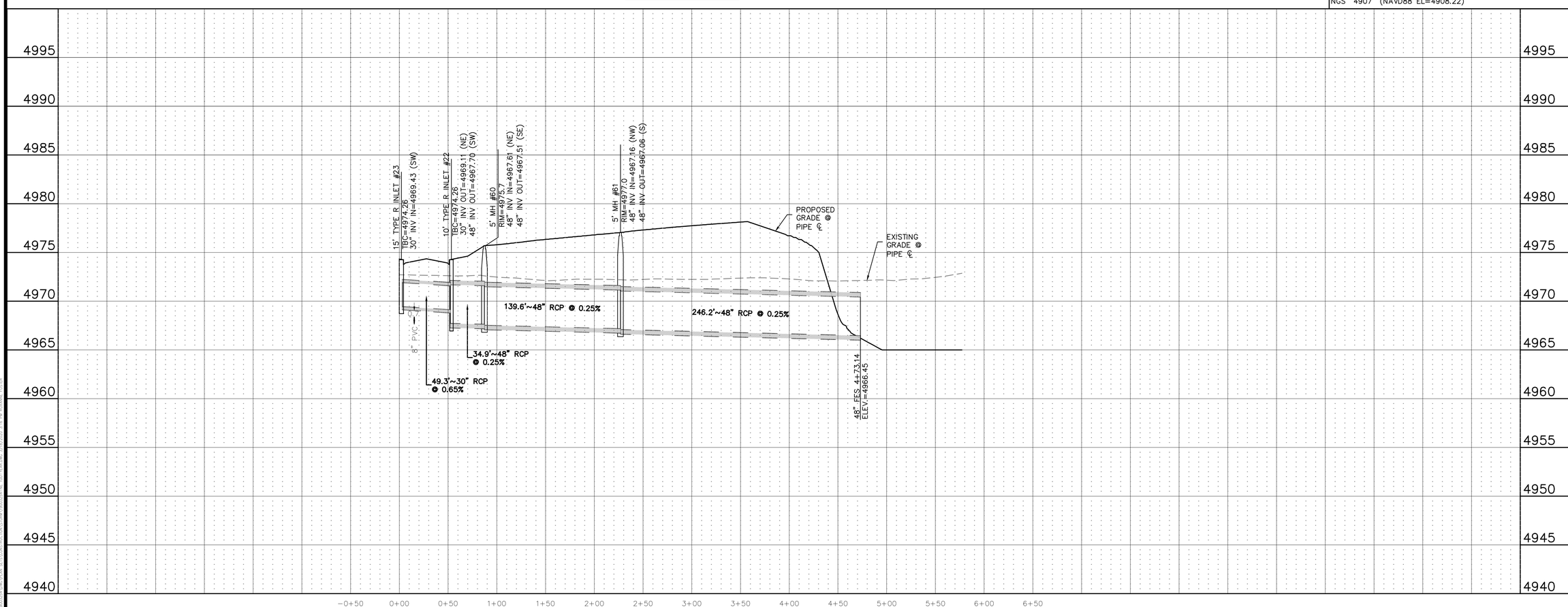
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STORM SEWER PLAN & PROFILE
NE 100-YEAR

DATE
03/19/20

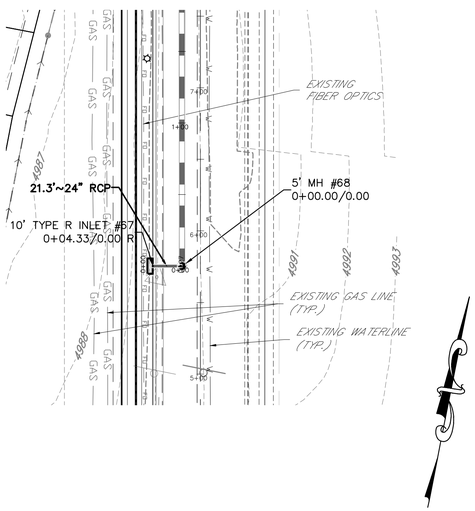
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

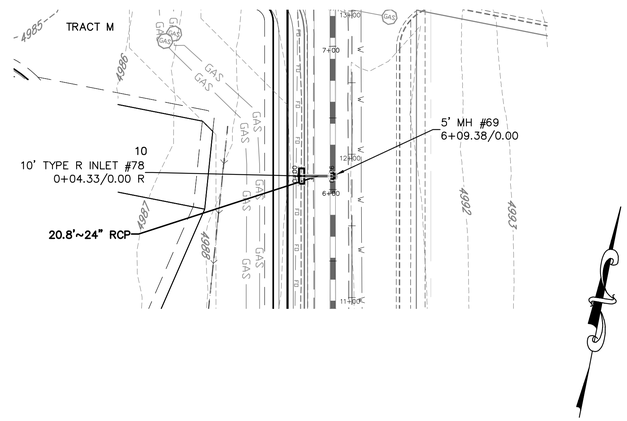
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
95

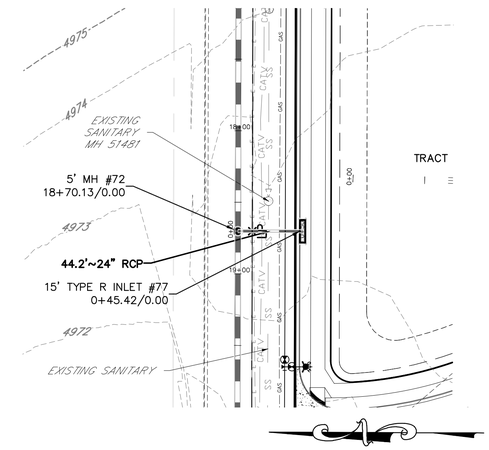
CAD FILE: 19003254-NE 100-YEAR.DWG



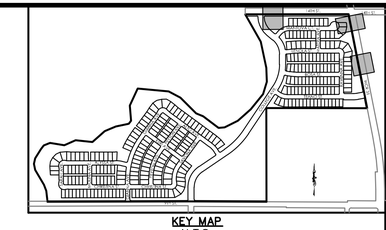
31 A - STORM



31 B - STORM



14A - STORM



KEY MAP
N.T.S.

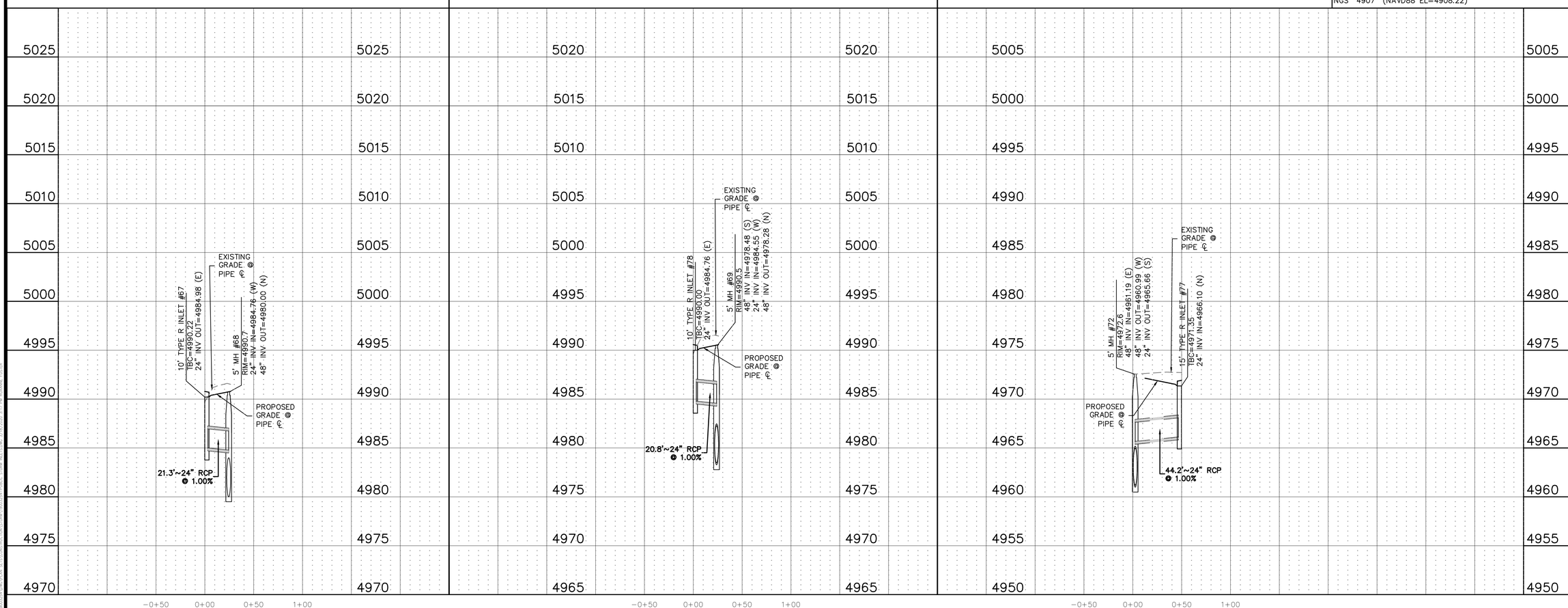
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STORM SEWER PLAN & PROFILE
PUBLIC STORM INLETS

DATE
03/19/20

A	1st SUBMITTAL TO FT. LUPTON	03/19/20 – MAM

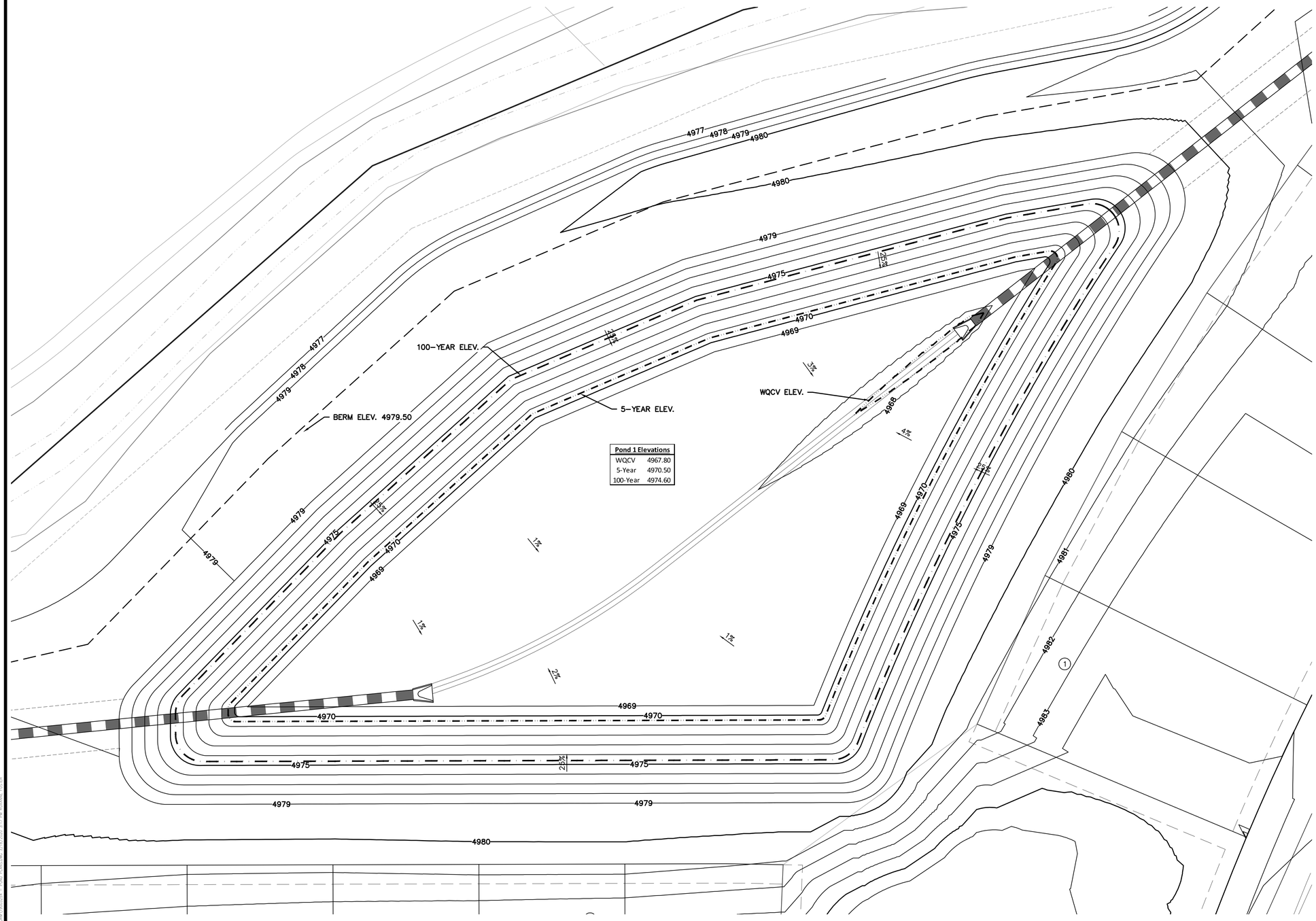
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

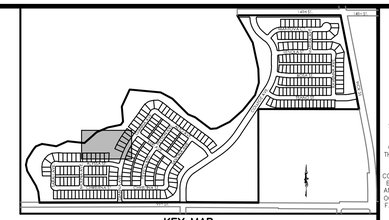
DR. RF CH. MAM
P.M. MAM

JOB 19003254
SHEET NO.
96

CAD FILE: 19003254-PUBLIC STORM INLETS.DWG



Pond 1 Elevations	
WQCV	4967.80
5-Year	4970.50
100-Year	4974.60



KEY MAP
N.T.S.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR. NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STORM SEWER PLAN & PROFILE
POND 1 PLAN

DATE 03/19/20

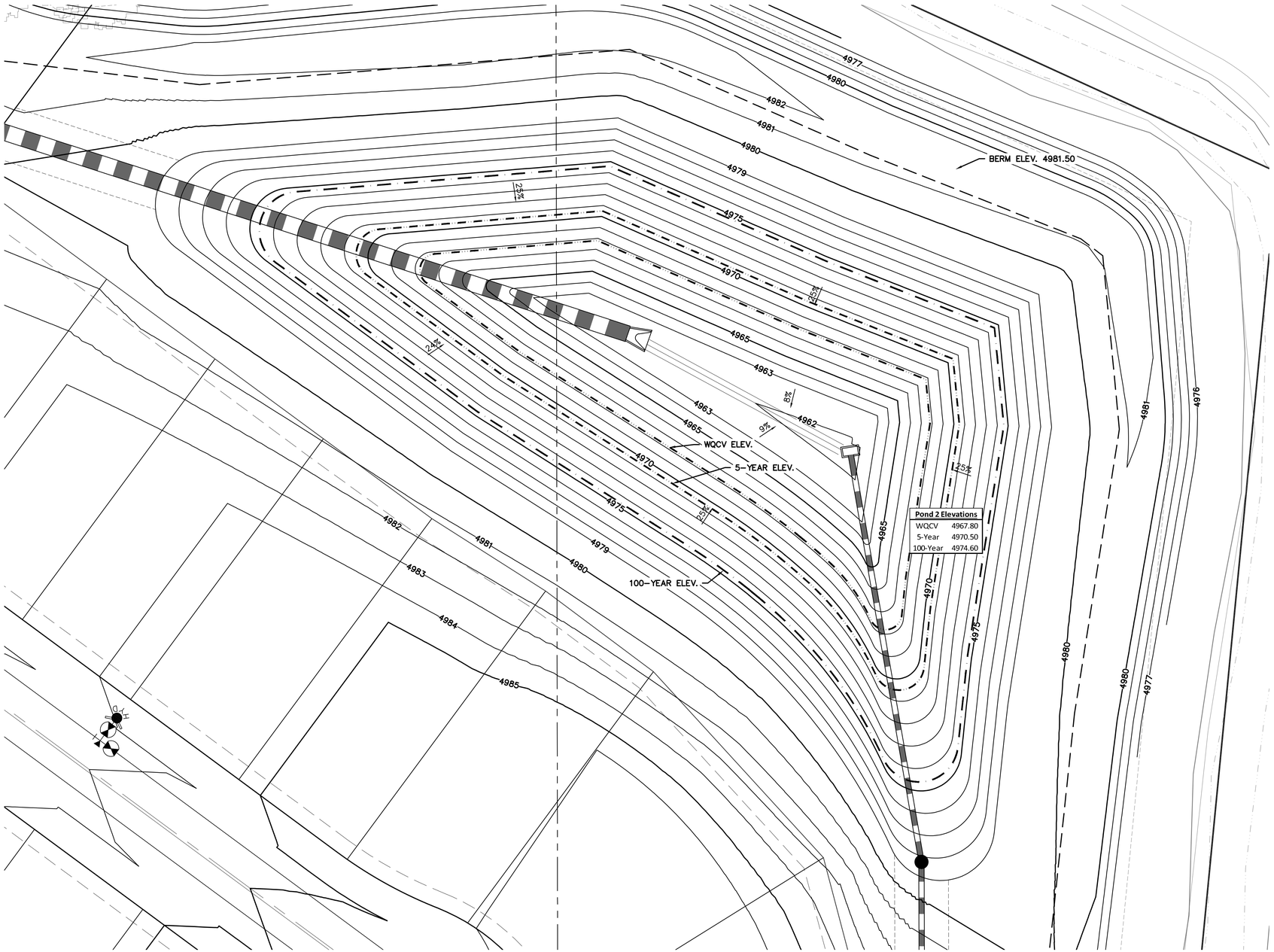
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

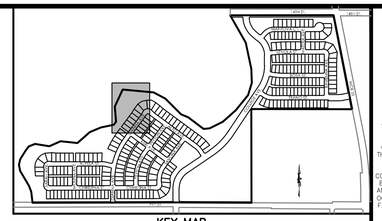
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 97

CAD FILE: 19003254 - POND PLANS.DWG



Pond 2 Elevations	
WQCV	4967.80
5-Year	4970.50
100-Year	4974.60



KEY MAP
N.T.S.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STORM SEWER PLAN & PROFILE
POND 2 PLAN

DATE 03/19/20

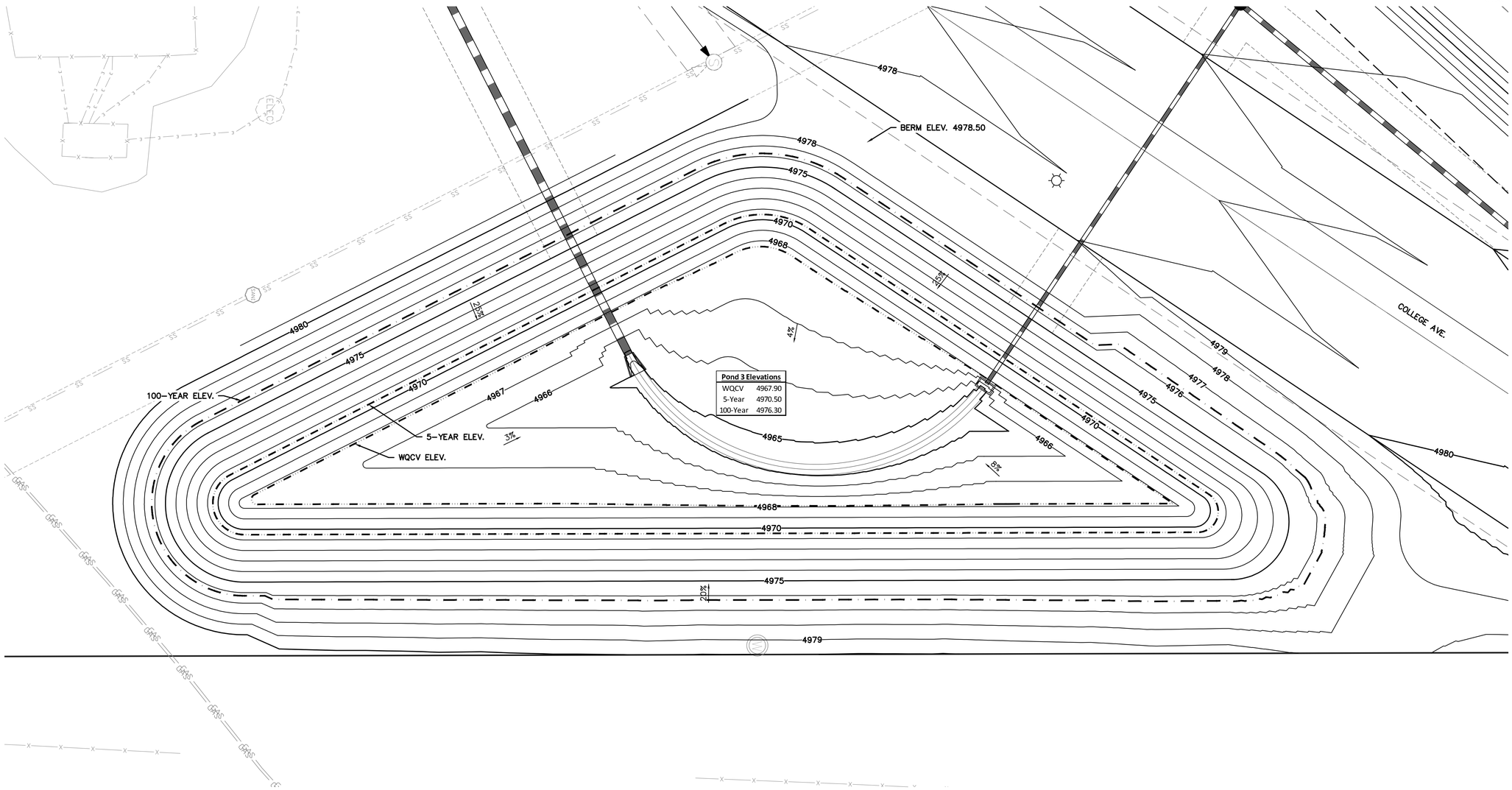
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

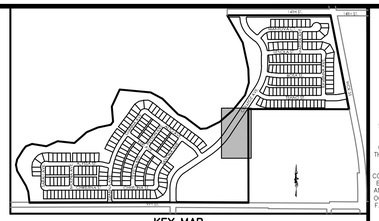
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 98

CAD FILE: 19003254 – POND PLANS.DWG





KEY MAP
N.T.S.

811
Know what's below.
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STORM SEWER PLAN & PROFILE
POND 3 PLAN

DATE
03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

PLANS UNDER REVIEW
NOT FOR CONSTRUCTION

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

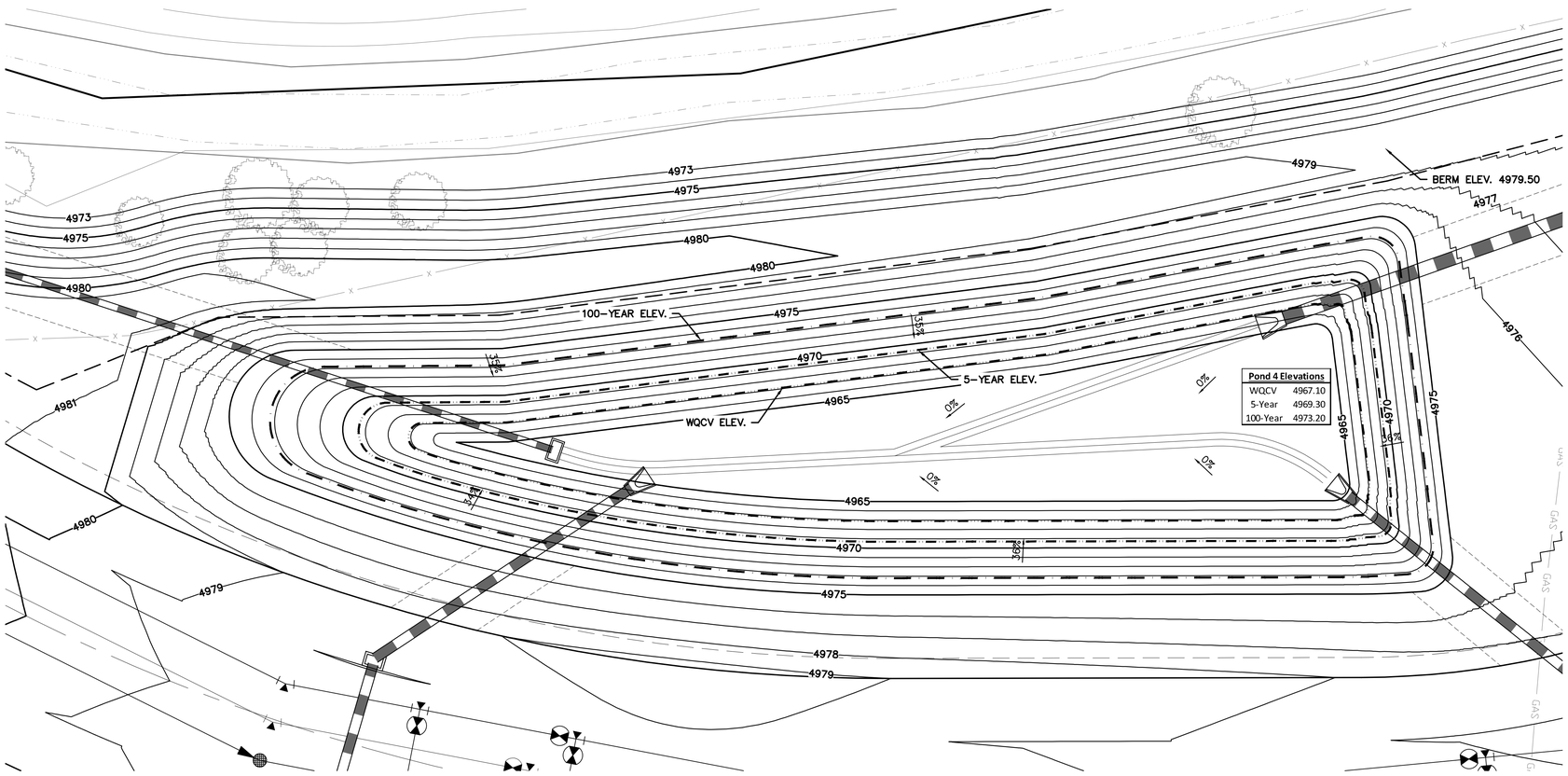
BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

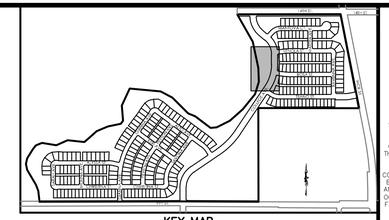
VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
99

CAD FILE: 19003254 – POND PLANS.DWG



Pond 4 Elevations	
WQCV	4967.10
5-Year	4969.30
100-Year	4973.20



KEY MAP
N.T.S.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STORM SEWER PLAN & PROFILE
POND 4 PLAN

DATE 03/19/20

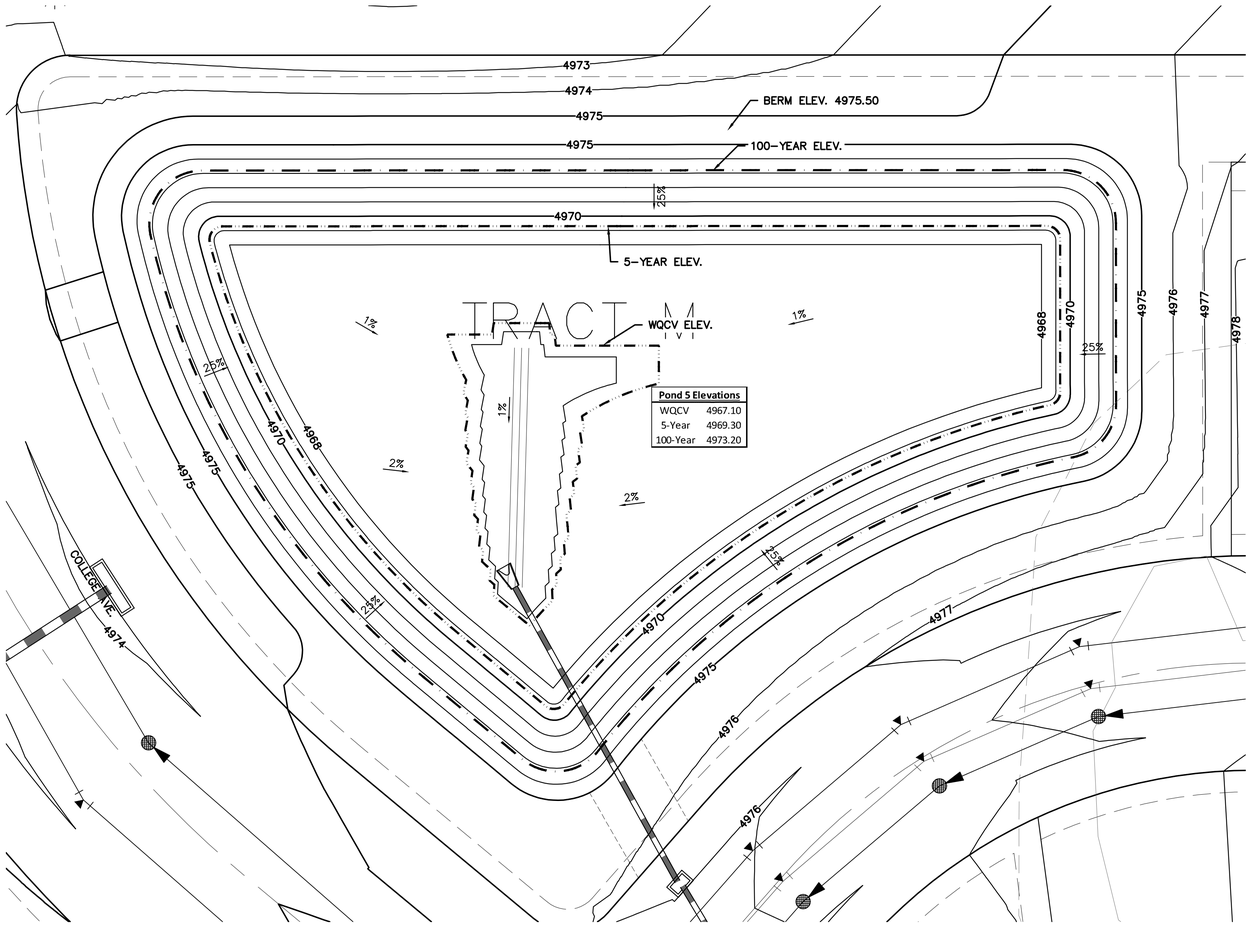
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

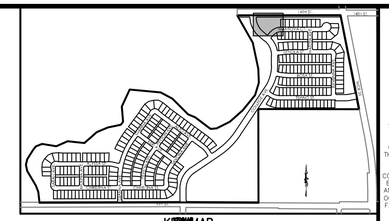
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 100

CAD FILE: 19003254 – POND PLANS.DWG



Pond 5 Elevations	
WQCV	4967.10
5-Year	4969.30
100-Year	4973.20



KEYMAP
N.T.S.

811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
STORM SEWER PLAN & PROFILE
POND 5 PLAN

DATE
03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

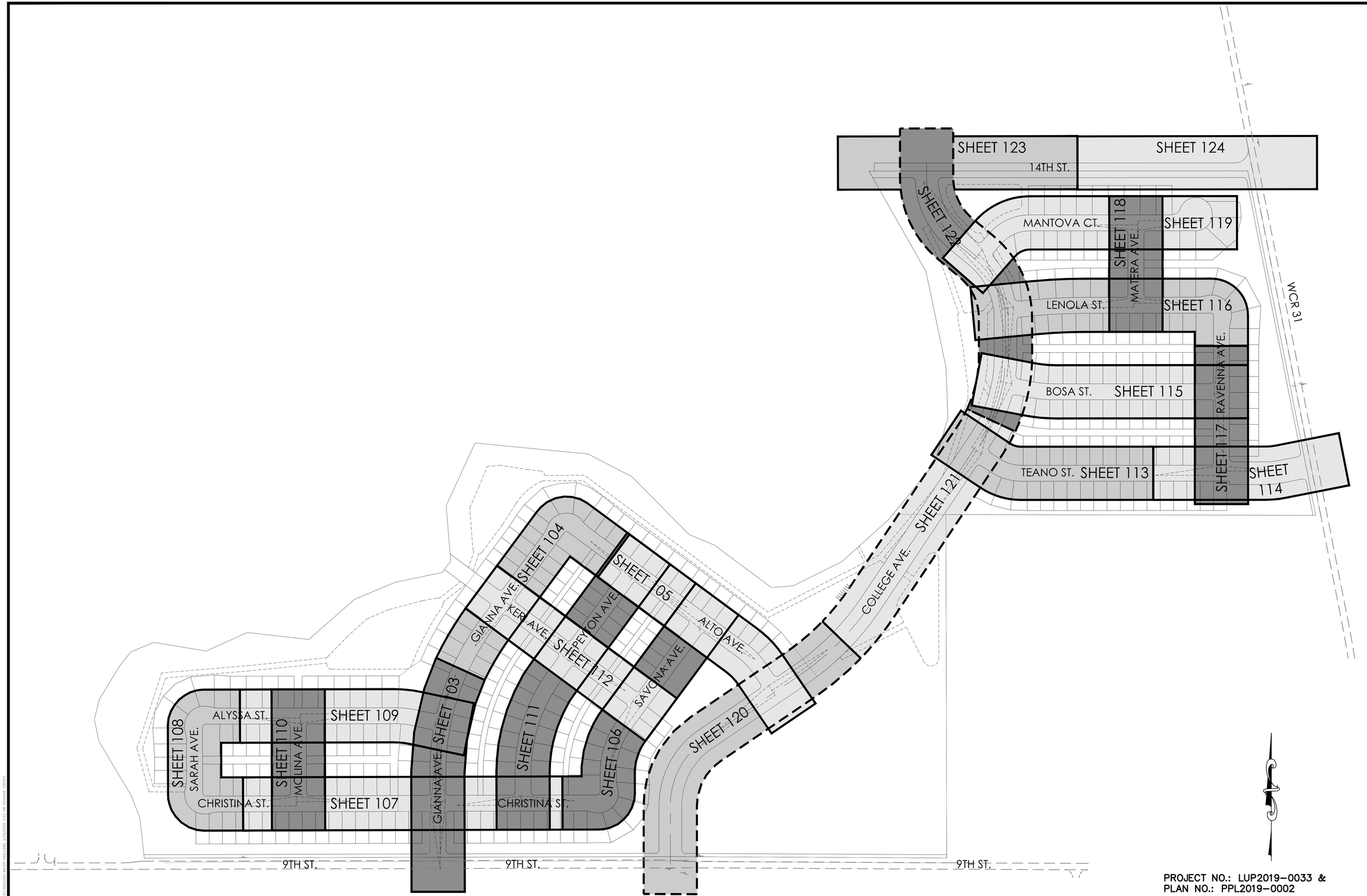
BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 101

CAD FILE: 19003254 – POND PLANS.DWG



PROJECT NO.: LUP2019–0033 &
PLAN NO.: PPL2019–0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's **below.** **Call** before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303–905–3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
WATER INDEX

DATE
03/19/20

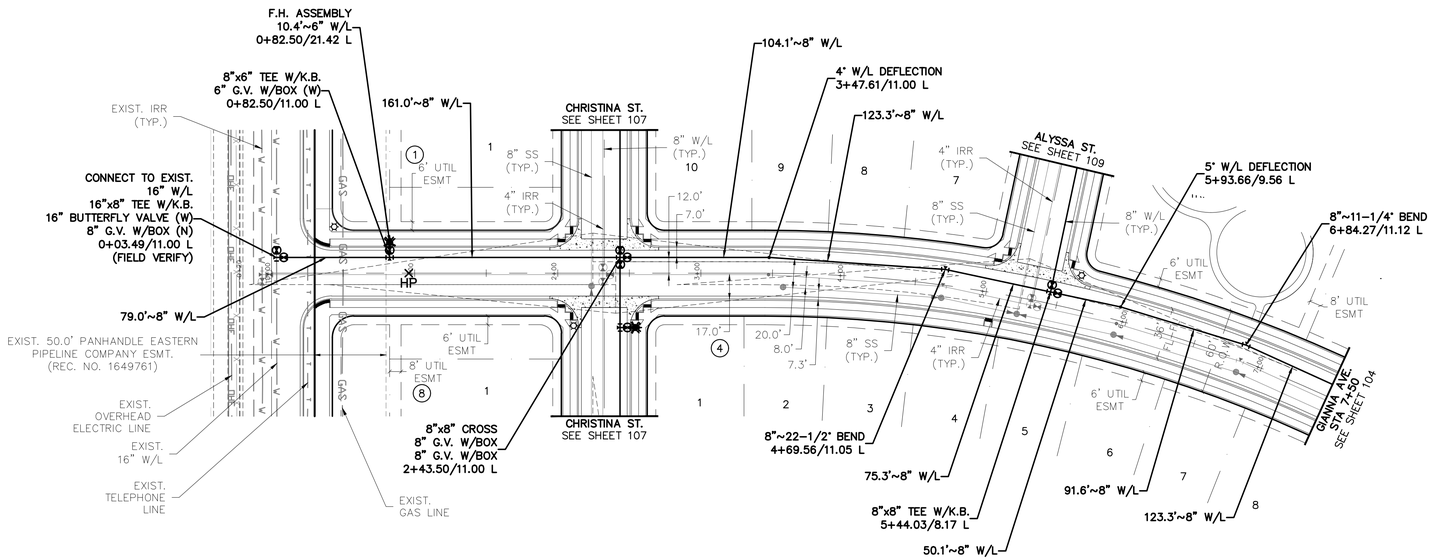
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

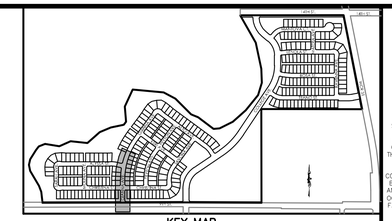
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
102

CAD FILE: 19003254-WATER INDEX.DWG



GIANNA AVE.



KEY MAP
N.T.S.

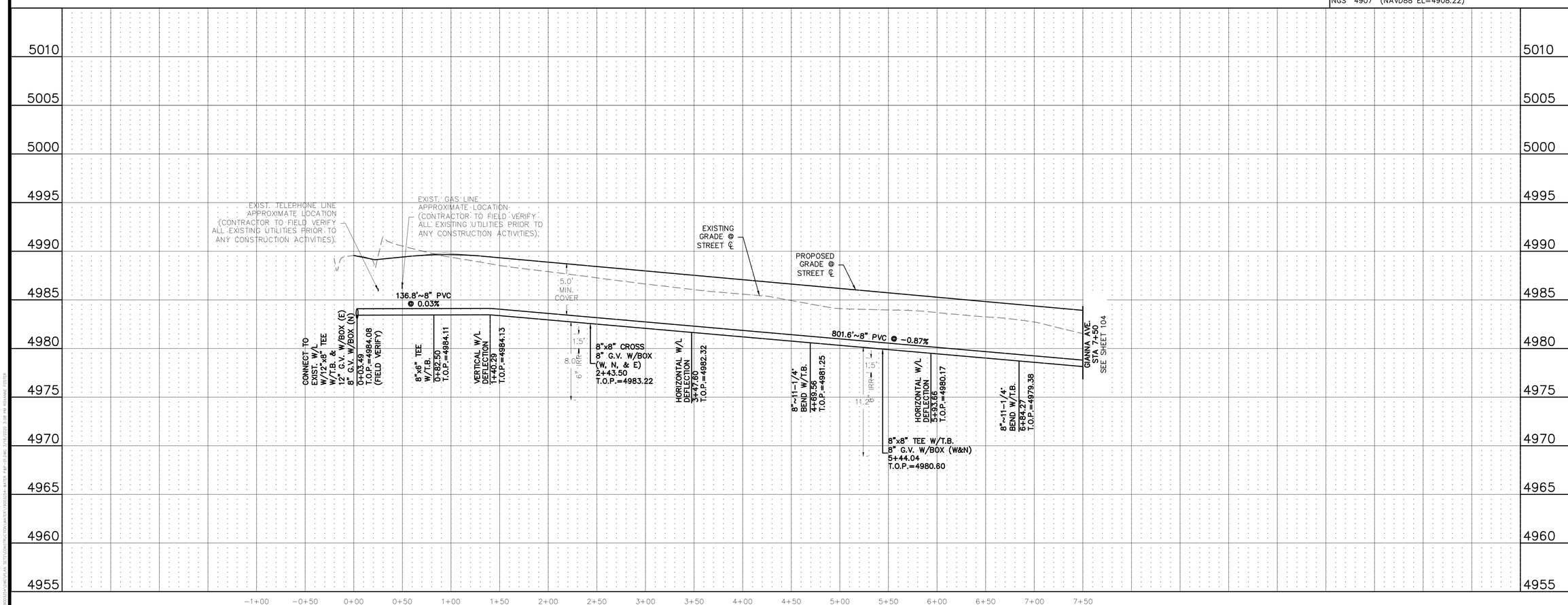
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
GIANNA AVE.

DATE 03/19/20

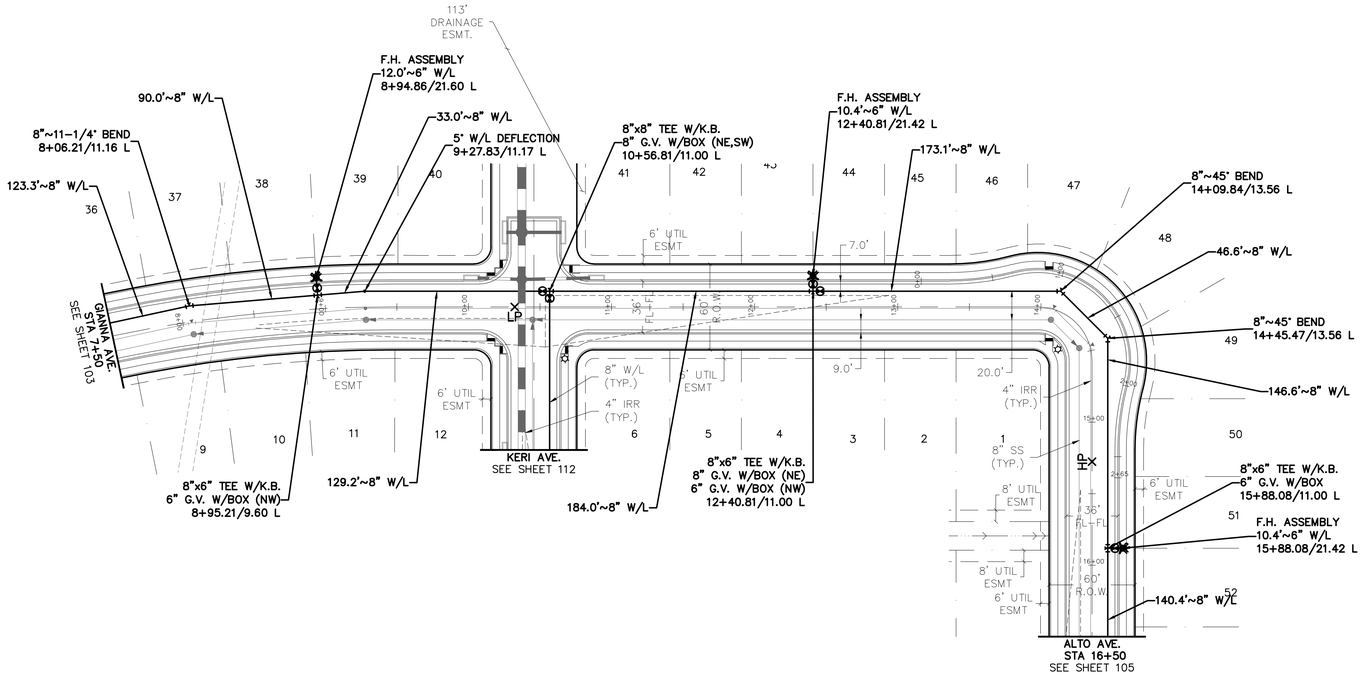
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

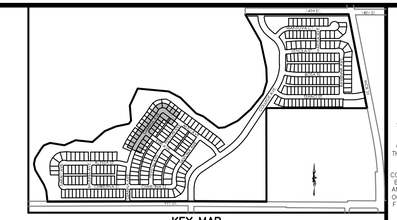
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 103

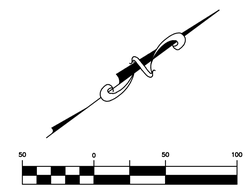
CAD FILE: 19003254-WATER P&P-01.DWG



GIANNA AVE.



KEY MAP
N.T.S.

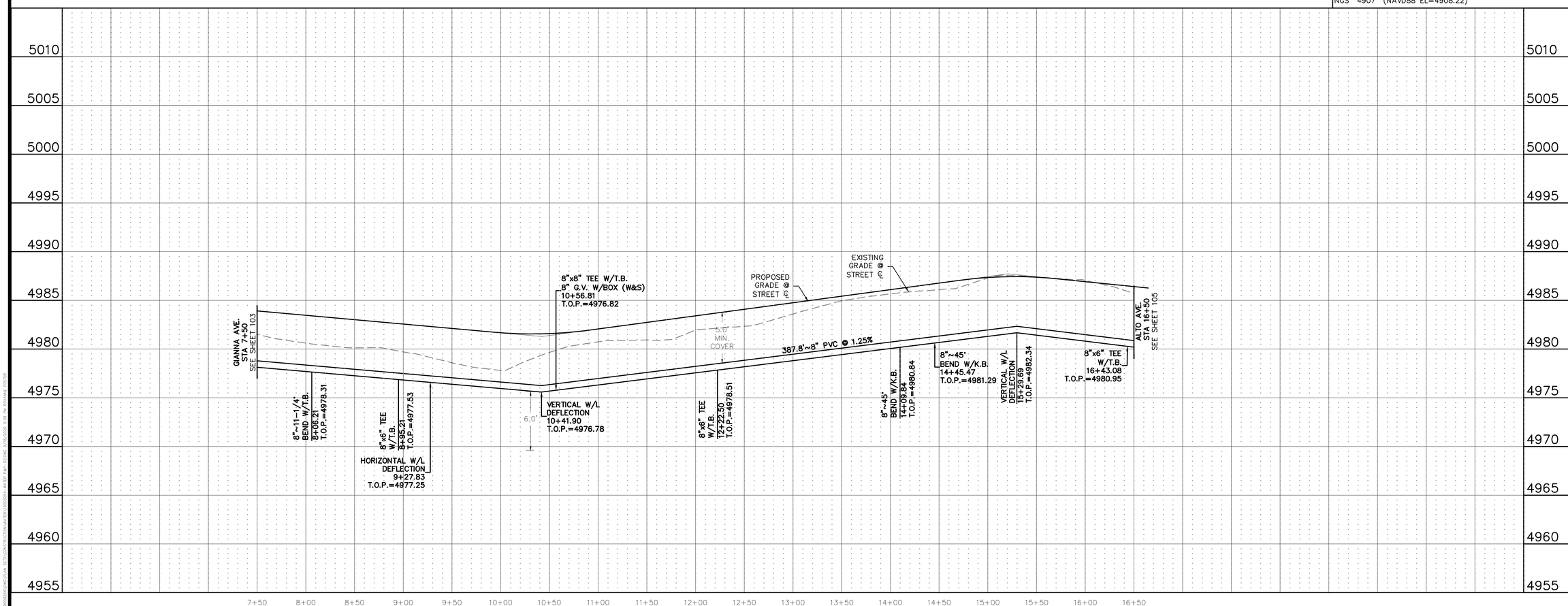


PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
GIANNA AVE.

DATE 03/19/20

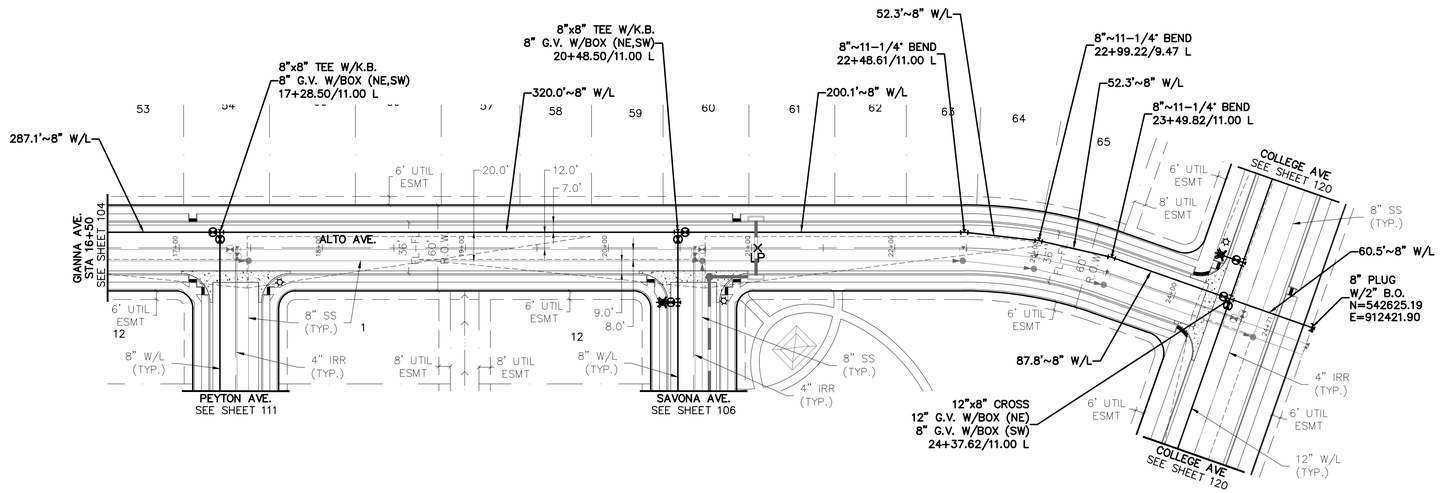
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

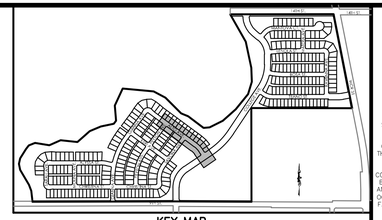
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

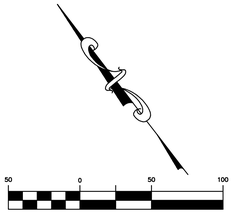
DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 104

CAD FILE: 19003254-WATER P&P-02.DWG





KEY MAP
N.T.S.



(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

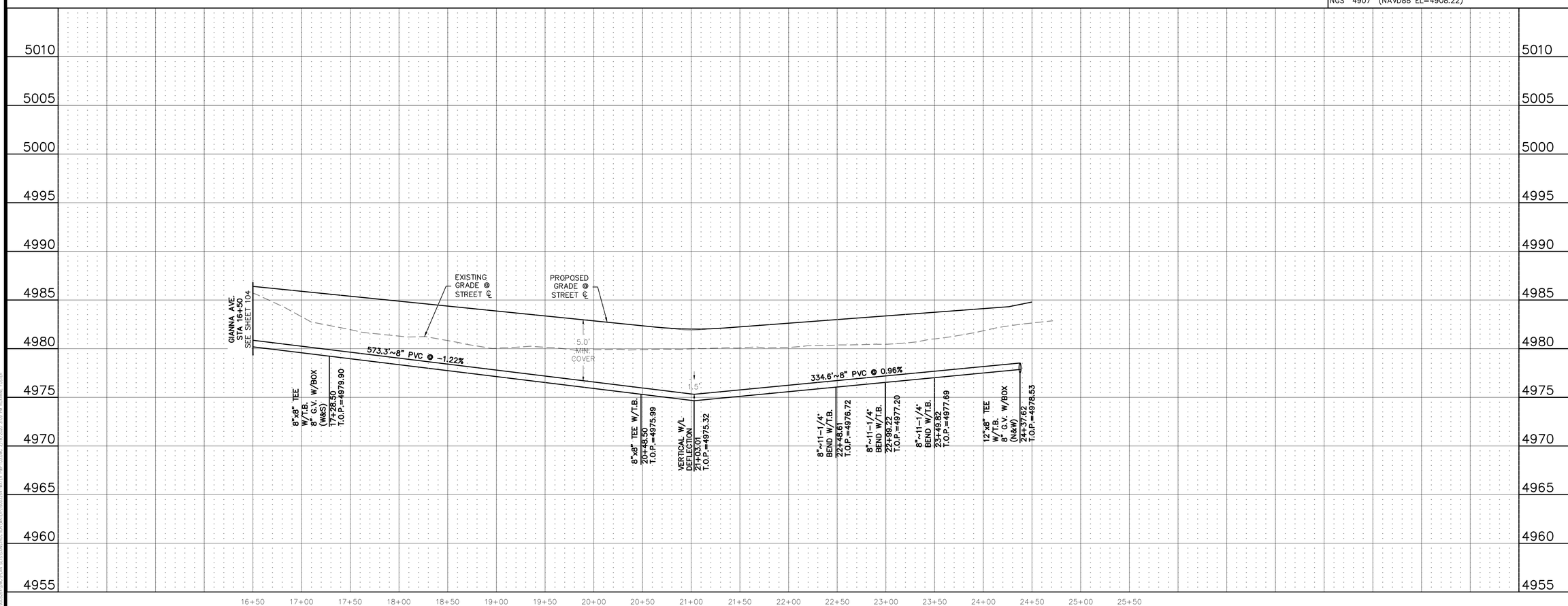
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

ALTO AVE.



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
ALTO AVE.

DATE
03/19/20

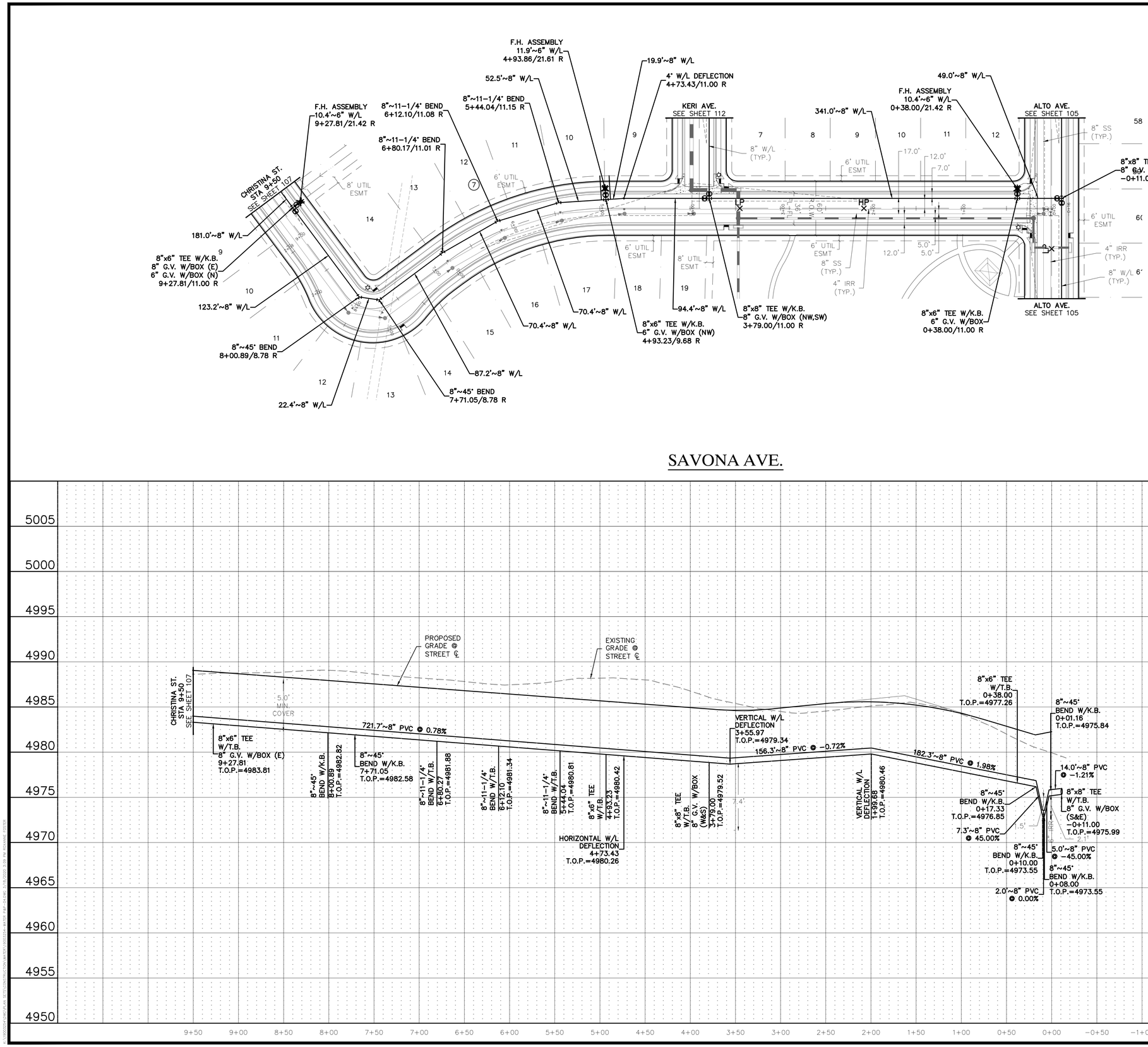
A	1st SUBMITTAL TO FT. LUPTON	03/19/2020 - MAM

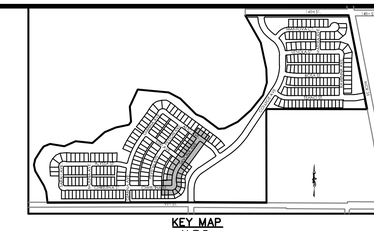
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

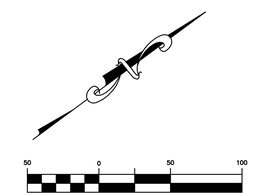
DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 105

CAD FILE: 19003254-WATER P&P-03.DWG





KEY MAP
N.T.S.



(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
SAVONA AVE.

DATE
03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

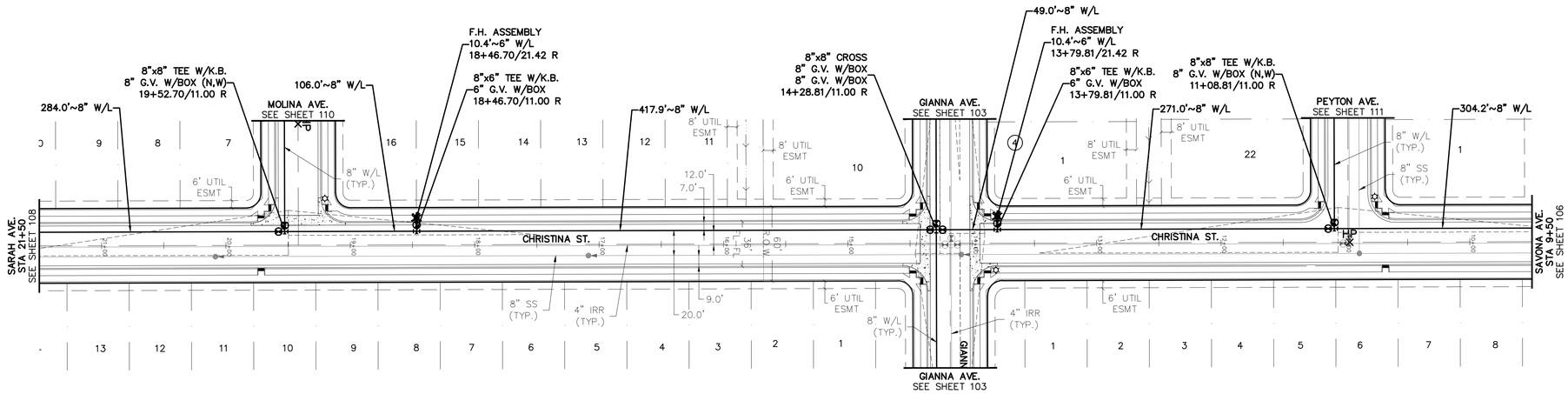
PLANS UNDER REVIEW
NOT FOR CONSTRUCTION

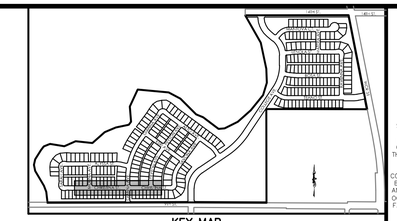
DR. RF | CH. MAM
P.M. MAM

JOB 19003254

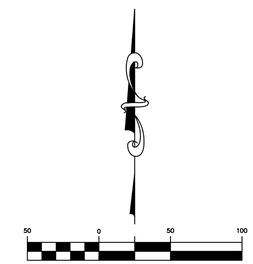
SHEET NO.
106

CAD FILE: 19003254-WATER P&P-04.DWG





KEY MAP
N.T.S.



(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

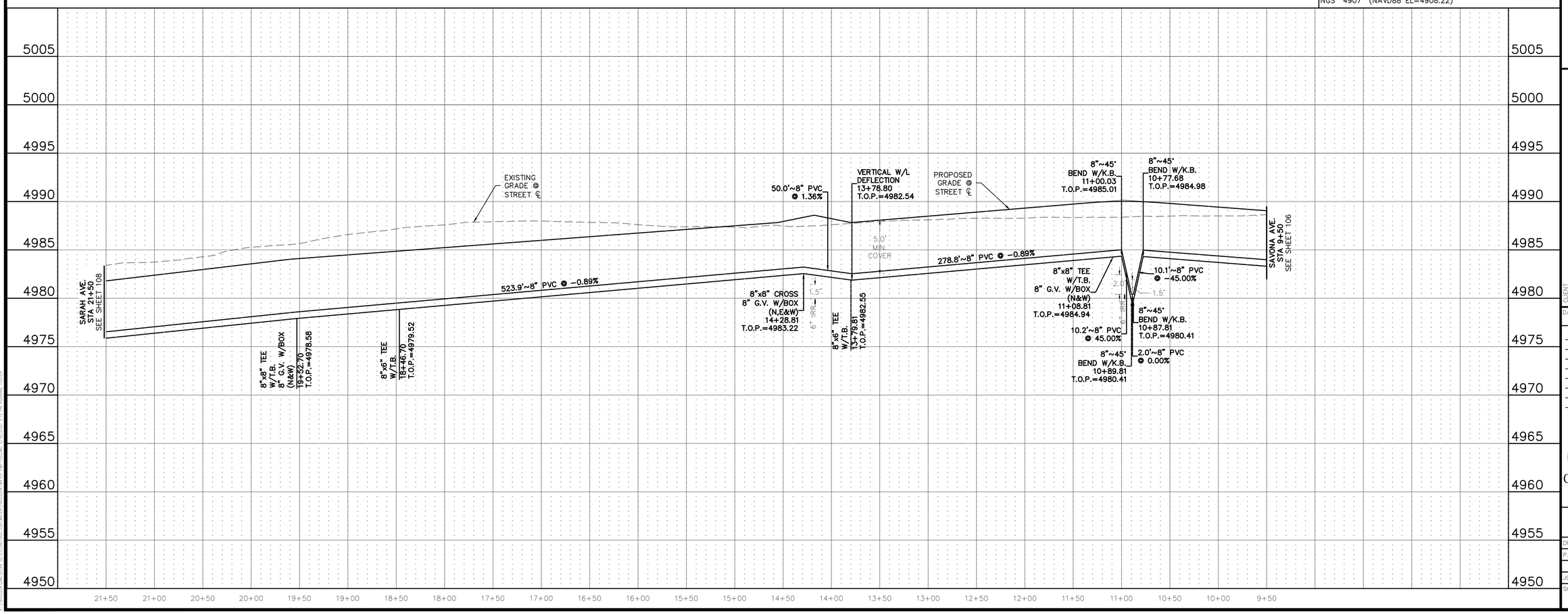
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

CHRISTINA ST.



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
CHRISTINA ST.

DATE 03/19/20

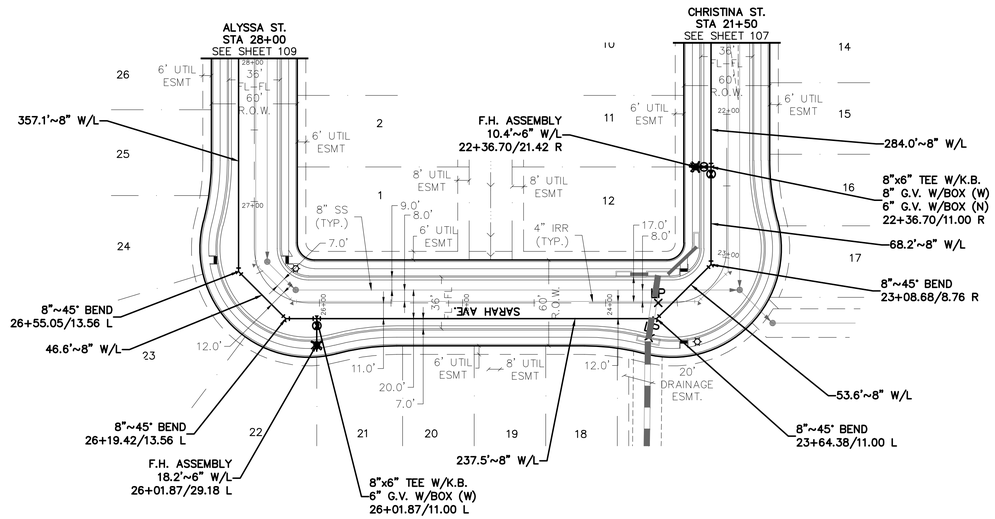
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

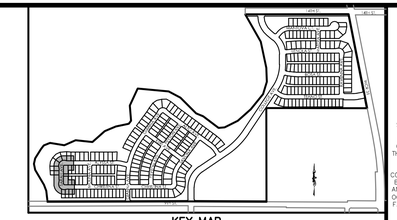
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 107

CAD FILE: 19003254-WATER P&P-05.DWG



SARAH AVE.



KEY MAP
N.T.S.

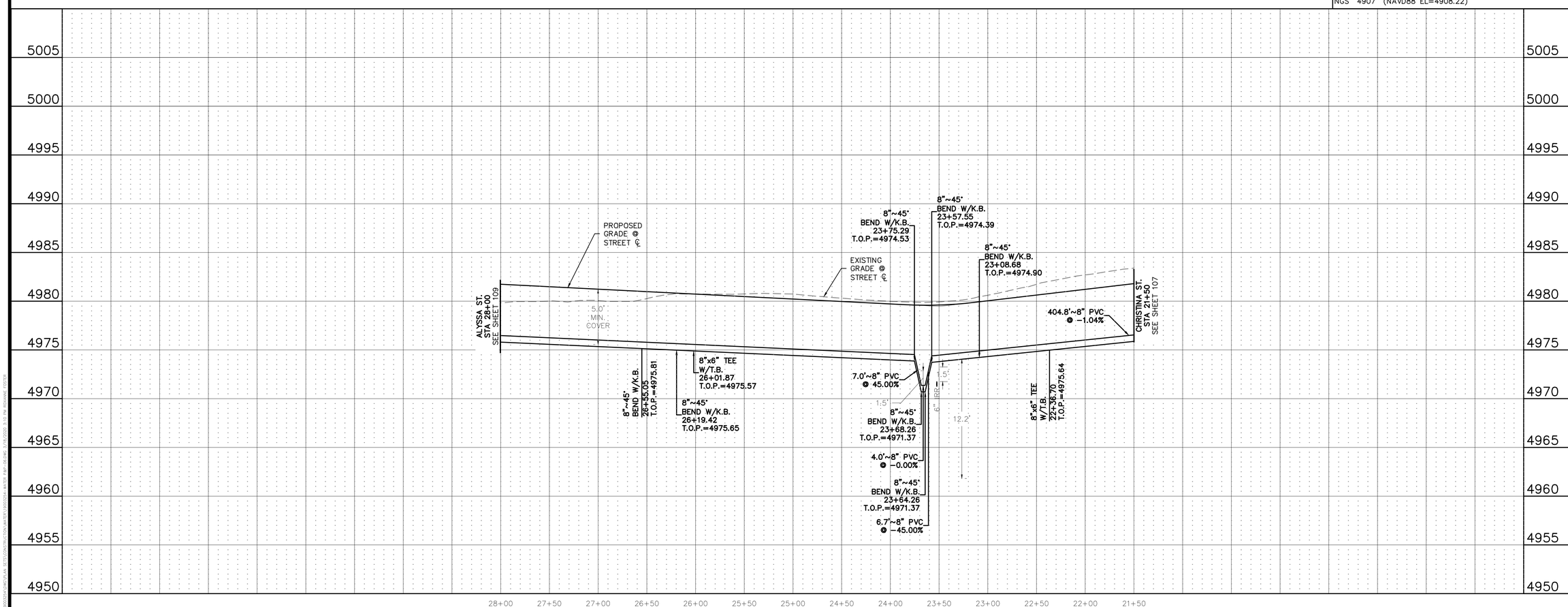
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
SARAH AVE.

DATE 03/19/20

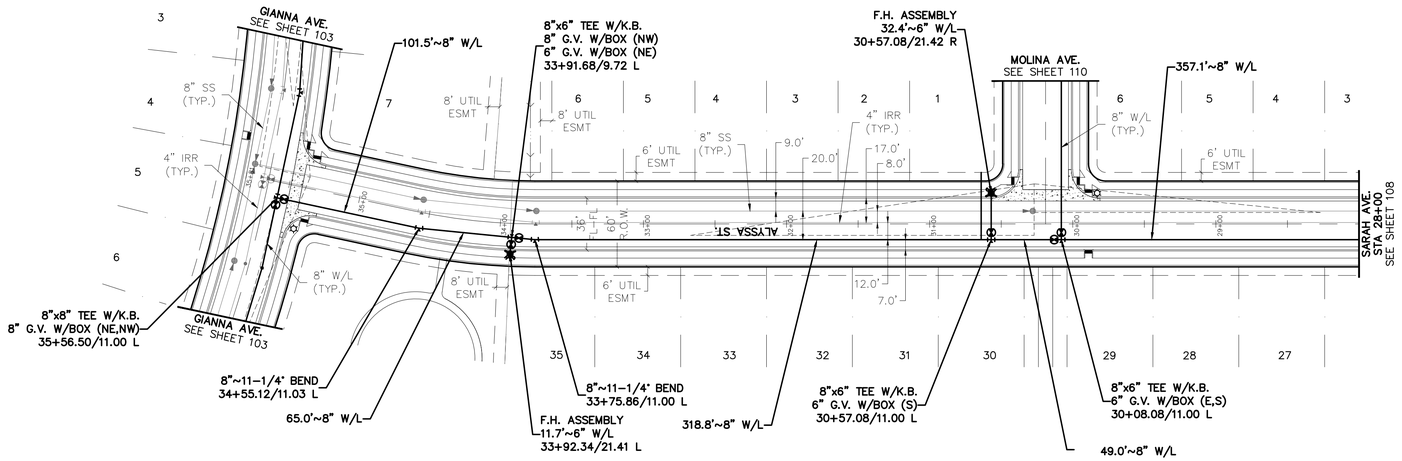
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

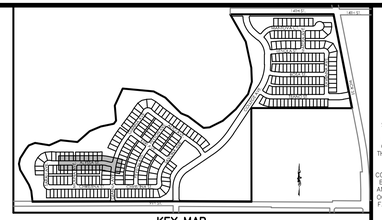
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 108

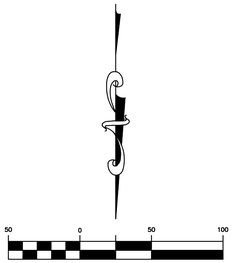
CAD FILE: 19003254-WATER P&P-06.DWG



ALYSSA ST.



KEY MAP
N.T.S.



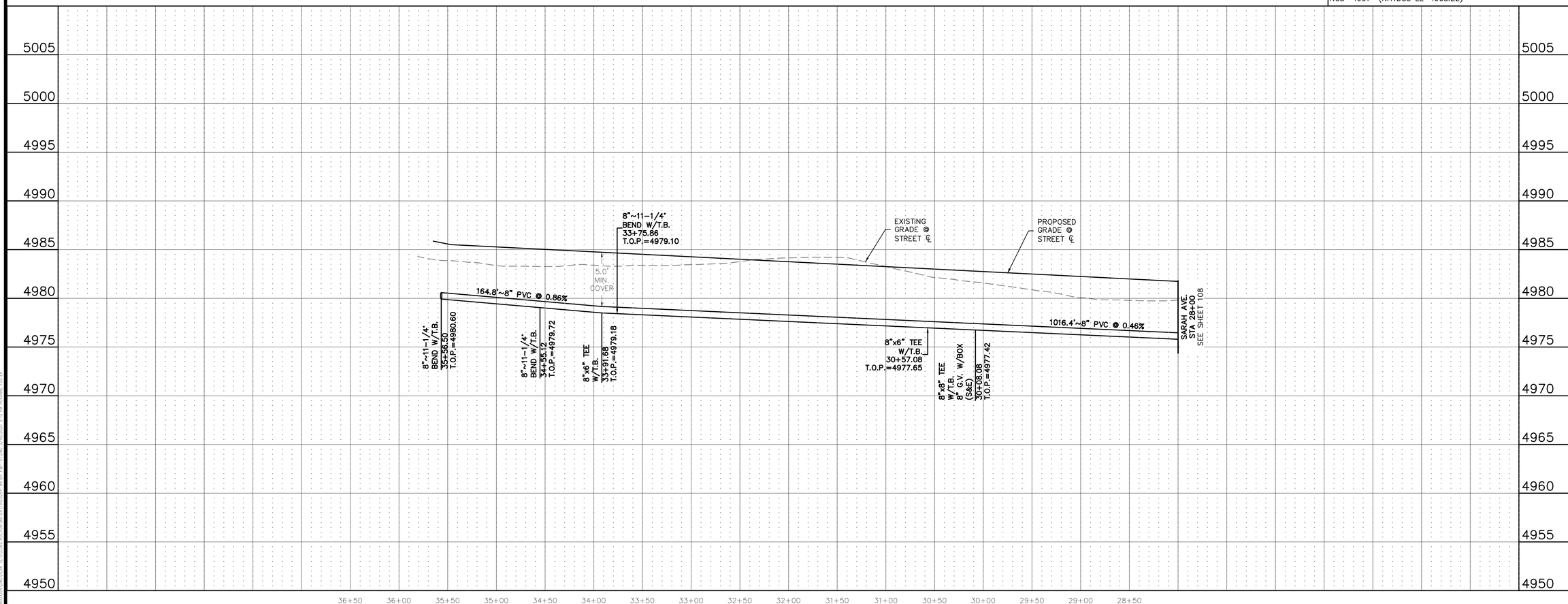
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
ALYSSA ST.

DATE
03/19/20

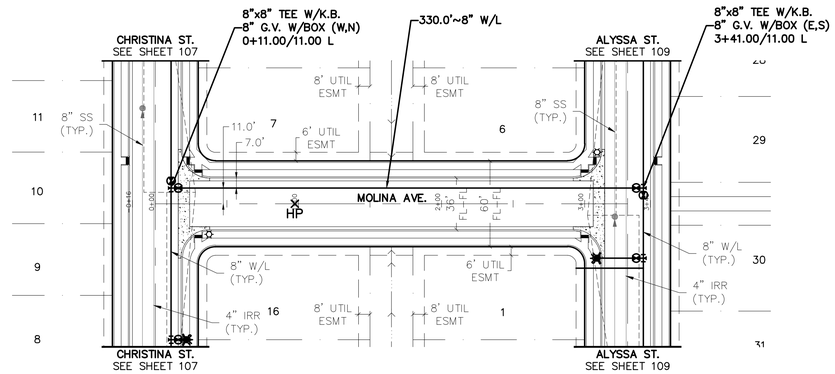
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

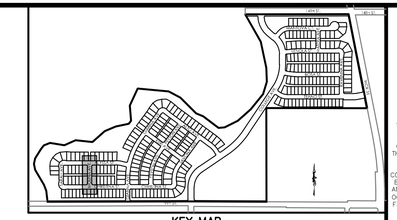
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
109

CAD FILE: 19003254-WATER P&P-07.DWG



MOLINA AVE.



KEY MAP
N.T.S.

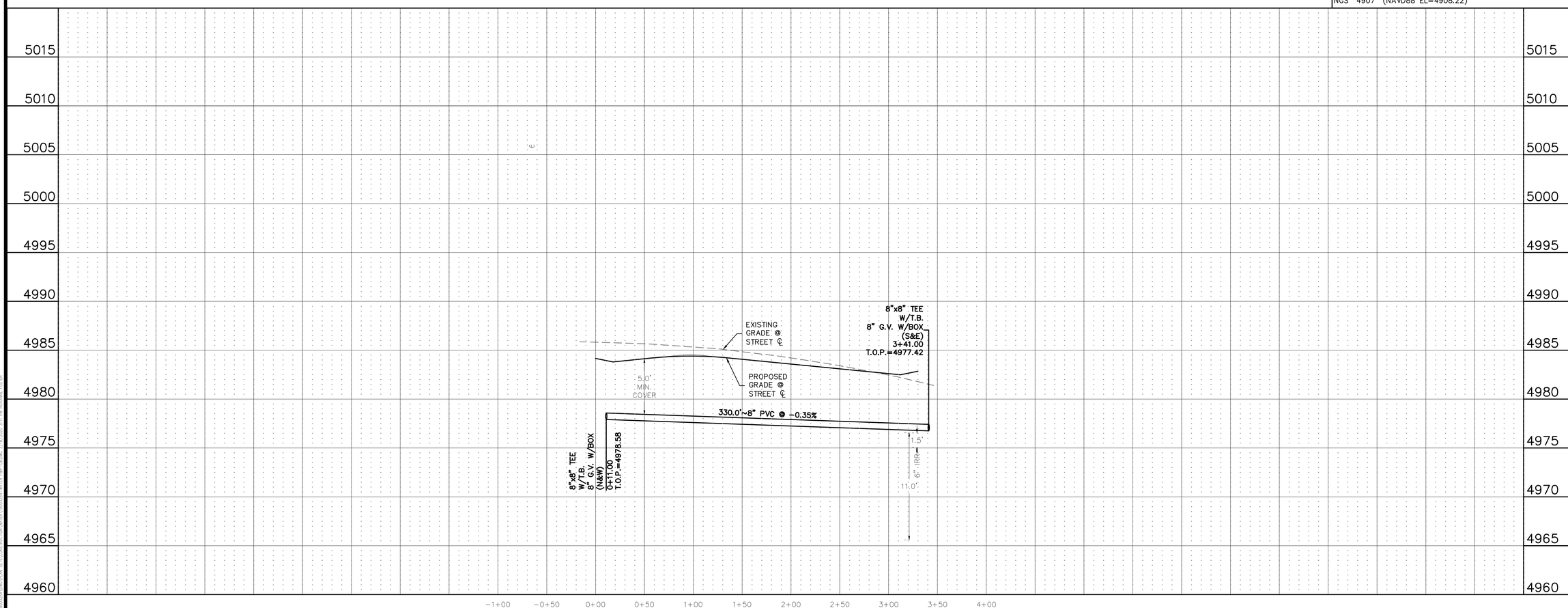
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
MOLINA AVE.

DATE
03/19/20

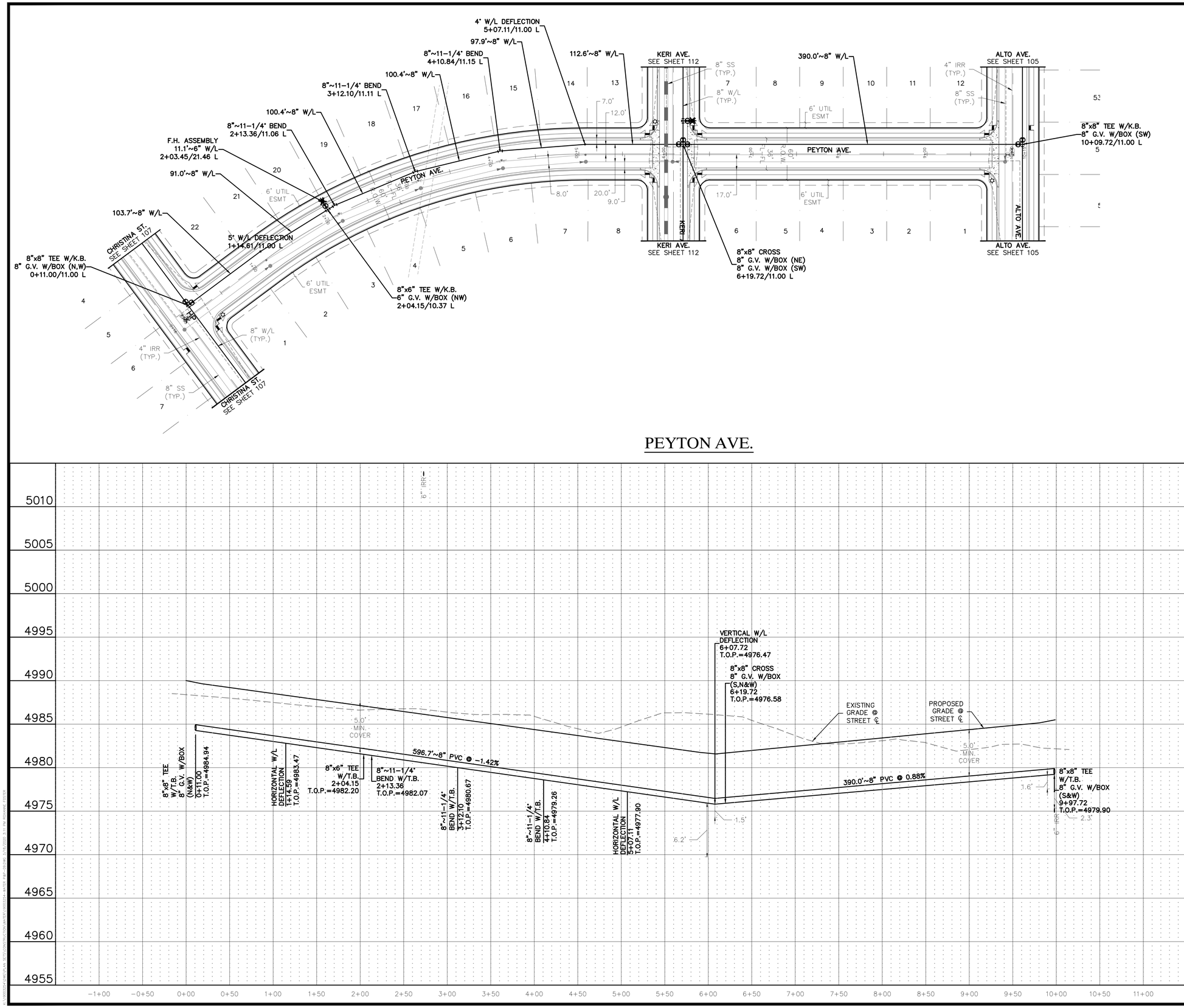
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

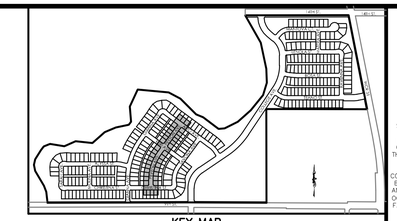
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 110

CAD FILE: 19003254-WATER P&P-08.DWG



PEYTON AVE.



KEY MAP
N.T.S.

(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
PEYTON AVE.

DATE
03/19/20

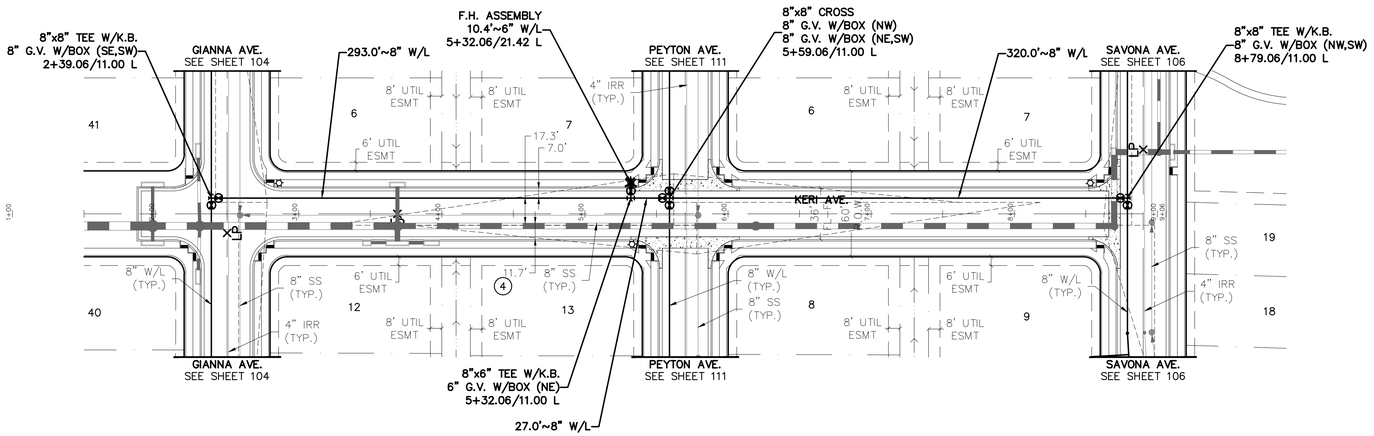
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

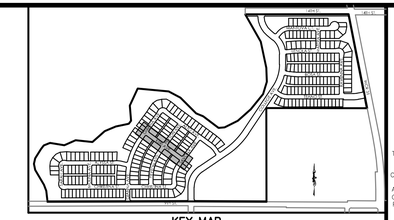
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 111

CAD FILE: 19003254-WATER P&P-09.DWG



KERI AVE.



KEY MAP
N.T.S.

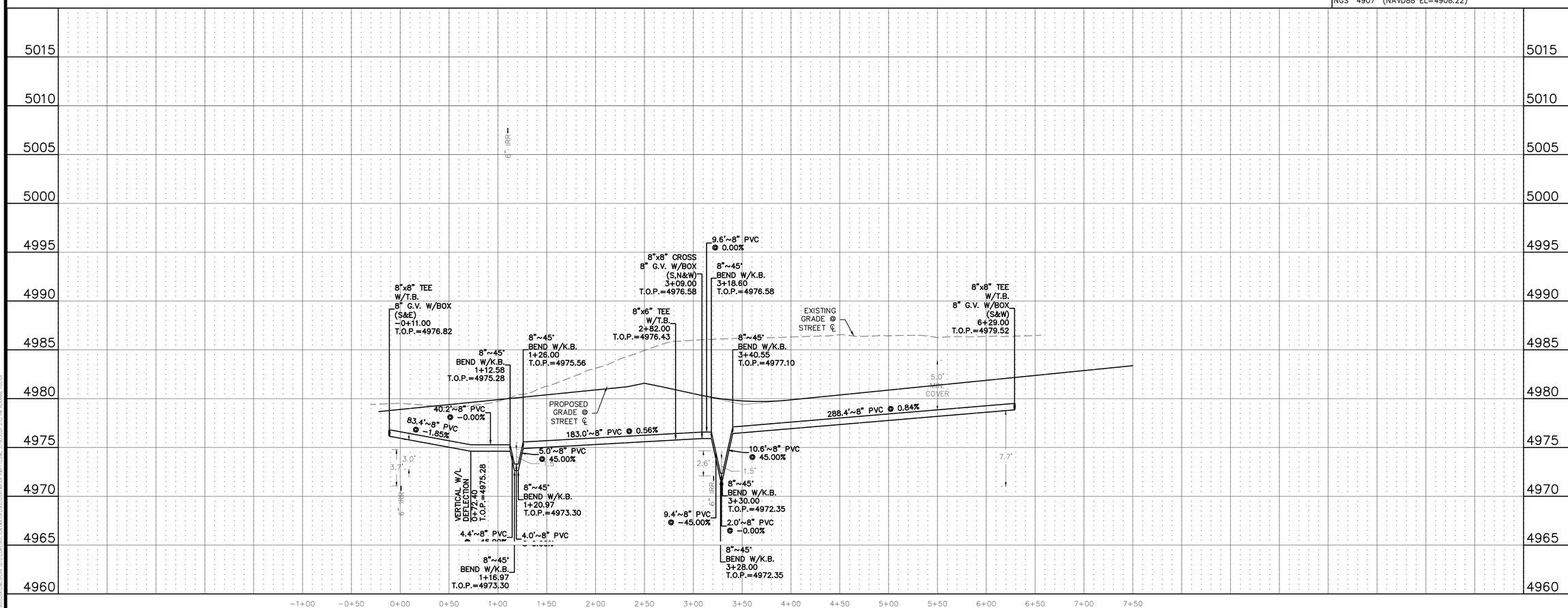
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
KERI AVE.

DATE 03/19/20

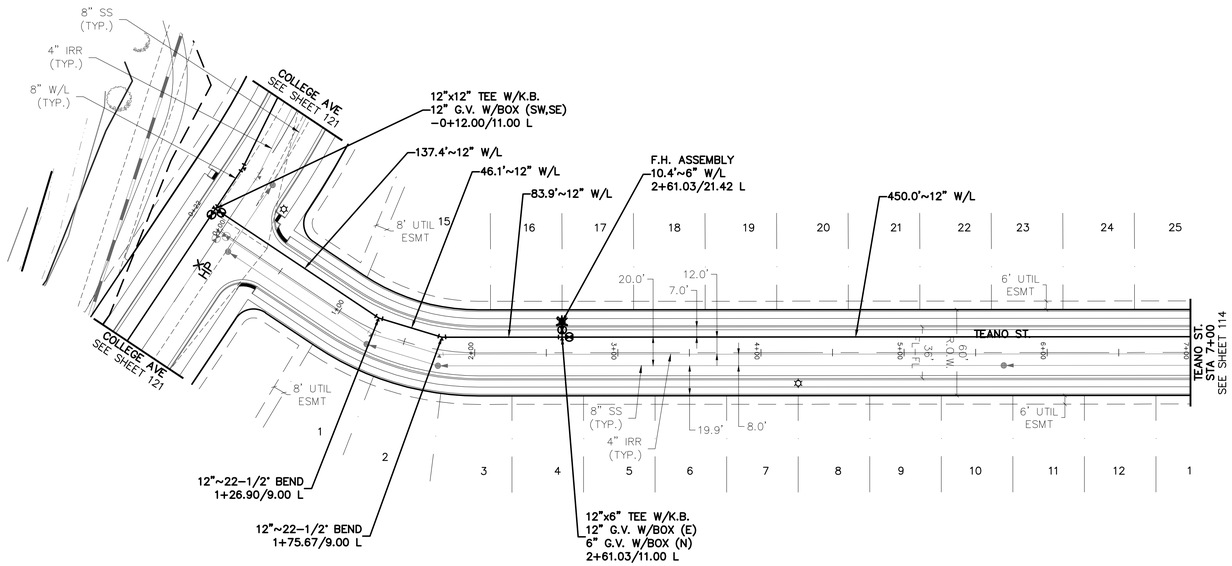
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

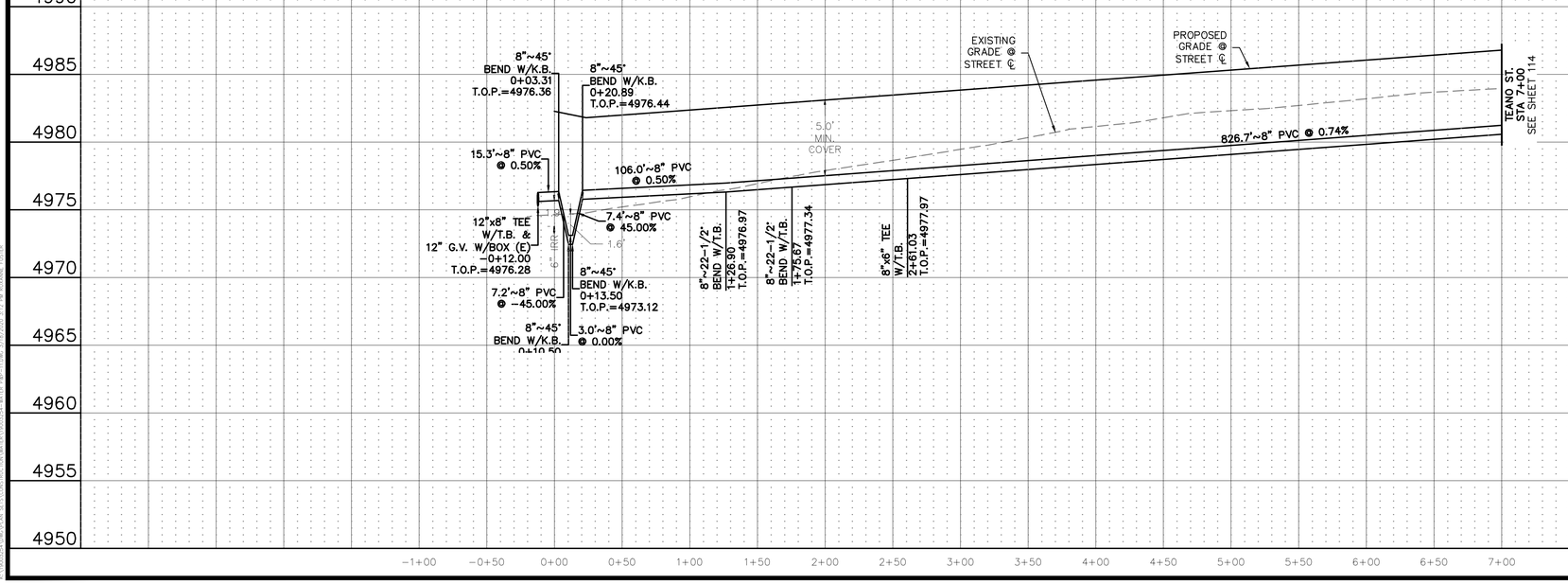
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

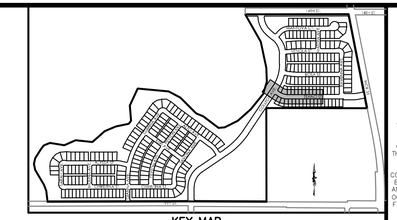
DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 112

CAD FILE: 19003254-WATER P&P-10.DWG

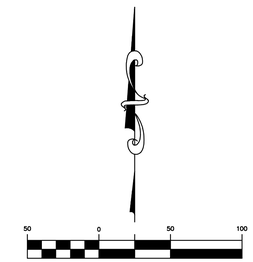


TEANO ST.





KEY MAP
N.T.S.



(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
TEANO ST.

DATE 03/19/20

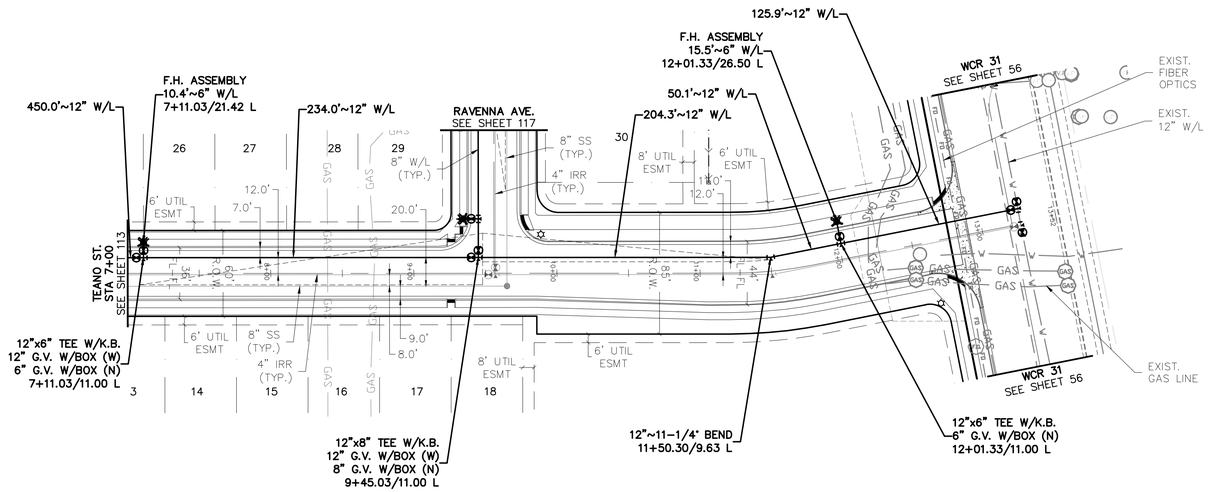
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

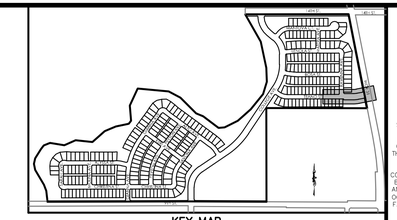
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 113

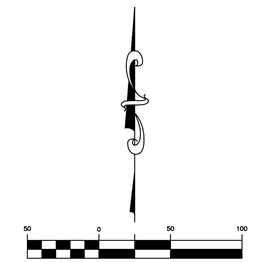
CAD FILE: 19003254-WATER P&P-113.DWG



TEANO ST.



KEY MAP
N.T.S.



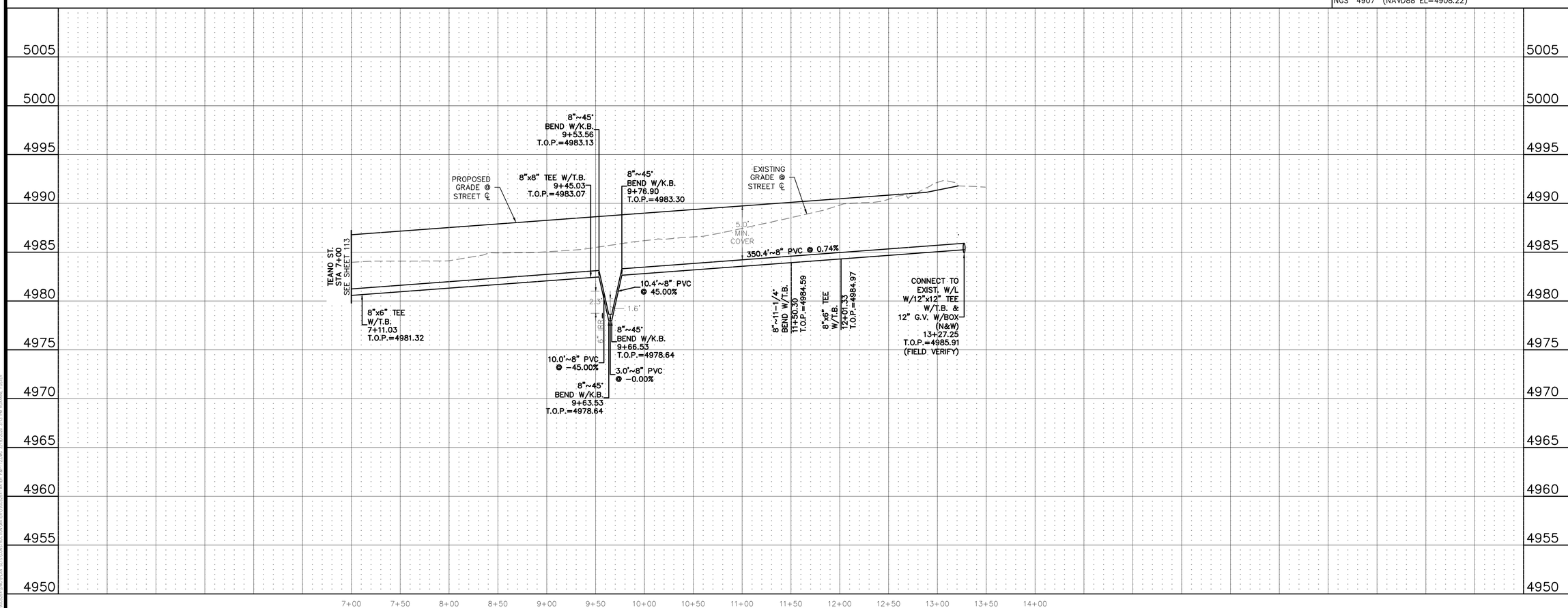
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
TEANO ST.

DATE 03/19/20

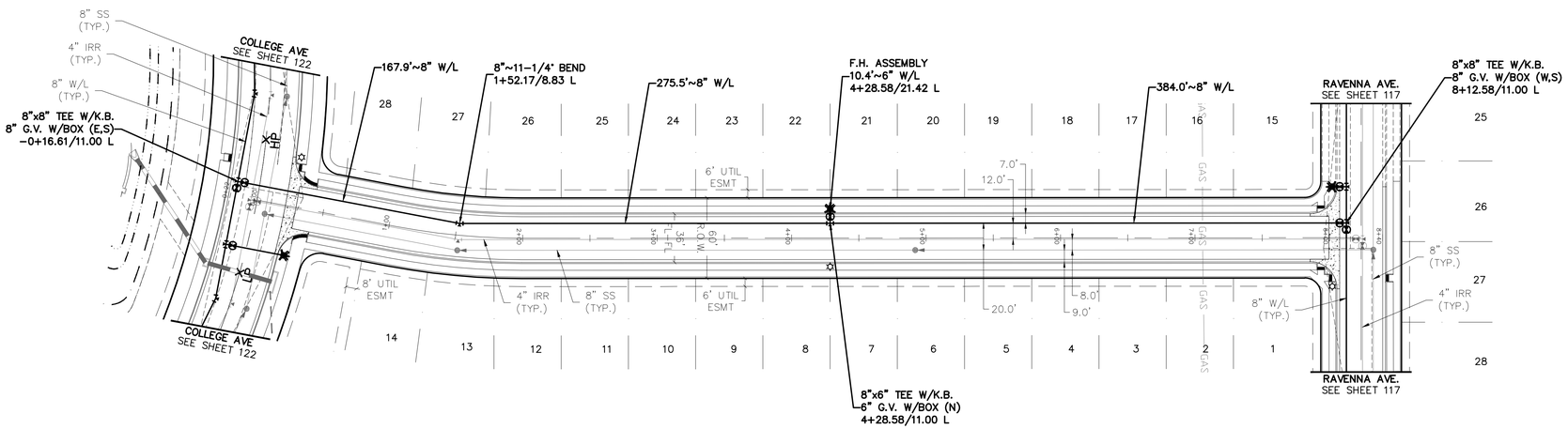
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

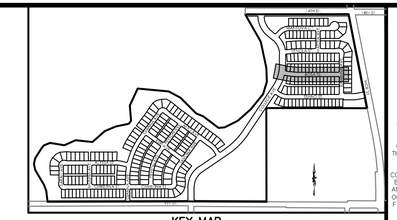
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

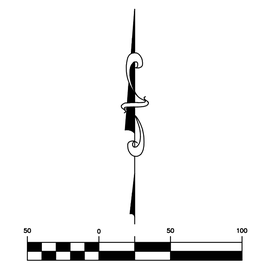
DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 114

CAD FILE: 19003254-WATER P&P-112.DWG





KEY MAP
N.T.S.



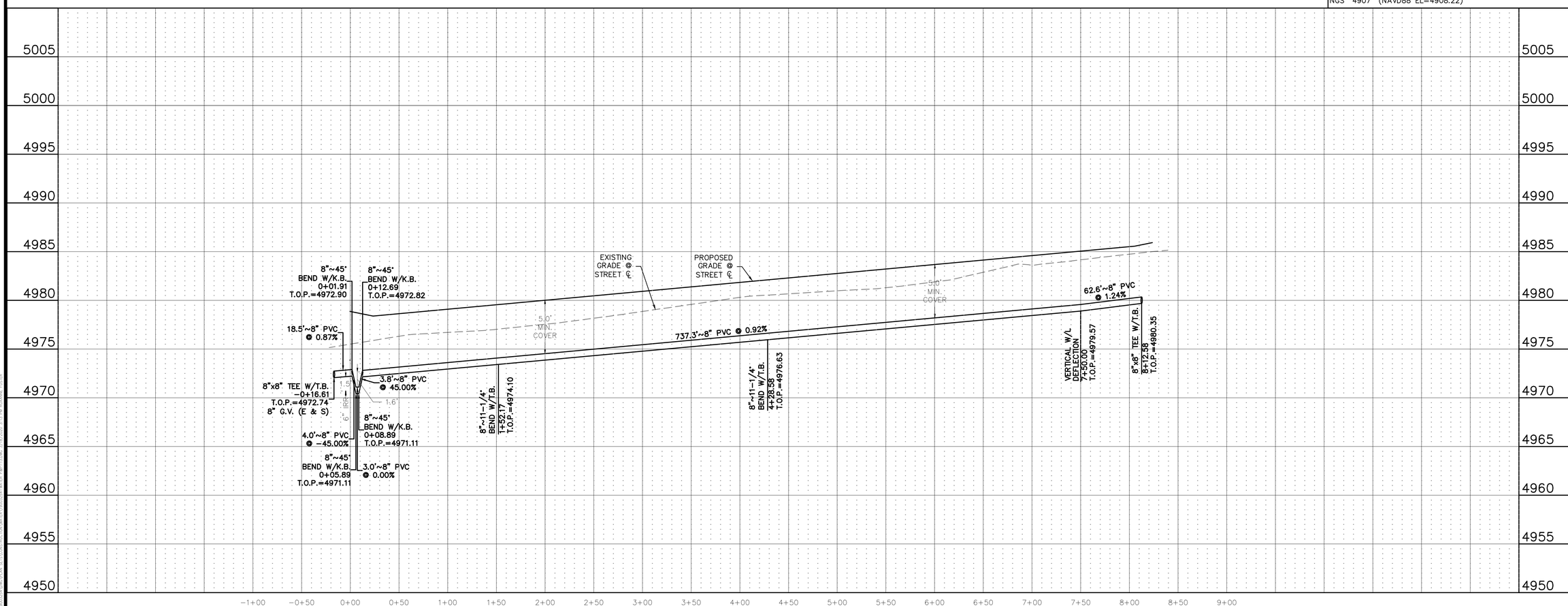
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
BOSA ST.

DATE 03/19/20

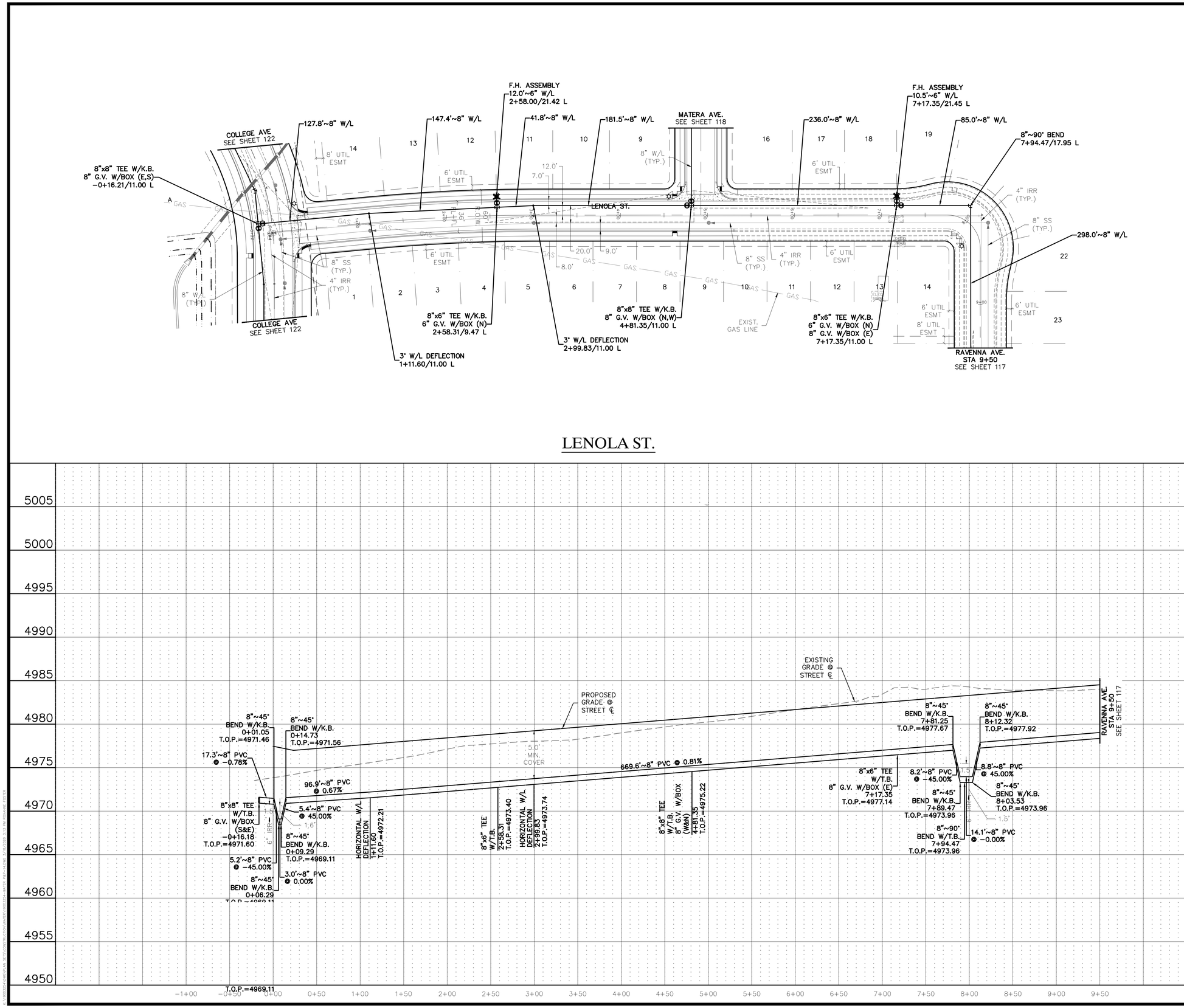
A	1st SUBMITTAL TO FT. LUPTON	03/19/2020 – MAM

REVISIONS

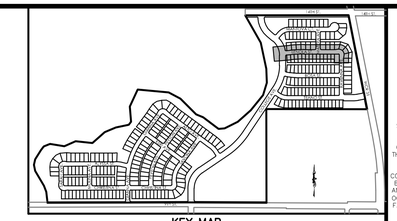
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 115

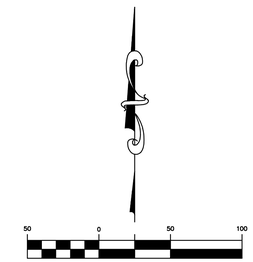
CAD FILE: 19003254-WATER P&P-113.DWG



LENOLA ST.



KEY MAP
N.T.S.



(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
LENOLA ST.

DATE
03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

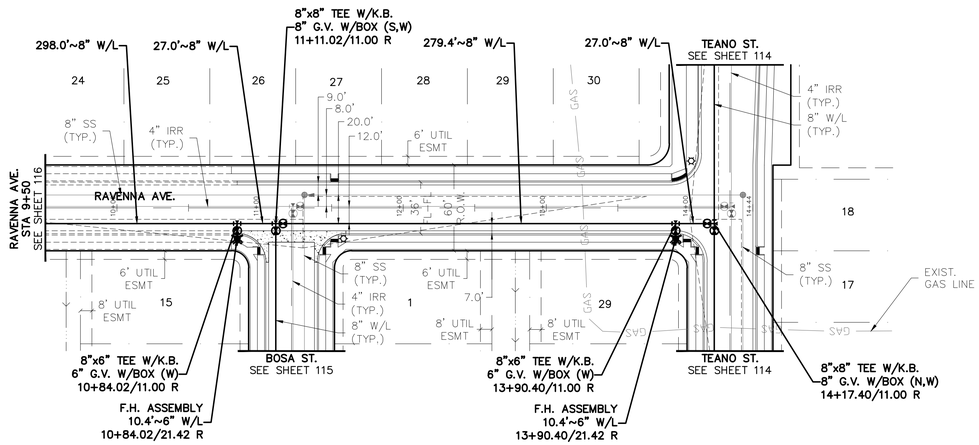
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

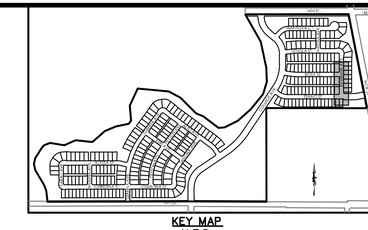
DR. RF | CH. MAM
P.M. MAM

JOB 19003254
SHEET NO. 116

CAD FILE: 19003254-WATER P&P-114.DWG



RAVENNA AVE.



KEY MAP
N.T.S.

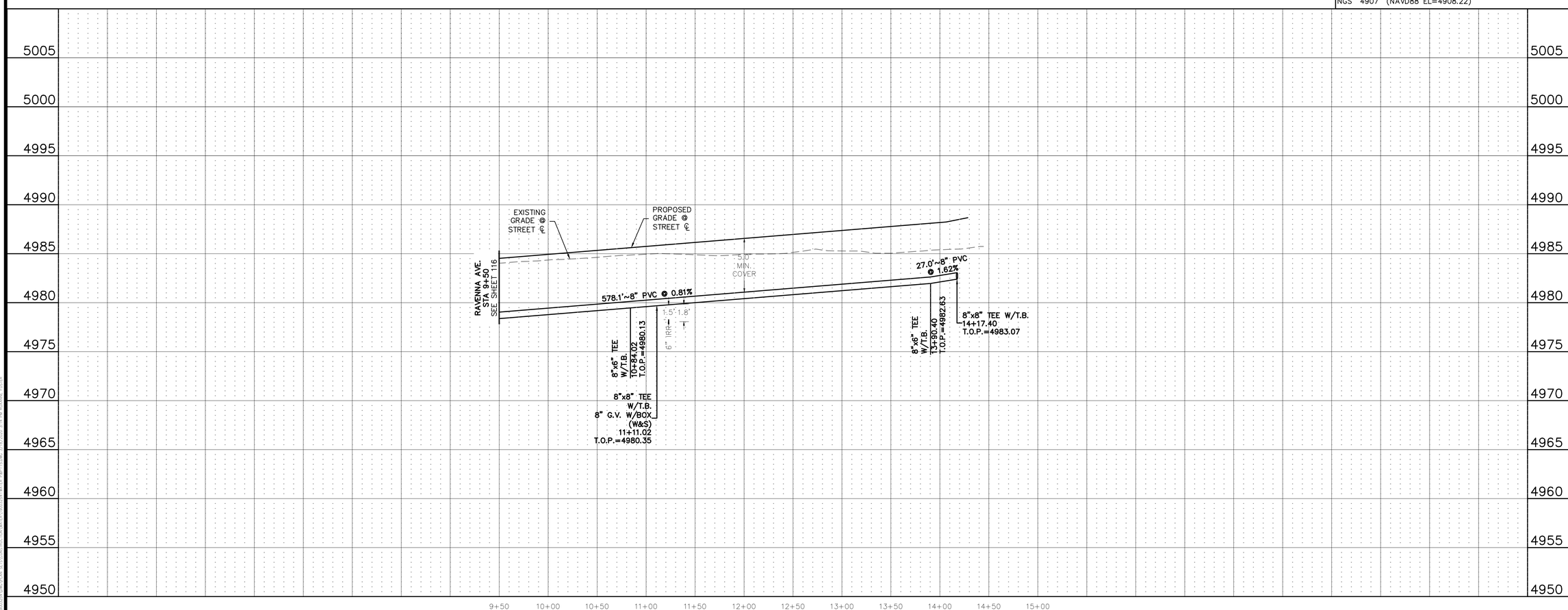
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811
Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
RAVENNA AVE.

DATE 03/19/20

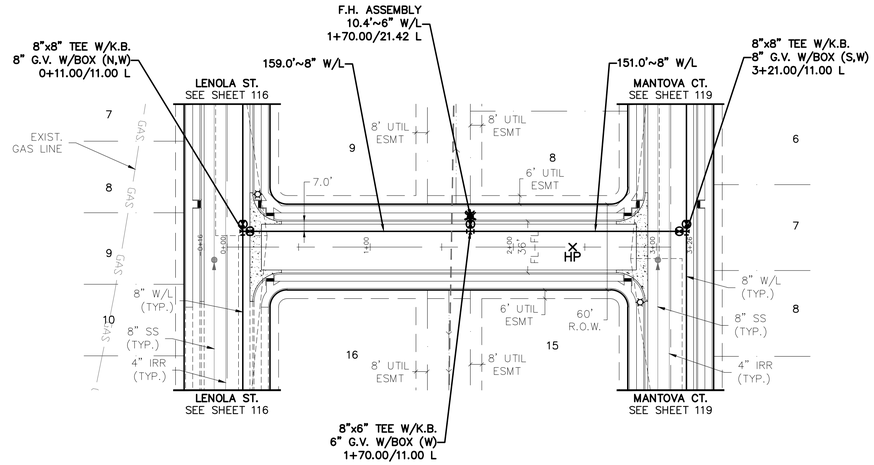
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

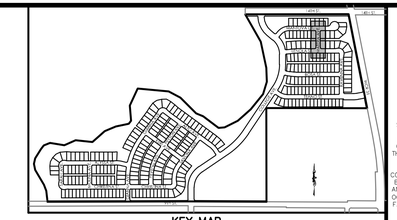
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 117

CAD FILE: 19003254-WATER P&P-115.DWG



MATERA AVE.



KEY MAP
N.T.S.

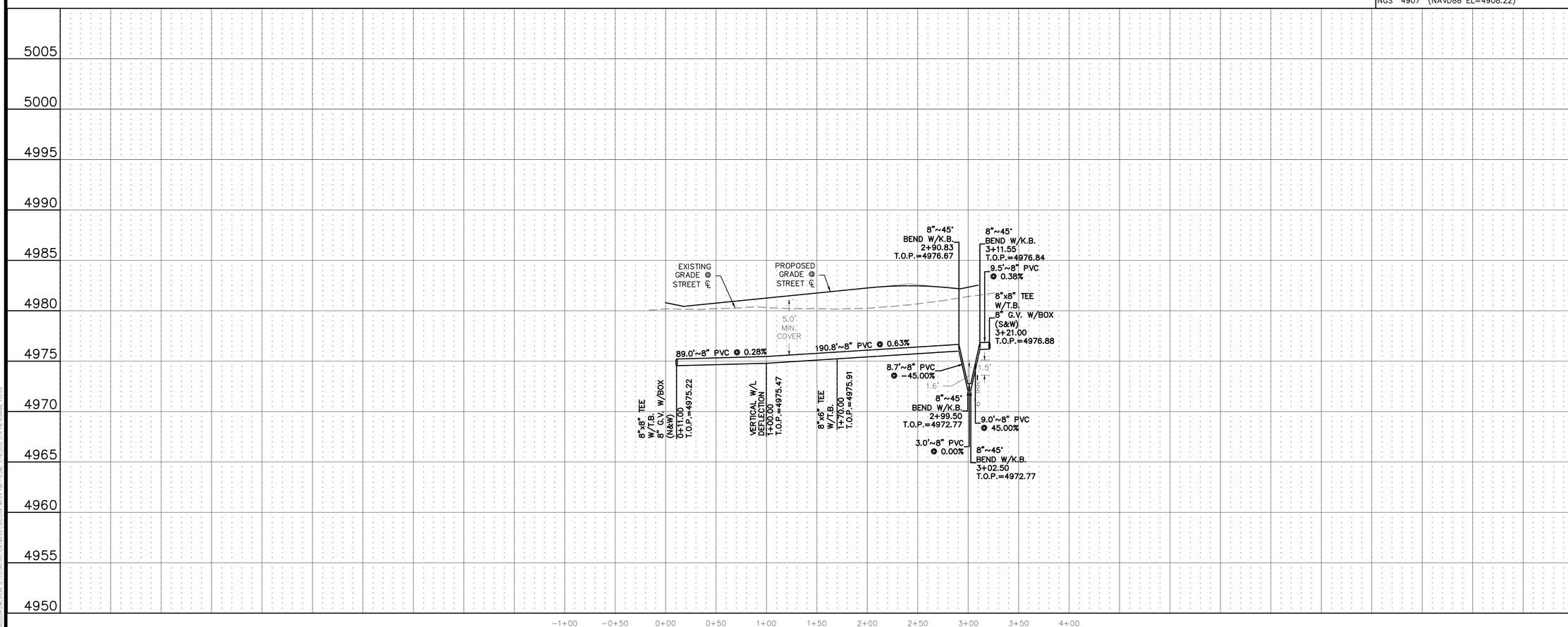
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
MATERA AVE.

DATE 03/19/20

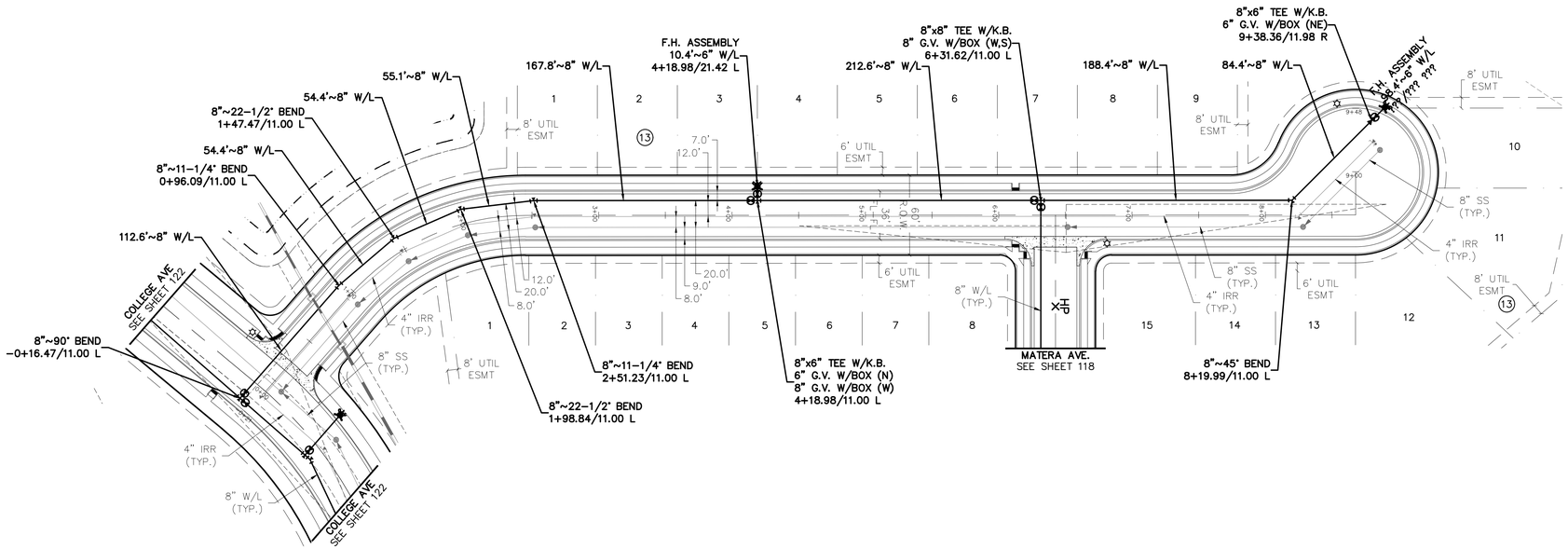
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

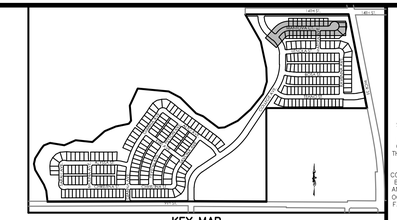
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

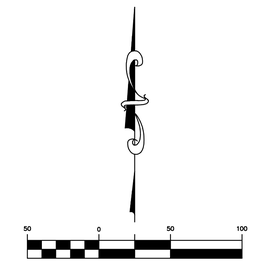
DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 118

CAD FILE: 19003254-WATER P&P-118.DWG





KEY MAP
N.T.S.



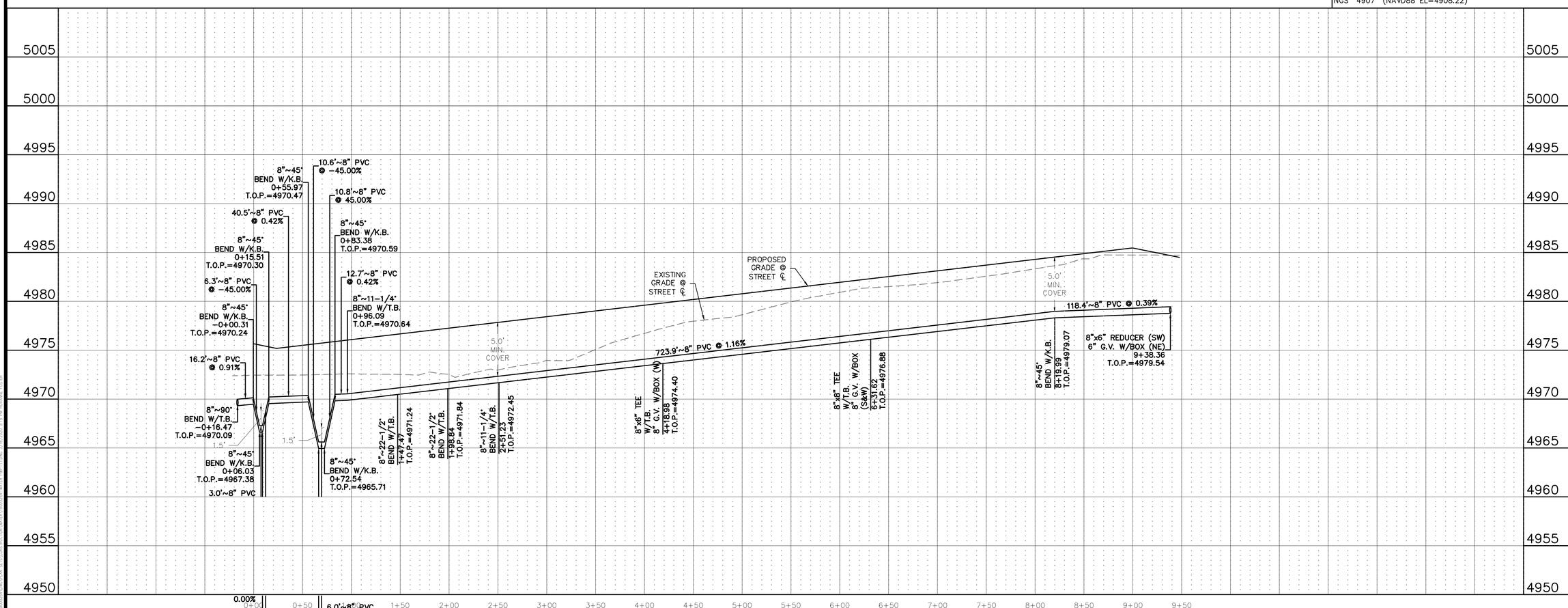
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
MANTOVA CT.

DATE 03/19/20

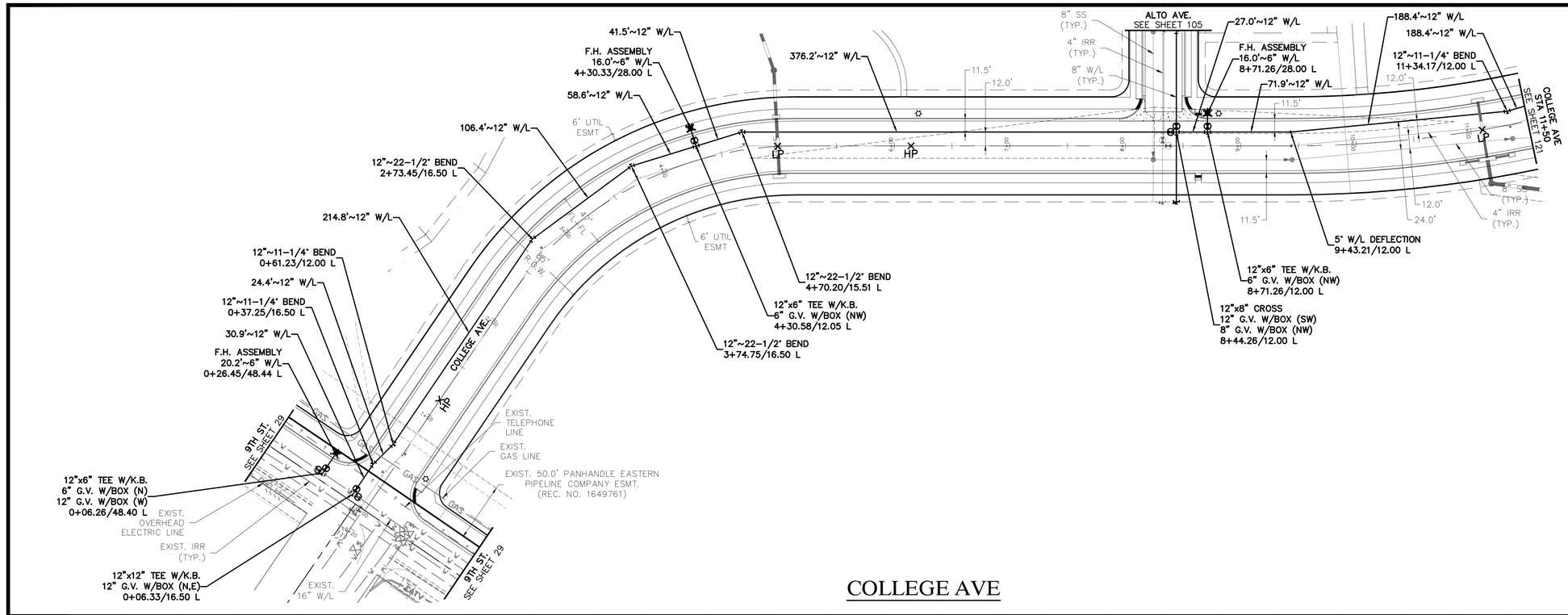
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

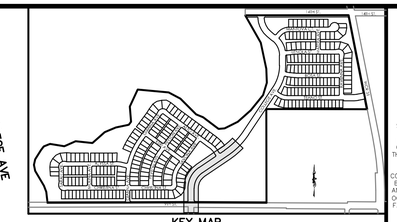
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 119

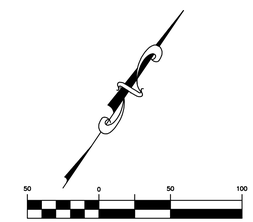
CAD FILE: 19003254-WATER P&P-117.DWG



COLLEGE AVE



KEY MAP
N.T.S.



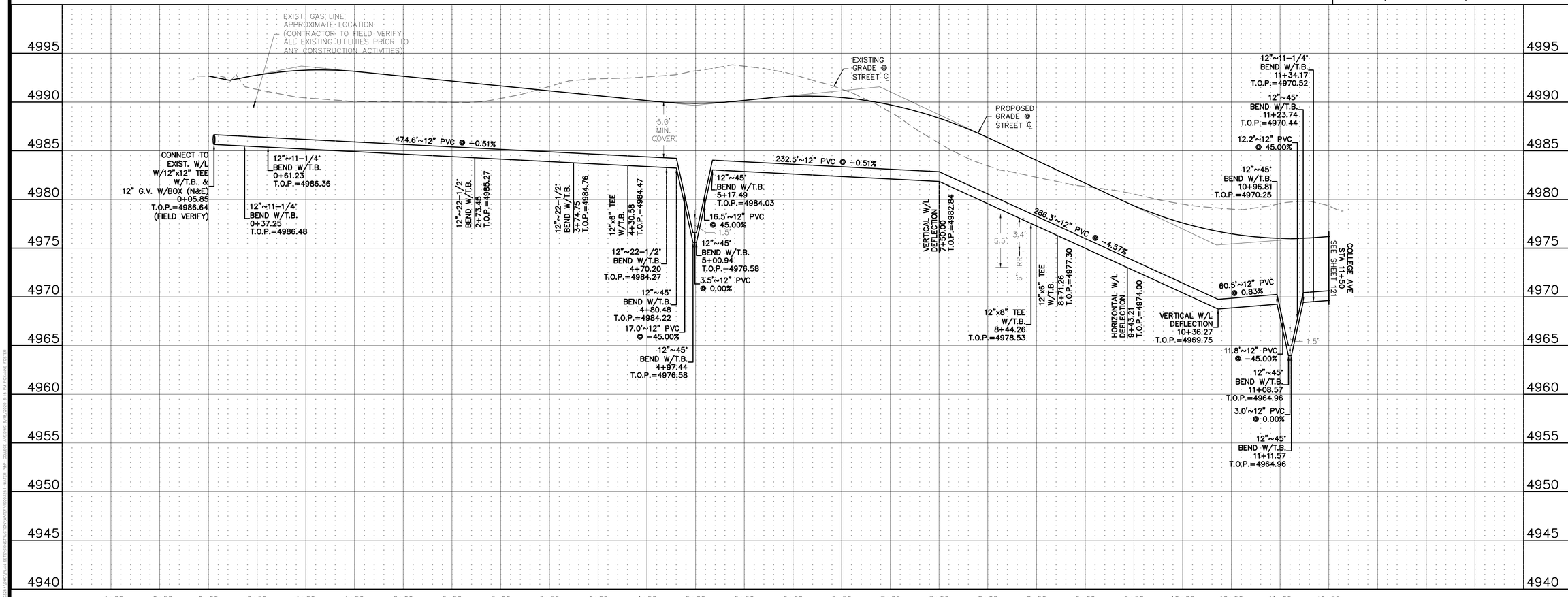
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811
Know what's below.
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
COLLEGE AVE

DATE
03/19/20

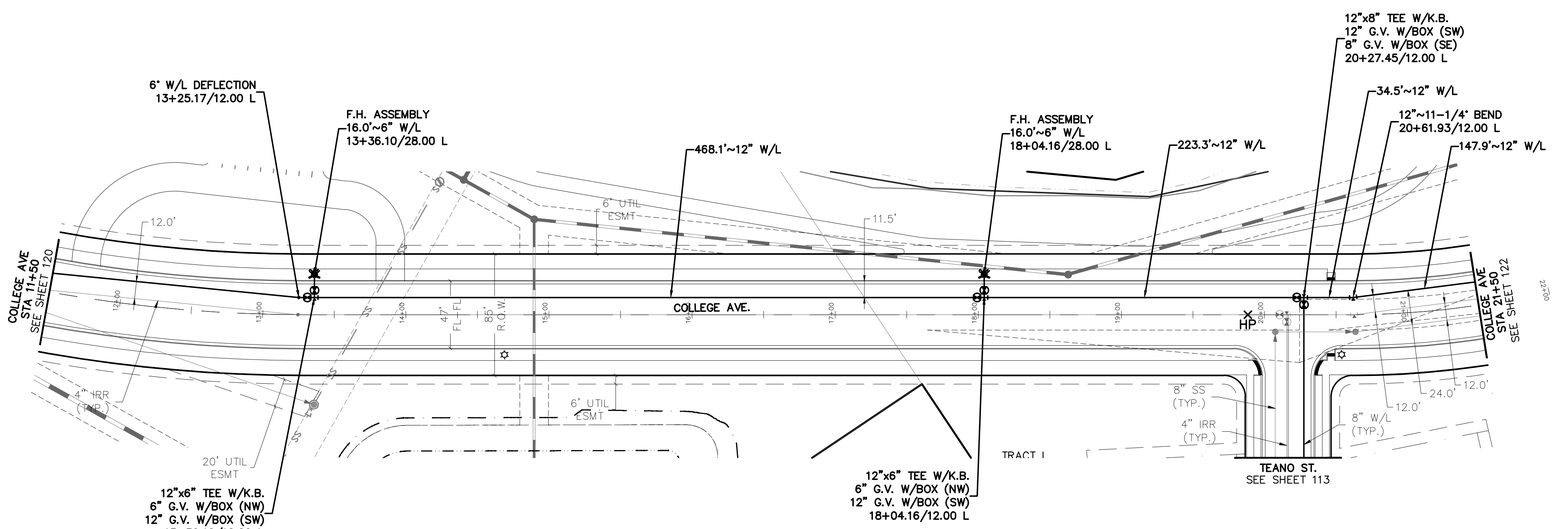
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

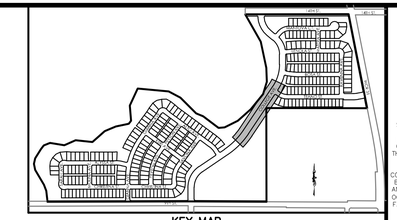
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

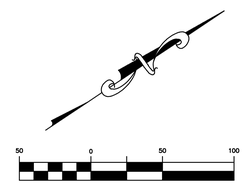
DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 120

CAD FILE: 19003254-WATER P&P-COLLEGE AVE.DWG





KEY MAP
N.T.S.



(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

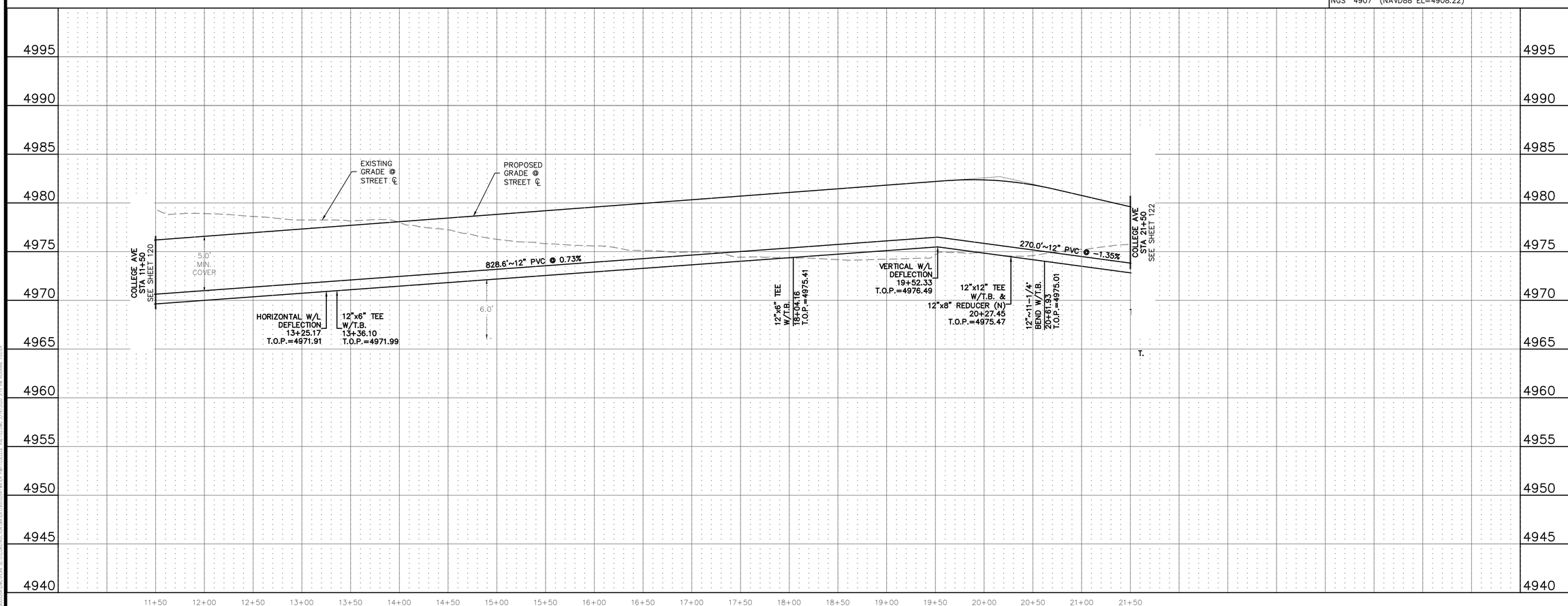
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

COLLEGE AVE



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
COLLEGE AVE

DATE 03/19/20

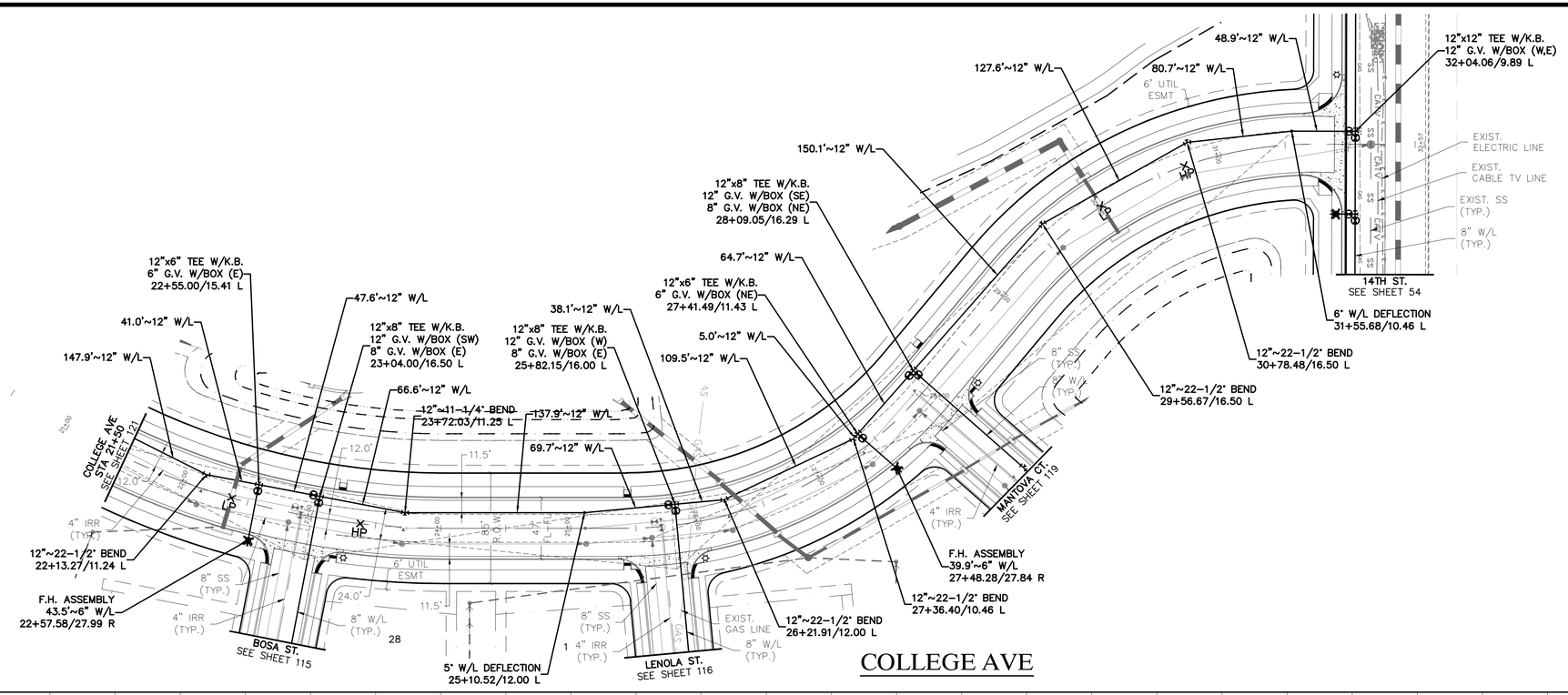
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

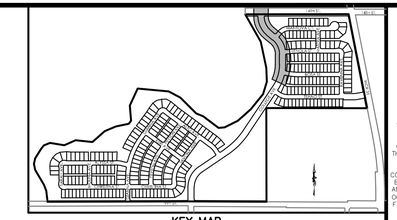
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 121

CAD FILE: 19003254-WATER P&P-COLLEGE AVE-02.DWG





KEY MAP
N.T.S.

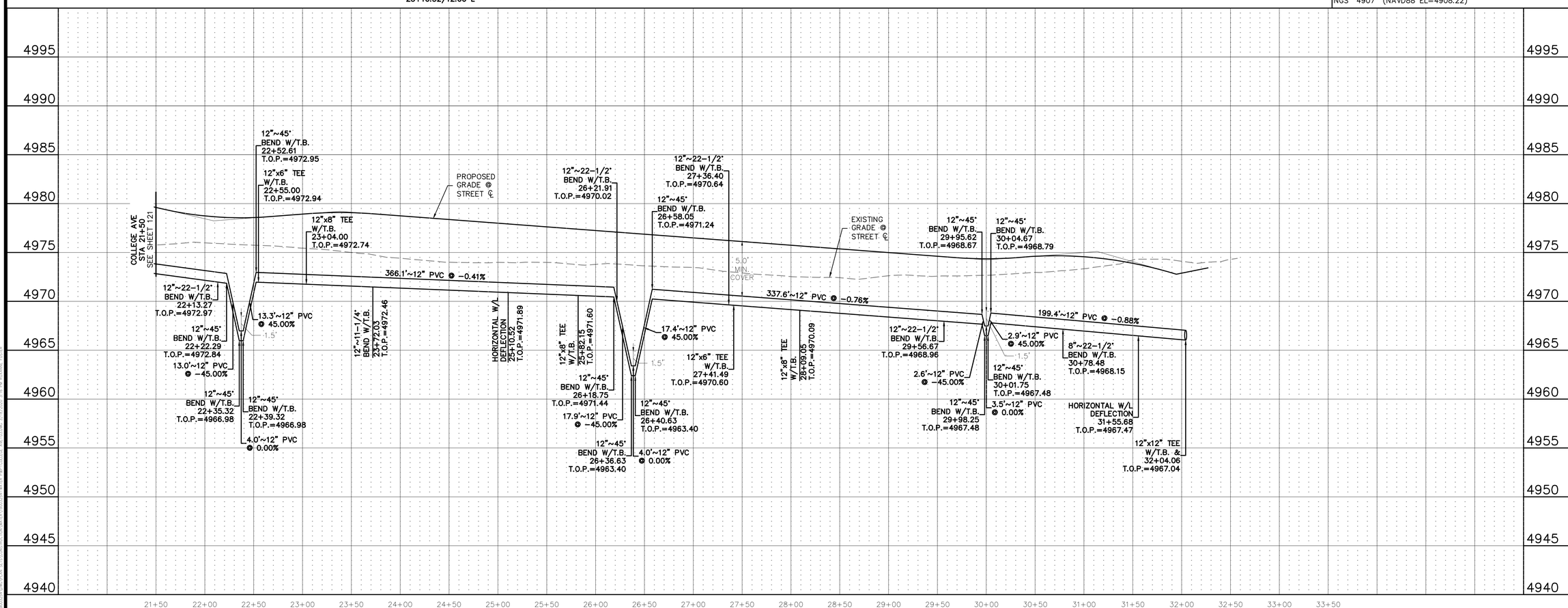
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811
Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
COLLEGE AVE

DATE 03/19/20

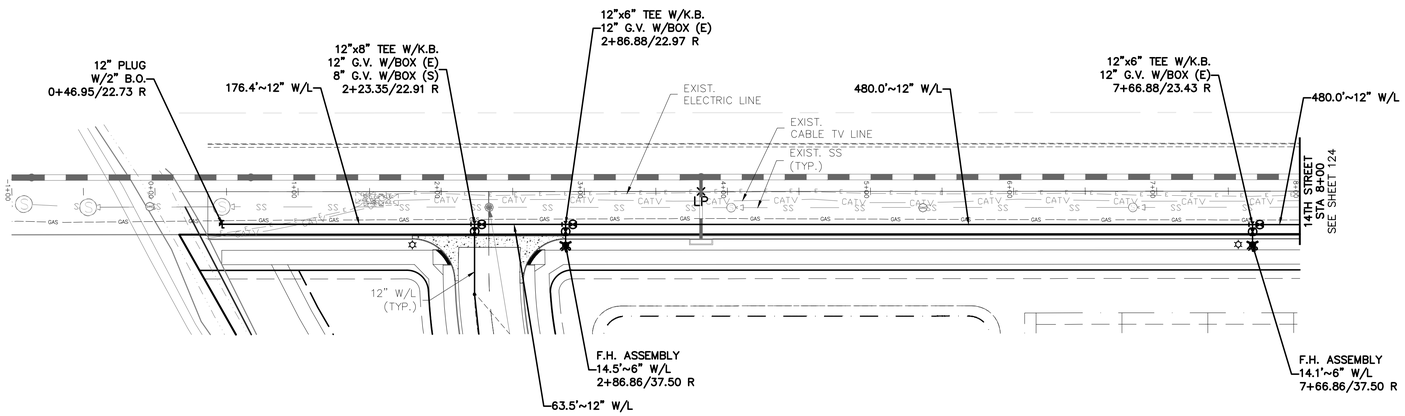
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

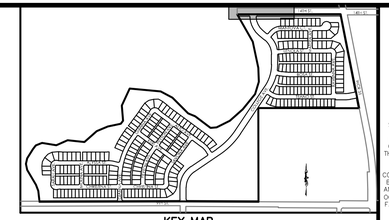
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 122

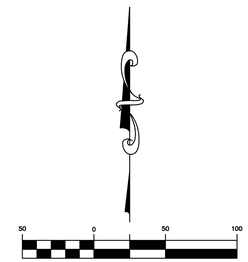
CAD FILE: 19003254-WATER P&P-COLLEGE AVE-03.DWG



14TH STREET



KEY MAP
N.T.S.



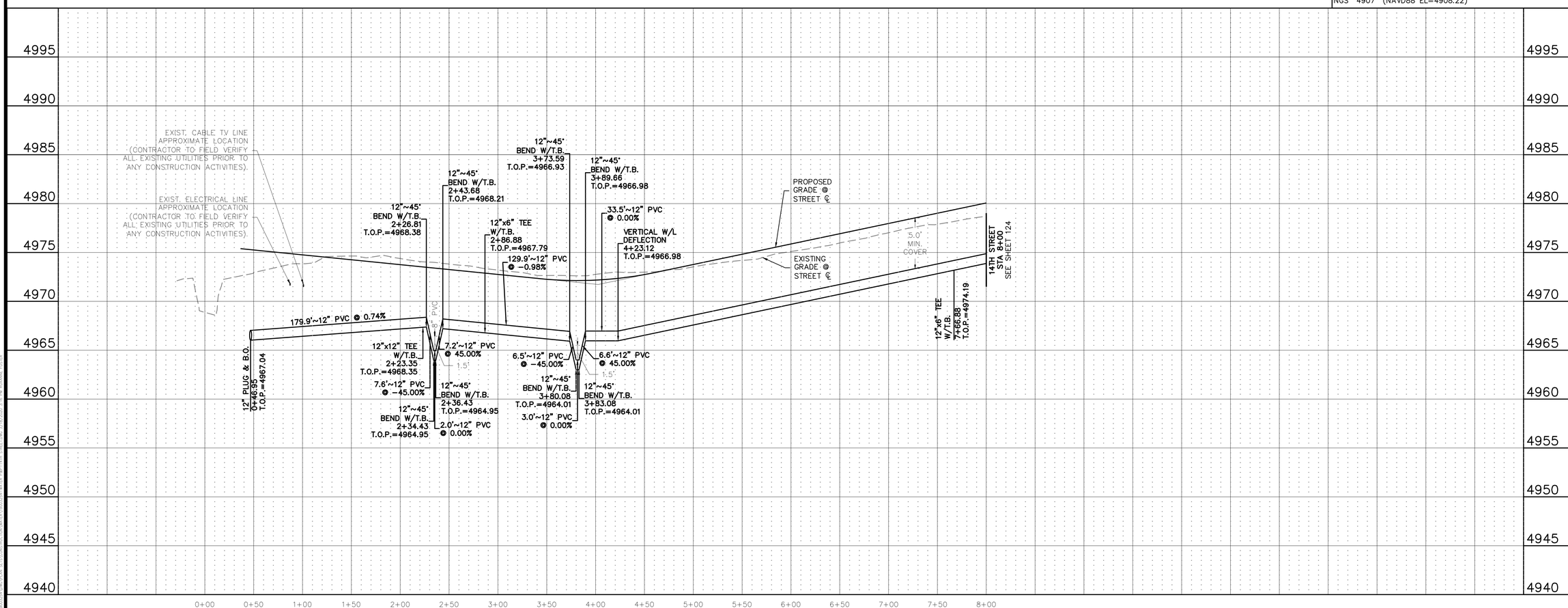
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
14TH STREET

DATE
03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

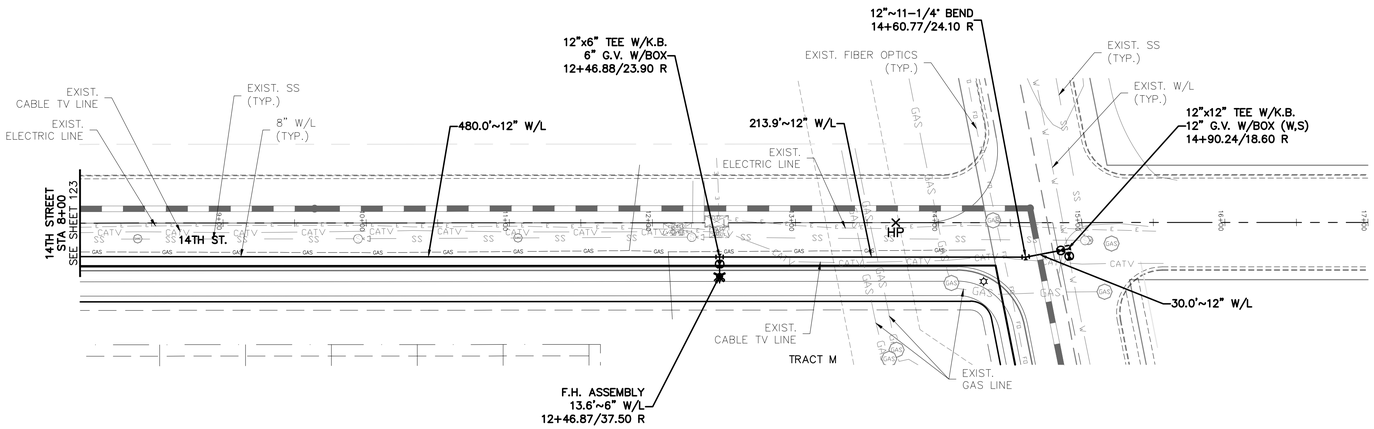
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM

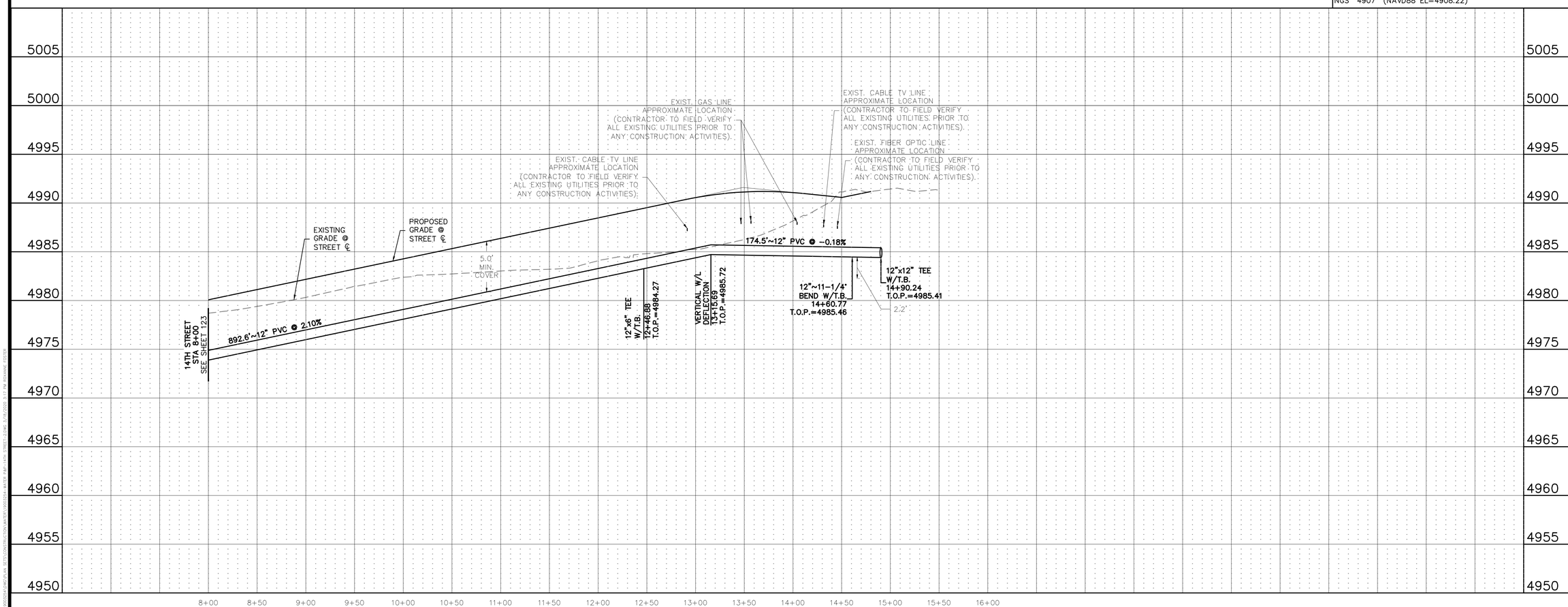
JOB 19003254

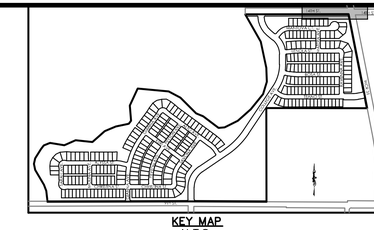
SHEET NO.
123

CAD FILE: 19003254-WATER P&P-14TH STREET.DWG

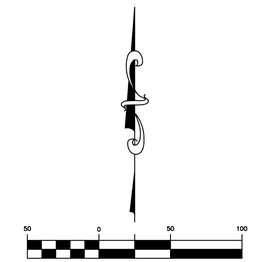


14TH STREET





KEY MAP
N.T.S.



(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
WATER PLAN & PROFILE
14TH STREET

DATE
03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

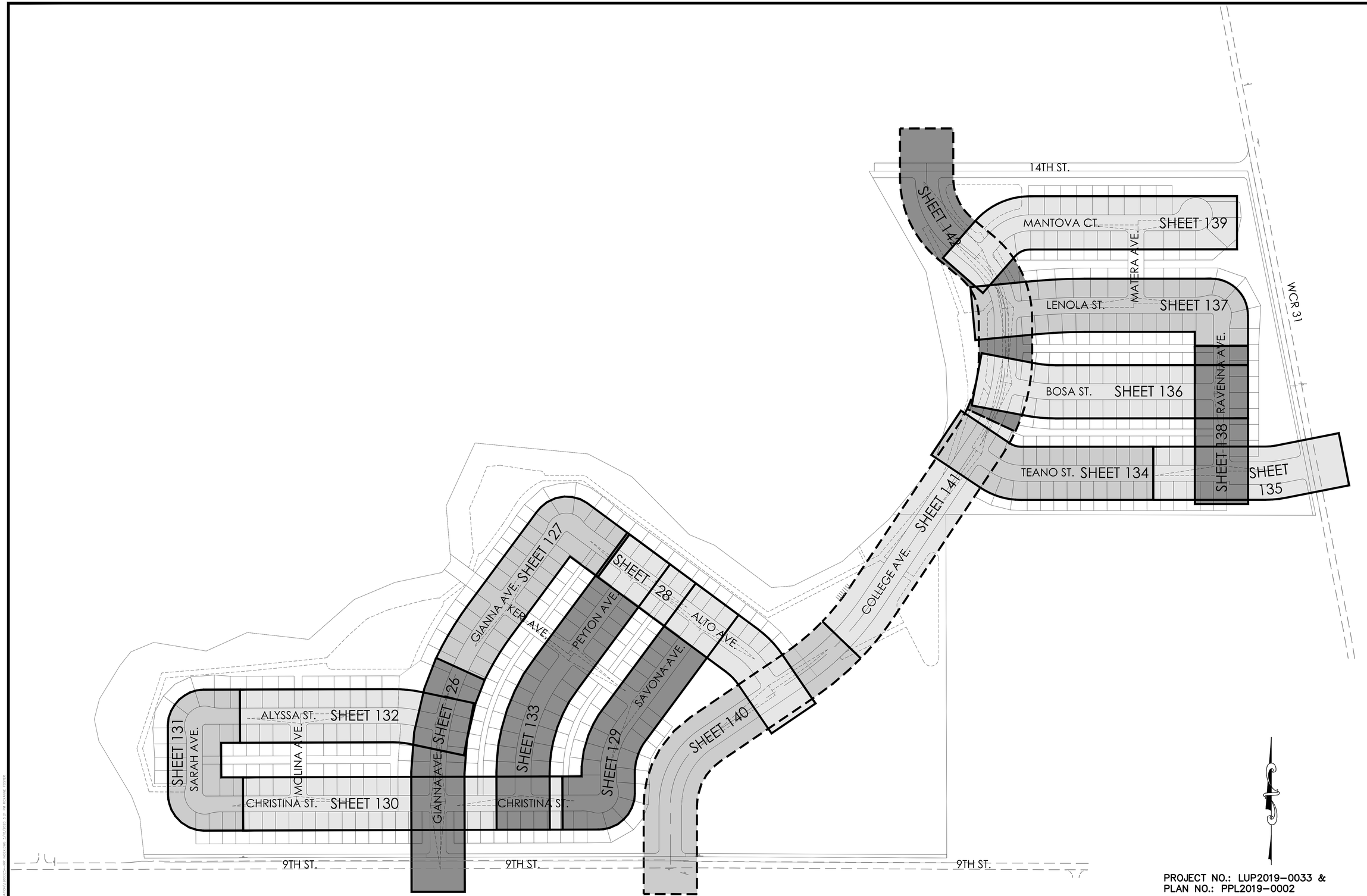
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM

JOB 19003254
SHEET NO.
124

CAD FILE: 19003254-WATER P&P-14TH STREET-2.DWG



PROJECT NO.: LUP2019–0033 &
PLAN NO.: PPL2019–0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
IRRIGATION INDEX

DATE
03/19/20

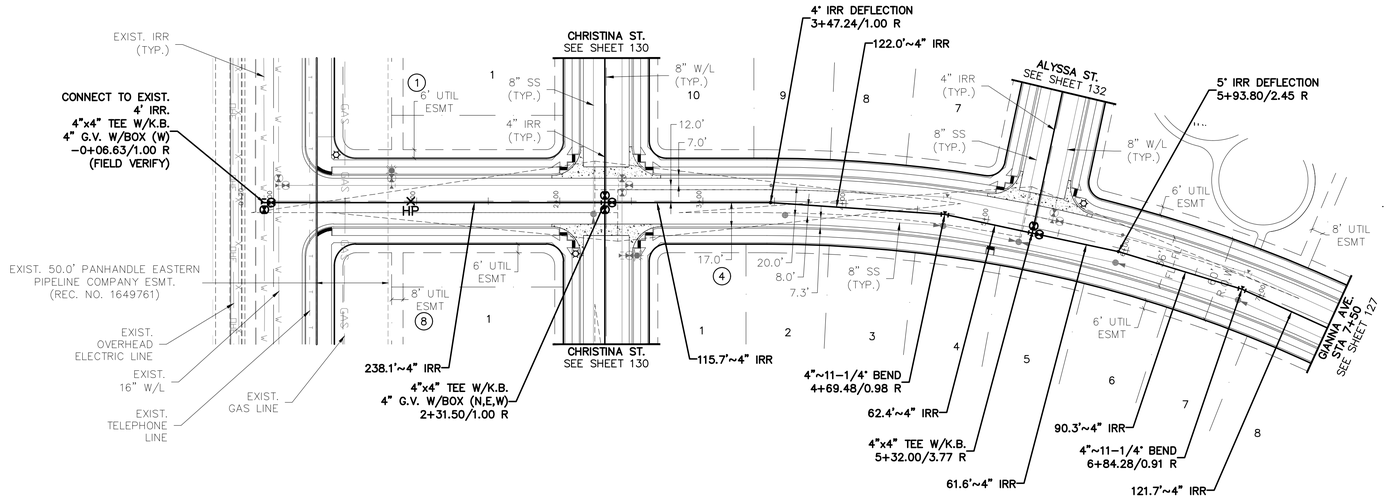
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

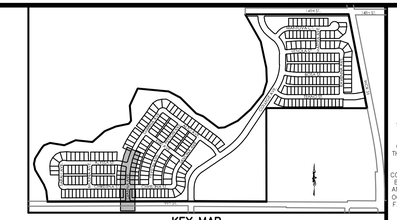
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
125

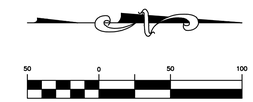
CAD FILE: 19003254-IRR INDEX.DWG



GIANNA AVE.



KEY MAP
N.T.S.



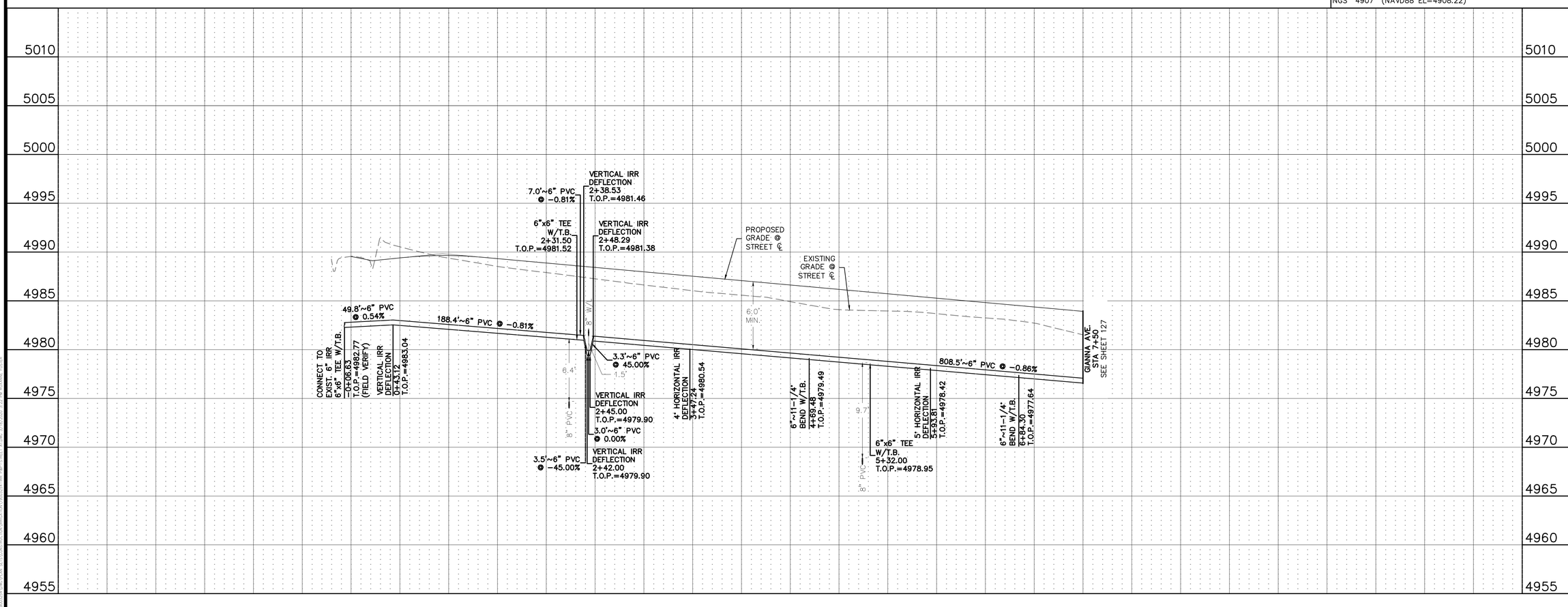
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
IRRIGATION PLAN & PROFILE
GIANNA AVE.

DATE 03/19/20

A	1st SUBMITTAL TO FT. LUPTON	03/19/2020 - MAM

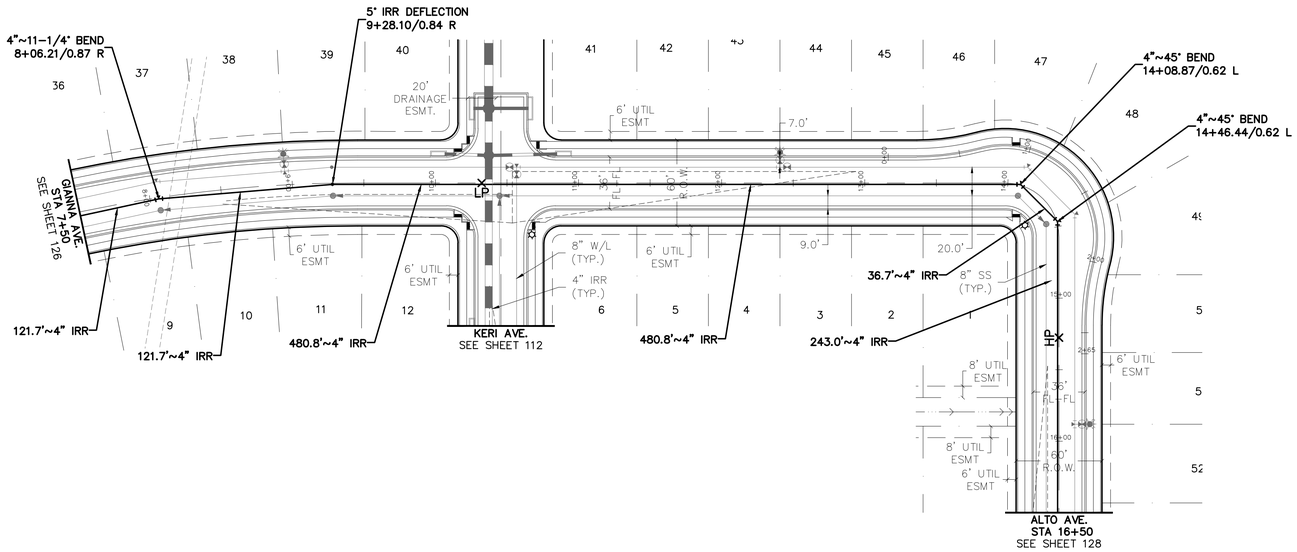
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

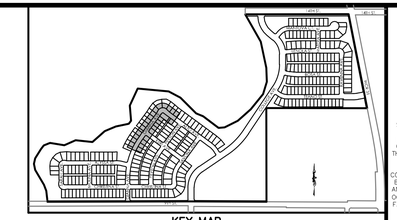
DR. RF | CH. MAM
P.M. MAM

JOB 19003254
SHEET NO. 126

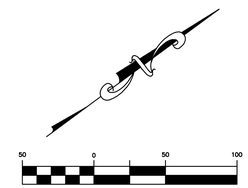
CAD FILE: 19003254-IRR P&P-STREET A1.DWG



GIANNA AVE.



KEY MAP
N.T.S.



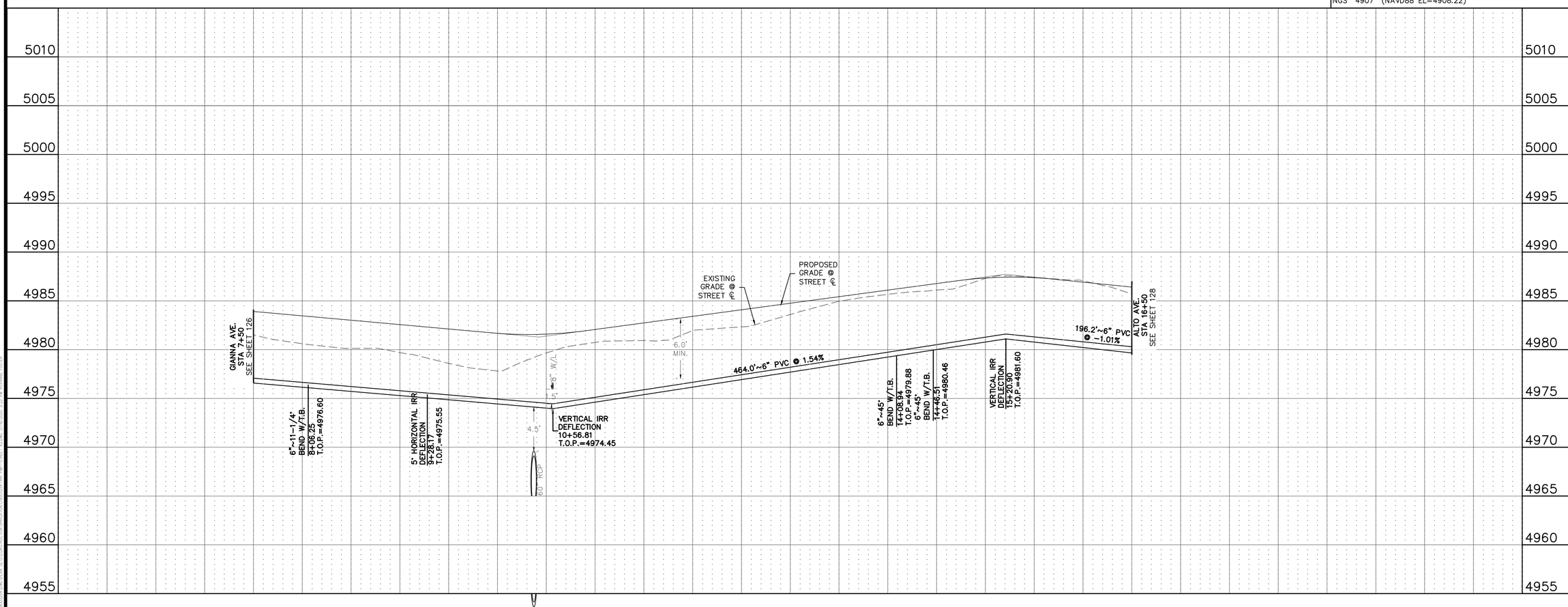
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811
Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
IRRIGATION PLAN & PROFILE
GIANNA AVE.

DATE
03/19/20

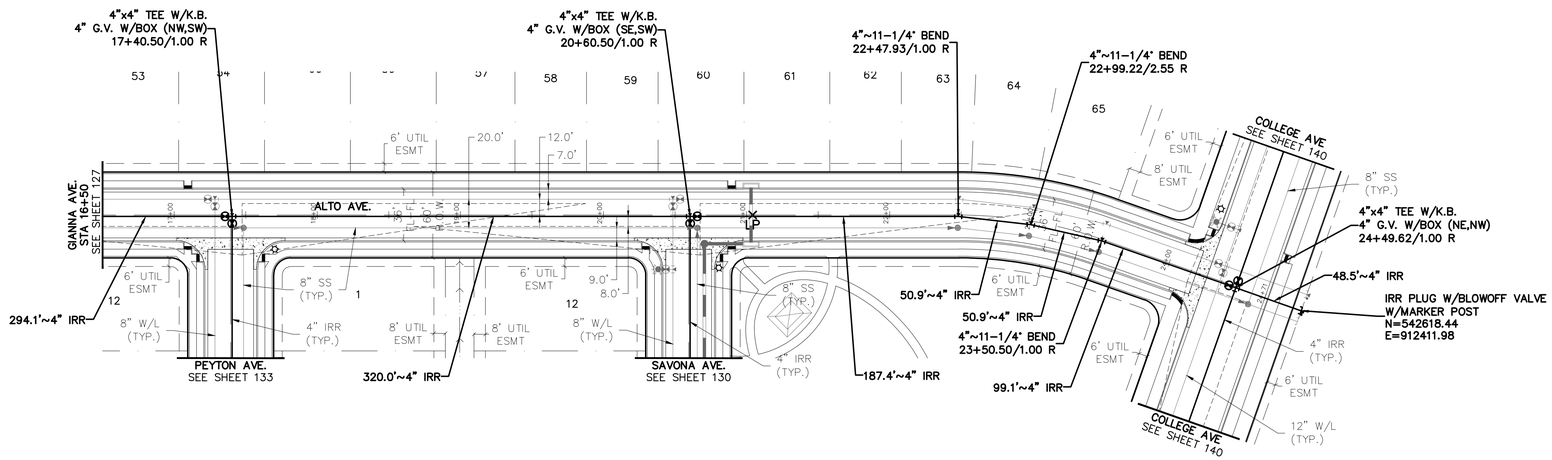
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

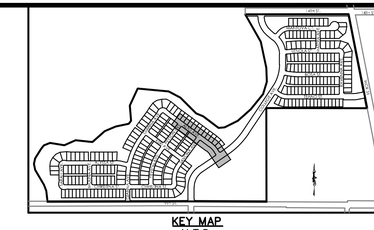
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

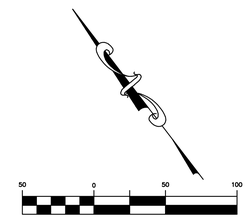
DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
127

CAD FILE: 19003254-IRR P&P-STREET A2.DWG





KEY MAP
N.T.S.



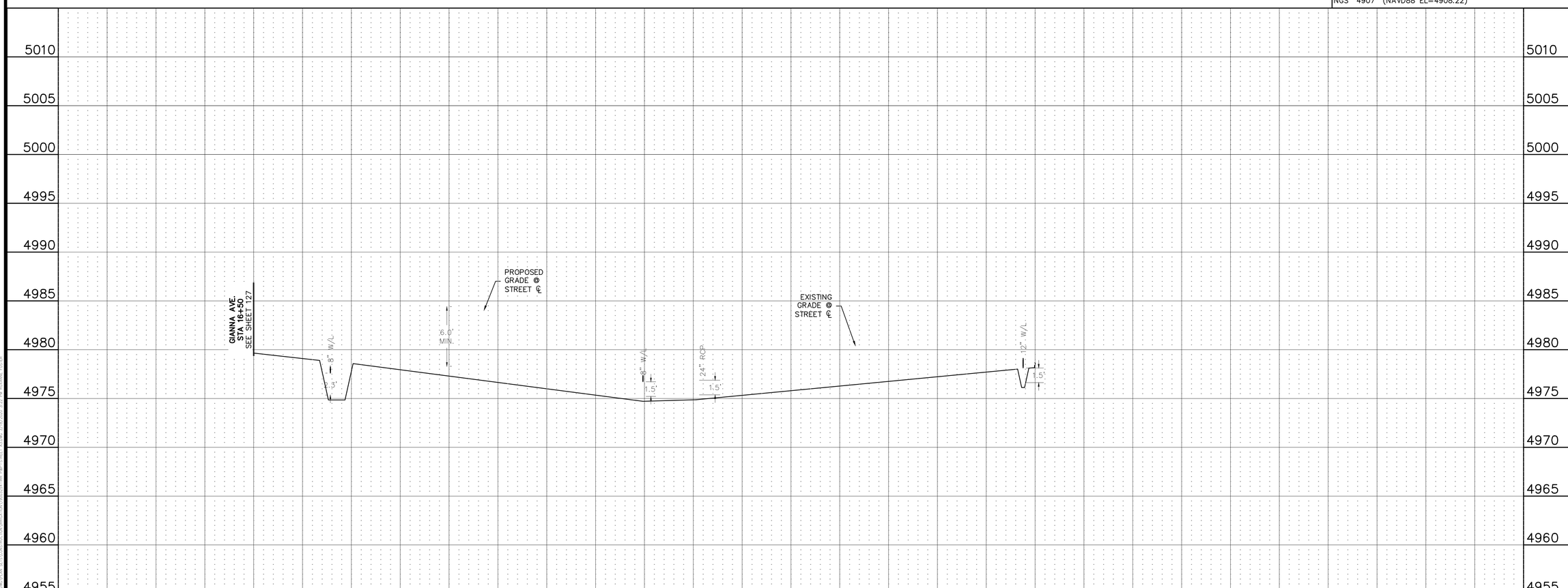
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOWN INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

ALTO AVE.



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
IRRIGATION PLAN & PROFILE
ALTO AVE.

DATE 03/19/20

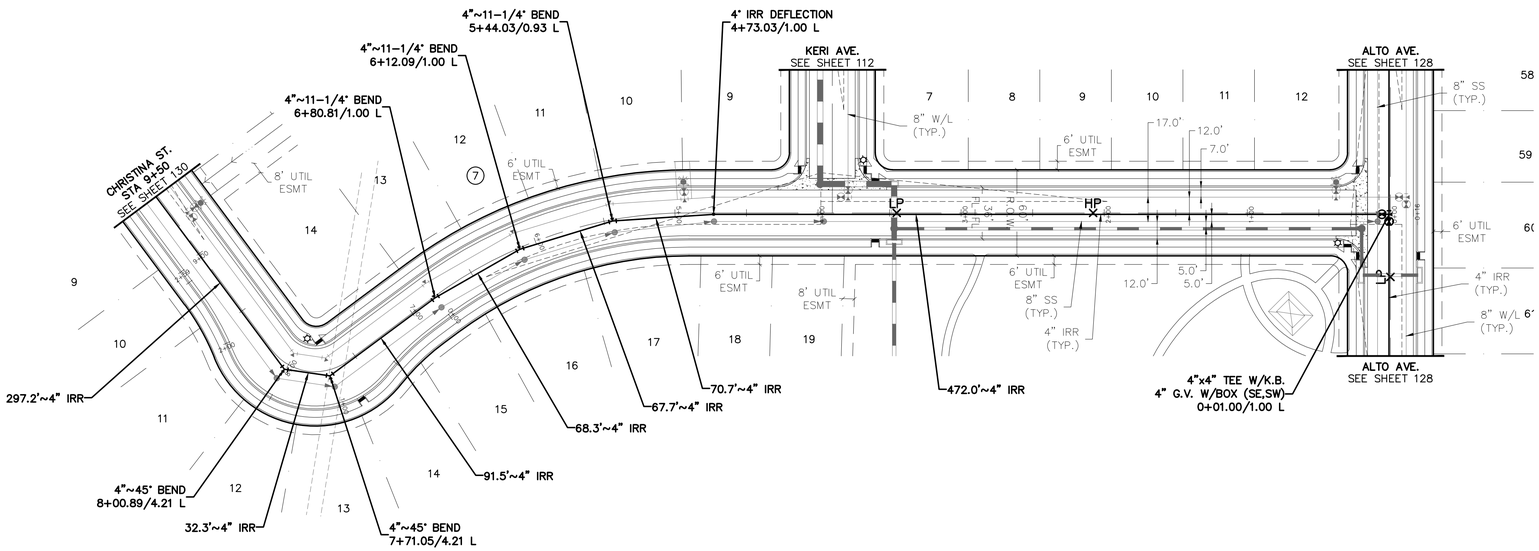
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

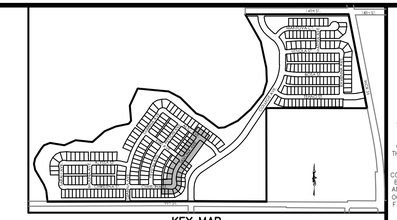
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 128

CAD FILE: 19003254-IRR P&P-STREET A.DWG



SAVONA AVE.



KEY MAP
N.T.S.

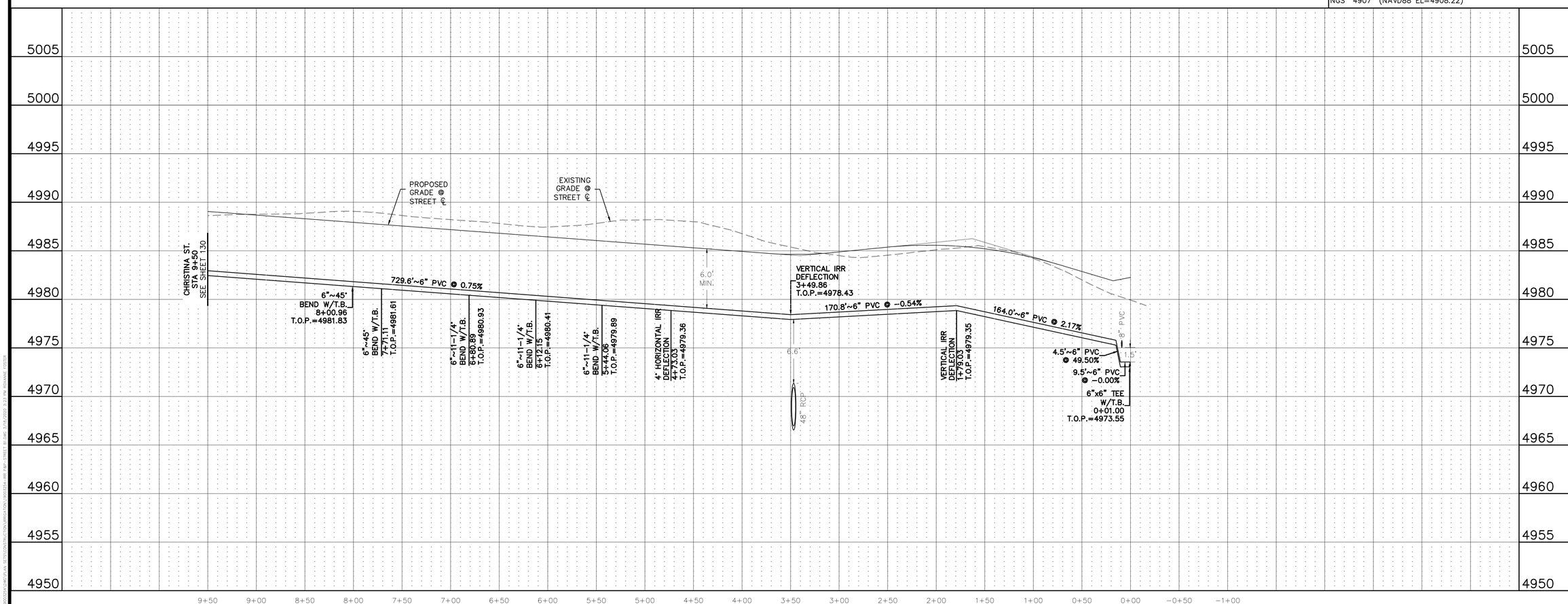
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811
Know what's below.
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
IRRIGATION PLAN & PROFILE
SAVONA AVE.

DATE
03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

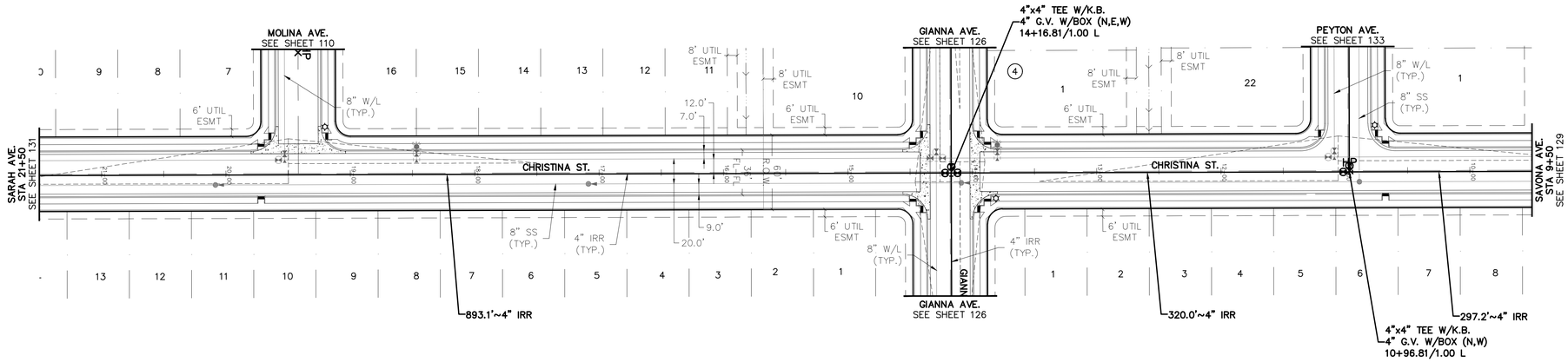
REVISIONS

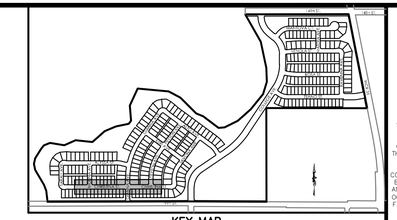
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM

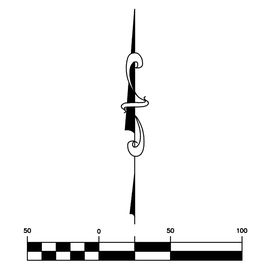
JOB 19003254
SHEET NO.
129

CAD FILE: 19003254-IRR P&P-STREET B1.DWG





KEY MAP
N.T.S.



(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

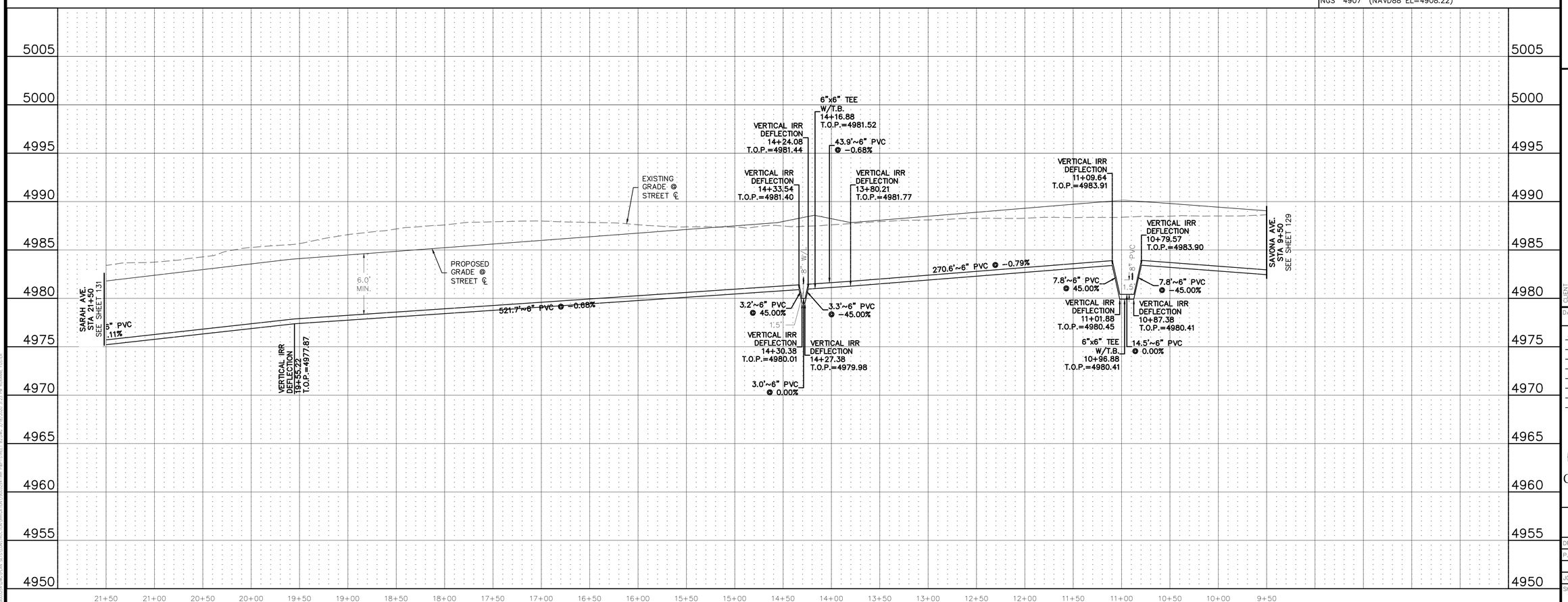
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

CHRISTINA ST.



811
Know what's below.
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
IRRIGATION PLAN & PROFILE
CHRISTINA ST.

DATE
03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

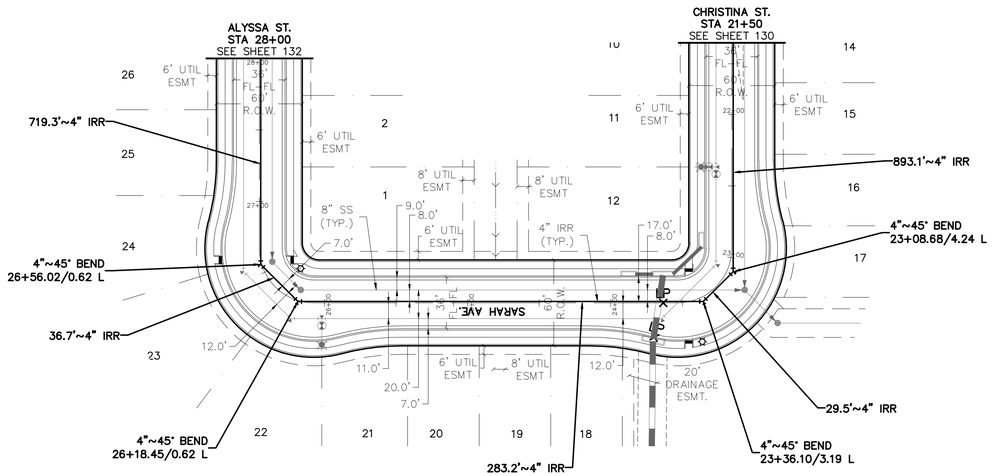
REVISIONS

PLANS UNDER REVIEW
NOT FOR CONSTRUCTION

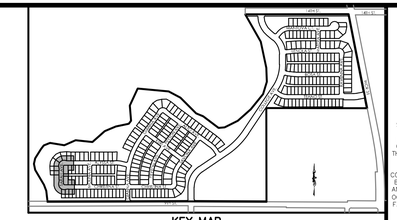
DR. RF | CH. MAM
P.M. MAM

JOB 19003254
SHEET NO.
130

CAD FILE: 19003254-IRR P&P-STREET B2.DWG



SARAH AVE.



KEY MAP
N.T.S.

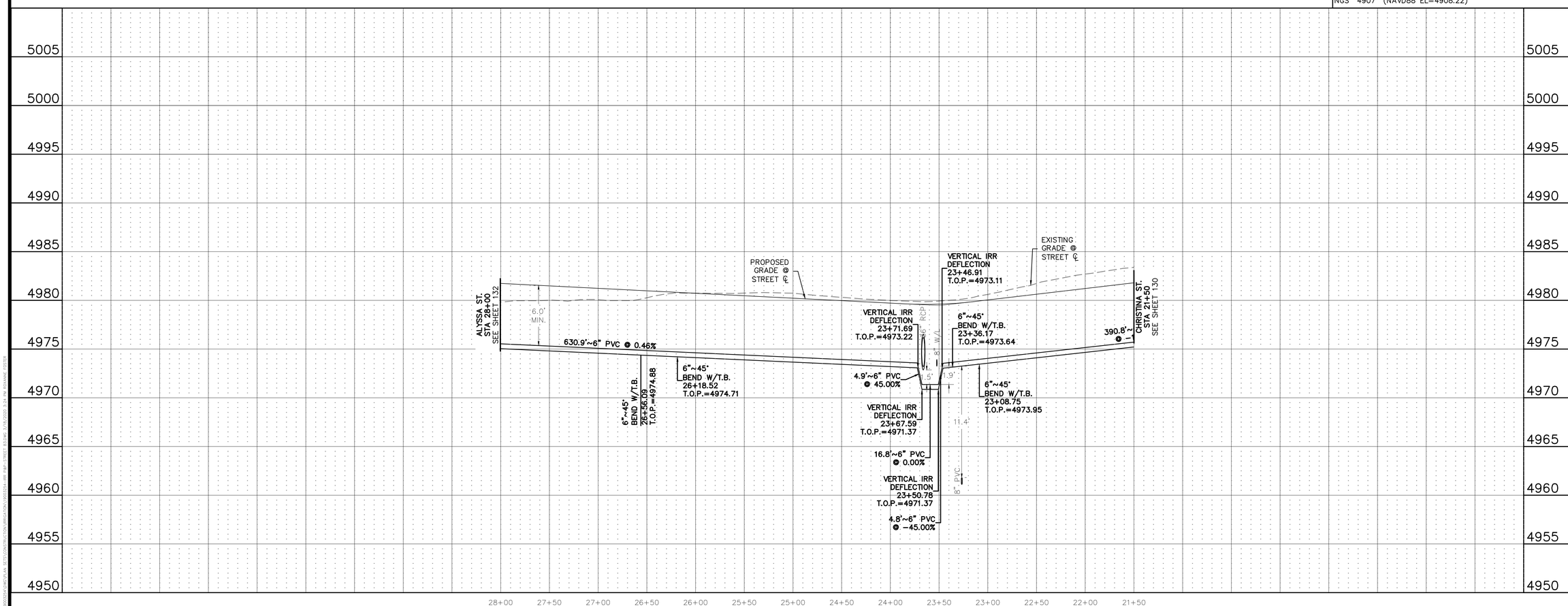
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
IRRIGATION PLAN & PROFILE
SARAH AVE.

DATE 03/19/20

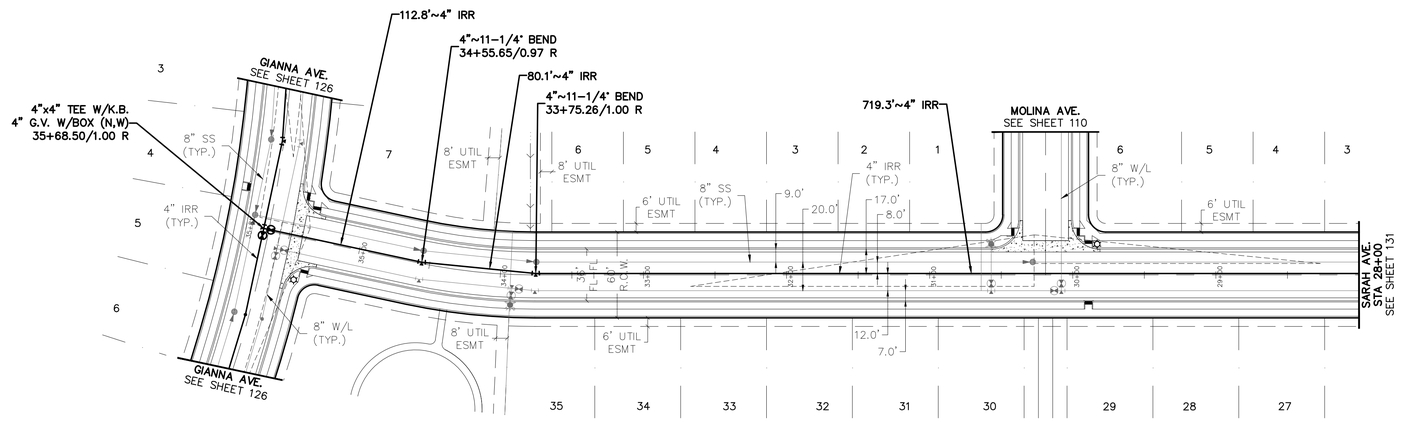
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

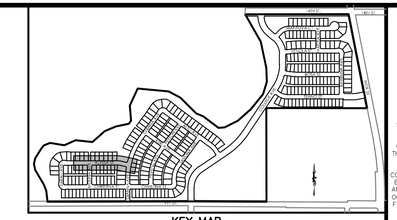
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 131

CAD FILE: 19003254-IRR P&P-STREET B3.DWG





KEY MAP
N.T.S.

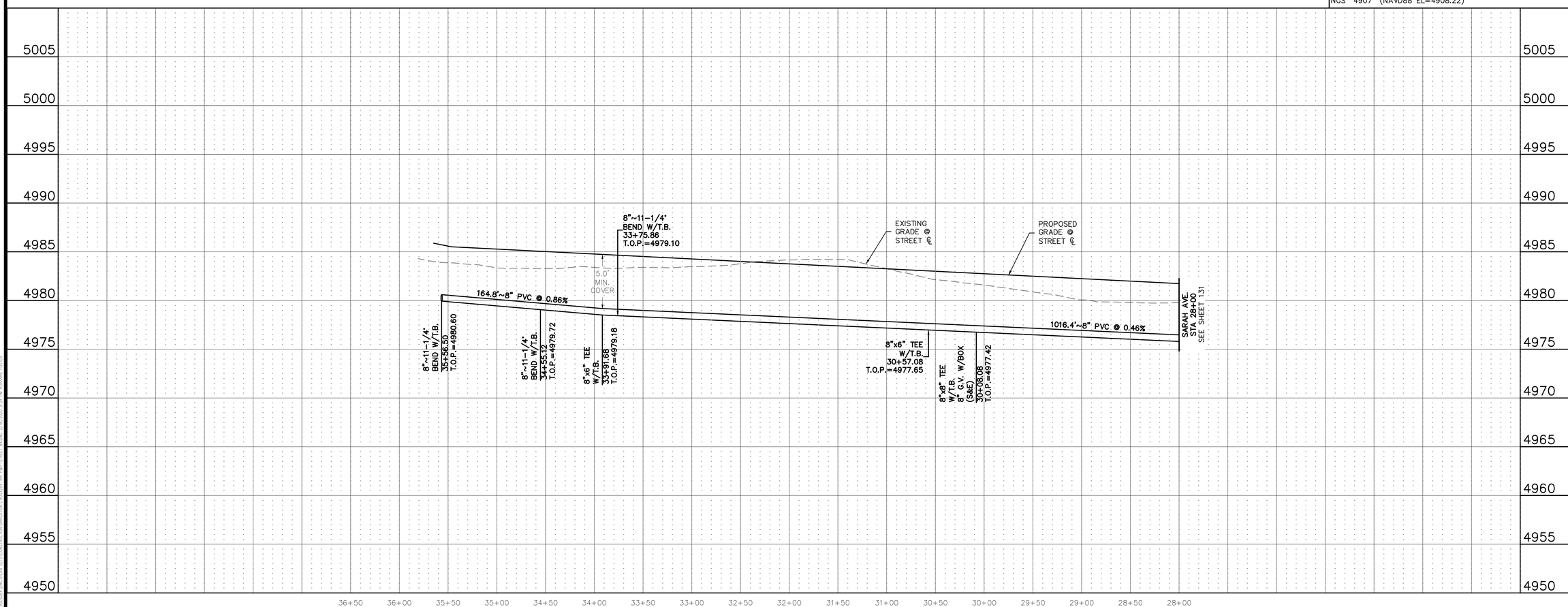
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
IRRIGATION PLAN & PROFILE
ALYSSA ST.

DATE
03/19/20

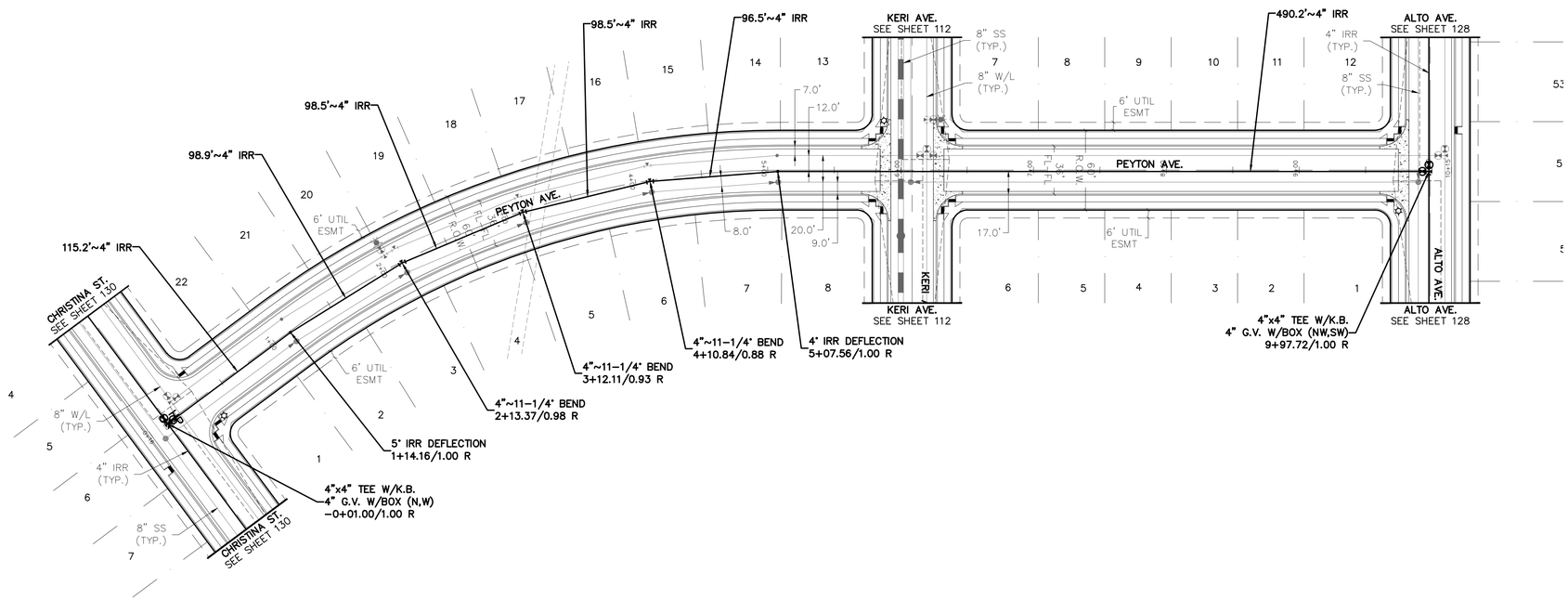
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

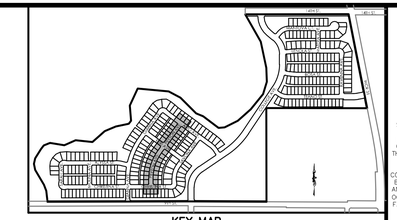
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
132

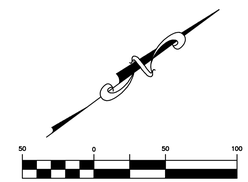
CAD FILE: 19003254-IRR P&P-STREET B4.DWG



PEYTON AVE.



KEY MAP
N.T.S.



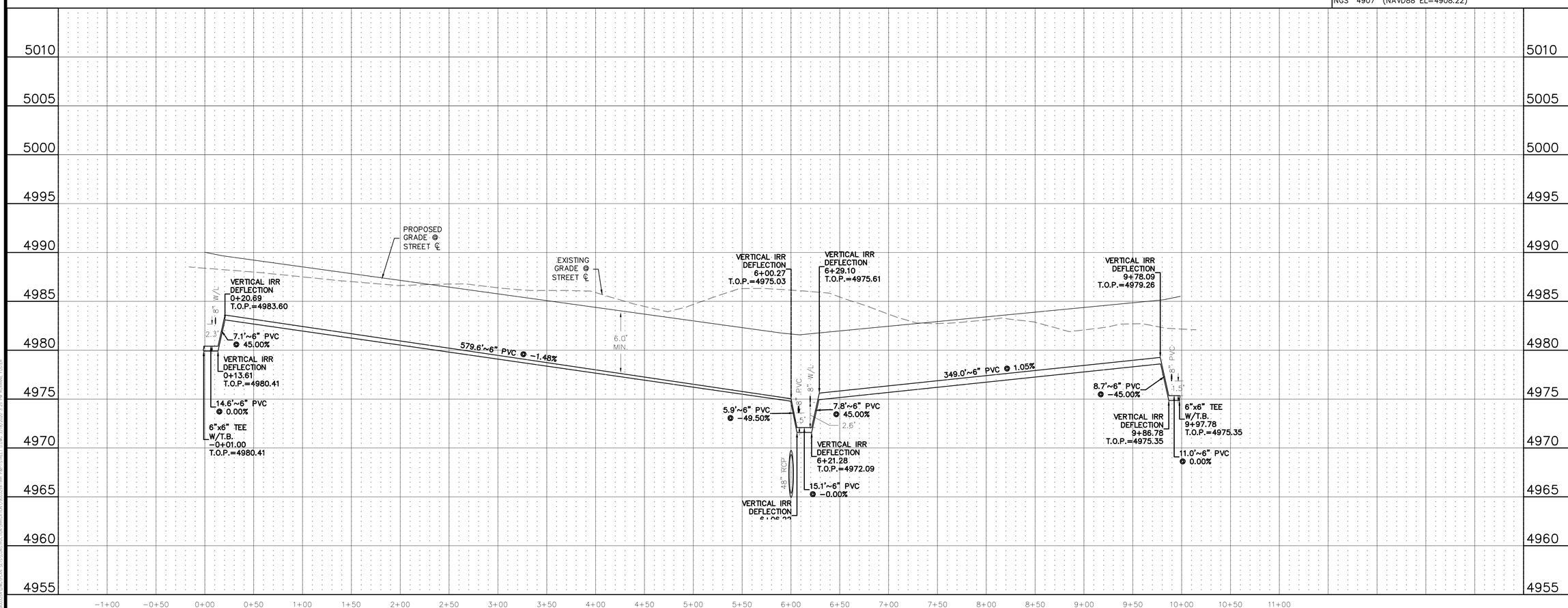
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
IRRIGATION PLAN & PROFILE
PEYTON AVE.

DATE 03/19/20

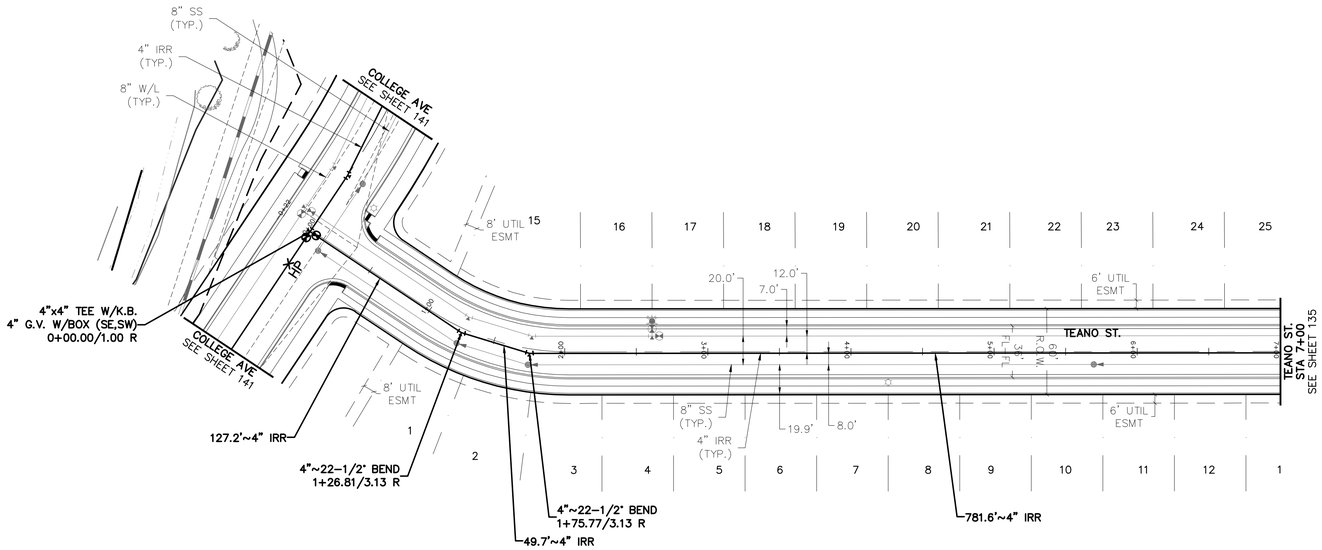
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

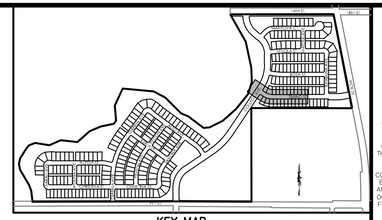
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

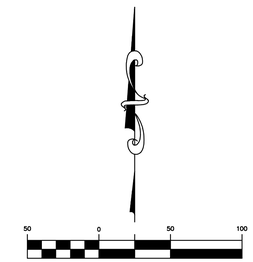
DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 133

CAD FILE: 19003254-IRR P&P-STREET D.DWG





KEY MAP
N.T.S.



(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

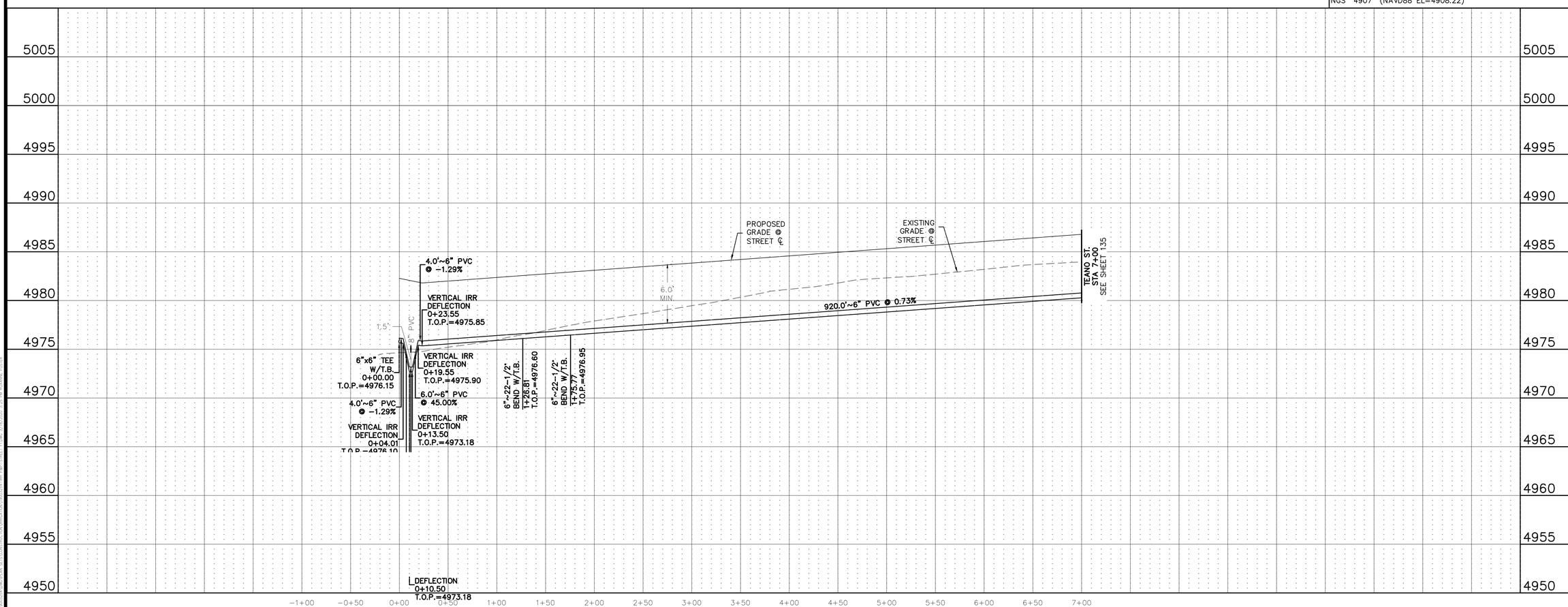
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

TEANO ST.



811
Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
IRRIGATION PLAN & PROFILE
TEANO ST.

DATE
03/19/20

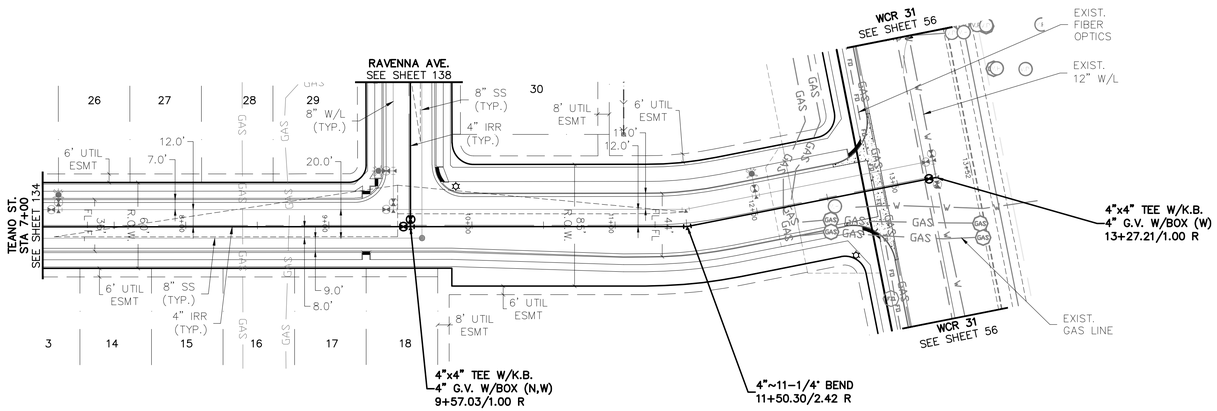
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

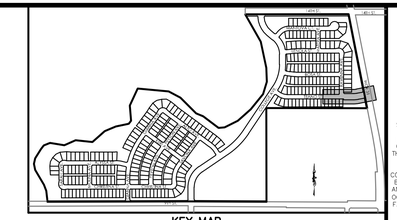
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

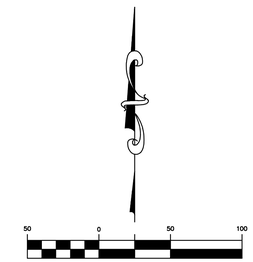
DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
134

CAD FILE: 19003254-IRR P&P-STREET FT.DWG





KEY MAP
N.T.S.



(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

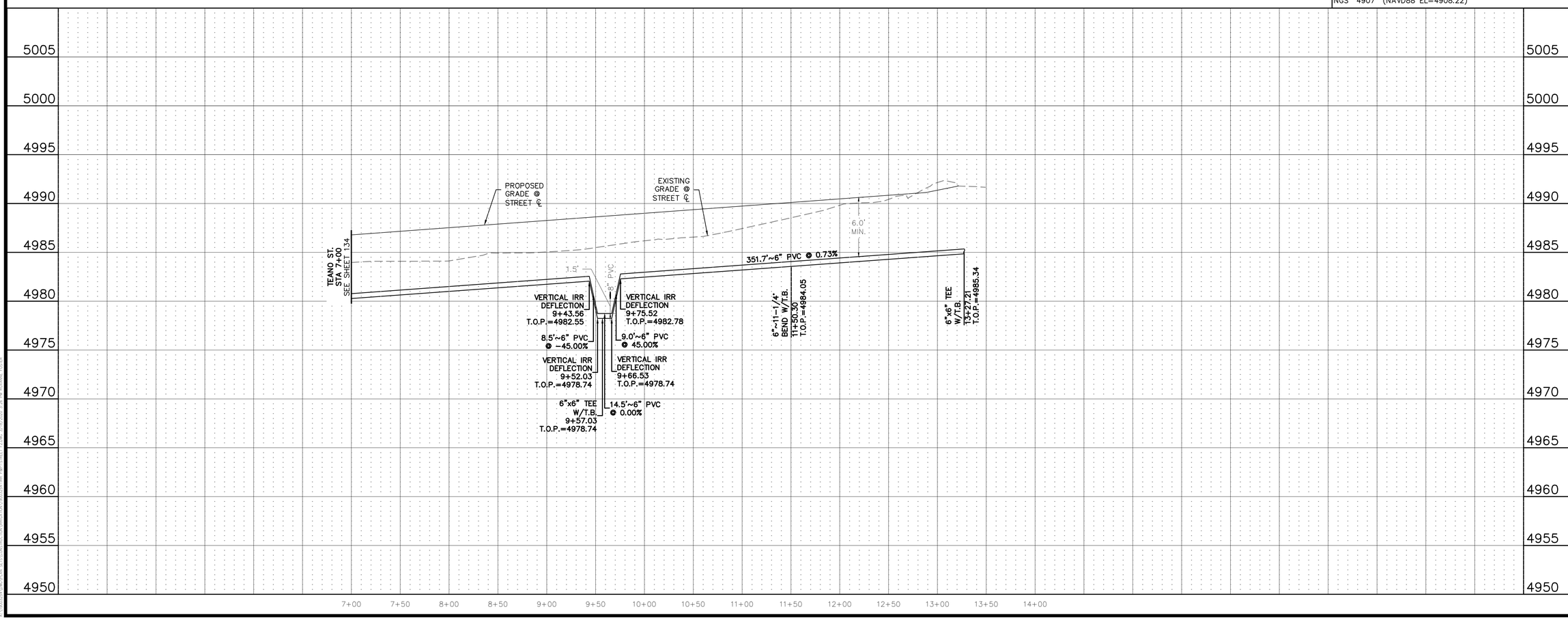
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

TEANO ST.



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
IRRIGATION PLAN & PROFILE
TEANO ST.

DATE
03/19/20

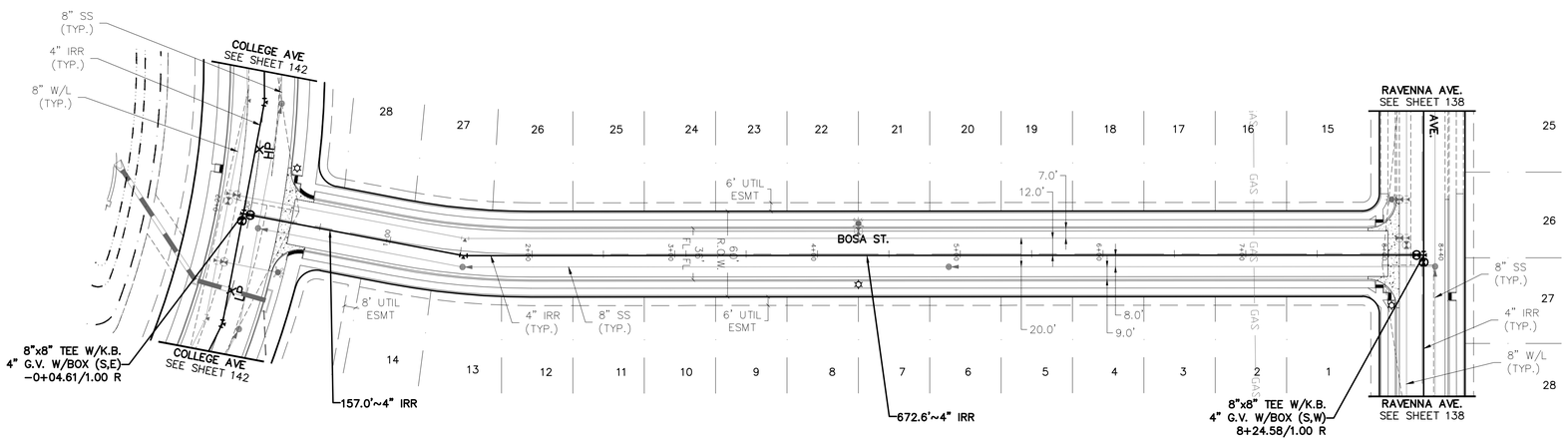
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

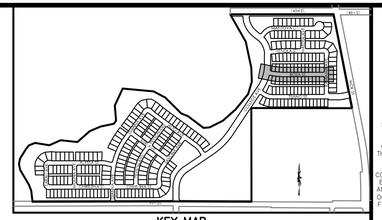
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

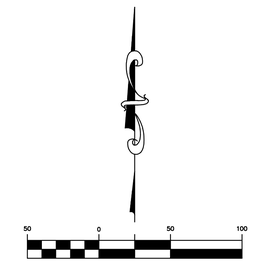
DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
135

CAD FILE: 19003254-IRR P&P-STREET F2.DWG





KEY MAP
N.T.S.



(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

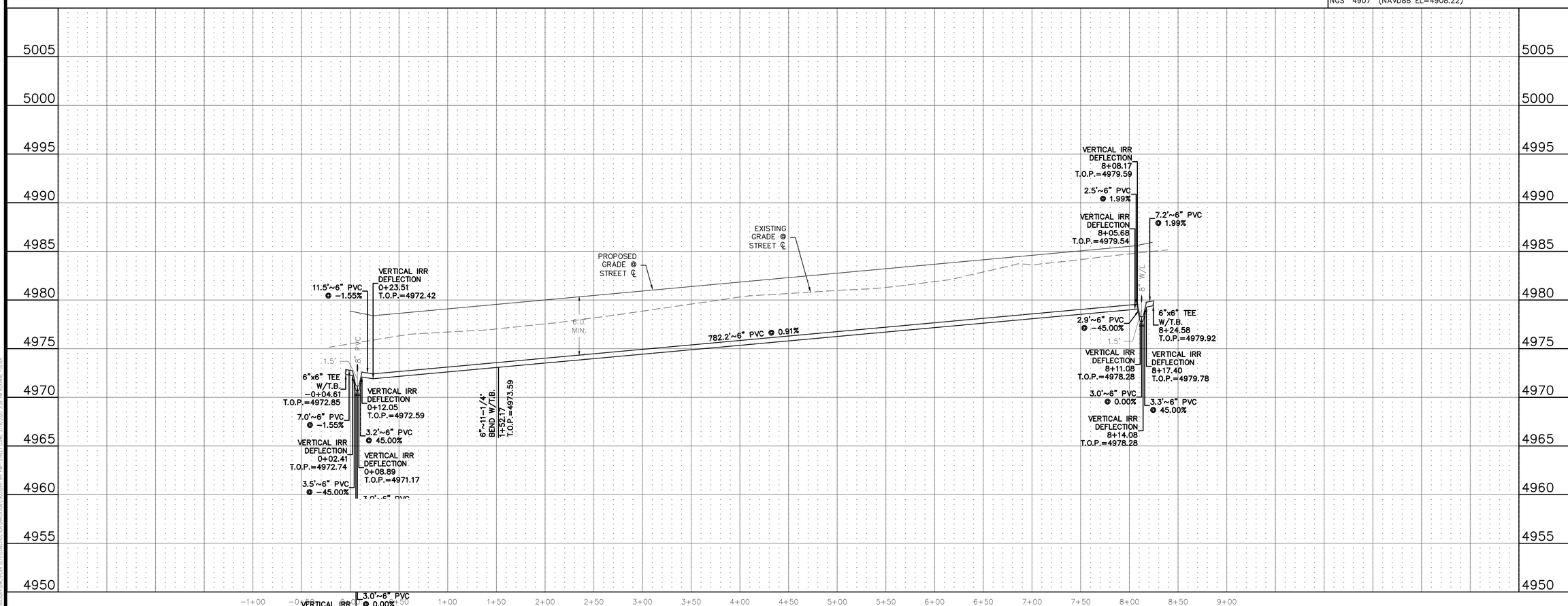
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

BOSA ST.



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
IRRIGATION PLAN & PROFILE
BOSA ST.

DATE
03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

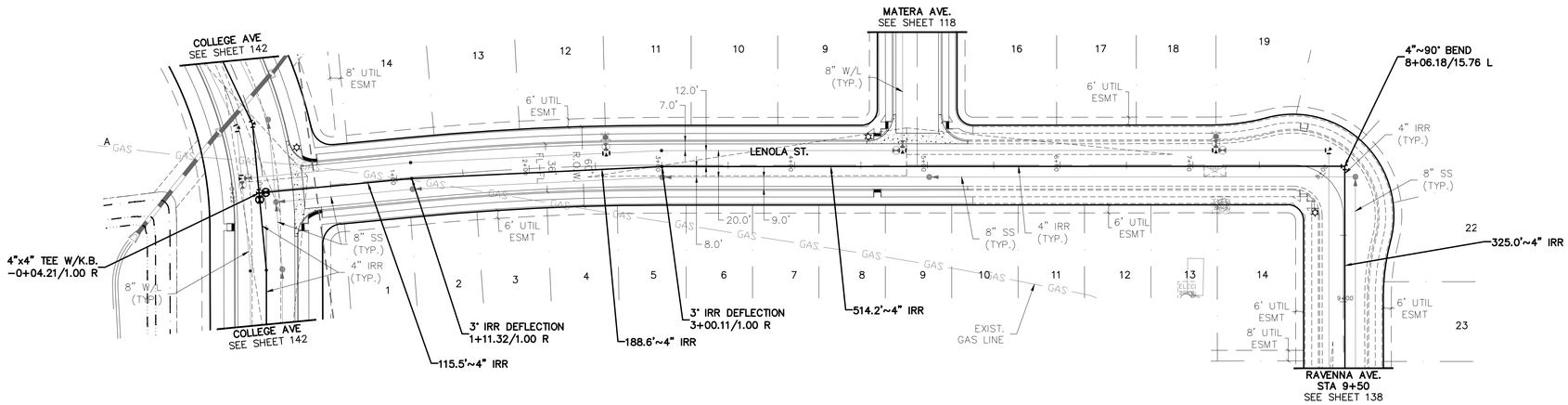
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

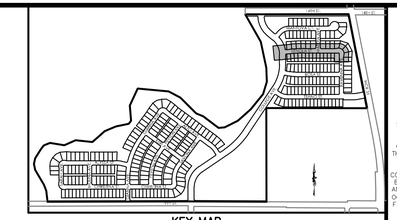
DR. RF | CH. MAM
P.M. MAM

JOB 19003254

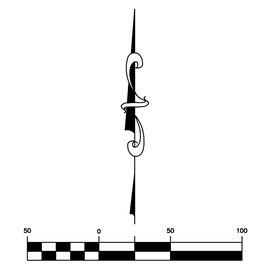
SHEET NO.
136

CAD FILE: 19003254-IRR P&P-STREET C.DWG





KEY MAP
N.T.S.



(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

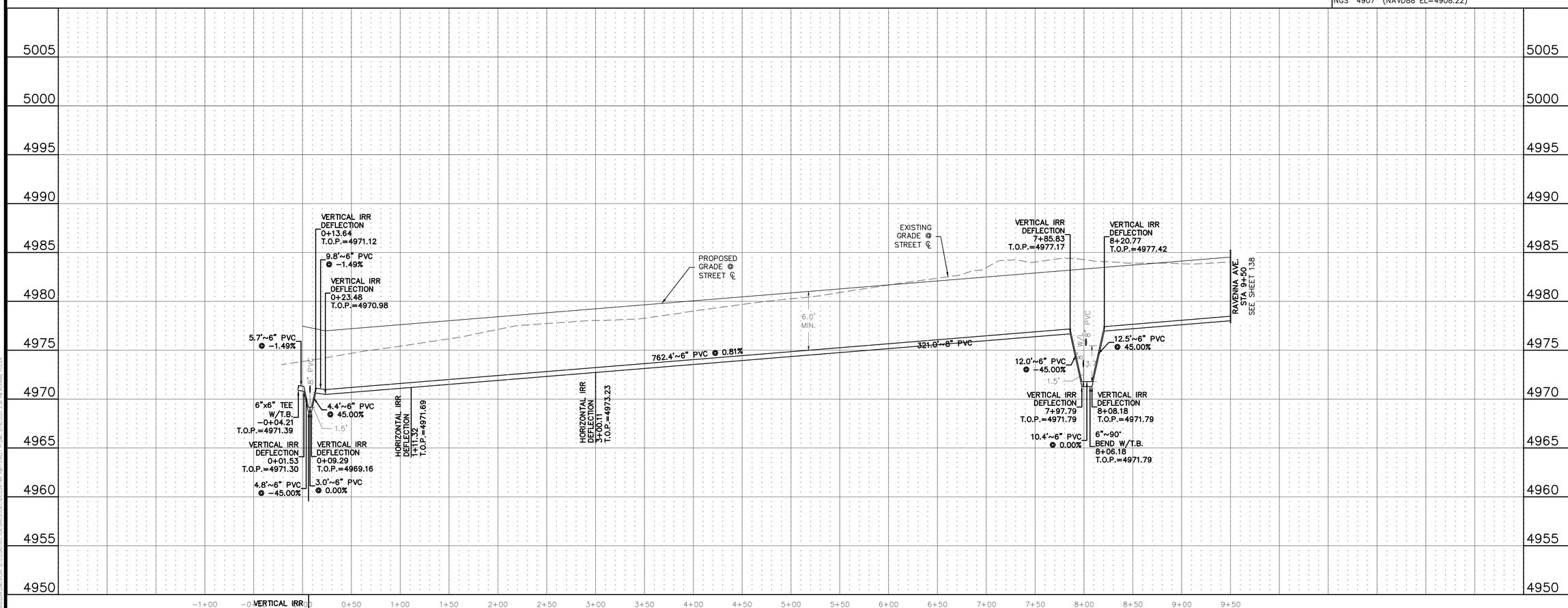
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

LENOLA ST.



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
IRRIGATION PLAN & PROFILE
LENOLA ST.

DATE
03/19/20

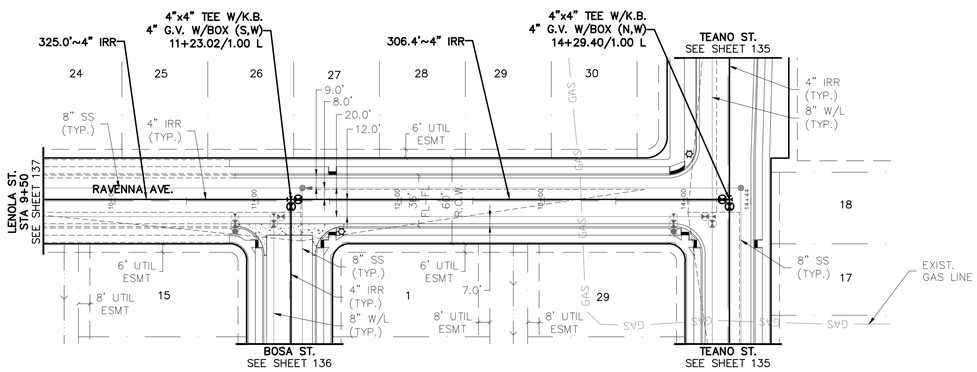
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

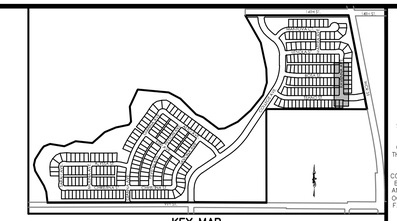
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 137

CAD FILE: 19003254-IRR P&P-STREET H1.DWG





KEY MAP
N.T.S.

(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

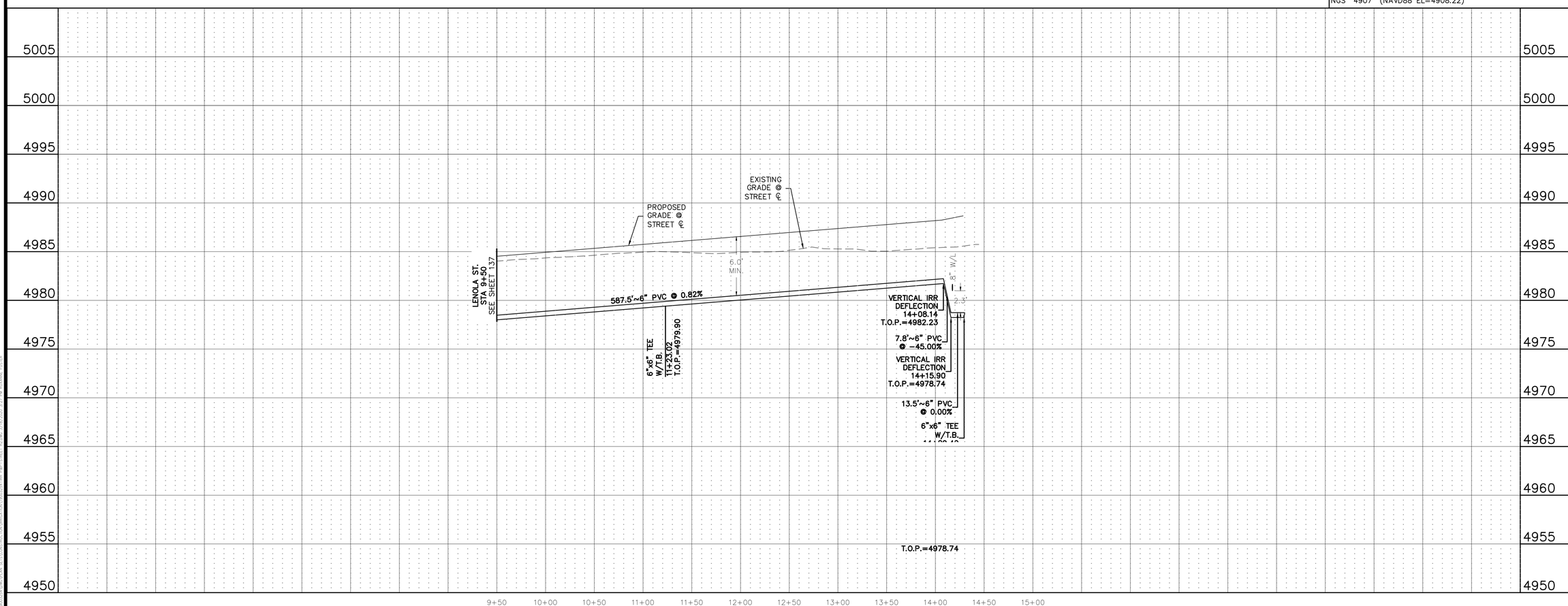
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

RAVENNA AVE.



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
IRRIGATION PLAN & PROFILE
RAVENNA AVE.

DATE
03/19/20

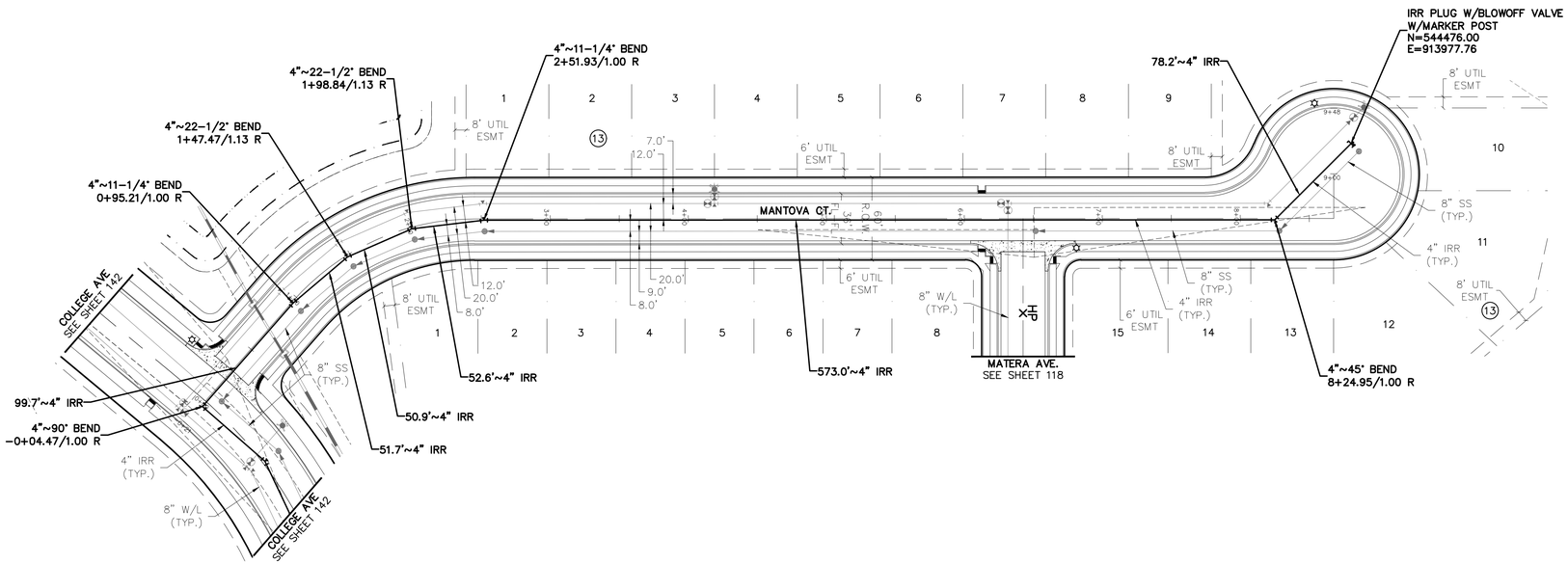
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

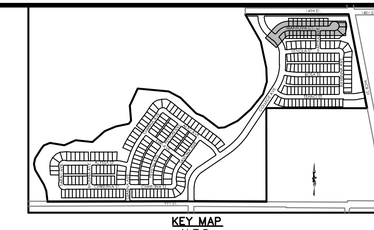
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
138

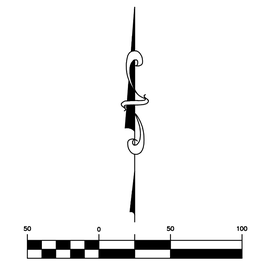
CAD FILE: 19003254-IRR P&P-STREET H2.DWG



MANTOVA CT.



KEY MAP
N.T.S.



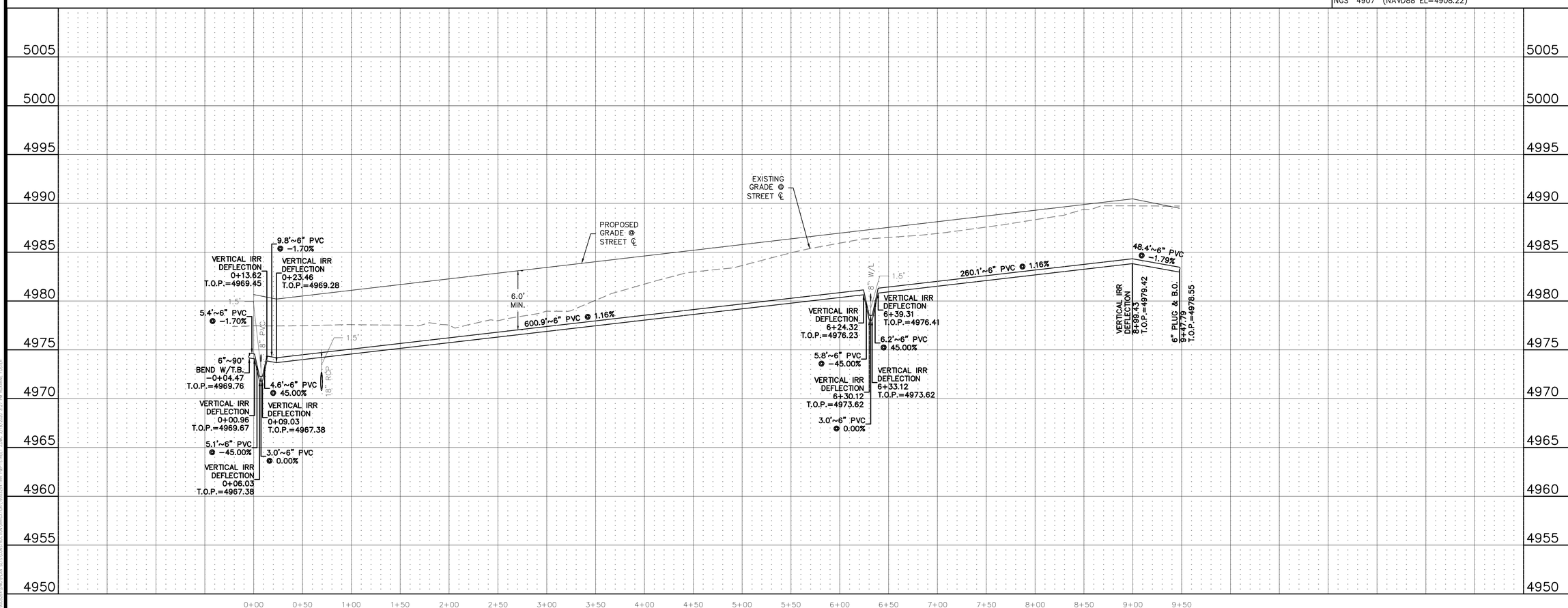
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
IRRIGATION PLAN & PROFILE
MANTOVA CT.

DATE 03/19/20

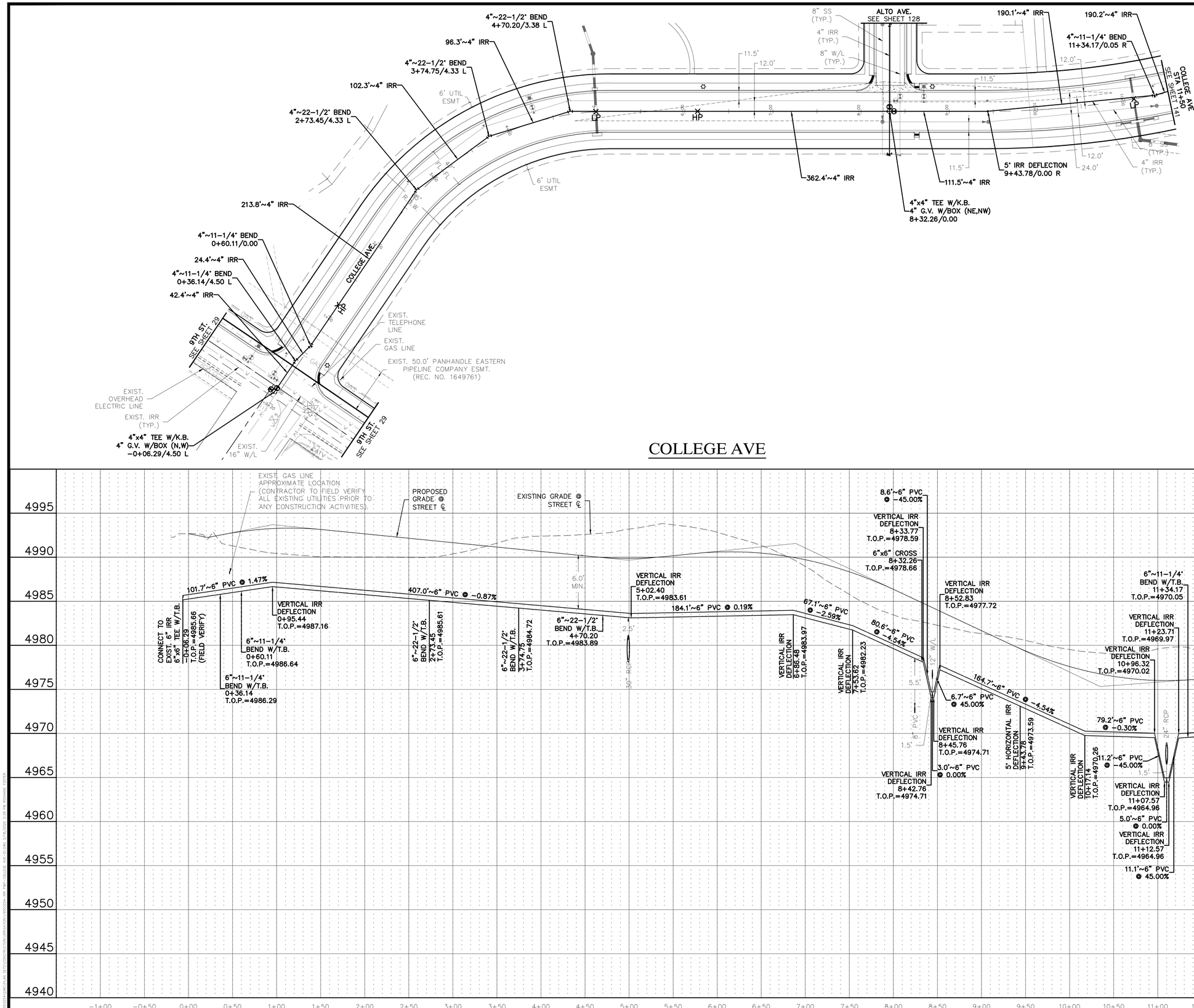
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

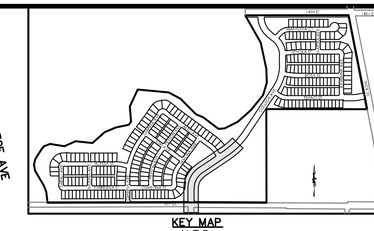
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

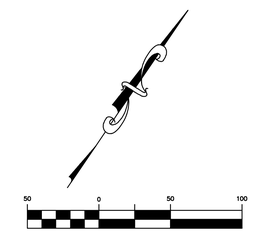
DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 139

CAD FILE: 19003254-IRR P&P-STREET 1.DWG





KEY MAP
N.T.S.



(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

COLLEGE AVE

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
IRRIGATION PLAN & PROFILE
COLLEGE AVE

DATE
03/19/20

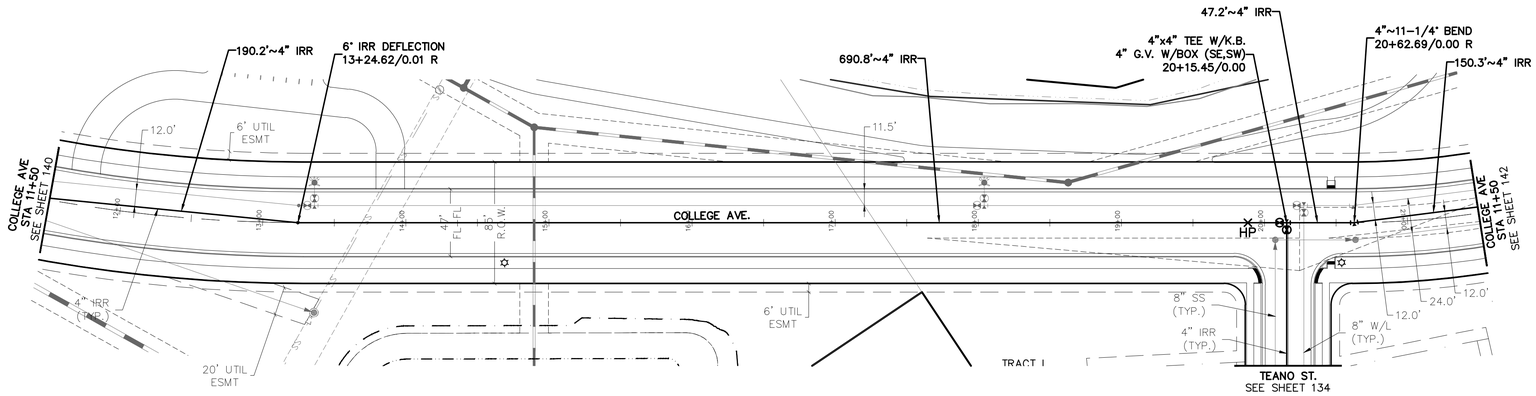
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

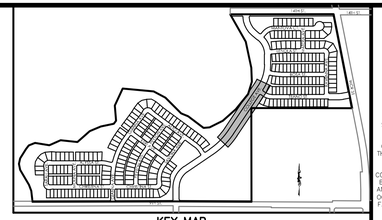
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

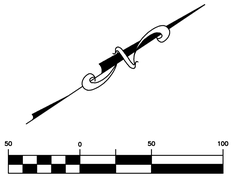
DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 140

CAD FILE: 19003254-IRR P&P-COLLEGE AVE-01.DWG





KEY MAP
N.T.S.



(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

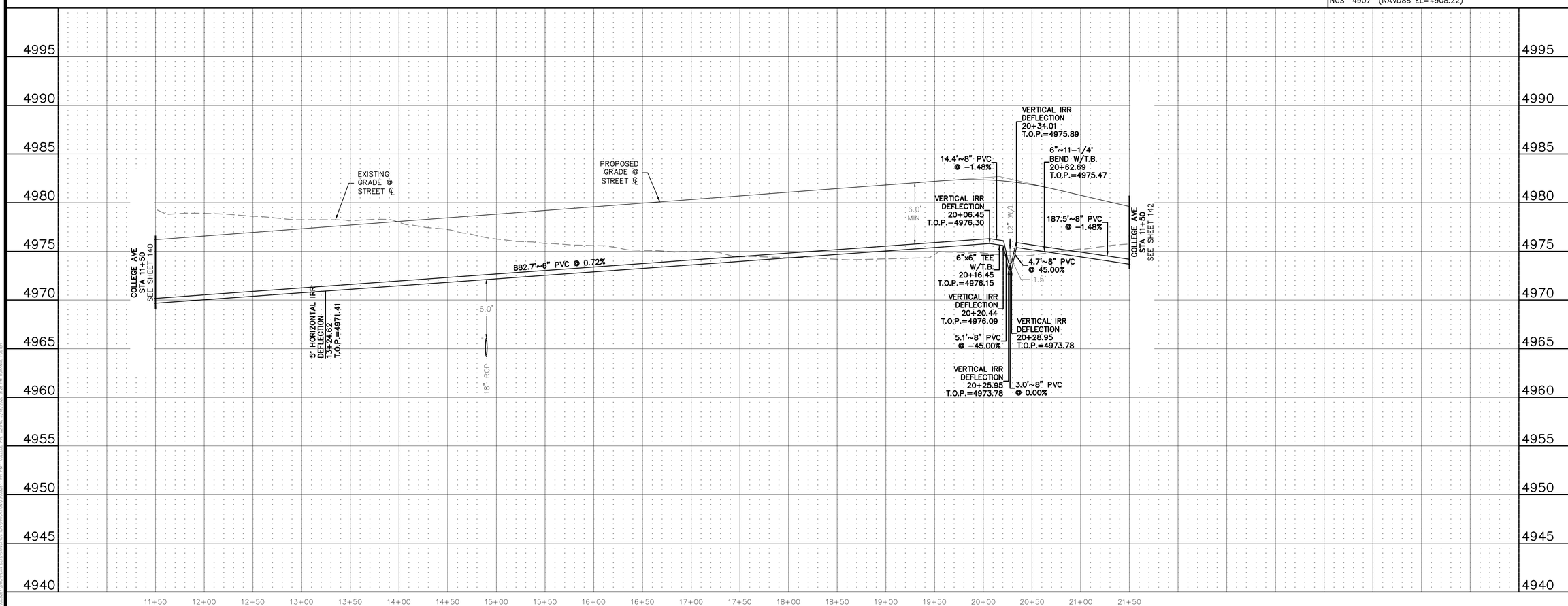
PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

COLLEGE AVE



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
IRRIGATION PLAN & PROFILE
COLLEGE AVE

DATE
03/19/20

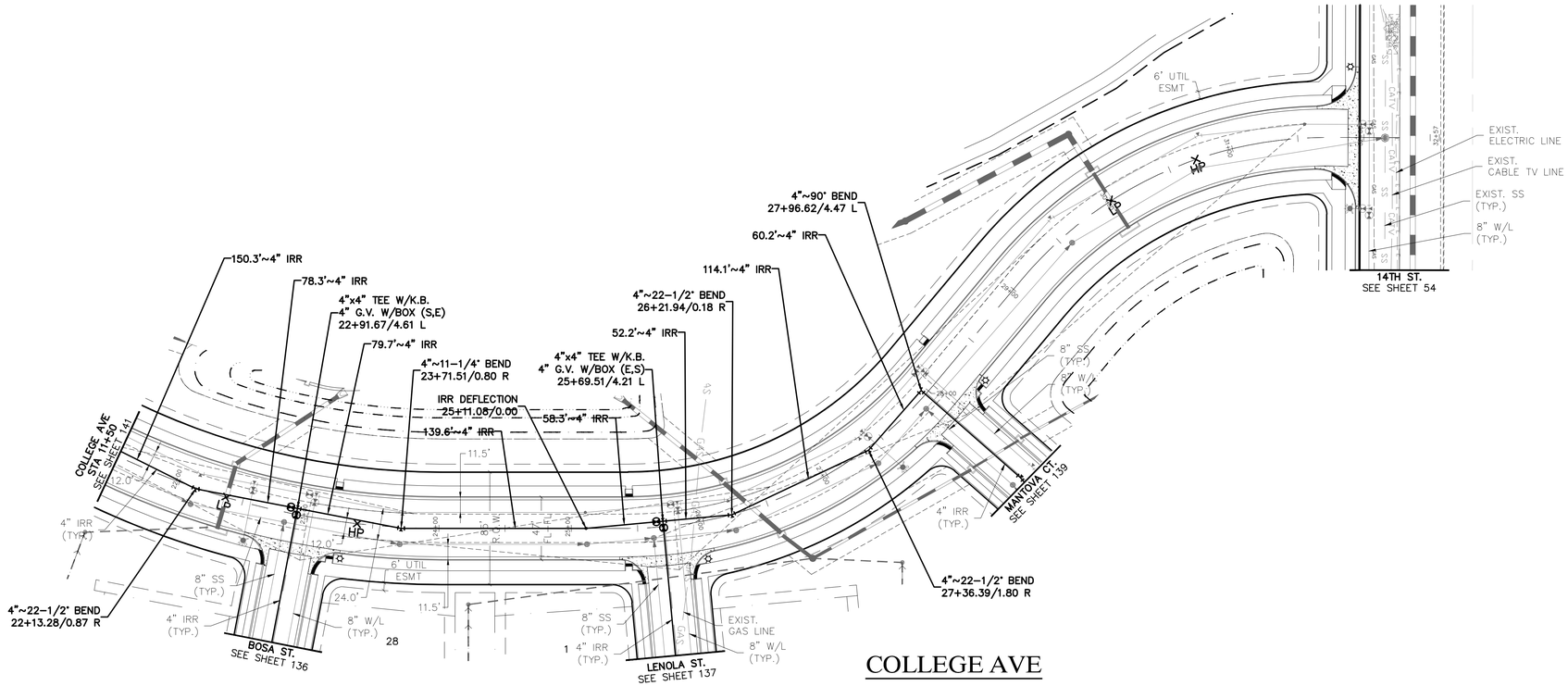
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

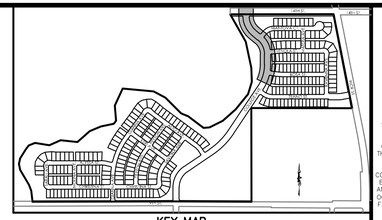
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 141

CAD FILE: 19003254-IRR P&P-COLLEGE AVE-02.DWG



COLLEGE AVE



KEY MAP
N.T.S.

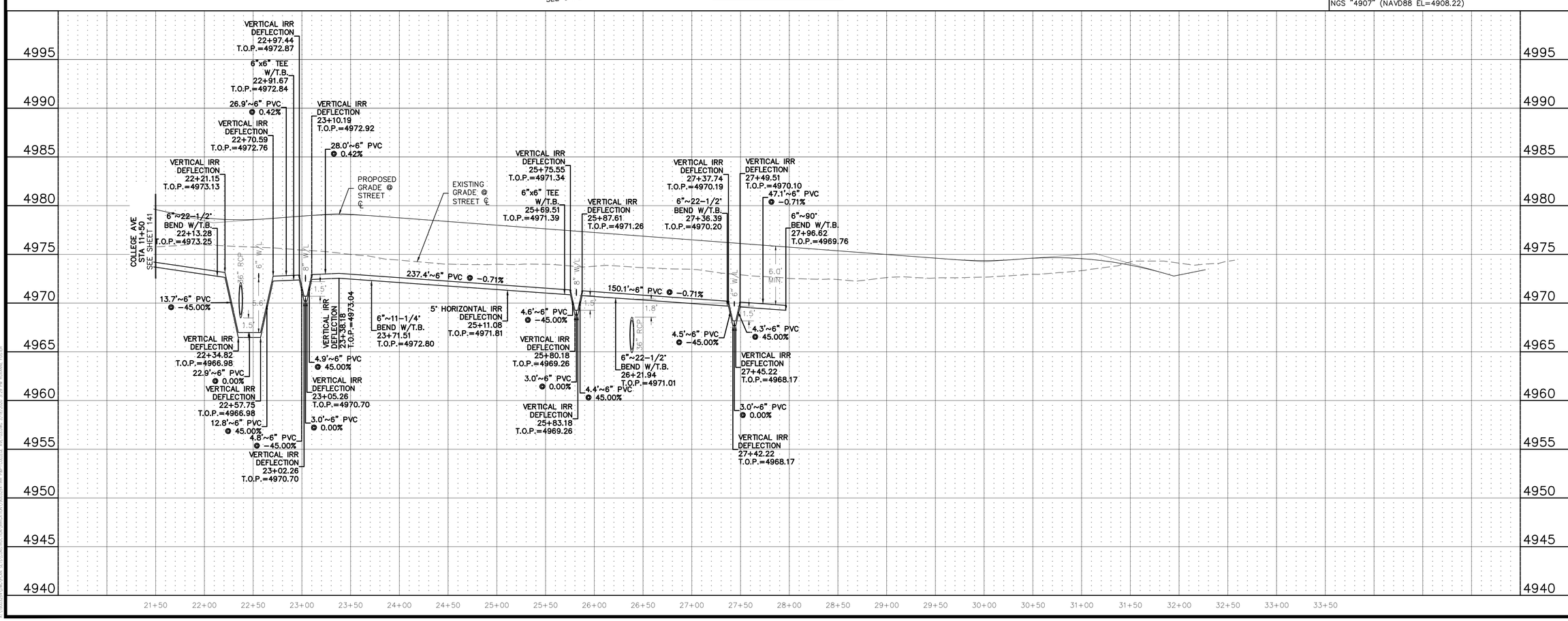
(IN FEET)
1 inch = 50 ft. (Horz)
1 inch = 5 ft. (Vert)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
IRRIGATION PLAN & PROFILE
COLLEGE AVE

DATE
03/19/20

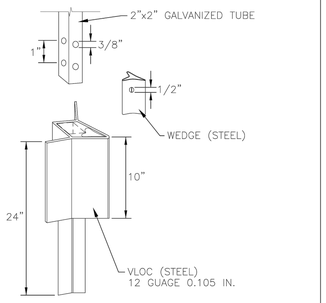
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

REVISIONS

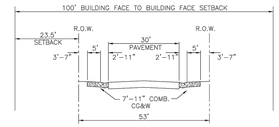
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 142

CAD FILE: 19003254-IRR P&P-COLLEGE AVE-03.DWG



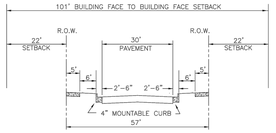
DESIGN STANDARDS	STANDARD DRAWING
TYPICAL SIGN POST ANCHOR DETAIL	T2
	DATE: 8/15/14



- PARKING ALLOWED ON BOTH SIDES OF STREET
- UTILIZED IN SINGLE FAMILY RESIDENTIAL AREAS

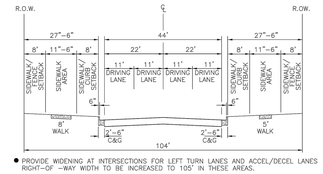
LOCAL W/ ATTACHED WALK

TO BE USED ONLY WITH WRITTEN PERMISSION FROM THE CITY ENGINEER



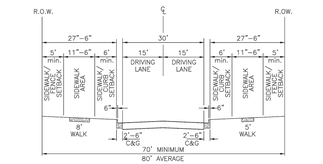
- PARKING ALLOWED ON BOTH SIDES OF STREET
- UTILIZED IN SINGLE FAMILY RESIDENTIAL AREAS

DESIGN STANDARDS	STANDARD DRAWING
LOCAL TYPICAL SECTION	R1
	DATE: 8/15/14



- PROVIDE WIDENING AT INTERSECTIONS FOR LEFT TURN LANES AND ACCEL/DECEL LANES RIGHT-OF-WAY WIDTH TO BE INCREASED TO 105' IN THESE AREAS.
- NO PARKING ALLOWED
- UTILIZED IN AREAS WHERE THERE IS LIMITED ACCESS AND PROJECTED TRAFFIC VOLUMES ARE GREATER THAN 10,000 VEHICLES PER DAY.

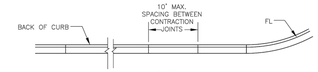
MAJOR COLLECTOR



- PARKING ALLOWED
- UTILIZED IN INDUSTRIAL, COMMERCIAL, MULTI-FAMILY, AND SINGLE-FAMILY RESIDENTIAL AREA'S WHERE ON-STREET PARKING IS REQUIRED.
- 80' AVERAGE RIGHT-OF-WAY (ROW) IS EXTENDED TO PROVIDE VARING FENCE ALIGNMENTS ALONG ROW LINE.

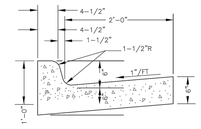
MINOR COLLECTOR

DESIGN STANDARDS	STANDARD DRAWING
MAJOR & MINOR COLLECTORS TYPICAL SECTION	R2
	DATE: 8/15/14

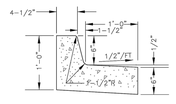


LAYOUT

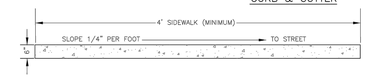
CONTRACTION JOINT



6" VERTICAL CURB & GUTTER

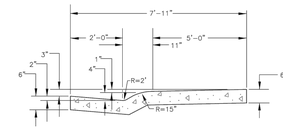


6" VERTICAL MEDIAN CURB & GUTTER

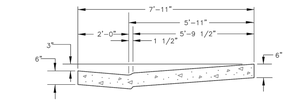


ATTACHED OR DETACHED WALK

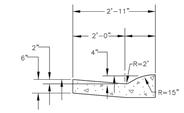
DESIGN STANDARDS	STANDARD DRAWING
VERTICAL CURB AND GUTTER	R7
	DATE: 8/15/14



COMBINATION CURB, GUTTER & WALK STANDARD SECTION

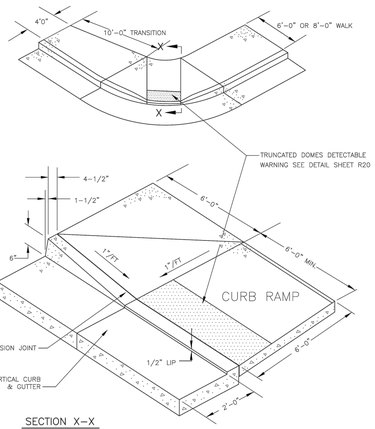


COMBINATION CURB, GUTTER & WALK DEPRESSED SECTION



4" MOUNTABLE CURB & GUTTER

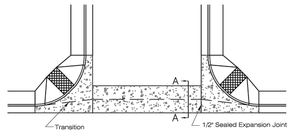
DESIGN STANDARDS	STANDARD DRAWING
COMBINATION CURB, GUTTER, AND WALK	R8
	DATE: 8/15/14

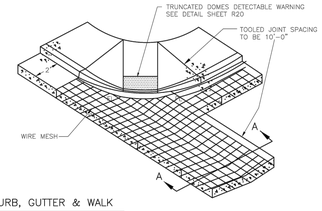


SECTION X–X

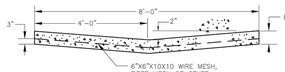
NOTE:
MIDBLOCK RAMP IS SAME AS ABOVE WITH 10 FOOT TRANSITIONS TO SIDEWALKS OF A DIFFERING DIMENSION OR A DETACHED WALK.

DESIGN STANDARDS	STANDARD DRAWING
CURB RAMP BARRIER CURB AND WALK	R10
	DATE: 8/15/14



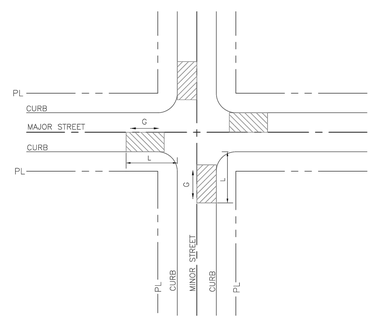


CURB, GUTTER & WALK



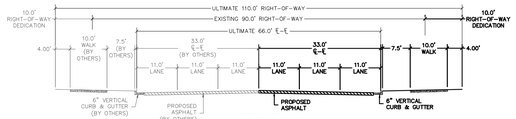
SECTION A–A

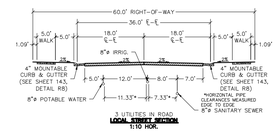
DESIGN STANDARDS	STANDARD DRAWING
SIDEWALK RAMP WITH CROSS PAN	R11
	DATE: 3/15/17

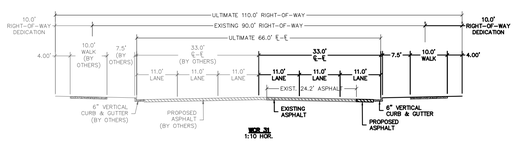


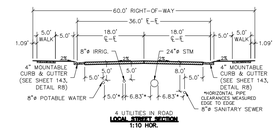
MINOR STREET \ MAJOR STREET		LOCAL	MINOR COLLECTOR	MAJOR COLLECTOR	MINOR ARTERIAL	MAJOR ARTERIAL
LOCAL	L	95'	100'	100'	125'	125'
	G	4%	4%	4%	4%	4%
MINOR COLLECTOR	L	--	100'	120'	150'	150'
	G	--	4%	3%	3%	3%
MAJOR COLLECTOR	L	--	--	120'	150'	200'
	G	--	--	3%	3%	3%
MINOR ARTERIAL	L	--	--	--	200'	200'
	G	--	--	--	2%	2%
MAJOR ARTERIAL	L	--	--	--	--	200'
	G	--	--	--	--	2%

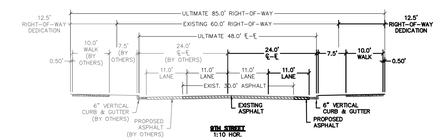
DESIGN STANDARDS	STANDARD DRAWING
MAXIMUM PERMISSIBLE INTERSECTION GRADE	R19
	DATE: 8/15/14

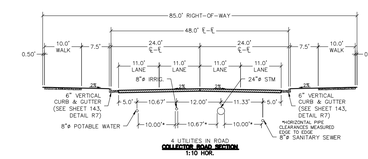












PROJECT NO.: LUP2019–0033 &
PLAN NO.: PPL2019–0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
DETAILS
STREET DETAILS

DATE 03/19/20

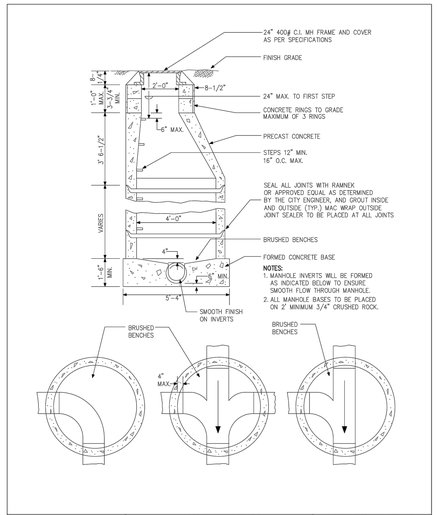
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

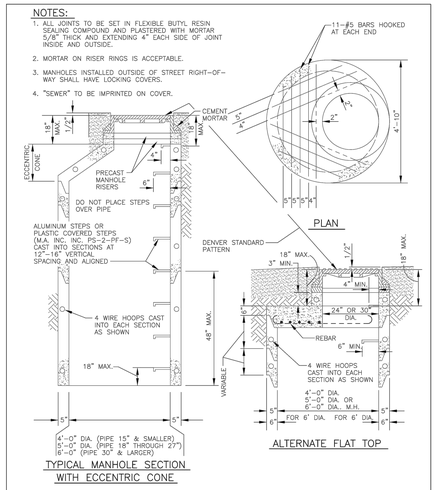
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 143

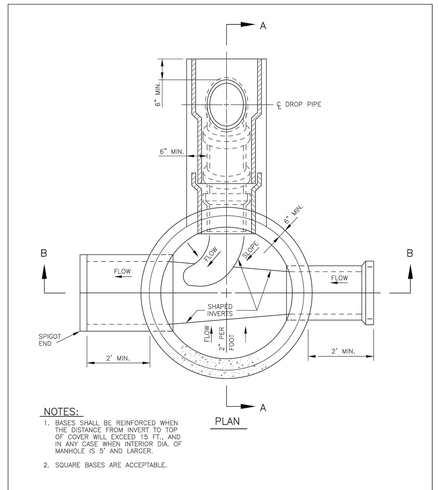
CAD FILE: 19003254-STREET DETAILS.DWG



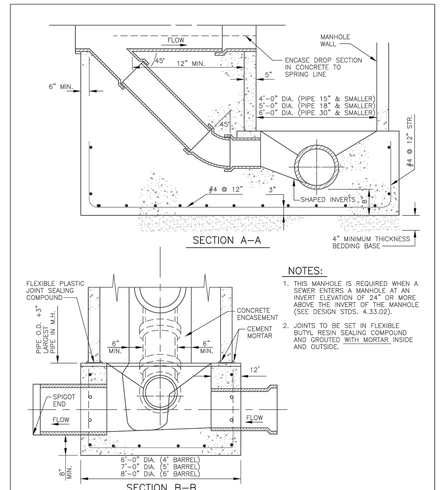
DESIGN STANDARDS	STANDARD DRAWING
SANITARY SEWER STANDARD MANHOLE	SS1
	DATE: 8/15/14



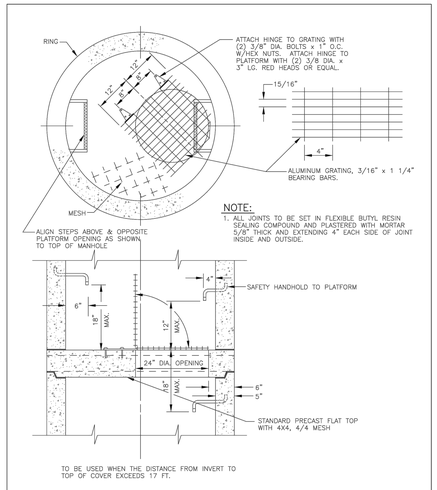
DESIGN STANDARDS	STANDARD DRAWING
MANHOLE BARRELS AND ALTERNATE TOPS	SS2
	DATE: 8/15/14



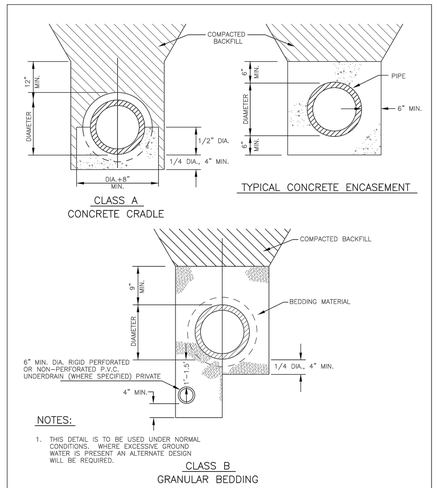
DESIGN STANDARDS	STANDARD DRAWING
MONOLITHIC BASES FOR DROP MANHOLE	SS3
	DATE: 8/15/14



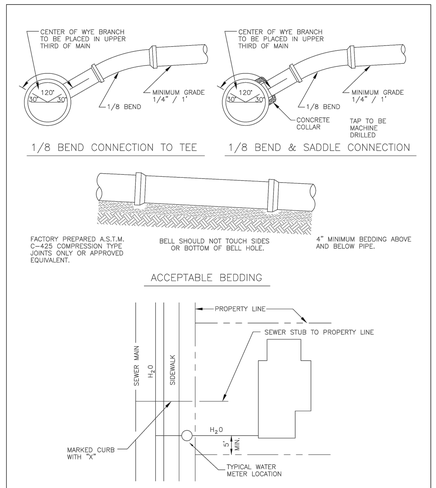
DESIGN STANDARDS	STANDARD DRAWING
DROP MANHOLE DETAIL	SS4
	DATE: 8/15/14



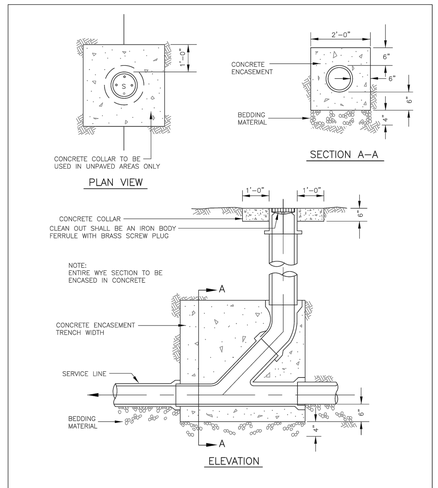
DESIGN STANDARDS	STANDARD DRAWING
INTERMEDIATE PLATFORM FOR MANHOLES 17' IN DEPTH	SS5
	DATE: 8/15/14



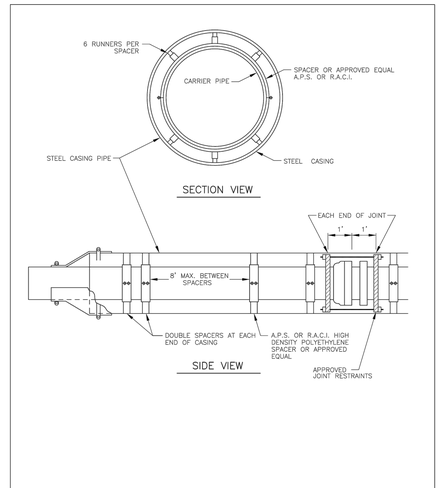
DESIGN STANDARDS	STANDARD DRAWING
TYPICAL PIPE BEDDING	SS6
	DATE: 8/15/14



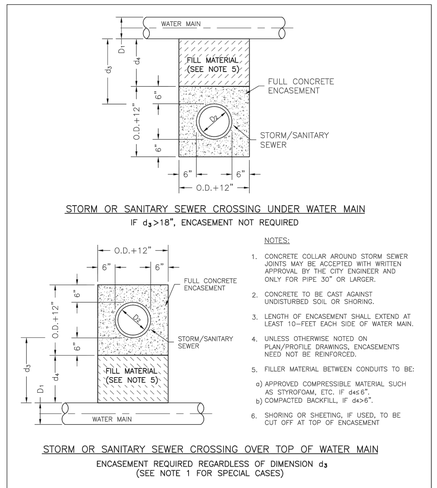
DESIGN STANDARDS	STANDARD DRAWING
TYPICAL HOUSE SERVICE LOCATION	SS7
	DATE: 8/15/14



DESIGN STANDARDS	STANDARD DRAWING
STANDARD CLEAN-OUT DETAIL	SS8
	DATE: 8/15/14



DESIGN STANDARDS	STANDARD DRAWING
JACKING DETAIL	SS9
	DATE: 8/15/14



DESIGN STANDARDS	STANDARD DRAWING
ENCASEMENT FOR CONDUIT CROSSING	SS11
	DATE: 8/15/14

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
DETAILS
SANITARY DETAILS

DATE 03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 - MAM

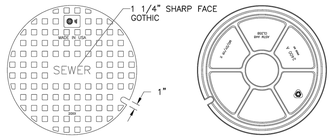
REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

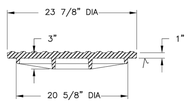
DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 144

CAD FILE: 19003254-SANITARY DETAILS.DWG

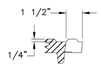
2400A Cover



COVER BACK



SECTION



PICKSLOT DETAIL

Product Number
00340023
Design Features
-Materials
Gray Iron (CL30B)
-Design Load
Heavy Duty
-Coating
Undipped
- - - Designates Machined Surface

Certification
- ASTM A48
-Country of Origin USA

	DESIGN STANDARDS	STANDARD DRAWING
CITY OF Fort Lupton EST. 1888 COME PAINT YOUR FUTURE WITH US	SANITARY SEWER MANHOLE LID	SS12
		DATE: 5/04/2017

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's **below.** **Call** before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
DETAILS
SANITARY DETAILS

DATE 03/19/20

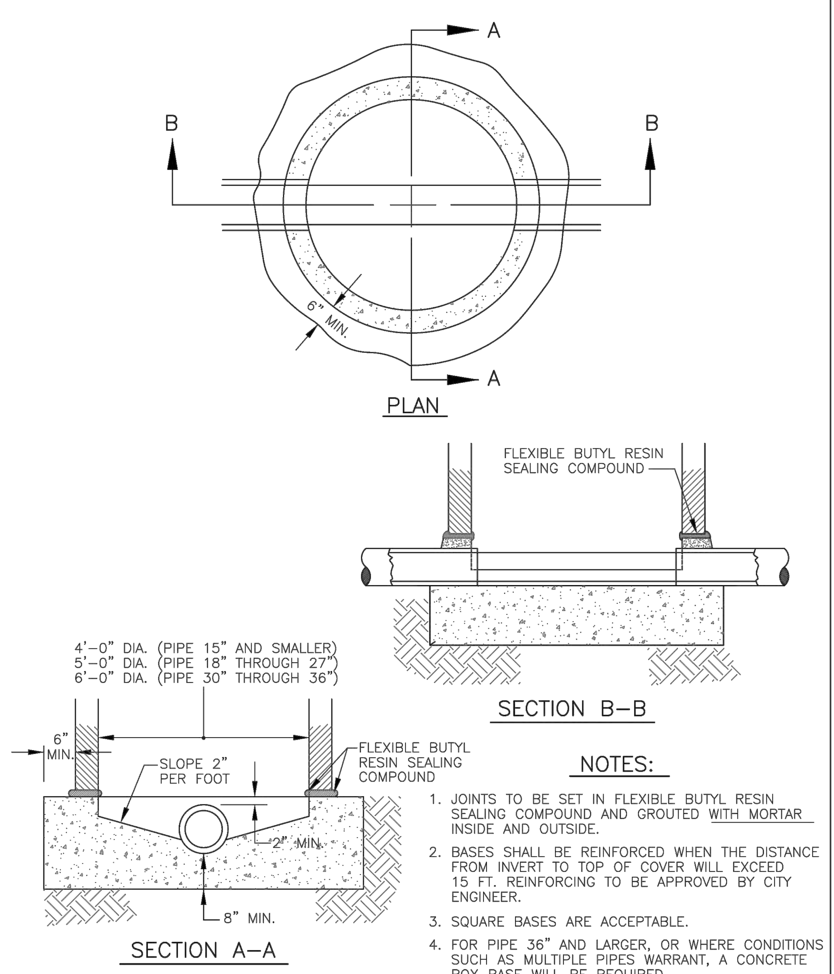
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 145

CAD FILE: 19003254-SANITARY DETAILS.DWG



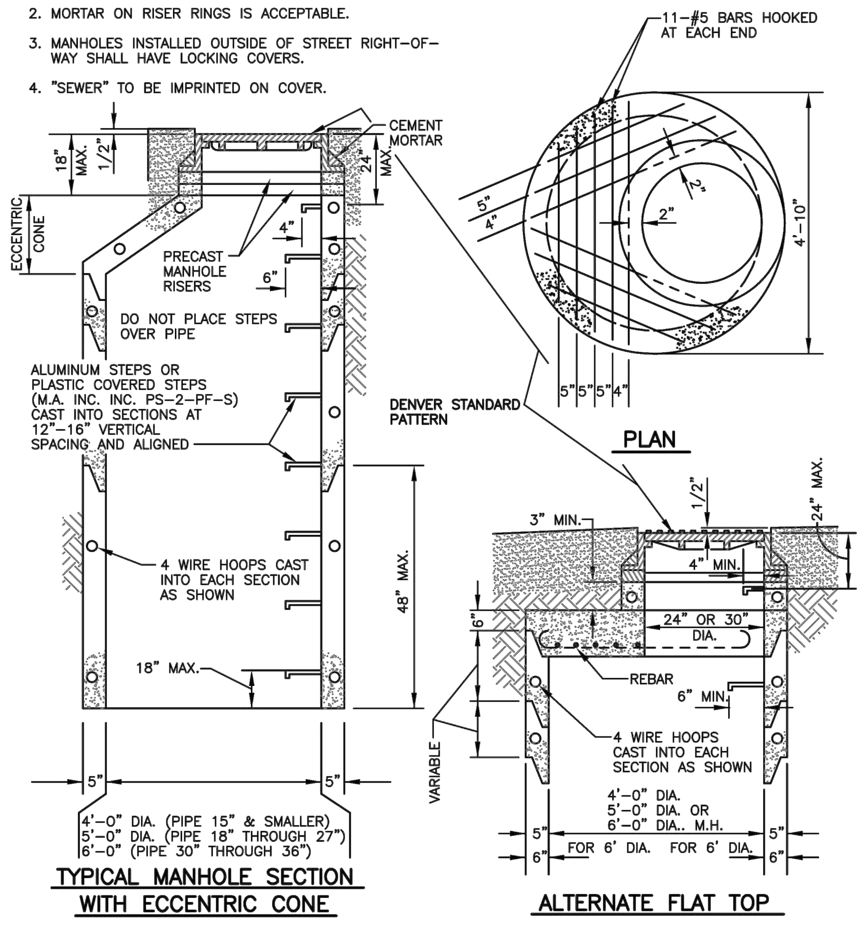
NOTES:

1. JOINTS TO BE SET IN FLEXIBLE BUTYL RESIN SEALING COMPOUND AND GROUTED WITH MORTAR INSIDE AND OUTSIDE.
2. BASES SHALL BE REINFORCED WHEN THE DISTANCE FROM INVERT TO TOP OF COVER WILL EXCEED 15 FT. REINFORCING TO BE APPROVED BY CITY ENGINEER.
3. SQUARE BASES ARE ACCEPTABLE.
4. FOR PIPE 36" AND LARGER, OR WHERE CONDITIONS SUCH AS MULTIPLE PIPES WARRANT, A CONCRETE BOX BASE WILL BE REQUIRED. (SEE CDOT STANDARD DRAWING M–604–20)

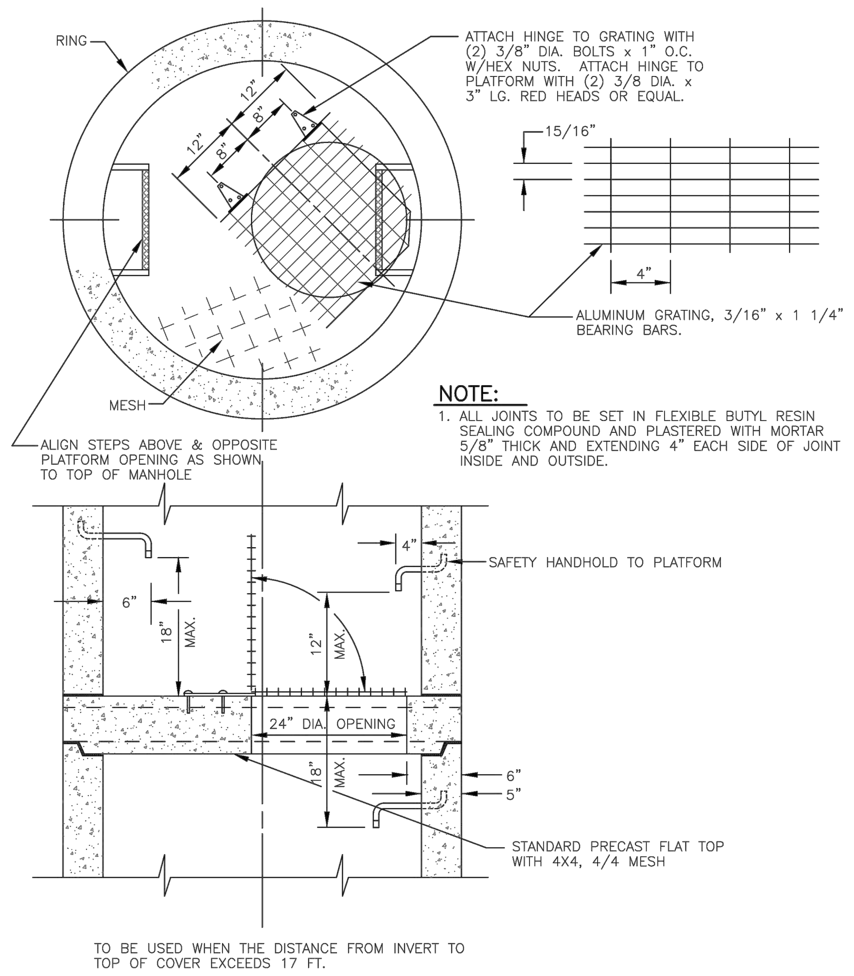
CITY OF Fort Lupton EST 1836 COME PAINT YOUR FUTURE WITH US	DESIGN STANDARDS	STANDARD DRAWING
	STANDARD MANHOLE BASE	ST1
		DATE: 8/15/14

NOTES:

1. ALL JOINTS TO BE SET IN FLEXIBLE BUTYL RESIN SEALING COMPOUND AND PLASTERED WITH MORTAR 5/8" THICK AND EXTENDING 4" EACH SIDE OF JOINT INSIDE AND OUTSIDE.
2. MORTAR ON RISER RINGS IS ACCEPTABLE.
3. MANHOLES INSTALLED OUTSIDE OF STREET RIGHT–OF–WAY SHALL HAVE LOCKING COVERS.
4. "SEWER" TO BE IMPRINTED ON COVER.
5. FOR PIPE 36" AND LARGER, OR WHERE CONDITIONS SUCH AS MULTIPLE PIPES WARRANT, A CONCRETE BOX BASE WILL BE REQUIRED. (SEE CDOT STANDARD DRAWING M–604–20)



CITY OF Fort Lupton EST 1836 COME PAINT YOUR FUTURE WITH US	DESIGN STANDARDS	STANDARD DRAWING
	MANHOLE BARRELS AND ALTERNATE TOPS	ST2
		DATE: 8/15/14

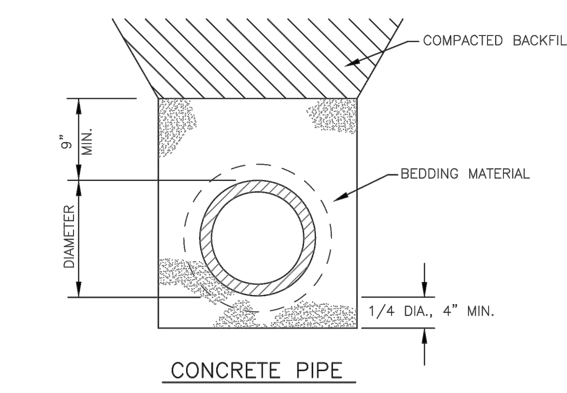


NOTE:

1. ALL JOINTS TO BE SET IN FLEXIBLE BUTYL RESIN SEALING COMPOUND AND PLASTERED WITH MORTAR 5/8" THICK AND EXTENDING 4" EACH SIDE OF JOINT INSIDE AND OUTSIDE.

TO BE USED WHEN THE DISTANCE FROM INVERT TO TOP OF COVER EXCEEDS 17 FT.

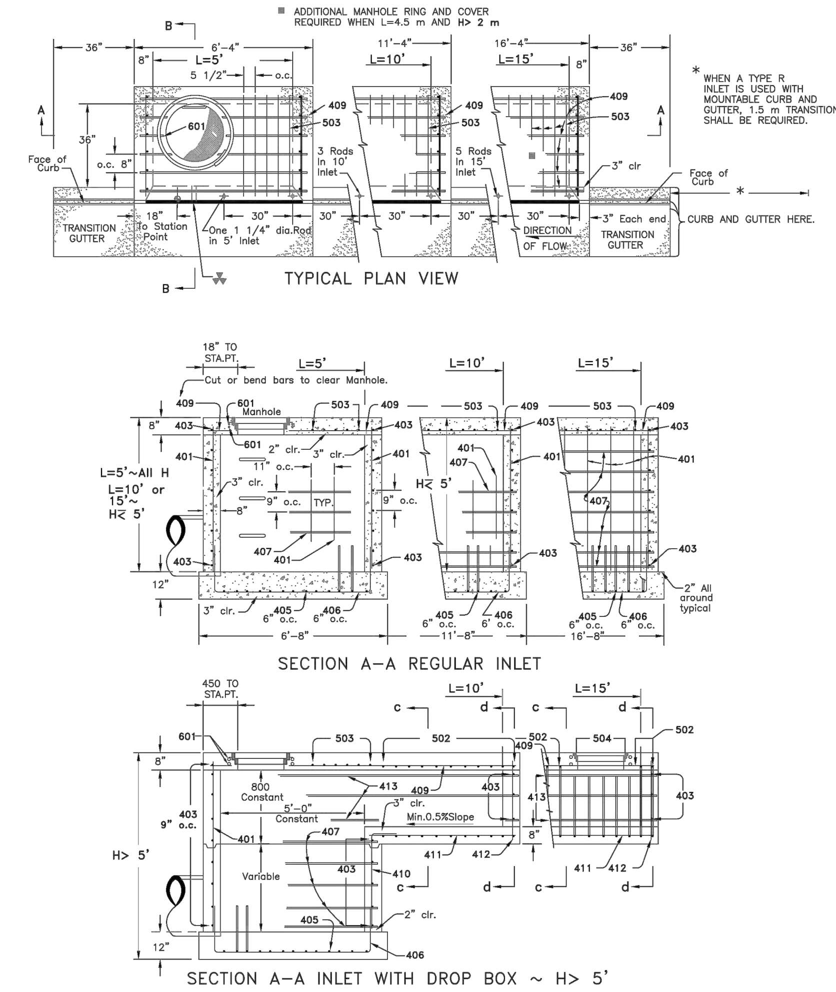
CITY OF Fort Lupton EST 1836 COME PAINT YOUR FUTURE WITH US	DESIGN STANDARDS	STANDARD DRAWING
	INTERMEDIATE PLATFORM FOR MANHOLES	ST3
		DATE: 8/15/14



NOTES:

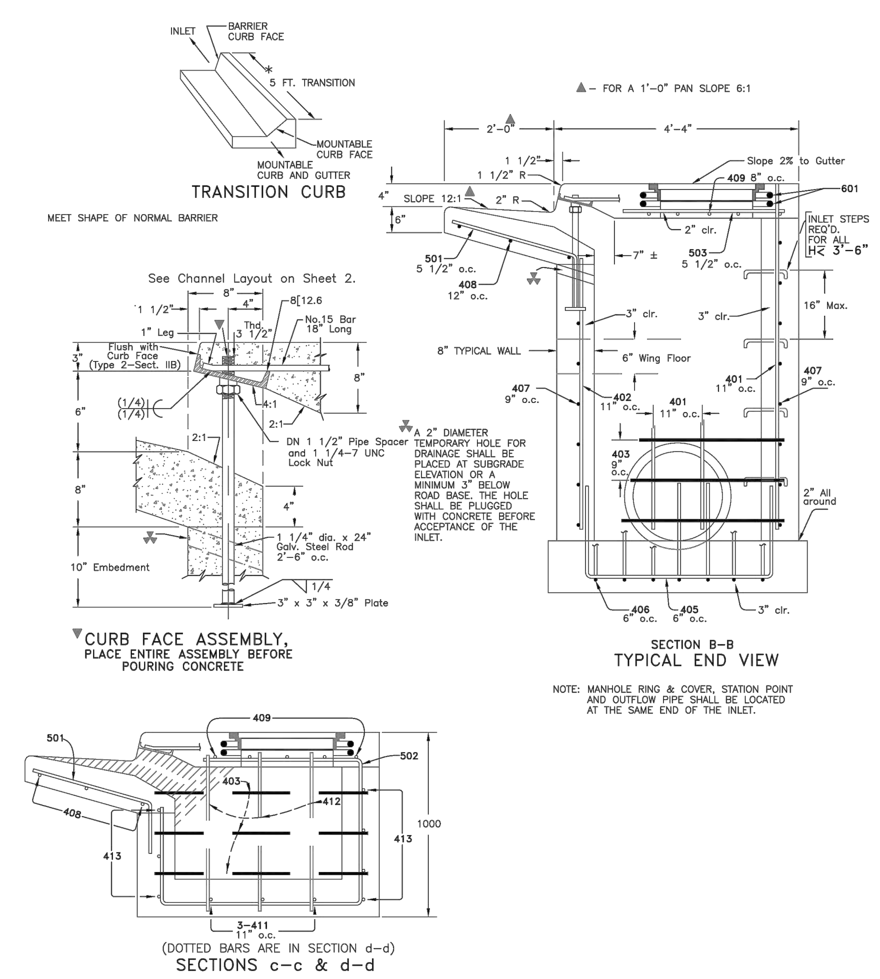
1. THIS DETAIL IS TO BE USED UNDER NORMAL CONDITIONS. WHERE EXCESSIVE GROUND WATER IS PRESENT AN ALTERNATE DESIGN WILL BE REQUIRED.

CITY OF Fort Lupton EST 1836 COME PAINT YOUR FUTURE WITH US	DESIGN STANDARDS	STANDARD DRAWING
	TYPICAL PIPE BEDDING	ST4
		DATE: 8/15/14



(1 OF 4)

CITY OF Fort Lupton EST 1836 COME PAINT YOUR FUTURE WITH US	DESIGN STANDARDS	STANDARD DRAWING
	CURB INLET TYPE R	ST5
		DATE: 8/15/14



(2 OF 4)

CITY OF Fort Lupton EST 1836 COME PAINT YOUR FUTURE WITH US	DESIGN STANDARDS	STANDARD DRAWING
	CURB INLET TYPE R	ST6
		DATE: 8/15/14

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

MARK	DIA (in)	O.C. SPACING (in)	TYPE	ALL INLETS L= → 5' NO. REQ'D.	LENGTH (ft–in)	INLETS, H ≤ 5' 10' NO. REQ'D.	LENGTH (ft–in)	15' NO. REQ'D.	LENGTH (ft–in)	INLETS, H ≥ 5' 10' NO. REQ'D.	LENGTH (ft–in)	15' NO. REQ'D.	LENGTH (ft–in)
401	1/2"	11"	II	15	*	21	*	26	*	11	*	11	*
402	1/2"	11"	II	7	*	13	*	18	*	7	*	7	*
403	1/2"	9"	II	*	4'–0"	*	4'–0"	*	4'–0"	*	4'–0"	*	4'–0"
405	1/2"	6"	VI	11	6'–10"	21	6'–10"	31	6'–10"	11	6'–10"	11	6'–10"
406	1/2"	6"	VIII	7	8'–10"	7	13'–10"	7	18'–10"	7	8'–10"	7	8'–10"
407	1/2"	9"	II	*	5'–10"	*	10'–10"	*	15'–10"	*	5'–10"	*	5'–10"
408	1/2"	12"	II	3	6'–0"	3	11'–0"	3	16'–0"	3	11'–0"	3	16'–0"
409	1/2"	8"	II	6	5'–10"	6	10'–10"	6	15'–10"	6	10'–10"	6	15'–10"
410	1/2"	11"	VI							3	*	3	*
411	1/2"	11"	II							3	5'–2"	3	10'–2"
412	1/2"	11"	II							3	2'–9"	3	2'–9"
413	1/2"	9"	II							7	10'–10"	7	15'–10"
501	5/8"	5 1/2"	IV	11	3'–4"	22	3'–4"	33	3'–4"	22	3'–4"	33	3'–4"
502	5/8"	5 1/2"	III							11	11'–5"	17	11'–5"
503	5/8"	5 1/2"	II	5	3'–6"	16	3'–6"	27	3'–6"	6	3'–6"	6	3'–6"
504	5/8"	5 1/2"	IX									5	8'–4"
601	3/4"	2 1/2"	V	2	8'–10"	2	8'–10"	2	8'–10"	2	8'–10"	4	8'–10"
Ø8[8.5				1	5'–10"	1	10'–10"	1	15'–10"	1	10'–10"	1	15'–10"
▼				2 BARS, 1 ROD	———	4 BARS, 3 RODS	———	8 BARS, 5 RODS	———	4 BARS, 3 RODS	———	8 BARS, 5 RODS	———

(10' and 15' columns under INLETS, H ≤ 5': REGULAR INLETS; under INLETS, H ≥ 5': DROP BOX INLETS)

* VARIABLE, REFER TO TABLE TWO.

Ø INCLUDE 18" NO. 4 BARS (SEE CHANNEL LAYOUT DETAIL).

▼ SEE CURB FACE ASSEMBLY ON SHEET 2 AND AND CHANNEL LAYOUT DETAILS ON SHEET 4.

TABLE TWO ~ BARS AND QUANTITIES VARIABLE WITH "H"

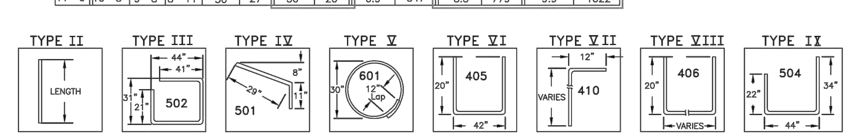
"H" (ft–in)	LENGTH (ft–in) 401	402	410	NO. REQ'D. REGULAR 403	407	NO. REQ'D. DROP BOX 403	407	L= 5' CONC. CU.YD.	STEEL LBS.	L= 10' CONC. CU.YD.	STEEL LBS.	L= 15' CONC. CU.YD.	STEEL LBS.
3'–0"	2'–8"	1'–8"		10	7			3.2	285	5.3	497	7.4	706
3'–6"	3'–2"	2'–2"		10	7			3.4	305	5.7	528	7.9	747
4'–0"	3'–8"	2'–8"		12	9			3.7	326	6.0	559	8.4	786
4'–6"	4'–2"	3'–2"		12	9			3.9	334	6.4	571	8.8	803
5'–0"	4'–8"	3'–8"		14	11			4.1	354	6.7	602	9.3	844
5'–6"	5'–2"	4'–2"	3'–5"	16	13	15	6	4.4	375	6.0	607	7.4	850
6'–0"	5'–8"	4'–8"	3'–11"	16	13	16	6	4.6	382	6.2	616	7.6	860
6'–6"	6'–2"	5'–2"	4'–5"	18	15	18	8	4.8	402	6.4	637	7.8	880
7'–0"	6'–8"	5'–8"	4'–11"	20	17	19	10	5.0	423	6.6	654	8.0	897
7'–6"	7'–2"	6'–2"	5'–5"	20	17	20	10	5.3	430	6.9	664	8.3	907
8'–0"	7'–8"	6'–8"	5'–11"	22	19	22	12	5.5	451	7.1	684	8.5	927
8'–6"	8'–2"	7'–2"	6'–5"	24	21	23	14	5.7	471	7.3	702	8.7	944
9'–0"	8'–8"	7'–8"	6'–11"	24	21	24	14	6.0	479	7.6	711	9.0	954
9'–6"	9'–2"	8'–2"	7'–5"	26	23	26	16	6.2	499	7.8	732	9.2	974
10'–0"	9'–8"	8'–8"	7'–11"	28	25	27	18	6.4	520	8.0	749	9.4	992
10'–6"	10'–2"	9'–2"	8'–5"	28	25	28	18	6.7	527	8.3	759	9.7	1001
11'–0"	10'–8"	9'–8"	8'–11"	30	27	30	20	6.9	547	8.5	779	9.9	1022

NOTE: FOR L= 5', L= 10' AND L= 15'

REGULAR INLETS: TOTAL QUANTITIES NEEDED ARE OUTSIDE OF THE HEAVY BLACK LINE.

DROP BOX INLETS: TOTAL QUANTITIES NEEDED ARE INSIDE OF THE HEAVY BLACK LINE.

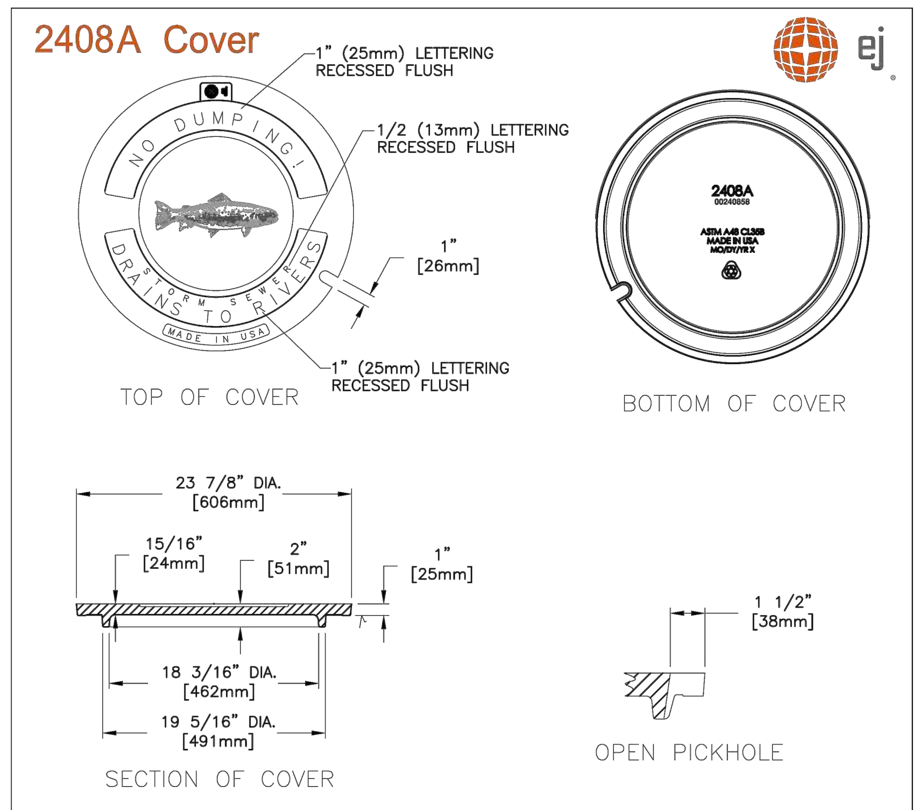
STEEL WEIGHTS DO NOT INCLUDE STRUCTURAL STEEL.



BAR BENDING DIAGRAMS ~ (Dimensions are Out–to–Out of bar)

(3 OF 4)

CITY OF Fort Lupton EST 1836 COME PAINT YOUR FUTURE WITH US	DESIGN STANDARDS	STANDARD DRAWING
	CURB INLET TYPE R	ST7
		DATE: 8/15/14



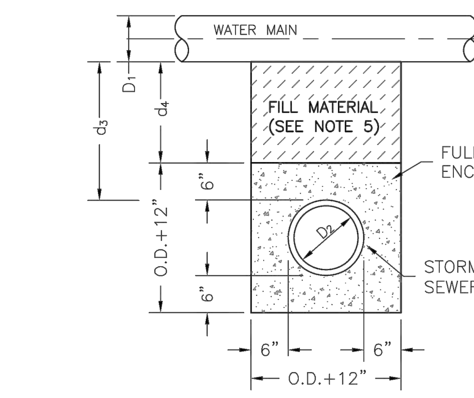
Product Number
00240858

Design Features
- Materials
  - Gray Iron (CL35B)
- Design Load
  - Heavy Duty
- Coating
  - Undipped
- √ Designates Machined Surface

Certification
- ASTM A48
- Country of Origin: USA

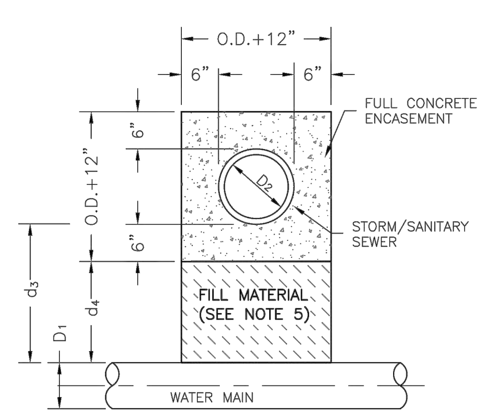
(4 OF 4)

CITY OF Fort Lupton EST 1836 COME PAINT YOUR FUTURE WITH US	DESIGN STANDARDS	STANDARD DRAWING
	CURB INLET TYPE R	ST8
		DATE: 5/04/2017



STORM OR SANITARY SEWER CROSSING UNDER WATER MAIN

IF d_3>18", ENCASEMENT NOT REQUIRED



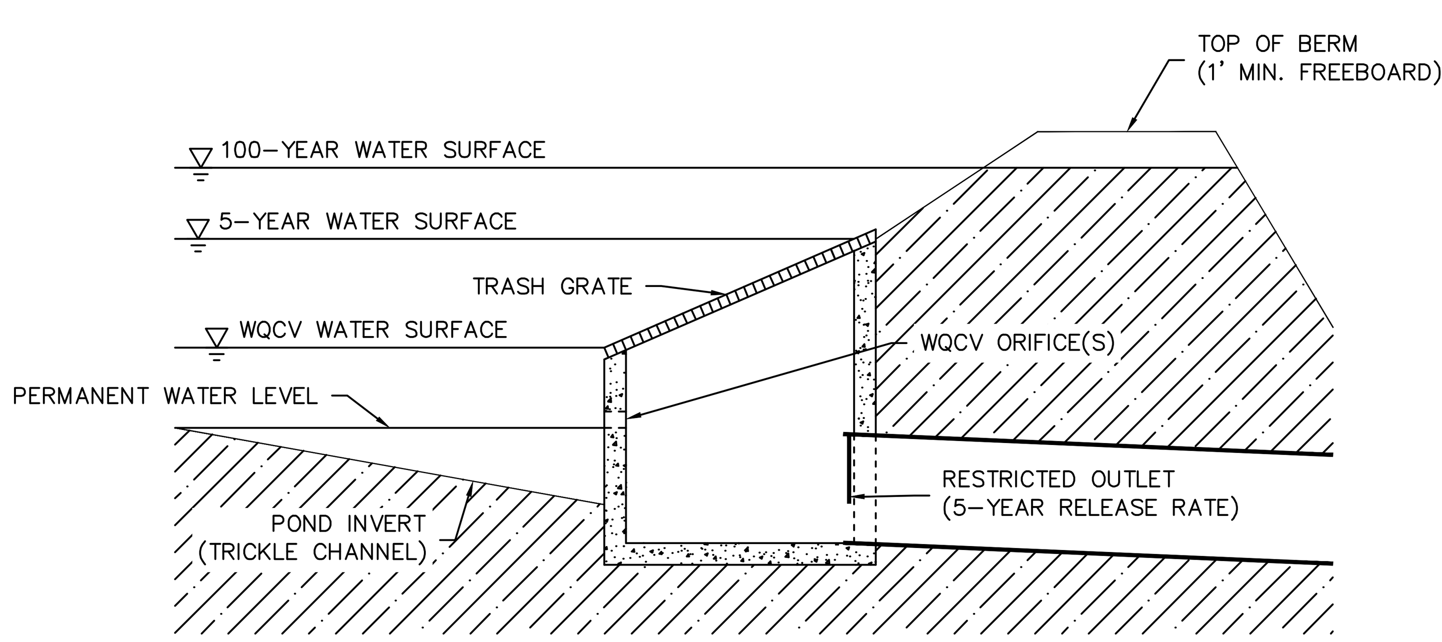
NOTES:

1. CONCRETE COLLAR AROUND STORM SEWER JOINTS MAY BE ACCEPTED WITH WRITTEN APPROVAL BY THE CITY ENGINEER AND ONLY FOR PIPE 30" OR LARGER.
2. CONCRETE TO BE CAST AGAINST UNDISTURBED SOIL OR SHORING.
3. LENGTH OF ENCASEMENT SHALL EXTEND AT LEAST 10–FEET EACH SIDE OF WATER MAIN.
4. UNLESS OTHERWISE NOTED ON PLAN/PROFILE DRAWINGS, ENCASEMENTS NEED NOT BE REINFORCED.
5. FILLER MATERIAL BETWEEN CONDUITS TO BE:
   a) APPROVED COMPRESSIBLE MATERIAL SUCH AS STYROFOAM, ETC. IF $d_4 \le 6$".
   b) COMPACTED BACKFILL, IF $d_4 > 6$".
6. SHORING OR SHEETING, IF USED, TO BE CUT OFF AT TOP OF ENCASEMENT

STORM OR SANITARY SEWER CROSSING OVER TOP OF WATER MAIN

ENCASEMENT REQUIRED REGARDLESS OF DIMENSION d_3 (SEE NOTE 1 FOR SPECIAL CASES)

CITY OF Fort Lupton EST 1836 COME PAINT YOUR FUTURE WITH US	DESIGN STANDARDS	STANDARD DRAWING
	ENCASEMENT FOR CONDUIT CROSSING	ST9
		DATE: 8/15/14



POND OUTLET DETAIL
N.T.S.

K:\19003254\DWG\PLAN SETS\CONSTRUCTION\STORM\19003254–STORM DETAILS.DWG 3/18/2020 3:22 PM ROXANNE FOSTER

PROJECT NO.: LUP2019–0033 &
PLAN NO.: PPL2019–0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303–905–3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
DETAILS
STORM DETAILS

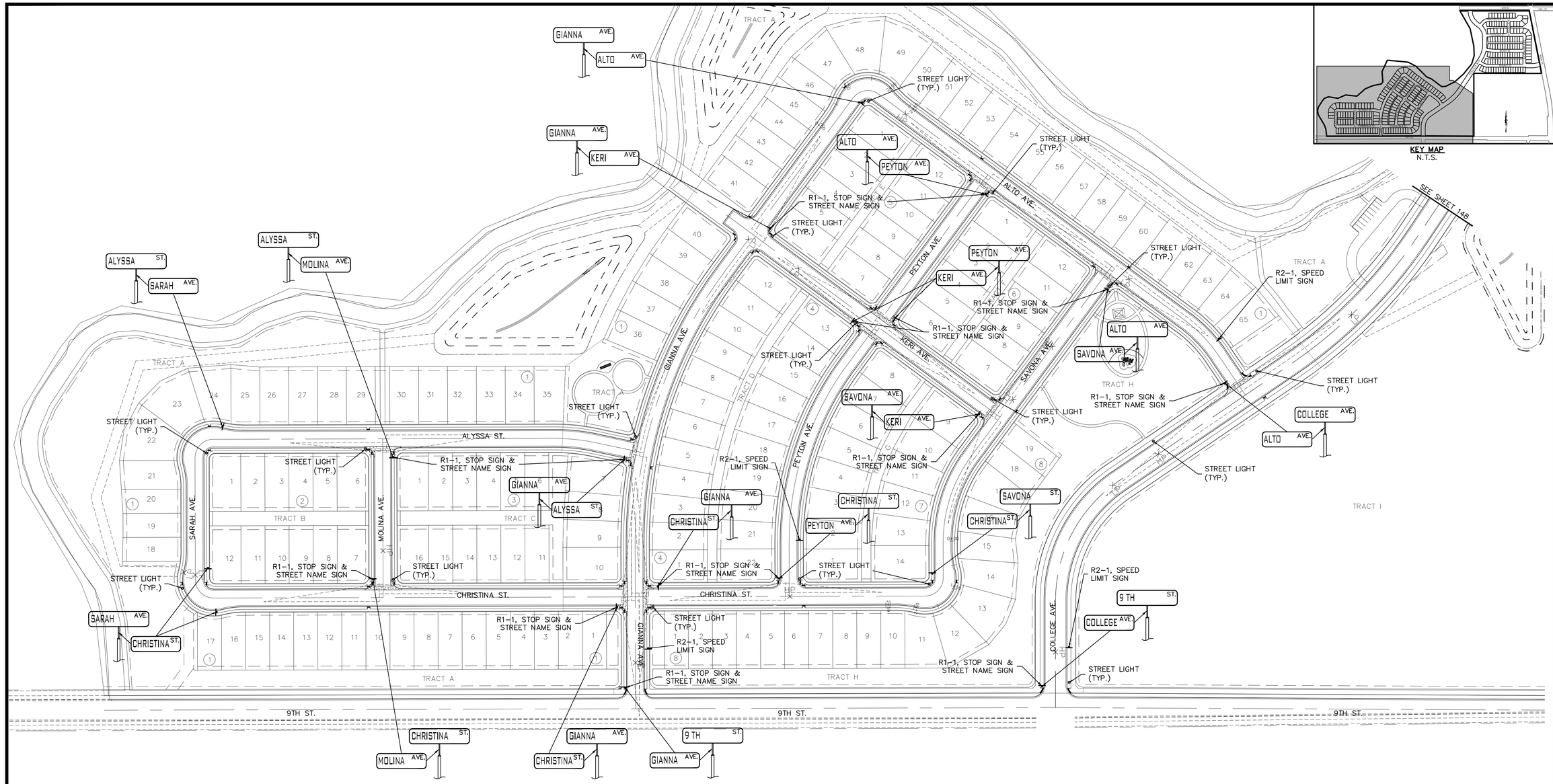
DATE 03/19/20

	REVISIONS
A	1ST SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF	CH. MAM
P.M. MAM	
JOB 19003254	
SHEET NO. 146	

CAD FILE: 19003254–STORM DETAILS.DWG



KEY MAP
N.T.S.

Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
SIGNAGE & STRIPING

DATE 03/19/20

A	1st SUBMITTAL TO FT. LUPTON	03/19/2020 – MAM

REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 147

CAD FILE: 19003254-SIGNAGE AND STRIPING.DWG

R1-1
36"x36"
(EXCEPT AS OTHERWISE NOTED)
NTS

D3
VARIABLE SIZE
NTS

R2-1
24"x30"
NTS
(SPEED LIMIT AS NOTED ON PLAN)

R2-1
24"x30"
NTS

R2-1
24"x30"
NTS

R2-1
24"x30"
NTS

NOTES:

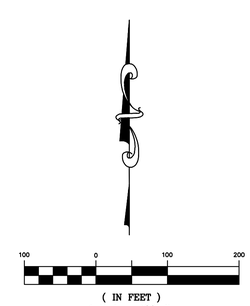
1. THE INSTALLATION OF ALL TRAFFIC CONTROL DEVICES SHALL CONFORM TO THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES AND THE COLORADO STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION, LATEST EDITION.

2. TRAFFIC CONTROL DEVICES ON PUBLIC PROPERTY ALL PERMANENTLY FIXED TRAFFIC SIGNALS WILL GENERALLY BE INSTALLED BY THE CITY AT THE DEVELOPER'S EXPENSE. HOWEVER, IF THE DEVELOPER SUBMITS A SIGNAGE PLAN WHICH IS SUBSEQUENTLY APPROVED BY THE PUBLIC WORKS DIRECTOR/CITY TRANSPORTATION ENGINEER, THE DEVELOPER MAY INSTALL THESE TRAFFIC SIGNS. TRAFFIC SIGNS SHALL BE PLACED TO CONFORM TO THE DRAWING DETAILS.

3. TRAFFIC CONTROL DEVICES ON PRIVATE PROPERTY
(A) RESPONSIBILITY: ALL TRAFFIC CONTROL DEVICES ON PRIVATE PROPERTY; I.E., PAVEMENT MARKINGS, REGULATORY SIGNS, FIRE LANE SIGNS, AND HANDICAPPED PARKING SIGNS SHALL BE INSTALLED AND MAINTAINED BY THE PROPERTY OWNER.
(B) PLACEMENT: A SIGNAGE AND STRIPING PLAN SPECIFYING THE VARIOUS TYPES AND COMBINATIONS OF TRAFFIC CONTROL DEVICES SHALL BE SUBMITTED TO THE PUBLIC WORKS DIRECTOR/CITY TRANSPORTATION ENGINEER FOR APPROVAL.

4. ALL PAVEMENT MARKINGS REQUIRED TO BE INSTALLED AS A RESULT OF NEW CONSTRUCTION OR DEVELOPMENT SHALL BE THERMOPLASTIC AS PER CDOT SPECIFICATION 627. TEMPORARY PAVEMENT MARKINGS NECESSARY TO FACILITATE CONSTRUCTION (I.E. DETOURS) MAY BE INSTALLED USING PAINT.

5. THE CONTRACTOR SHALL SUBMIT A PLAN FOR ALL PAVEMENT MARKINGS TO THE PUBLIC WORKS DIRECTOR/CITY TRANSPORTATION ENGINEER FOR APPROVAL PRIOR TO THE BEGINNING OF THE WORK. THE PAVEMENT MARKING PLAN SHALL MEET THE REQUIREMENTS FOR SUCH WORK AS OUTLINED IN THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES. ALL PAVEMENT MARKING MATERIALS MUST BE APPROVED BY THE CITY TRANSPORTATION ENGINEER. MATERIAL SPECIFICATIONS.



LEGEND

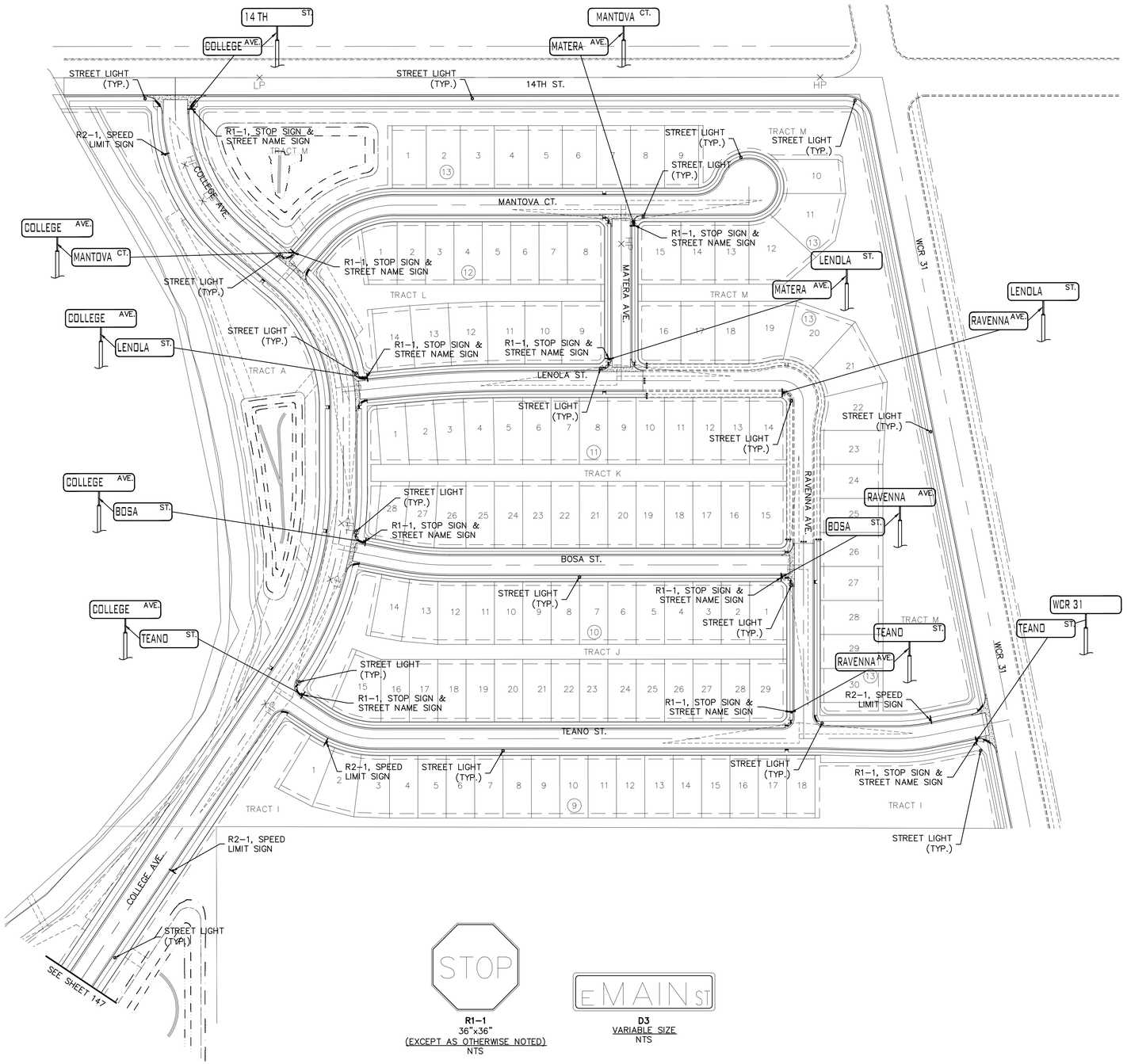
- R1-1, STOP SIGN & STREET NAME SIGN
- R2-1 SPEED LIMIT 25
- TYPE 4 STREET LIGHT
- STREET LIGHT (BY OTHERS)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)



NOTES:

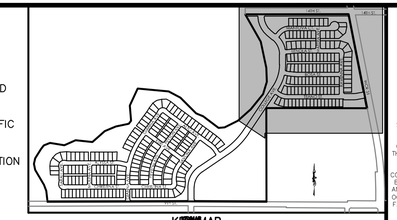
1. THE INSTALLATION OF ALL TRAFFIC CONTROL DEVICES SHALL CONFORM TO THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES AND THE COLORADO STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION, LATEST EDITION.

2. TRAFFIC CONTROL DEVICES ON PUBLIC PROPERTY ALL PERMANENTLY FIXED TRAFFIC SIGNALS WILL GENERALLY BE INSTALLED BY THE CITY AT THE DEVELOPER'S EXPENSE. HOWEVER, IF THE DEVELOPER SUBMITS A SIGNAGE PLAN WHICH IS SUBSEQUENTLY APPROVED BY THE PUBLIC WORKS DIRECTOR/CITY TRANSPORTATION ENGINEER, THE DEVELOPER MAY INSTALL THESE TRAFFIC SIGNS. TRAFFIC SIGNS SHALL BE PLACED TO CONFORM TO THE DRAWING DETAILS.

3. TRAFFIC CONTROL DEVICES ON PRIVATE PROPERTY
   (A) RESPONSIBILITY: ALL TRAFFIC CONTROL DEVICES ON PRIVATE PROPERTY; I.E., PAVEMENT MARKINGS, REGULATORY SIGNS, FIRE LANE SIGNS, AND HANDICAPPED PARKING SIGNS SHALL BE INSTALLED AND MAINTAINED BY THE PROPERTY OWNER.
   (B) PLACEMENT: A SIGNAGE AND STRIPING PLAN SPECIFYING THE VARIOUS TYPES AND COMBINATIONS OF TRAFFIC CONTROL DEVICES SHALL BE SUBMITTED TO THE PUBLIC WORKS DIRECTOR/CITY TRANSPORTATION ENGINEER FOR APPROVAL.

4. ALL PAVEMENT MARKINGS REQUIRED TO BE INSTALLED AS A RESULT OF NEW CONSTRUCTION OR DEVELOPMENT SHALL BE THERMOPLASTIC AS PER CDOT SPECIFICATION 627. TEMPORARY PAVEMENT MARKINGS NECESSARY TO FACILITATE CONSTRUCTION (I.E. DETOURS) MAY BE INSTALLED USING PAINT.

5. THE CONTRACTOR SHALL SUBMIT A PLAN FOR ALL PAVEMENT MARKINGS TO THE PUBLIC WORKS DIRECTOR/CITY TRANSPORTATION ENGINEER FOR APPROVAL PRIOR TO THE BEGINNING OF THE WORK. THE PAVEMENT MARKING PLAN SHALL MEET THE REQUIREMENTS FOR SUCH WORK AS OUTLINED IN THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES. ALL PAVEMENT MARKING MATERIALS MUST BE APPROVED BY THE CITY TRANSPORTATION ENGINEER. MATERIAL SPECIFICATIONS.



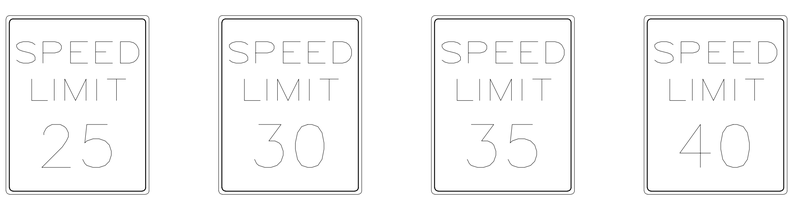
KEYMAP
N.T.S.

LEGEND

- R1-1, STOP SIGN & STREET NAME SIGN
- R2-1 SPEED LIMIT 25
- TYPE 4 STREET LIGHT
- STREET LIGHT (BY OTHERS)

R1-1
36"x36"
(EXCEPT AS OTHERWISE NOTED)
NTS

D3
VARIABLE SIZE
NTS

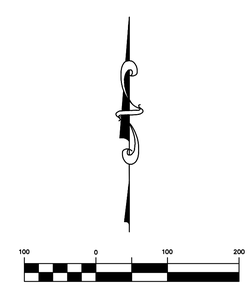


R2-1
24"x30"
NTS
(SPEED LIMIT AS NOTED ON PLAN)

R2-1
24"x30"
NTS

R2-1
24"x30"
NTS

R2-1
24"x30"
NTS



(IN FEET)
1 inch = 100 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC
COTTONWOOD GREENS
FORT LUPTON, COLORADO
CONSTRUCTION PLANS
SIGNAGE & STRIPING

DATE
03/19/20

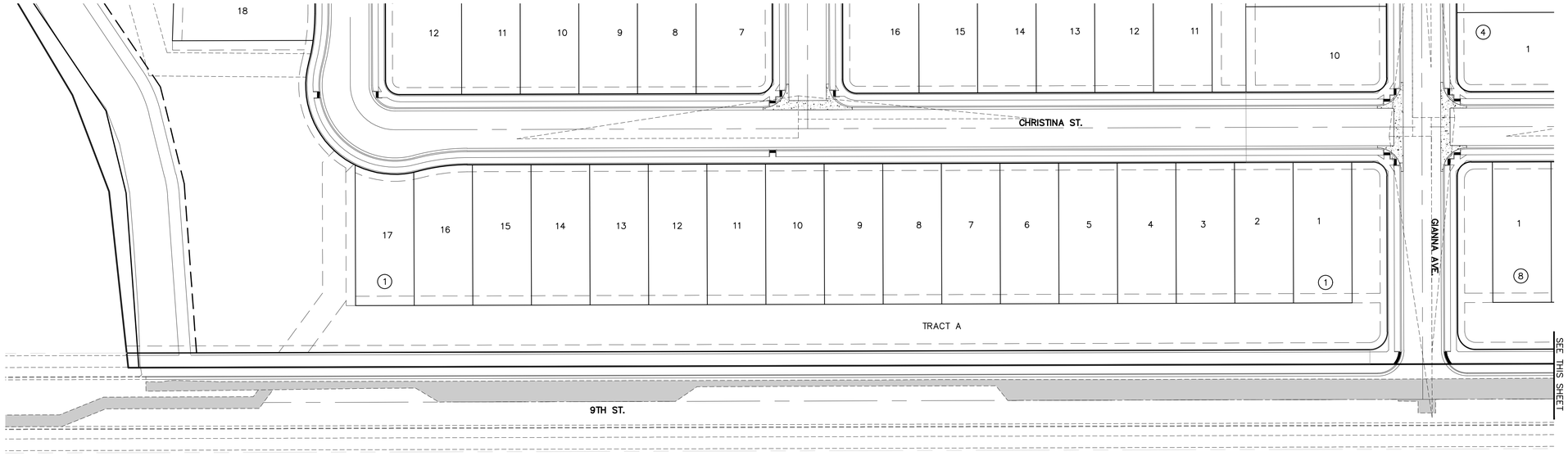
A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

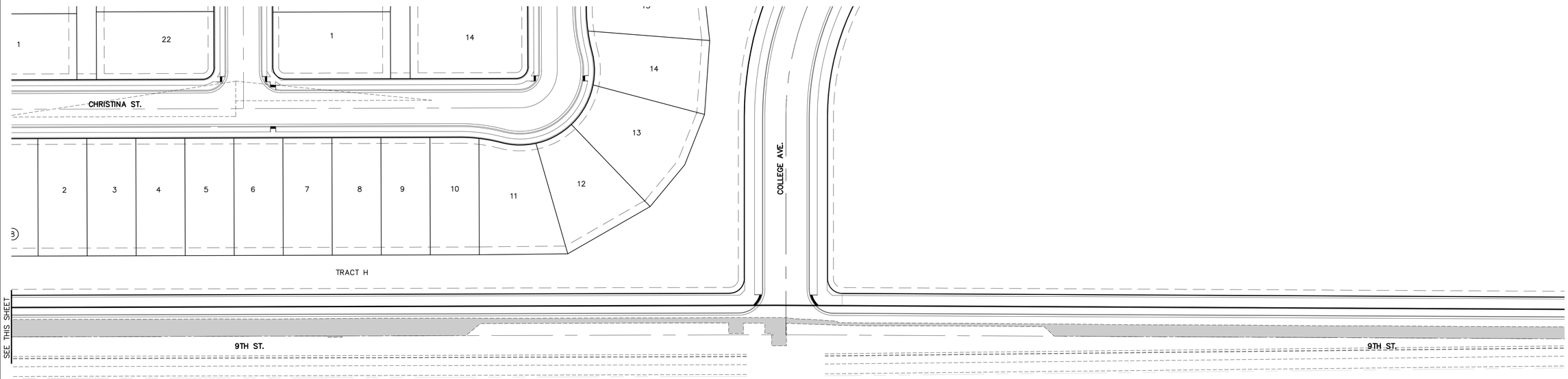
REVISIONS

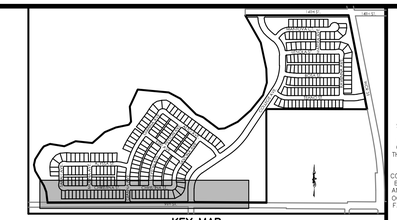
PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 148

CAD FILE: 19003254-SIGNAGE AND STRIPING.DWG







KEY MAP
N.T.S.

R1-1
36"x36"
(EXCEPT AS OTHERWISE NOTED)
NTS

D3
VARIABLE SIZE
NTS

R2-1
24"x30"
NTS
(SPEED LIMIT AS NOTED ON PLAN)

R2-1
24"x30"
NTS

R2-1
24"x30"
NTS

R2-1
24"x30"
NTS

NOTES:

1. THE INSTALLATION OF ALL TRAFFIC CONTROL DEVICES SHALL CONFORM TO THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES AND THE COLORADO STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION, LATEST EDITION.

2. TRAFFIC CONTROL DEVICES ON PUBLIC PROPERTY ALL PERMANENTLY FIXED TRAFFIC SIGNALS WILL GENERALLY BE INSTALLED BY THE CITY AT THE DEVELOPER'S EXPENSE. HOWEVER, IF THE DEVELOPER SUBMITS A SIGNAGE PLAN WHICH IS SUBSEQUENTLY APPROVED BY THE PUBLIC WORKS DIRECTOR/CITY TRANSPORTATION ENGINEER, THE DEVELOPER MAY INSTALL THESE TRAFFIC SIGNS. TRAFFIC SIGNS SHALL BE PLACED TO CONFORM TO THE DRAWING DETAILS.

3. TRAFFIC CONTROL DEVICES ON PRIVATE PROPERTY
   (A) RESPONSIBILITY: ALL TRAFFIC CONTROL DEVICES ON PRIVATE PROPERTY; I.E., PAVEMENT MARKINGS, REGULATORY SIGNS, FIRE LANE SIGNS, AND HANDICAPPED PARKING SIGNS SHALL BE INSTALLED AND MAINTAINED BY THE PROPERTY OWNER.
   (B) PLACEMENT: A SIGNAGE AND STRIPING PLAN SPECIFYING THE VARIOUS TYPES AND COMBINATIONS OF TRAFFIC CONTROL DEVICES SHALL BE SUBMITTED TO THE PUBLIC WORKS DIRECTOR/CITY TRANSPORTATION ENGINEER FOR APPROVAL.

4. ALL PAVEMENT MARKINGS REQUIRED TO BE INSTALLED AS A RESULT OF NEW CONSTRUCTION OR DEVELOPMENT SHALL BE THERMOPLASTIC AS PER CDOT SPECIFICATION 627. TEMPORARY PAVEMENT MARKINGS NECESSARY TO FACILITATE CONSTRUCTION (I.E. DETOURS) MAY BE INSTALLED USING PAINT.

5. THE CONTRACTOR SHALL SUBMIT A PLAN FOR ALL PAVEMENT MARKINGS TO THE PUBLIC WORKS DIRECTOR/CITY TRANSPORTATION ENGINEER FOR APPROVAL PRIOR TO THE BEGINNING OF THE WORK. THE PAVEMENT MARKING PLAN SHALL MEET THE REQUIREMENTS FOR SUCH WORK AS OUTLINED IN THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES. ALL PAVEMENT MARKING MATERIALS MUST BE APPROVED BY THE CITY TRANSPORTATION ENGINEER. MATERIAL SPECIFICATIONS.

50 0 50 100
(IN FEET)
1 inch = 50 ft.

LEGEND

- R1-1, STOP SIGN & STREET NAME SIGN
- R2-1 SPEED LIMIT 25
- TYPE 4 STREET LIGHT
- STREET LIGHT (BY OTHERS)

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
SIGNAGE & STRIPING
9TH STREET

DATE 03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 149

CAD FILE: 19003254-SIGNAGE AND STRIPING-14TH.DWG

NOTES:

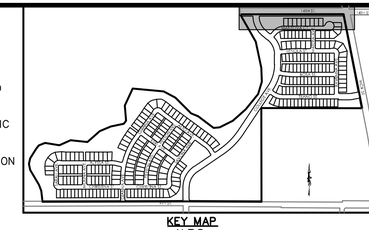
1. THE INSTALLATION OF ALL TRAFFIC CONTROL DEVICES SHALL CONFORM TO THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES AND THE COLORADO STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION, LATEST EDITION.

2. TRAFFIC CONTROL DEVICES ON PUBLIC PROPERTY ALL PERMANENTLY FIXED TRAFFIC SIGNALS WILL GENERALLY BE INSTALLED BY THE CITY AT THE DEVELOPER'S EXPENSE. HOWEVER, IF THE DEVELOPER SUBMITS A SIGNAGE PLAN WHICH IS SUBSEQUENTLY APPROVED BY THE PUBLIC WORKS DIRECTOR/CITY TRANSPORTATION ENGINEER, THE DEVELOPER MAY INSTALL THESE TRAFFIC SIGNS. TRAFFIC SIGNS SHALL BE PLACED TO CONFORM TO THE DRAWING DETAILS.

3. TRAFFIC CONTROL DEVICES ON PRIVATE PROPERTY
   (A) RESPONSIBILITY: ALL TRAFFIC CONTROL DEVICES ON PRIVATE PROPERTY; I.E., PAVEMENT MARKINGS, REGULATORY SIGNS, FIRE LANE SIGNS, AND HANDICAPPED PARKING SIGNS SHALL BE INSTALLED AND MAINTAINED BY THE PROPERTY OWNER.
   (B) PLACEMENT: A SIGNAGE AND STRIPING PLAN SPECIFYING THE VARIOUS TYPES AND COMBINATIONS OF TRAFFIC CONTROL DEVICES SHALL BE SUBMITTED TO THE PUBLIC WORKS DIRECTOR/CITY TRANSPORTATION ENGINEER FOR APPROVAL.

4. ALL PAVEMENT MARKINGS REQUIRED TO BE INSTALLED AS A RESULT OF NEW CONSTRUCTION OR DEVELOPMENT SHALL BE THERMOPLASTIC AS PER CDOT SPECIFICATION 627. TEMPORARY PAVEMENT MARKINGS NECESSARY TO FACILITATE CONSTRUCTION (I.E. DETOURS) MAY BE INSTALLED USING PAINT.

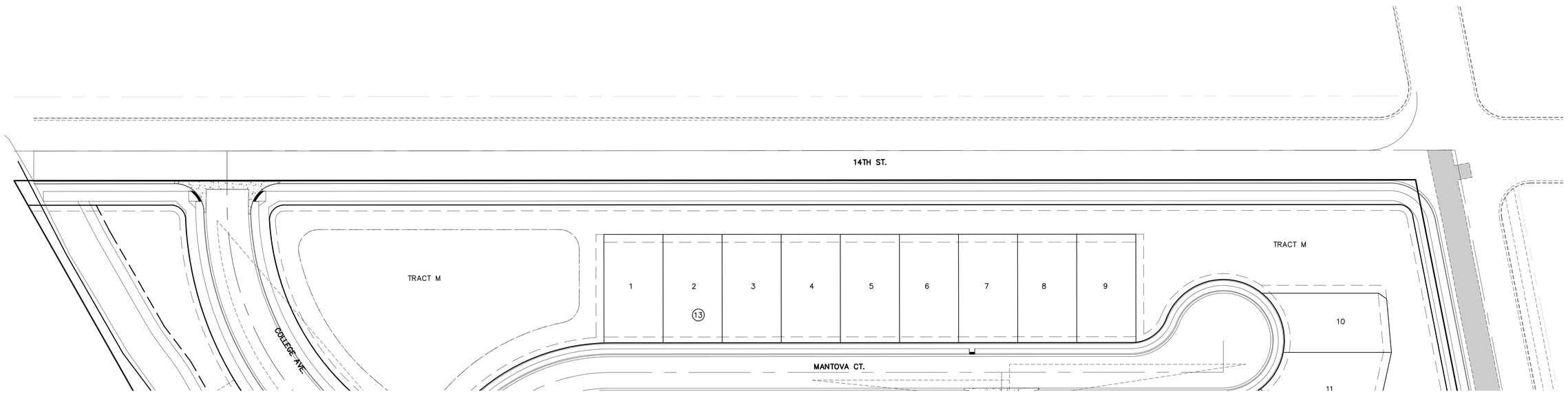
5. THE CONTRACTOR SHALL SUBMIT A PLAN FOR ALL PAVEMENT MARKINGS TO THE PUBLIC WORKS DIRECTOR/CITY TRANSPORTATION ENGINEER FOR APPROVAL PRIOR TO THE BEGINNING OF THE WORK. THE PAVEMENT MARKING PLAN SHALL MEET THE REQUIREMENTS FOR SUCH WORK AS OUTLINED IN THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES. ALL PAVEMENT MARKING MATERIALS MUST BE APPROVED BY THE CITY TRANSPORTATION ENGINEER. MATERIAL SPECIFICATIONS.



KEY MAP
N.T.S.

LEGEND

- R1-1, STOP SIGN & STREET NAME SIGN
- R2-1 SPEED LIMIT 25
- TYPE 4 STREET LIGHT
- STREET LIGHT (BY OTHERS)



R1-1
36"x36"
(EXCEPT AS OTHERWISE NOTED)
NTS

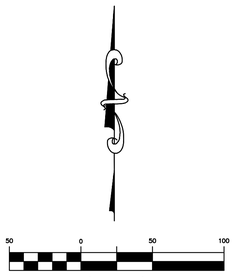
D3
VARIABLE SIZE
NTS

R2-1
24"x30"
NTS
(SPEED LIMIT AS NOTED ON PLAN)

R2-1
24"x30"
NTS

R2-1
24"x30"
NTS

R2-1
24"x30"
NTS



(IN FEET)
1 inch = 50 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
SIGNAGE & STRIPING
14TH STREET

DATE 03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 150

CAD FILE: 19003254-SIGNAGE AND STRIPING-14TH.DWG

NOTES:

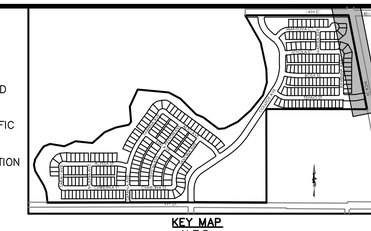
1. THE INSTALLATION OF ALL TRAFFIC CONTROL DEVICES SHALL CONFORM TO THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES AND THE COLORADO STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION, LATEST EDITION.

2. TRAFFIC CONTROL DEVICES ON PUBLIC PROPERTY ALL PERMANENTLY FIXED TRAFFIC SIGNALS WILL GENERALLY BE INSTALLED BY THE CITY AT THE DEVELOPER'S EXPENSE. HOWEVER, IF THE DEVELOPER SUBMITS A SIGNAGE PLAN WHICH IS SUBSEQUENTLY APPROVED BY THE PUBLIC WORKS DIRECTOR/CITY TRANSPORTATION ENGINEER, THE DEVELOPER MAY INSTALL THESE TRAFFIC SIGNS. TRAFFIC SIGNS SHALL BE PLACED TO CONFORM TO THE DRAWING DETAILS.

3. TRAFFIC CONTROL DEVICES ON PRIVATE PROPERTY
   (A) RESPONSIBILITY: ALL TRAFFIC CONTROL DEVICES ON PRIVATE PROPERTY; I.E., PAVEMENT MARKINGS, REGULATORY SIGNS, FIRE LANE SIGNS, AND HANDICAPPED PARKING SIGNS SHALL BE INSTALLED AND MAINTAINED BY THE PROPERTY OWNER.
   (B) PLACEMENT: A SIGNAGE AND STRIPING PLAN SPECIFYING THE VARIOUS TYPES AND COMBINATIONS OF TRAFFIC CONTROL DEVICES SHALL BE SUBMITTED TO THE PUBLIC WORKS DIRECTOR/CITY TRANSPORTATION ENGINEER FOR APPROVAL.

4. ALL PAVEMENT MARKINGS REQUIRED TO BE INSTALLED AS A RESULT OF NEW CONSTRUCTION OR DEVELOPMENT SHALL BE THERMOPLASTIC AS PER CDOT SPECIFICATION 627. TEMPORARY PAVEMENT MARKINGS NECESSARY TO FACILITATE CONSTRUCTION (I.E. DETOURS) MAY BE INSTALLED USING PAINT.

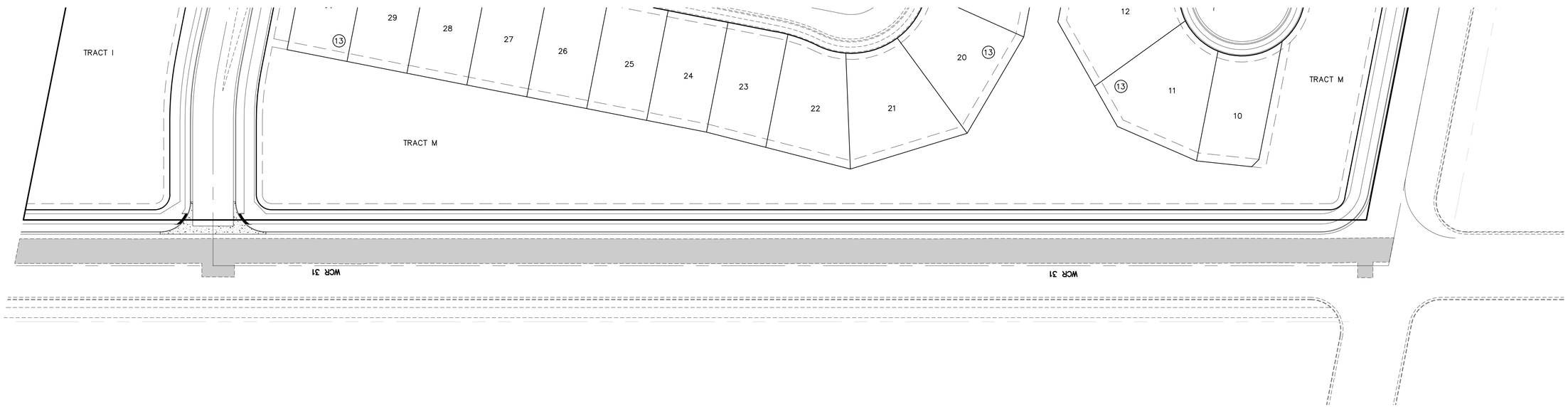
5. THE CONTRACTOR SHALL SUBMIT A PLAN FOR ALL PAVEMENT MARKINGS TO THE PUBLIC WORKS DIRECTOR/CITY TRANSPORTATION ENGINEER FOR APPROVAL PRIOR TO THE BEGINNING OF THE WORK. THE PAVEMENT MARKING PLAN SHALL MEET THE REQUIREMENTS FOR SUCH WORK AS OUTLINED IN THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES. ALL PAVEMENT MARKING MATERIALS MUST BE APPROVED BY THE CITY TRANSPORTATION ENGINEER. MATERIAL SPECIFICATIONS.



KEY MAP
N.T.S.

LEGEND

- R1-1, STOP SIGN & STREET NAME SIGN
- R2-1 SPEED LIMIT 25
- TYPE 4 STREET LIGHT
- STREET LIGHT (BY OTHERS)



R1-1
36"x36"
(EXCEPT AS OTHERWISE NOTED)
NTS

D3
VARIABLE SIZE
NTS

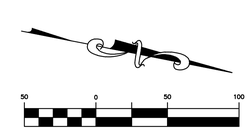
R2-1
24"x30"
NTS
(SPEED LIMIT AS NOTED ON PLAN)

R2-1
24"x30"
NTS

R2-1
24"x30"
NTS

R2-1
24"x30"
NTS

R2-1
24"x30"
NTS



(IN FEET)
1 inch = 50 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

BENCHMARK:

HORIZONTAL DATUM: LOCAL COORDINATE SYSTEM BASED ON NGS "N 260 REST" (500000, 900000). KNOW INTERNALLY AS "BRIGHTON LOCAL". LINEAL MEASURE IS BASED ON THE U.S. SURVEY FOOT.

VERTICAL DATUM: NAVD88 USING GEOID MODEL "GEOID12A"
NGS "U 260" (NAVD88 EL=4894.42)
NGS "4907" (NAVD88 EL=4908.22)

811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MACARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO

CONSTRUCTION PLANS
SIGNAGE & STRIPING
WCR 31

DATE 03/19/20

A	1st SUBMITTAL TO FT. LUPTON 03/19/2020 – MAM

REVISIONS

PLANS UNDER REVIEW NOT FOR CONSTRUCTION

DR. RF	CH. MAM
P.M. MAM	
JOB 19003254	
SHEET NO. 151	

CAD FILE: 19003254-SIGNAGE AND STRIPING-14TH.DWG

COTTONWOOD GREENS SUBDIVISION

A TRACT OF LAND LOCATED IN THE SOUTH HALF OF SECTION 33, TOWNSHIP 2 NORTH, RANGE 66 WEST OF THE 6TH PRINCIPAL MERIDIAN, FORT LUPTON, COUNTY OF WELD, STATE OF COLORADO

GRADING, EROSION AND SEDIMENT CONTROL PLANS

GRADING AND EROSION CONTROL NOTES

THE FOLLOWING MINIMUM GRADING AND EROSION CONTROL NOTES SHALL BE STATED ON, AS WELL AS INCORPORATED INTO THE OVERLOT GRADING AND EROSION CONTROL PLAN:

1. IMPERVIOUS SURFACES WHICH ARE ADJACENT TO OR CONTAINED WITHIN CONSTRUCTION SITES WILL BE SWEPT ON A DAILY BASIS OR AS NEEDED DURING THE DAY WHEN SEDIMENT AND OTHER MATERIALS ARE TRACKED OR DISCHARGED ON TO THEM. EITHER SWEEPING BY HAND OR USE OF STREET SWEEPERS IS ACCEPTABLE. STREET SWEEPERS USING WATER WHILE SWEEPING IS PREFERRED IN ORDER TO MINIMIZE DUST. FLUSHING OFF PAVED SURFACES WITH WATER IS PROHIBITED.

2. THE CONTRACTOR SHALL PROTECT ALL STORM SEWER FACILITIES ADJACENT TO ANY LOCATION WHERE PAVEMENT CUTTING OPERATIONS INVOLVING WHEEL CUTTING, SAW CUTTING, OR ABRASIVE WATER JET CUTTING ARE TO TAKE PLACE. THE CONTRACTOR SHALL REMOVE AND PROPERLY DISPOSE OF ALL WASTE PRODUCTS GENERATED BY SAID CUTTING OPERATIONS ON A DAILY BASIS OR AS NEEDED THROUGHOUT THE WORK DAY. THE DISCHARGE OF ANY WATER CONTAMINATED BY WASTE PRODUCTS FROM CUTTING OPERATIONS TO THE STORM SEWER SYSTEM IS PROHIBITED.

3. THE DISCHARGE OF WATER CONTAINING WASTE CEMENT TO ADJACENT WATERWAYS, WETLANDS, OTHER PROPERTIES, ETC., IS PROHIBITED. THE CLEANING OF CEMENT TRUCK DELIVERY CHUTES, EXCEPT IN DESIGNATED CONCRETE WASHOUT AREAS, IS PROHIBITED AT THE JOB SITE.

GRADING AND EROSION CONTROL NOTES

(A) ALL SITE GRADING (EXCAVATION, EMBANKMENT, AND COMPACTION) SHALL CONFORM TO THE RECOMMENDATIONS OF THE LATEST SOILS INVESTIGATION FOR THIS PROPERTY AND SHALL FURTHER BE IN CONFORMANCE WITH THE CITY OF FORT LUPTON'S **"STANDARDS AND SPECIFICATIONS FOR THE DESIGN AND CONSTRUCTION OF PUBLIC IMPROVEMENTS,"** LATEST EDITION.

(B) NATURAL VEGETATION SHALL BE RETAINED AND PROTECTED WHEREVER POSSIBLE. EXPOSURE OF SOIL TO EROSION BY REMOVAL OR DISTURBANCE OF VEGETATION SHALL BE LIMITED TO THE AREA REQUIRED FOR IMMEDIATE CONSTRUCTION OPERATION AND FOR THE SHORTEST PRACTICAL PERIOD OF TIME.

(C) TOPSOIL SHALL BE STOCKPILED TO THE EXTENT PRACTICABLE ON THE SITE FOR USE ON AREAS TO BE REVEGETATED. ANY AND ALL STOCKPILES SHALL BE LOCATED AND PROTECTED FROM EROSIVE ELEMENTS.

(D) TEMPORARY VEGETATION SHALL BE INSTALLED ON ALL DISTURBED AREAS WHERE PERMANENT SURFACE IMPROVEMENTS ARE NOT SCHEDULED FOR INSTALLATION WITHIN THREE MONTHS. VEGETATION SHALL BE A VIGOROUS, DROUGHT TOLERANT, NATIVE SPECIES MIX. (REFER TO SECTION 2.26.00 OF THESE **STANDARDS AND SPECIFICATIONS** FOR SEEDING MIX.) PROJECT SCHEDULING SHOULD TAKE ADVANTAGE OF SPRING OR FALL PLANTING SEASONS FOR NATURAL GERMINATION, BUT SEEDED AREAS SHALL BE IRRIGATED, IF CONDITIONS SO MERIT.

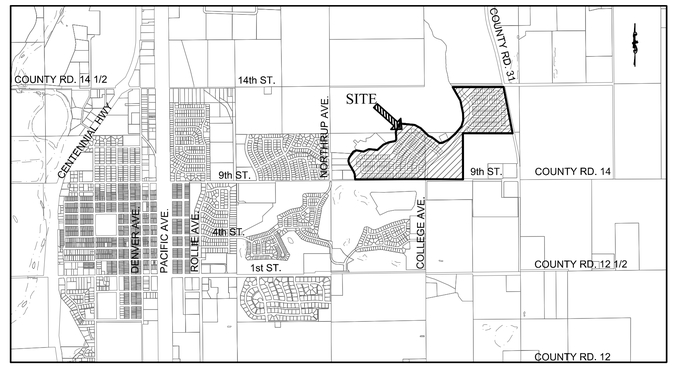
(E) AT ALL TIMES, THE PROPERTY SHALL BE MAINTAINED AND/OR WATERED TO PREVENT WIND-CAUSED EROSION. EARTHWORK OPERATIONS SHALL BE DISCONTINUED WHEN FUGITIVE DUST SIGNIFICANTLY IMPACTS ADJACENT PROPERTY. IF EARTHWORK IS COMPLETE OR DISCONTINUED AND DUST FROM THE SITE CONTINUES TO CREATE PROBLEMS, THE OWNER/DEVELOPER SHALL IMMEDIATELY INSTITUTE MITIGATIVE MEASURES AND SHALL CORRECT DAMAGE TO ADJACENT PROPERTY.

(F) TEMPORARY CUT/FILL SLOPES SHALL NOT EXCEED A STEEPNESS OF 2:1 (2H:1V). PERMANENT SLOPES SHALL NOT EXCEED 4:1 (4H:1V) IN AREAS TO BE SEEDED OR SODDED.

(G) UTILITY CONSTRUCTION IS NOT APPROVED UNDER THIS PLAN.

(H) THE OWNER/DEVELOPER SHALL PROVIDE ANY ADDITIONAL DUST ABATEMENT AND EROSION CONTROL MEASURES DEEMED NECESSARY BY THE CITY, SHOULD CONDITIONS MERIT THEM.

(I) TEMPORARY FENCES SHALL BE INSTALLED ALONG ALL BOUNDARIES OF THE CONSTRUCTION LIMITS OR PROPERTY LINES AS SHOWN ON THE APPROVED EROSION CONTROL PLAN, TO PREVENT GRADING ON PROPERTY NOT OWNED BY THE DEVELOPER. IN ADDITION, THE CITY MAY REQUIRE ADDITIONAL TEMPORARY FENCES IF FIELD CONDITIONS SO MERIT THEM.



VICINITY MAP
SCALE: 1"=2,000'

DRY LAND SEEDING NOTES

SOIL PREPARATION, SEEDING AND MULCHING SHALL BE REQUIRED IN ALL DISTURBED AREAS

AMOUNT	COMMON NAME
30%	CRESTED WHEAT, EPHRAIM
20%	SHEEP FESCUE
25%	P. RYEGRASS, LOWGRO
15%	CANADA BLUE, REUBENS
10%	CHEWING FESCUE

PLANT AT A RATE OF 20 LBS/ACRE IF MECHANICALLY DRILLED 0.25" – 0.50" INTO TOPSOIL.

PLANT AT A RATE OF 40 LBS/ACRE IF BROADCAST.

COVER CROP:
TREATED DURHAM OATS – 15 LBS OF PURE LIVE SEED PER ACRE (SPRING PLANTING)
WHEAT/RYE CROSS – 15 LBS OF PURE LIVE SEED PER ACRE (FALL PLANTING)

MULCHING REQUIREMENT AND APPLICATION: USE CLEAN, WEED- AND SEED-FREE, LONG-STEMMED GRASS HAY OR CEREAL GRAIN STRAW. AT LEAST 50% OF THE MULCH, BY WEIGHT, SHALL BE 10" OR MORE IN LENGTH, APPLIED AT A RATE OF 2 TONS/ACRE. MULCH SHALL BE ANCHORED BY MECHANICAL CRIMPING.

CONTRACTOR SHALL PROVIDE ALL SOIL PREPARATION, SEEDING, MULCHING, AND FERTILIZER REQUIRED TO PROMOTE VEGETATIVE GROWTH.

DURING TRENCH EXCAVATION CONTRACTOR SHALL STOCKPILE SEPARATELY ALL TOPSOIL THAT SHALL BE USED DURING SOIL PREPARATION FOR SEEDING.

DRY LAND SEEDING RATES

SPECIES	C-W-N	VARIETY	LBS. PER ACRE PLS DRILLED	LBS. PER ACRE PLS BROADCAST
WESTERN WHEATGRASS	N	BARTON	25	50
BLUE GRAMA	N	LOVINGTON	2.5	5
BUFFALO GRASS	N	SHARPS IMPROVED	20	40
ALKALI SACATON	N	**	2.5	5
PUBESCENT WHEATGRASS	C	LUNE	7.5	15
KENTUCKY BLUEGRASS	C	MERION	1.25	2.5

** = SEED SOURCE SHOULD COME FROM WITHIN 150 MILES OF AN AREA TO BE SEEDED.
PLS = PURE LIVE SEED IS THE AMOUNT OF SEED EXPECTED TO GROW BASED ON THE PURITY AND GERMINATION RATE OF THE BULK SEED.
C = COOL SEASON GRASS
W = WARM SEASON GRASS
N = NATIVE SPECIES

Sheet List Table	
SHEET NUMBER	SHEET TITLE
01	COVER SHEET
02	INITIAL GESC PLAN
03	INITIAL GESC PLAN
04	INITIAL GESC PLAN
05	INTERIM GESC PLAN
06	INTERIM GESC PLAN
07	INTERIM GESC PLAN
08	FINAL GESC PLAN
09	FINAL GESC PLAN
10	FINAL GESC PLAN
11	GESC DETAILS
12	GESC DETAILS

OWNER:
ARBOR CAPITAL PARTNERS, LLC.
4040 MacARTHUR BLVD.,
SUITE 250
NEWPORT BEACH, CA 92660
(303) 905-3496
CONTACT:

SURVEYOR:
ATWELL, LLC.
143 UNION BLVD.,
SUITE 700
LAKEWOOD, CO 80228
(303) 462-1100
CONTACT: BRIAN RITZ

UNITED POWER (ELEC):
P.O. BOX 929
BRIGHTON, CO 80601
(303) 659-0551
CONTACT: HECTOR AVENDANO

CIVIL ENGINEER:
ATWELL, LLC.
143 UNION BLVD.,
SUITE 700
LAKEWOOD, CO 80228
(303) 462-1100
CONTACT: MICHAEL MCGOLDRICK

CITY OF FORT LUPTON:
130 S. McKINLEY AVE.
FORT LUPTON, CO 80621
(303) 857-6694
CONTACT: ROY VESTAL

XCEL ENERGY(GAS):
5460 W. 60TH AVE.
ARVADA, CO 80003
(800) 895-4999
CONTACT: DONNA SANDERS

LEGEND

- PROPERTY BOUNDARY
- PROPOSED RIGHT-OF-WAY
- EXISTING RIGHT-OF-WAY
- PROPOSED LOT LINE
- EXISTING LOT LINE
- PROPOSED CATCH CURB & GUTTER
- PROPOSED SPILL CURB & GUTTER
- EXISTING CURB & GUTTER
- PROPOSED SIDEWALK
- EXISTING SIDEWALK
- EXISTING SECTION LINE
- PROPOSED EASEMENT
- EXISTING EASEMENT
- PROPOSED CONTOURS
- EXISTING CONTOURS
- PROPOSED SANITARY
- EXISTING SANITARY
- S — PROPOSED SANITARY SERVICE
- PROPOSED STORM
- EXISTING STORM
- PROPOSED WATER
- EXISTING WATER
- W — PROPOSED WATER SERVICE
- PROPOSED HYDRANT
- EXISTING HYDRANT
- PROPOSED WATER VALVE
- AREA OUTSIDE LIMITS OF CONSTRUCTION
- LOC — LIMITS OF CONSTRUCTION

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

ENGINEER'S STATEMENT

MICHAEL A. MCGOLDRICK, P.E. DATE
COLORADO NO. 30960
FOR AND ON BEHALF OF ATWELL, LLC.

Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD., SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
GRADING, EROSION AND SEDIMENT CONTROL PLANS
COVER SHEET

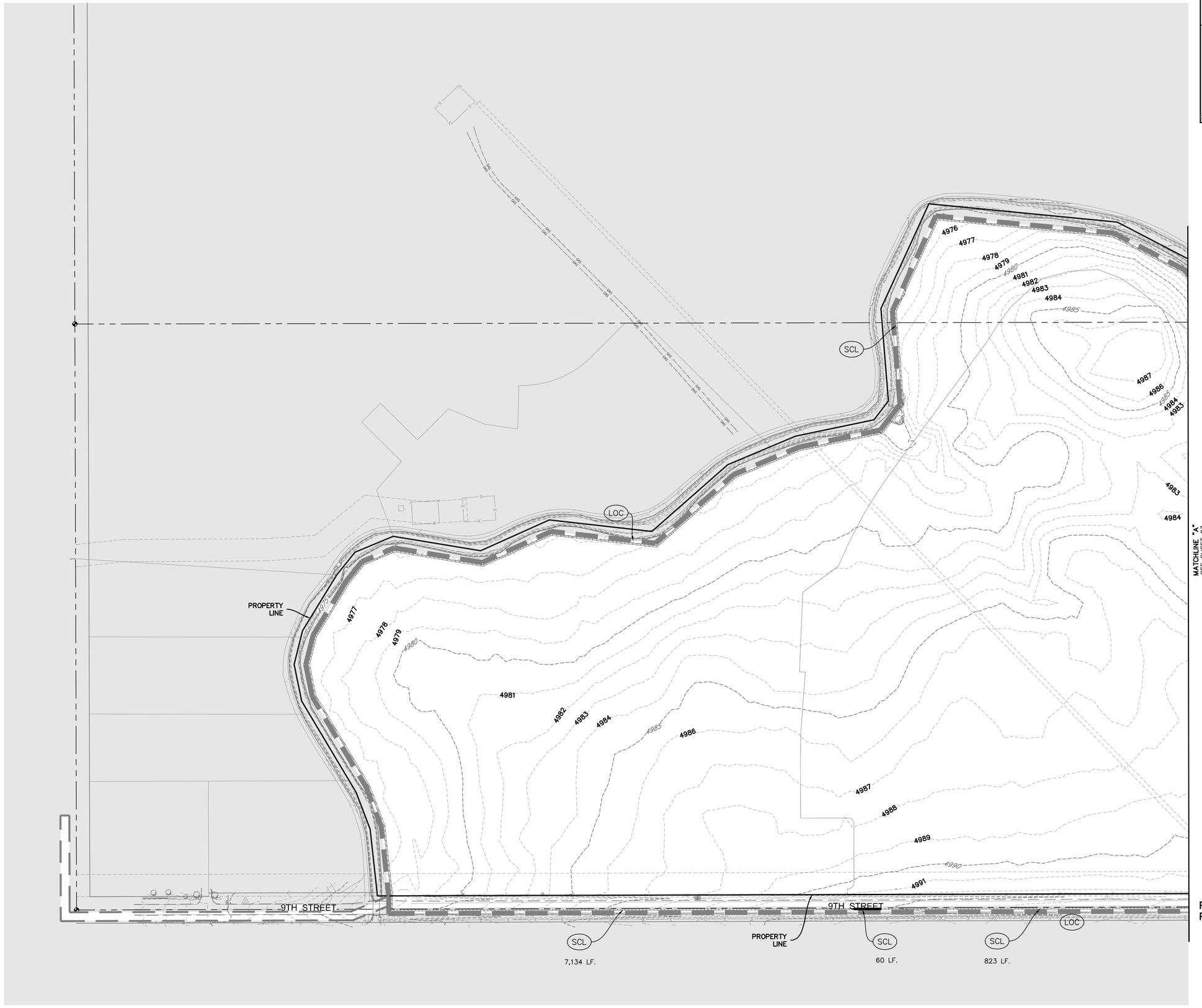
DATE
03/19/20

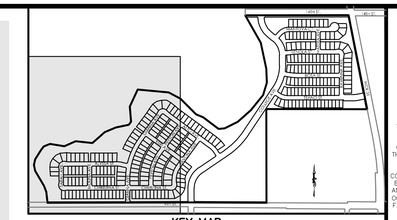
A	1st SUBMITTAL TO FT. LUPTON 01/31/2020 – MAM

REVISIONS

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 01

CAD FILE: 19003254-GESC COVER SHEET.DWG





KEY MAP
N.T.S.

NOTES:

1. SEE COVER SHEET AND DETAILS FOR LEGEND OF BMP NAMES AND SYMBOLS.
2. SHADED BMPS WERE INSTALLED IN INITIAL OR INTERIM GESC DRAWING AND, UNLESS OTHERWISE INDICATED, SHALL BE LEFT IN PLACE UNTIL REVEGETATION ESTABLISHMENT IS APPROVED BY THE COUNTY.
3. SEE CONSTRUCTION PLANS FOR DETAILS OF PERMANENT DRAINAGE FACILITIES SUCH AS DETENTION FACILITIES, CULVERTS, STORM DRAINS, AND INLET AND OUTLET PROTECTION.
4. THIS AREA IS INTENDED TO HAVE MINIMAL DISTURBANCE. ALL DISTURBED AREAS BETWEEN THE DEVELOPMENT AREA AND THE LOC WILL BE SEEDED AND MULCHED. THE COVERAGE AREA WILL BE DEPENDENT ON THE CONTRACTORS DISTURBED AREA. FIELD VERIFY WITH OWNER AND GESC INSPECTOR.
5. ANY SLOPES GREATER THAN 4:1 ARE REQUIRED TO HAVE EROSION CONTROL BLANKETS

(IN FEET)
1 inch = 100 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
GRADING, EROSION AND SEDIMENT CONTROL PLANS
INITIAL GESC PLAN

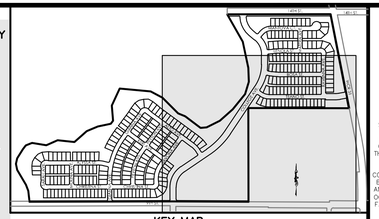
DATE 03/19/20

A	1st SUBMITTAL TO FT. LUPTON 01/31/2020 - MAM

REVISIONS

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 02

CAD FILE: 19003254-INITIAL GESC PLAN.DWG



KEY MAP
N.T.S.

NOTES:

1. SEE COVER SHEET AND DETAILS FOR LEGEND OF BMP NAMES AND SYMBOLS.
2. SHADED BMPS WERE INSTALLED IN INITIAL OR INTERIM GESC DRAWING AND, UNLESS OTHERWISE INDICATED, SHALL BE LEFT IN PLACE UNTIL REVEGETATION ESTABLISHMENT IS APPROVED BY THE COUNTY.
3. SEE CONSTRUCTION PLANS FOR DETAILS OF PERMANENT DRAINAGE FACILITIES SUCH AS DETENTION FACILITIES, CULVERTS, STORM DRAINS, AND INLET AND OUTLET PROTECTION.
4. THIS AREA IS INTENDED TO HAVE MINIMAL DISTURBANCE. ALL DISTURBED AREAS BETWEEN THE DEVELOPMENT AREA AND THE LOC WILL BE SEEDED AND MULCHED. THE COVERAGE AREA WILL BE DEPENDENT ON THE CONTRACTORS DISTURBED AREA. FIELD VERIFY WITH OWNER AND GESC INSPECTOR.
5. ANY SLOPES GREATER THAN 4:1 ARE REQUIRED TO HAVE EROSION CONTROL BLANKETS

(IN FEET)
1 inch = 100 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
GRADING, EROSION AND SEDIMENT CONTROL PLANS
INITIAL GESC PLAN

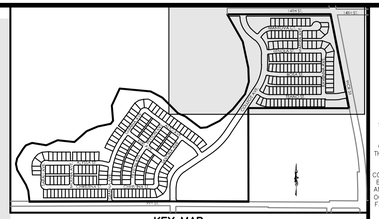
DATE 03/19/20

A	1st SUBMITTAL TO FT. LUPTON 01.31.2020 – MAM

REVISIONS

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 03

CAD FILE: 19003254-INITIAL GESC PLAN.DWG



KEY MAP
N.T.S.

NOTES:

1. SEE COVER SHEET AND DETAILS FOR LEGEND OF BMP NAMES AND SYMBOLS.
2. SHADED BMPS WERE INSTALLED IN INITIAL OR INTERIM GESC DRAWING AND, UNLESS OTHERWISE INDICATED, SHALL BE LEFT IN PLACE UNTIL REVEGETATION ESTABLISHMENT IS APPROVED BY THE COUNTY.
3. SEE CONSTRUCTION PLANS FOR DETAILS OF PERMANENT DRAINAGE FACILITIES SUCH AS DETENTION FACILITIES, CULVERTS, STORM DRAINS, AND INLET AND OUTLET PROTECTION.
4. THIS AREA IS INTENDED TO HAVE MINIMAL DISTURBANCE. ALL DISTURBED AREAS BETWEEN THE DEVELOPMENT AREA AND THE LOC WILL BE SEEDED AND MULCHED. THE COVERAGE AREA WILL BE DEPENDENT ON THE CONTRACTORS DISTURBED AREA. FIELD VERIFY WITH OWNER AND GESC INSPECTOR.
5. ANY SLOPES GREATER THAN 4:1 ARE REQUIRED TO HAVE EROSION CONTROL BLANKETS

(IN FEET)
1 inch = 100 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
GRADING, EROSION AND SEDIMENT CONTROL PLANS
INITIAL GESC PLAN

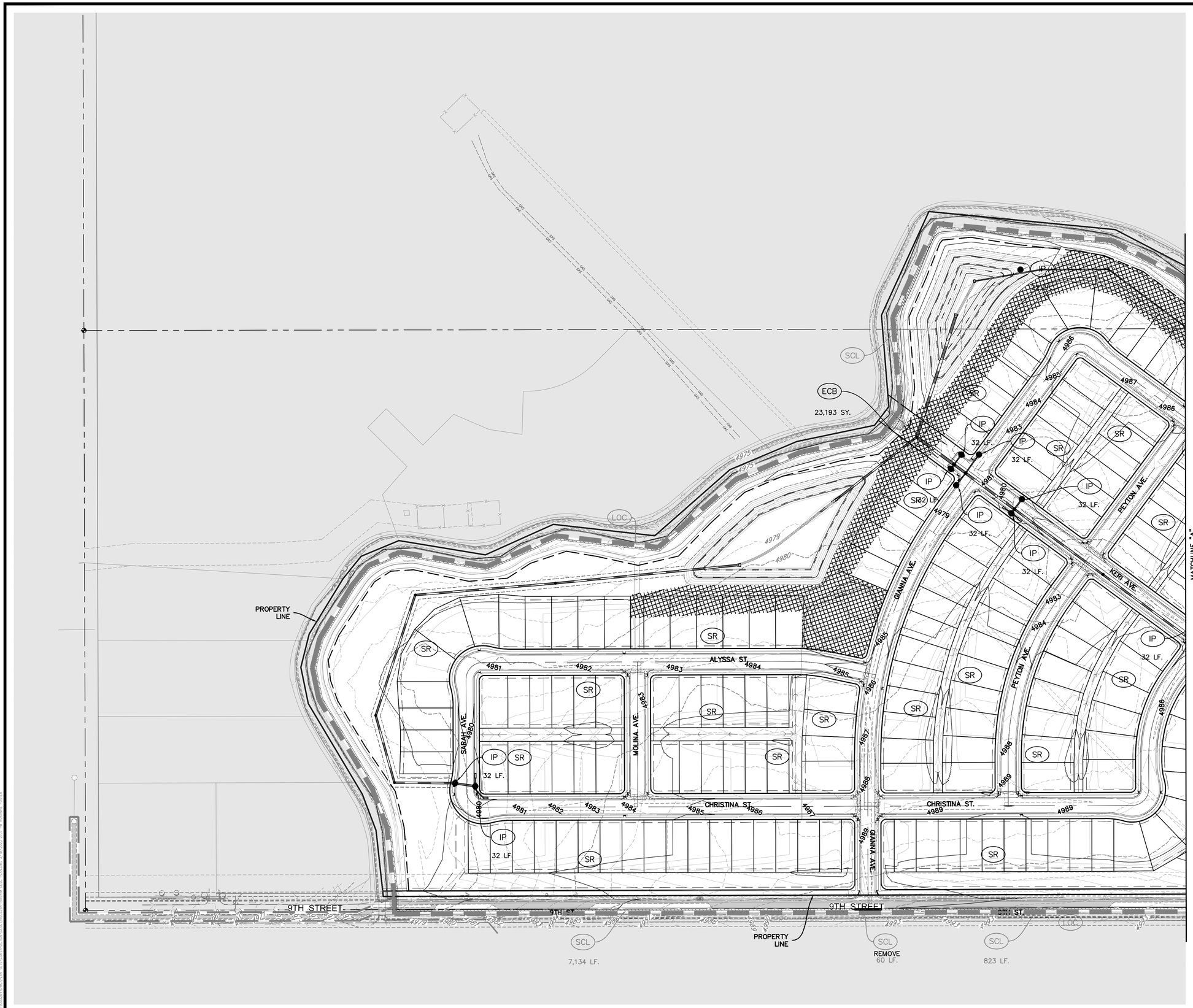
DATE
03/19/20

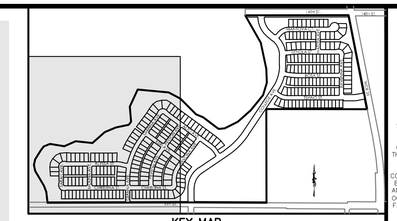
A	1st SUBMITTAL TO FT. LUPTON	01/31/2020 - MAM

REVISIONS

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO.
04

CAD FILE: 19003254-INITIAL GESC PLAN.DWG





KEY MAP
N.T.S.

NOTES:

1. SEE COVER SHEET AND DETAILS FOR LEGEND OF BMP NAMES AND SYMBOLS.
2. SHADED BMPS WERE INSTALLED IN INITIAL OR INTERIM GESC DRAWING AND, UNLESS OTHERWISE INDICATED, SHALL BE LEFT IN PLACE UNTIL REVEGETATION ESTABLISHMENT IS APPROVED BY THE COUNTY.
3. SEE CONSTRUCTION PLANS FOR DETAILS OF PERMANENT DRAINAGE FACILITIES SUCH AS DETENTION FACILITIES, CULVERTS, STORM DRAINS, AND INLET AND OUTLET PROTECTION.
4. THIS AREA IS INTENDED TO HAVE MINIMAL DISTURBANCE. ALL DISTURBED AREAS BETWEEN THE DEVELOPMENT AREA AND THE LOC WILL BE SEEDED AND MULCHED. THE COVERAGE AREA WILL BE DEPENDENT ON THE CONTRACTORS DISTURBED AREA. FIELD VERIFY WITH OWNER AND GESC INSPECTOR.
5. ANY SLOPES GREATER THAN 4:1 ARE REQUIRED TO HAVE EROSION CONTROL BLANKETS

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

(IN FEET)
1 inch = 100 ft.

811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
GRADING, EROSION AND SEDIMENT CONTROL PLANS
INTERIM GESC PLAN

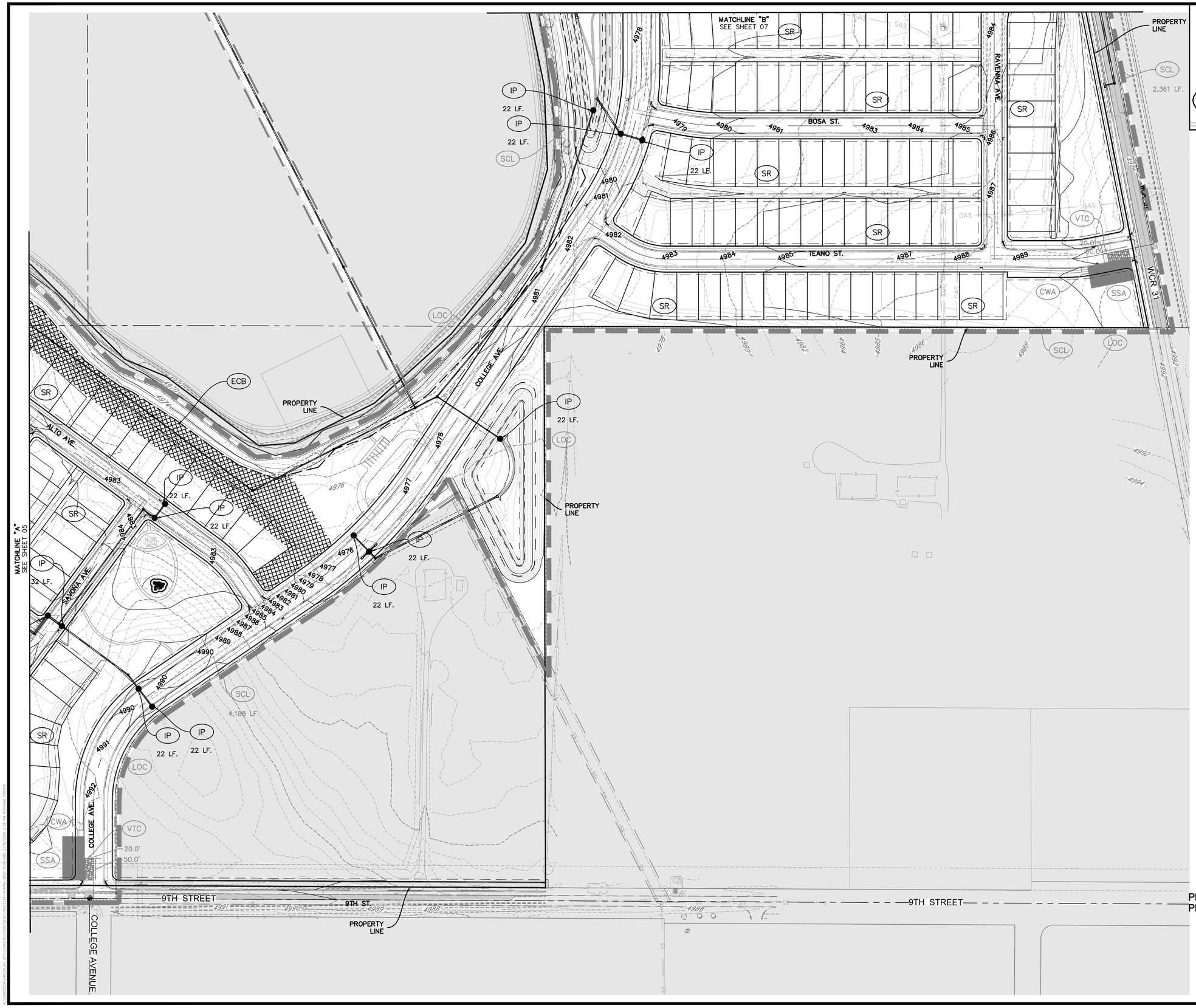
DATE 03/19/20

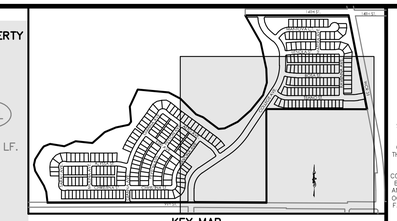
A	1st SUBMITTAL TO FT. LUPTON	01/31/2020 – MAM

REVISIONS

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 05

CAD FILE: 19003254-INTERIM GESC PLAN.DWG





KEY MAP
N.T.S.

NOTES:

1. SEE COVER SHEET AND DETAILS FOR LEGEND OF BMP NAMES AND SYMBOLS.
2. SHADED BMPS WERE INSTALLED IN INITIAL OR INTERIM GESC DRAWING AND, UNLESS OTHERWISE INDICATED, SHALL BE LEFT IN PLACE UNTIL REVEGETATION ESTABLISHMENT IS APPROVED BY THE COUNTY.
3. SEE CONSTRUCTION PLANS FOR DETAILS OF PERMANENT DRAINAGE FACILITIES SUCH AS DETENTION FACILITIES, CULVERTS, STORM DRAINS, AND INLET AND OUTLET PROTECTION.
4. THIS AREA IS INTENDED TO HAVE MINIMAL DISTURBANCE. ALL DISTURBED AREAS BETWEEN THE DEVELOPMENT AREA AND THE LOC WILL BE SEEDED AND MULCHED. THE COVERAGE AREA WILL BE DEPENDENT ON THE CONTRACTORS DISTURBED AREA. FIELD VERIFY WITH OWNER AND GESC INSPECTOR.
5. ANY SLOPES GREATER THAN 4:1 ARE REQUIRED TO HAVE EROSION CONTROL BLANKETS

100 0 100 200
(IN FEET)
1 inch = 100 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
GRADING, EROSION AND SEDIMENT CONTROL PLANS
INTERIM GESC PLAN

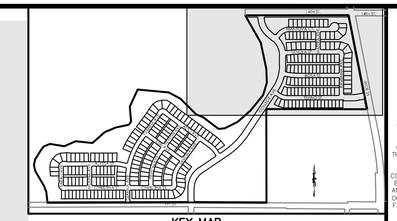
DATE 03/19/20

A	1st SUBMITTAL TO FT. LUPTON 01/31/2020 - MAM

REVISIONS

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 06

CAD FILE: 19003254-INTERIM GESC PLAN.DWG



KEY MAP
N.T.S.

NOTES:

1. SEE COVER SHEET AND DETAILS FOR LEGEND OF BMP NAMES AND SYMBOLS.
2. SHADED BMPS WERE INSTALLED IN INITIAL OR INTERIM GESC DRAWING AND, UNLESS OTHERWISE INDICATED, SHALL BE LEFT IN PLACE UNTIL REVEGETATION ESTABLISHMENT IS APPROVED BY THE COUNTY.
3. SEE CONSTRUCTION PLANS FOR DETAILS OF PERMANENT DRAINAGE FACILITIES SUCH AS DETENTION FACILITIES, CULVERTS, STORM DRAINS, AND INLET AND OUTLET PROTECTION.
4. THIS AREA IS INTENDED TO HAVE MINIMAL DISTURBANCE. ALL DISTURBED AREAS BETWEEN THE DEVELOPMENT AREA AND THE LOC WILL BE SEEDED AND MULCHED. THE COVERAGE AREA WILL BE DEPENDENT ON THE CONTRACTORS DISTURBED AREA. FIELD VERIFY WITH OWNER AND GESC INSPECTOR.
5. ANY SLOPES GREATER THAN 4:1 ARE REQUIRED TO HAVE EROSION CONTROL BLANKETS

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

(IN FEET)
1 inch = 100 ft.

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2020 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
GRADING, EROSION AND SEDIMENT CONTROL PLANS
INTERIM GESC PLAN

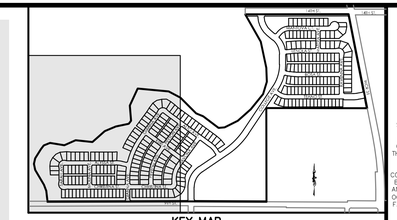
DATE 03/19/20

A	1st SUBMITTAL TO FT. LUPTON 01/31/2020 - MAM

REVISIONS

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 07

CAD FILE: 19003254-INTERIM GESC PLAN.DWG



KEY MAP
N.T.S.

NOTES:

1. SEE COVER SHEET AND DETAILS FOR LEGEND OF BMP NAMES AND SYMBOLS.
2. SHADED BMPS WERE INSTALLED IN INITIAL OR INTERIM GESC DRAWING AND, UNLESS OTHERWISE INDICATED, SHALL BE LEFT IN PLACE UNTIL REVEGETATION ESTABLISHMENT IS APPROVED BY THE COUNTY.
3. SEE CONSTRUCTION PLANS FOR DETAILS OF PERMANENT DRAINAGE FACILITIES SUCH AS DETENTION FACILITIES, CULVERTS, STORM DRAINS, AND INLET AND OUTLET PROTECTION.
4. THIS AREA IS INTENDED TO HAVE MINIMAL DISTURBANCE. ALL DISTURBED AREAS BETWEEN THE DEVELOPMENT AREA AND THE LOC WILL BE SEEDED AND MULCHED. THE COVERAGE AREA WILL BE DEPENDENT ON THE CONTRACTORS DISTURBED AREA. FIELD VERIFY WITH OWNER AND GESC INSPECTOR.
5. ANY SLOPES GREATER THAN 4:1 ARE REQUIRED TO HAVE EROSION CONTROL BLANKETS

(IN FEET)
1 inch = 100 ft.

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2019 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
GRADING, EROSION AND SEDIMENT CONTROL PLANS
FINAL GESC PLAN

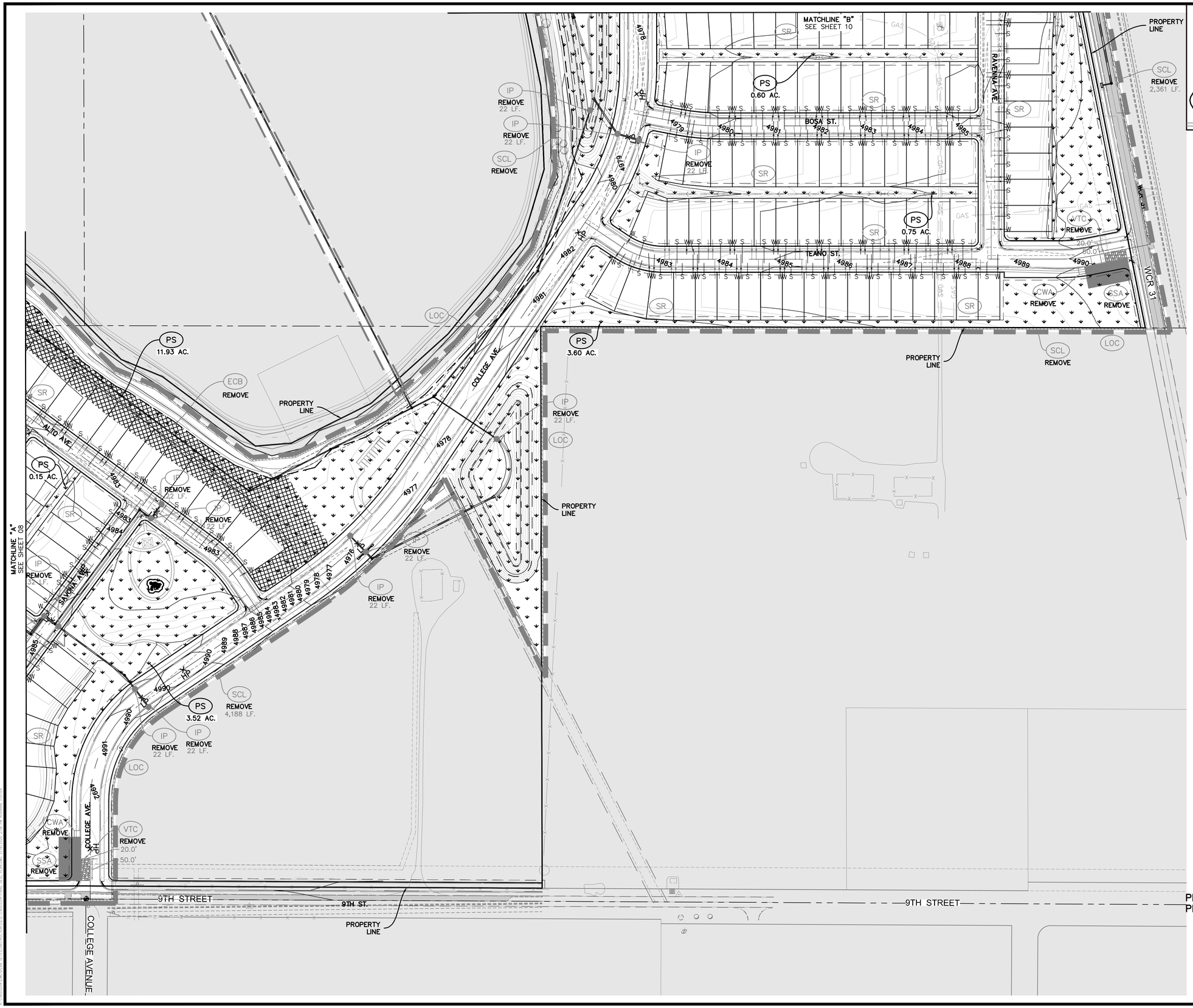
DATE 03/19/20

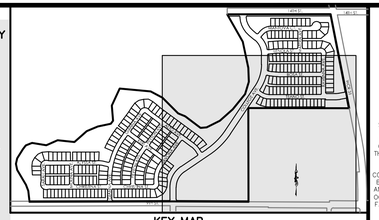
A	1st SUBMITTAL TO FT. LUPTON 01/31/2020 – MAM

REVISIONS

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 08

CAD FILE: 19003254-FINAL GESC PLAN.DWG





KEY MAP
N.T.S.

NOTES:

1. SEE COVER SHEET AND DETAILS FOR LEGEND OF BMP NAMES AND SYMBOLS.
2. SHADED BMPS WERE INSTALLED IN INITIAL OR INTERIM GESC DRAWING AND, UNLESS OTHERWISE INDICATED, SHALL BE LEFT IN PLACE UNTIL REVEGETATION ESTABLISHMENT IS APPROVED BY THE COUNTY.
3. SEE CONSTRUCTION PLANS FOR DETAILS OF PERMANENT DRAINAGE FACILITIES SUCH AS DETENTION FACILITIES, CULVERTS, STORM DRAINS, AND INLET AND OUTLET PROTECTION.
4. THIS AREA IS INTENDED TO HAVE MINIMAL DISTURBANCE. ALL DISTURBED AREAS BETWEEN THE DEVELOPMENT AREA AND THE LOC WILL BE SEEDED AND MULCHED. THE COVERAGE AREA WILL BE DEPENDENT ON THE CONTRACTORS DISTURBED AREA. FIELD VERIFY WITH OWNER AND GESC INSPECTOR.
5. ANY SLOPES GREATER THAN 4:1 ARE REQUIRED TO HAVE EROSION CONTROL BLANKETS

100 0 100 200
(IN FEET)
1 inch = 100 ft.

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2019 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BOULEVARD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
GRADING, EROSION AND SEDIMENT CONTROL PLANS
FINAL GESC PLAN

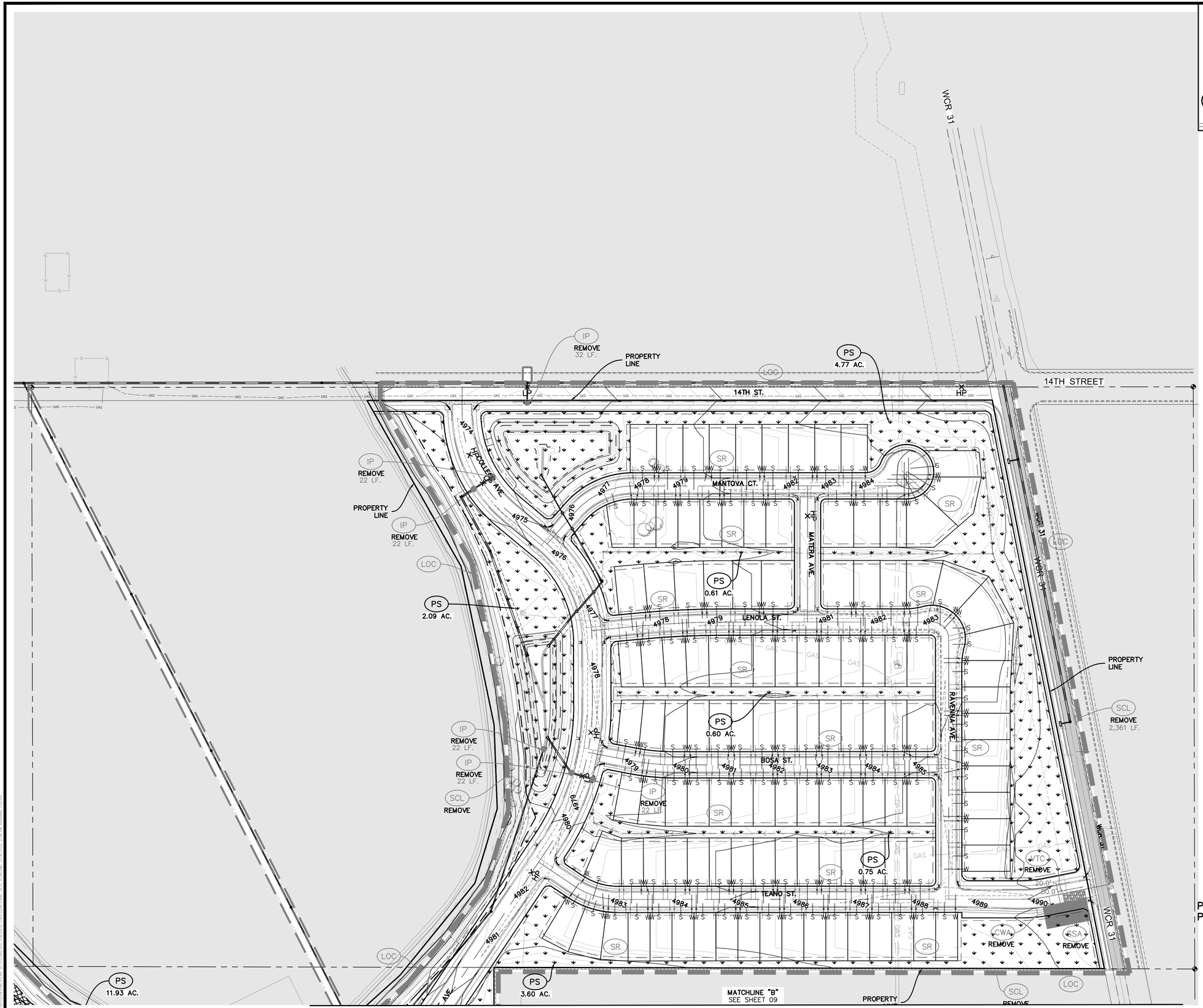
DATE 03/19/20

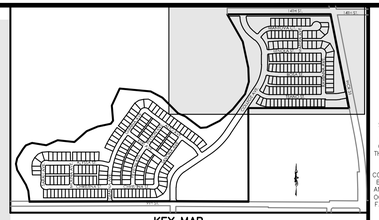
A	1st SUBMITTAL TO FT. LUPTON 01/31/2020 – MAM

REVISIONS

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 09

CAD FILE: 19003254-FINAL GESC PLAN.DWG





KEY MAP
N.T.S.

NOTES:

1. SEE COVER SHEET AND DETAILS FOR LEGEND OF BMP NAMES AND SYMBOLS.
2. SHADED BMPS WERE INSTALLED IN INITIAL OR INTERIM GESC DRAWING AND, UNLESS OTHERWISE INDICATED, SHALL BE LEFT IN PLACE UNTIL REVEGETATION ESTABLISHMENT IS APPROVED BY THE COUNTY.
3. SEE CONSTRUCTION PLANS FOR DETAILS OF PERMANENT DRAINAGE FACILITIES SUCH AS DETENTION FACILITIES, CULVERTS, STORM DRAINS, AND INLET AND OUTLET PROTECTION.
4. THIS AREA IS INTENDED TO HAVE MINIMAL DISTURBANCE. ALL DISTURBED AREAS BETWEEN THE DEVELOPMENT AREA AND THE LOC WILL BE SEEDED AND MULCHED. THE COVERAGE AREA WILL BE DEPENDENT ON THE CONTRACTORS DISTURBED AREA. FIELD VERIFY WITH OWNER AND GESC INSPECTOR.
5. ANY SLOPES GREATER THAN 4:1 ARE REQUIRED TO HAVE EROSION CONTROL BLANKETS

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

(IN FEET)
1 inch = 100 ft.

811
Know what's **below.**
Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2019 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, STE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
GRADING, EROSION AND SEDIMENT CONTROL PLANS
FINAL GESC PLAN

DATE
03/19/20

A	1st SUBMITTAL TO FT. LUPTON	01/31/2020 – MAM

REVISIONS

DR. RF | CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 10

CAD FILE: 19003254-FINAL GESC PLANDWG

TITLE	KEY	SYMBOL
CHECK DAM	CD	
CONSTRUCTION ROAD STABILIZATION	CRS	
CURB SOCK INLET PROTECTION	CS	
CONCRETE WASHOUT AREA	CWA	
DIVERSION DITCH AND DIKE, TEMPORARY	DD	
DIVERSION CHANNEL, TEMPORARY	DV	
DEWATERING	DW	
EROSION CONTROL BLANKET	ECB	
INLET FILTER	IF	
STORM DRAIN INLET PROTECTION	IP	
MULCHING	MU	

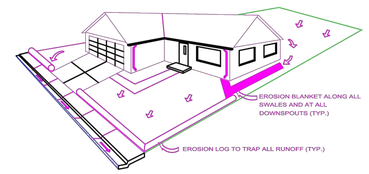
DESIGN STANDARDS	STANDARD DRAWING
MAP SYMBOLS	EC1
	DATE: 8/15/14

TITLE	KEY	SYMBOL
OUTLET PROTECTION	OP	
PAVED FLUME	PF	
PERMANENT SEEDING	PS	
REINFORCED CONCRETE DAM	RCD	
ROUGH CUT STREET CONTROL	RCS	
SEDIMENT BASIN	SB	
STRAW BALE BARRIER	SBB	
SILT FENCE	SF	
SURFACE ROUGHENING	SR	

DESIGN STANDARDS	STANDARD DRAWING
MAP SYMBOLS	EC2
	DATE: 8/15/14

TITLE	KEY	SYMBOL
STABILIZED STAGING AREA	SSA	
SEDIMENT TRAP	ST	
SEDIMENT LOG	SCL	
TERRACING	TER	
TEMPORARY SEEDING	TS	
TEMPORARY STREAM CROSSING CULVERT/BRIDGE TYPE	TSC C	
TEMPORARY STREAM CROSSING FORD TYPE	TSC F	
TEMPORARY SLOPE DRAIN	TSD	
VEHICLE TRACKING CONTROL	VTC	
VEHICLE TRACKING CONTROL WITH WASH RACK	WR	

DESIGN STANDARDS	STANDARD DRAWING
MAP SYMBOLS	EC3
	DATE: 8/15/14

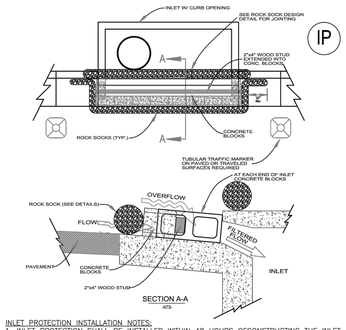


NOTE: EROSION CONTROL MEASURES SHALL BE MAINTAINED AT ALL TIMES AS DIRECTED BY THE CITY

EROSION LOG AND BLANKET BARRIER

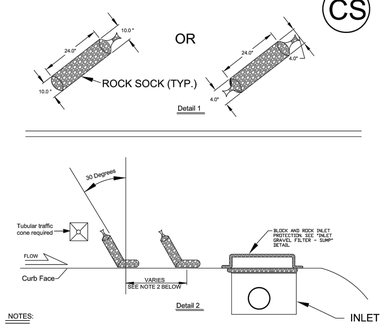
RESIDENTIAL INSTALLATION

DESIGN STANDARDS	STANDARD DRAWING
SINGLE FAMILY EROSION CONTROL PLAN	EC4
	DATE: 8/15/14



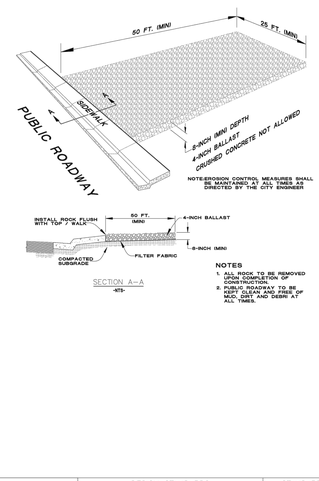
INLET PROTECTION INSTALLATION NOTES:
1. INLET PROTECTION SHALL BE INSTALLED WITHIN 48 HOURS OFCONSTRUCTING THE INLET.
2. SEE ROCK SOCK DESIGN DETAIL FOR INSTALLATION REQUIREMENTS.
3. CONCRETE "CINDER" BLOCKS SHALL BE LAID ON THEIR SIDES AROUND THE INLET IN A SINGLE ROW ABUTTING ONE ANOTHER WITH THE OPEN END FACING AWAY FROM THE CURB.
4. GRAVEL SOCKS SHALL BE PLACED AROUND THE CONCRETE BLOCKS, CLOSELY ABUTTING ONE ANOTHER AND JOINTED IN ACCORDANCE WITH THE ROCK SOCK DESIGN DETAIL.

DESIGN STANDARDS	STANDARD DRAWING
INLET GRAVEL FILTER - SUMP	EC5
	DATE: 8/15/14



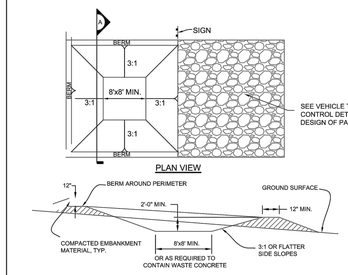
NOTES:
1) SOCKS WILL BE USED UPGRADIENT OF THE INLET AND FLUSH WITH THE CURB.
2) NO LESS THAN TWO 10 INCH DIAMETER SOCKS MUST BE USED IN SEQUENCE, SPACED NO MORE THAN FIVE FEET APART. NO LESS THAN SIX SOCKS SHALL BE USED IF THE 4 INCH SOCK IS USED, ALSO SPACED AT NO MORE THAN 5 FEET APART.
3) ALIGN AT 30 DEGREES FROM PERPENDICULAR, OPPOSITE THE DIRECTION OF FLOW (SEE DETAIL 2.
4) EROSION CONTROL MEASURES SHALL BE MAINTAINED AT ALL TIMES AS DIRECTED BY THE CITY.

DESIGN STANDARDS	STANDARD DRAWING
ON GRADE INLET PROTECTION	EC 6
	DATE: 8/15/14



NOTES
1. ALL ROCK TO BE REMOVED UPON COMPLETION OF CONSTRUCTION.
2. PUBLIC ROADWAY TO BE KEPT CLEAN AND FREE OF MUD, DIRT AND DEBRI AT ALL TIMES.

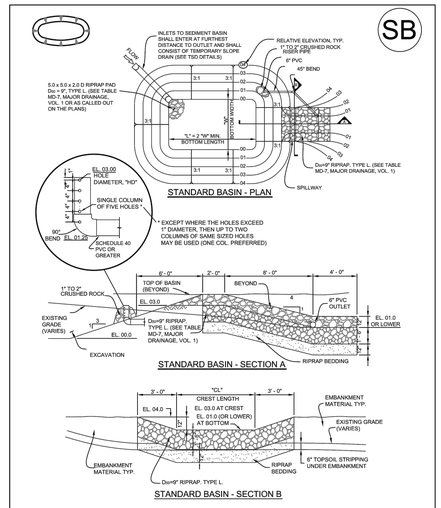
DESIGN STANDARDS	STANDARD DRAWING
VEHICLE TRACKING PAD	EC 8
	DATE: 8/15/14



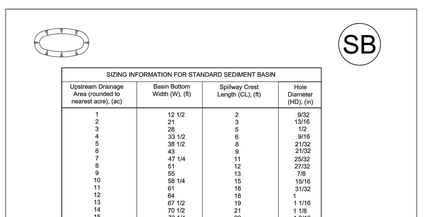
CONCRETE WASHOUT AREA INSTALLATION NOTES
1. SEE PLAN VIEW FOR LOCATIONS OF CONCRETE WASHOUT AREA.
2. THE CONCRETE WASHOUT AREA SHALL BE INSTALLED PRIOR TO ANY CONCRETE PLACEMENT ON SITE.
3. VEHICLE TRACKING CONTROL IS REQUIRED AT THE ACCESS POINT.
4. SIGNS SHALL BE PLACED AT THE CONSTRUCTION ENTRANCE, AT THE WASHOUT AREA, AND ELSEWHERE AS NECESSARY TO CLEARLY INDICATE THE LOCATION OF THE CONCRETE WASHOUT ARE TO OPERATORS OF CONCRETE TRCUYKS AND PUMP RIGS.

CONCRETE WASHOUT AREA MAINTENANCE NOTES
1. THE CONCRETE WASHOUT AREA SHALL BE REPAIRED AND ENLARGED OR CLEANED OUT AS NECESSARY TO MAINTAIN CAPACITY FOR WASTED CONCRETE.
2. AT THE END OF CONSTRUCTION, ALL CONCRETE SHALL BE REMOVED FROM THE SITE AND DISPOSED OF AT AND APPROVED WASTE SITE.
3. WHEN THE CONCRETE WASHOUT AREA IS REMOVED, COVER THE DISTURBED AREA WITH TOP SOIL, DRILL SEED AND CRIMP MULCH, OR OTHERWISE STABILZE IN A MANNER APPROVED BY THE CITY.
4. INSPECT WEEKLY, DURING AND AFTER ANY STORM EVENT.
5. PORTABLE ROLLOFF TYPE OF CONCRETE WASHOUT FACILITIES WILL ALSO BE ALLOWED.

DESIGN STANDARDS	STANDARD DRAWING
CONCRETE WASHOUT AREA	EC 9
	DATE: 8/15/14



DESIGN STANDARDS	STANDARD DRAWING
SEDIMENT BASIN DETAILS	EC 11
	DATE: 8/15/14



SIZING INFORMATION FOR STANDARD SEDIMENT BASIN

Upstream Drainage Area (rounded to nearest acre), (ac)	Basin Bottom Width (W), (ft)	Spillway Crest Length (CL), (ft)	Hole Diameter (HD), (in)
1	12 1/2	2	9/32
2	21	3	13/16
3	28	5	1/2
4	33 1/2	6	9/16
5	38 1/2	8	21/32
6	43	9	21/32
7	47 1/4	11	25/32
8	51	12	27/32
9	55	13	7/8
10	58 1/4	15	15/16
11	61	16	31/32
12	64	18	1
13	67 1/2	19	1 1/16
14	70 1/2	21	1 1/8
15	73 1/4	22	1 3/16

Minimum Bottom Width and diameter of outlet plate holes based on 2,700 cu. ft. / acre of tributary area and 72 hour drain time.

SEDIMENT BASIN INSTALLATION NOTES
1. SEE PLAN VIEW AND SECTIONS FOR:
   - LOCATION OF SEDIMENT BASIN
   - TYPE OF BASIN (STANDARD BASIN OR NONSTANDARD BASIN),
   - FOR STANDARD BASIN, BOTTOM WIDTH, "W", CREST LENGTH, "CL", AND HOLE DIAMETER, "HD".
   - FOR NONSTANDARD BASIN, SEE CONSTRUCTION DRAWINGS FOR DESIGN OF BASIN INCLUDING RISER HEIGHT, "H", NUMBER OF COLUMNS, "N", HOLE DIAMETER, "HD", AND PIPE DIAMETER "D".
2. FOR STANDARD BASIN, BOTTOM DIMENSION MAY BE MODIFIED AS LONG AS BOTTOM AREA IS NOT REDUCED.
3. SEDIMENT BASINS INDICATED ON INITIAL SWMP PLAN SHALL BE INSTALLED PRIOR TO ANY OTHER LAND-DISTURBING ACTIVITY.
4. EMBANKMENT MATERIAL SHALL CONSIST OF SOIL FREE OF DEBRIS, ORGANIC MATERIAL, AND ROCKS OR CONCRETE GREATER THAN 3 INCHES AND SHALL HAVE A MINIMUM OF 15 PERCENT BY WEIGHT PASSING THE NO. 200 SIEVE.
5. EMBANKMENT MATERIAL SHALL BE COMPACTED TO AT LEAST 95 PERCENT OF MAXIMUM DENSITY IN ACCORDANCE WITH ASTM D 698.
6. PIPE SCH 40 OR GREATER SHALL BE USED.
7. THE DETAILS SHOWN ON THESE SHEETS PERTAIN TO STANDARD SEDIMENT BASIN(S) IDENTIFIED ON THE SWMP PLAN VIEW DRAWINGS USED FOR DRAINAGE AREAS LESS THAN 15 ACRES. SEE CONSTRUCTION DRAWINGS FOR EMBANKMENT, STORAGE VOLUME, SPILLWAY, OUTLET, AND OUTLET PROTECTION DETAILS FOR ANY SEDIMENT BASIN(S) THAT HAVE BEEN INDIVIDUALLY DESIGNED FOR DRAINAGE AREAS LARGER THAN 15 ACRES.

SEDIMENT BASIN MAINTENANCE NOTES
1. THE SWMP MANAGER SHALL INPSECT SEDIMENT BASIN WEEKLY, DURING AND AFTER ANY STORM EVENT AND MAKE REPAIRS OR CLEAN OUT AS NECESSARY.
2. SEDIMENT ACCUMULATED IN BASIN SHALL BE REMOVED WHEN SEDIMENT DEPTH IS ONE FOOT (I.E., 2-FEET BELOW THE SPILLWAY CREST).
3. SEDIMENT BASINS ARE TO REMAIN IN PLACE UNTIL THE UPSTREAM DISTURBED AREA IS STABILIZED AND GRASS COVER IS ACCEPTED BY THE CITY.
4. WHEN SEDIMENT BASINS ARE REMOVED, ALL DISTURBED AREAS SHALL BE COVERED WITH TOPSOIL, SEEDED AND MULCHED OR OTHERWISE STABILIZED AS APPROVED BY THE CITY.

DESIGN STANDARDS	STANDARD DRAWING
SEDIMENT BASIN SIZING & NOTES	EC 12
	DATE: 8/15/14

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2019 ATWELL LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
GRADING, EROSION AND SEDIMENT CONTROL PLANS
GESC DETAILS

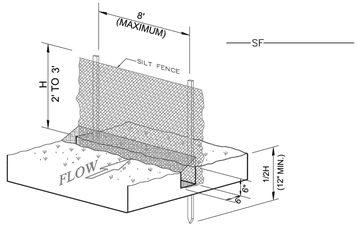
DATE 03/19/20

A	1st SUBMITTAL TO FT. LUPTON 01/31/2020 - MAM

REVISIONS

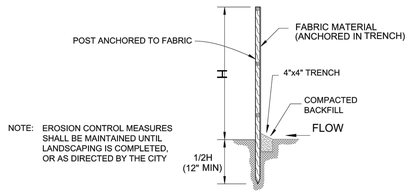
DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 11

CAD FILE: 19003254-GESC DETAILS.DWG



SILT FENCE INSTALLATION

-NTS-



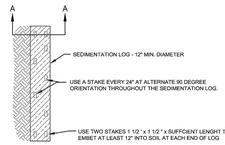
NOTE: EROSION CONTROL MEASURES SHALL BE MAINTAINED UNTIL LANDSCAPING IS COMPLETED, OR AS DIRECTED BY THE CITY

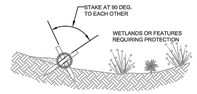
SECTION

-NTS-

CITY OF Fort Lupton EST. 1890 COME PAINT YOUR FUTURE WITH US	DESIGN STANDARDS	STANDARD DRAWING
	SILT FENCE	EC 15
		DATE: 8/15/14

SCL





SECTION A - A

SEDIMENT CONTROL LOG INSTALLATION NOTES

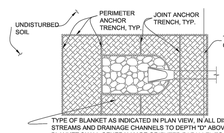
1. SEE PLAN VIEW FOR:
   - LOCATION AND LENGTH OF SEDIMENT CONTROL LOG.
2. SEDIMENT CONTROL LOGS INDICATED ON INITIAL SWMP PLAN SHALL BE INSTALLED PRIOR TO ANY LAND-DISTURBING ACTIVITIES.
3. SEDIMENT CONTROL LOGS SHALL CONSIST OF STRAW, COMPOST, EXCELSIOR, OR COCONUT FIBER.
4. NOT FOR USE IN CONCENTRATED FLOW AREAS.
5. THE SEDIMENT CONTROL LOG SHALL BE TRENCHED INTO THE GROUND A MINIMUM OF 2".

SEDIMENT CONTROL LOG MAINTENANCE NOTES

1. THE SWMP MANAGER SHALL INSPECT SEDIMENT CONTROL LOGS DAILY, DURING AND AFTER ANY STORM EVENT AND MAKE REPAIRS OR CLEAN OUT UPSTREAM SEDIMENT AS NECESSARY.
2. SEDIMENT ACCUMULATED UPSTREAM OF SEDIMENT CONTROL LOGS SHALL BE REMOVED WHEN THE UPSTREAM SEDIMENT DEPTH IS WITHIN ½ THE HEIGHT OF THE CREST OF LOG.
3. SEDIMENT CONTROL LOG SHALL BE REMOVED AT THE END OF CONSTRUCTION. IF ANY DISTURBED AREA EXISTS AFTER REMOVAL, IT SHALL BE COVERED WITH TOP SOIL, DRILL SEEDED AND CRIMP MULCHED OR OTHERWISE STABILIZED IN A MANNER APPROVED BY THE CITY.

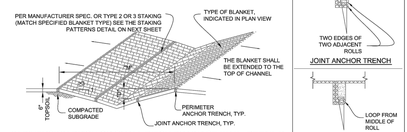
CITY OF Fort Lupton EST. 1890 COME PAINT YOUR FUTURE WITH US	DESIGN STANDARDS	STANDARD DRAWING
	SEDIMENT CONTROL LOGS	EC 16
		DATE: 8/15/14

ECB

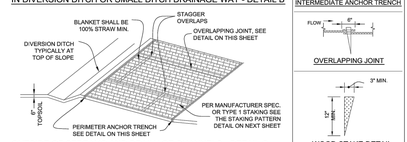


TYPE OF BLANKET AS INDICATED IN PLAN VIEW. IN ALL DISTURBED AREAS OF STREAMS AND DRAINAGE CHANNELS TO DEPTH "D" ABOVE CHANNEL INVERT. BLANKET SHALL GENERALLY BE ORIENTED PARALLELL TO FLOW DIRECTION. STAKING PATTERN SHALL MATCH BLANKET TYPE.

AT PIPE OUTLET AREAS OF STREAMS AND DRAINAGE CHANNELS - DETAIL A



IN DIVERSION DITCH OR SMALL DITCH DRAINAGE WAY - DETAIL B

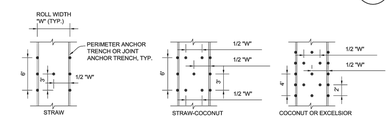


OUTSIDE OF STREAMS AND DRAINAGE CHANNELS - DETAIL C

ANCHOR DETAILS

CITY OF Fort Lupton EST. 1890 COME PAINT YOUR FUTURE WITH US	DESIGN STANDARDS	STANDARD DRAWING
	EROSION BLANKET DETAILS	EC 17
		DATE: 8/15/14

ECB



STAKING PATTERNS

SHALL BE IN ACCORDANCE WITH MANUFACTURER'S SPECIFICATION. IF NO MANUFACTURER'S SPECIFICATION IS AVAILABLE USE THE ACCEPTABLE STAKING PATTERN (AS SHOWN ABOVE)

EROSION CONTROL BLANKET INSTALLATION NOTES

1. SEE PLAN VIEW FOR:
   - LOCATION OF PERIMETER OF EROSION CONTROL BLANKET.
   - TYPE OF BLANKET (STRAW, STRAW-COCONUT, COCONUT, OR EXCELSIOR).
   - AREA "A" IN SQUARE YARDS OF EACH TYPE OF BLANKET.
2. ALL EROSION CONTROL BLANKETS AND NETTING SHALL BE MADE OF 100% NATURAL AND BIODEGRADABLE MATERIAL; NO PLASTIC OR OTHER SYNTHETIC MATERIAL, EVEN IF PHOTO DEGRADABLE, SHALL BE ALLOWED.
3. IN AREAS WHERE EROSION CONTROL BLANKET IS SHOWN ON THE PLANS, THE DEVELOPER SHALL PLACE TOPSOIL AND PERFORM FINAL GRADING, SURFACE PREPARATION, AND SEEDING BELOW THE SEEDING AND MULCHING. SUBGRADE SHALL BE SMOOTH AND MOIST PRIOR TO BLANKET INSTALLATION AND THE BLANKET SHALL BE IN FULL CONTACT WITH SUBGRADE; NO GAPS OR VOIDS SHALL EXIST UNDER THE BLANKET.
4. PERIMETER ANCHOR TRENCH SHALL BE USED AT OUTSIDE PERIMETER OF ALL BLANKET AREAS.
5. JOINT ANCHOR TRENCH SHALL BE USED TO JOIN ROLLS OF BLANKETS TOGETHER (LONGITUDINALLY AND TRANSVERSELY) FOR ALL BLANKETS EXCEPT STRAW, WHICH MAY USE AN OVERLAPPING JOINT.
6. INTERMEDIATE ANCHOR TRENCH SHALL BE USED AT SPACING OF ONE-HALF THE ROLL LENGTH FOR COCONUT AND EXCELSIOR BLANKETS.
7. THE OVERLAPPING JOINT DETAIL SHALL BE USED TO JOIN ROLLS OF BLANKETS TOGETHER FOR BLANKETS ON SLOPES.
8. MATERIAL SPECIFICATIONS OF EROSION CONTROL BLANKET SHALL CONFORM TO TABLE 7.1.
9. ANY AREAS OF SEEDING AND MULCHING DISTURBED IN THE PROCESS OF INSTALLING EROSION CONTROL BLANKET SHALL BE RESEEDED AND MULCHED.
10. DETAILS ON DESIGN PLANS FOR MAJOR DRAINAGEWAY STABILIZATION WILL GOVERN IF DIFFERENT FROM ONES SHOWN HERE

TABLE 7.1 - EROSION CONTROL BLANKET TYPE

TYPE	COCONUT CONTENT	STRAW CONTENT	EXCELSIOR CONTENT	NETTING MIN.
STRAW*		100%	-	DOUBLE NATURAL
STRAW-COCONUT	30% MIN.	70% MAX.	-	DOUBLE NATURAL
COCONUT*	100%		-	DOUBLE NATURAL
EXCELSIOR			100%	DOUBLE NATURAL

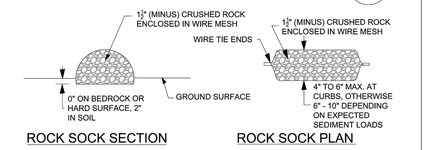
* FOR OUTSIDE OF STREAMS AND DRAINAGE CHANNELS

EROSION CONTROL BLANKET MAINTENANCE NOTES

1. THE SWMP MANAGER SHALL INSPECT EROSION CONTROL BLANKETS WEEKLY, DURING AND AFTER ANY STORM EVENT AND MAKE REPAIRS AS NECESSARY.
2. EROSION CONTROL BLANKET IS TO BE LEFT IN PLACE UNLESS DIRECTED TO BE REMOVED BY THE CITY.
3. ANY EROSION CONTROL BLANKET PULLED OUT, TORN, OR OTHERWISE DAMAGED SHALL BE RE-INSTALLED. ANY SUBGRADE AREAS BELOW THE BLANKET THAT HAVE ERODED TO CREATE A VOID UNDER THE BLANKET, OR THAT REMAIN DEVOID OF GRASS SHALL BE REPAIRED, RESEEDED AND MULCHED AND THE EROSION CONTROL BLANKET REINSTALLED.

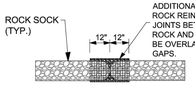
CITY OF Fort Lupton EST. 1890 COME PAINT YOUR FUTURE WITH US	DESIGN STANDARDS	STANDARD DRAWING
	EROSION BLANKET INSTALLATION AND MAINTENANCE NOTES	EC 18
		DATE: 8/15/14

RS



ROCK SOCK SECTION

ROCK SOCK PLAN



ANY GAP AT JOINT SHALL BE FILLED WITH AN ADEQUATE AMOUNT OF 1½" (MINUS) CRUSHED ROCK AND WRAPPED WITH ADDITIONAL WIRE MESH SECURED TO THE ENDS OF THE ROCK REINFORCED SOCK. AS AN ALTERNATIVE TO FILLING JOINTS BETWEEN ADJOINING ROCK SOCKS WITH CRUSHED ROCK AND ADDITIONAL WIRE WRAPPING, ROCK SOCKS CAN BE OVERLAPPED (TYPICALLY 12 - INCH OVERLAP) TO AVOID GAPS.

ROCK SOCK JOINTING

GRADATION TABLE	
SIEVE SIZE	MASS PERCENT PASSING SQUARE MESH SIEVES
	NO. 4
2"	100
11/2"	90 - 100
1"	20 - 55
3/4"	0 - 15
3/8"	0 - 5
MATCHES SPECIFICATIONS FOR NO. 4 COARSE AGGREGATE FOR CONCRETE PER AASHTO M43. ALL ROCK SHALL BE FRACTURED FACE, ALL SIDES.	

ROCK SOCK INSTALLATION NOTES

1. SEE PLAN VIEW FORLOCATION OF ROCK SOCKS.
2. CRUSHED ROCK SHALL BE 11/2 " (MINUS) IN SIZE WITH A FRACTURED FACE (ALL SIDES) AND SHALL COMPLY WITH GRADATION SHOWN ON THIS SHEET (11/2" MINUS).
3. WIRE MESH SHALL BE FABRICATED OD 10 GAGE POULTRY MESH OR EQUIVALENT WITH A MAXIMUM OPENING OF 1/2", RECOMMENDED MINIMUM ROLL WIDTH OF 48".
4. WIRE MESH SHALL BE SECURED USING "HOG RINGS" OR WIRE TIES AT 6" CENTERS ALONG ALL JOINTS AND AT 2" CENTERS ON ENDS OF SOCKS.

CITY OF Fort Lupton EST. 1890 COME PAINT YOUR FUTURE WITH US	DESIGN STANDARDS	STANDARD DRAWING
	ROCK SOCK DETAIL	EC 19
		DATE: 8/15/14

PROJECT NO.: LUP2019-0033 &
PLAN NO.: PPL2019-0002

811 Know what's below. Call before you dig.

THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.

NOTICE:
CONSTRUCTION SITE SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR; NEITHER THE OWNER NOR THE ENGINEER SHALL BE EXPECTED TO ASSUME ANY RESPONSIBILITY FOR SAFETY OF THE WORK, OF PERSONS ENGAGED IN THE WORK, OF ANY NEARBY STRUCTURES, OR OF ANY OTHER PERSONS.

COPYRIGHT © 2019 ATWELL, LLC NO REPRODUCTION SHALL BE MADE WITHOUT THE PRIOR WRITTEN CONSENT OF ATWELL, LLC

ATWELL
866.850.4200 www.atwell-group.com
143 UNION BLVD, SUITE 700
LAKEWOOD, CO 80228
303.462.1100

DEVELOPER
4040 MacARTHUR BLVD.
SUITE 250
NEWPORT BEACH, CA 92660
303-905-3496
ARBOR CAPITAL PARTNERS, LLC

CLIENT
ARBOR CAPITAL PARTNERS, LLC

COTTONWOOD GREENS
FORT LUPTON, COLORADO
GRADING, EROSION AND SEDIMENT CONTROL PLANS
GESC DETAILS

DATE 03/19/20

A	1st SUBMITTAL TO FT. LUPTON 01/31/2020 - MAM

REVISIONS

DR. RF CH. MAM
P.M. MAM
JOB 19003254
SHEET NO. 12

CAD FILE: 19003254-GESC DETAILS.DWG

Project: Cottonwood Greens Subdivision
Date: February 5, 2020
Client: Arbor Capital Partners

Prepared By: MLH
Job Number: 19003254

ATWELL

Cottonwood Greens Metropolitan District
Overall

Storm Drainage

Item	Qty	Unit	Unit Cost	Item Cost	Description
18" Storm Sewer	378	LF	$150.00	$56,700.00	Includes storm sewer pipe, inlets, manholes and FES
24" Storm Sewer	3,131	LF	$155.00	$485,305.00	Includes storm sewer pipe, inlets, manholes and FES
30" Storm Sewer	2,093	LF	$160.00	$334,880.00	Includes storm sewer pipe, inlets, manholes and FES
36" Storm Sewer	670	LF	$165.00	$110,550.00	Includes storm sewer pipe, inlets, manholes and FES
42" Storm Sewer	20	LF	$170.00	$3,400.00	Includes storm sewer pipe, inlets, manholes and FES
48" Storm Sewer	5,800	LF	$175.00	$1,015,000.00	Includes storm sewer pipe, inlets, manholes and FES
54" Storm Sewer	221	LF	$180.00	$39,780.00	Includes storm sewer pipe, inlets, manholes and FES
60" Storm Sewer	138	LF	$190.00	$26,220.00	Includes storm sewer pipe, inlets, manholes and FES
72" Storm Sewer	428	LF	$200.00	$85,600.00	Includes storm sewer pipe, inlets, manholes and FES
Detention Pond	5	EA	$60,000.00	$300,000.00	Includes inlet/outlet structures, trickle channel, micropool, forebay, grading and seeding
Storm Total				**$2,457,435.00**	

Sanitary Sewer

Item	Qty	Unit	Unit Cost	Item Cost	Description
8" Sanitary Sewer	13,950	LF	$65.00	$906,750.00	Includes 8" sanitary sewer pipe, manholes and stubs
Sanitary Sewer Service	287	EA	$100.00	$28,700.00	
Sanitary Total				**$935,450.00**	

Water Distribution

Item	Qty	Unit	Unit Cost	Item Cost	Description
12" Water Line	1,956	LF	$120.00	$234,720.00	Includes water mains, valves, fittings, bends, hydrants, blowoffs, etc..
8" Water Line	13,618	LF	$85.00	$1,157,530.00	Includes water mains, valves, fittings, bends, hydrants, blowoffs, etc..
4" Irrigation Line	14,396	LF	$50.00	$719,800.00	Includes water mains, valves, fittings, bends, hydrants, blowoffs, etc..
Water Service	287	EA	$100.00	$28,700.00	
Water Total				**$2,112,050.00**	

Roadways

Item	Qty	Unit	Unit Cost	Item Cost	Description
9th Street	3,315	LF	$200.00	$663,000.00	Minor Collector - Half Section - Includes roadway, curb & gutter and sidewalks
14th Street	1,897	LF	$250.00	$474,250.00	Major Collector - Half Section - Includes roadway, curb & gutter and sidewalks
College Avenue	3,257	LF	$400.00	$1,302,800.00	Minor Collector - Full Section - Includes roadway, curb & gutter and sidewalks
Street A	2,471	LF	$290.00	$716,590.00	Local Residential - Includes roadway, curb & gutter and sidewalks
Street B	3,581	LF	$290.00	$1,038,490.00	Local Residential - Includes roadway, curb & gutter and sidewalks
Street C	346	LF	$290.00	$100,340.00	Local Residential - Includes roadway, curb & gutter and sidewalks
Street D	1,015	LF	$290.00	$294,350.00	Local Residential - Includes roadway, curb & gutter and sidewalks
Street E	656	LF	$290.00	$190,240.00	Local Residential - Includes roadway, curb & gutter and sidewalks
Street F	1,352	LF	$290.00	$392,080.00	Local Residential - Includes roadway, curb & gutter and sidewalks
Street G	840	LF	$290.00	$243,600.00	Local Residential - Includes roadway, curb & gutter and sidewalks
Street H	1,445	LF	$290.00	$419,050.00	Local Residential - Includes roadway, curb & gutter and sidewalks
Street I	326	LF	$290.00	$94,540.00	Local Residential - Includes roadway, curb & gutter and sidewalks
Street J	948	LF	$290.00	$274,920.00	Local Residential - Includes roadway, curb & gutter and sidewalks
Roadway Total				**$6,204,250.00**	

Soil Erosion Control

Item	Qty	Unit	Unit Cost	Item Cost	Description
Wattles	14,500	LF	$2.00	$29,000.00	
Mulching	15	AC	$500.00	$7,500.00	
Temporary Seeding	15	AC	$500.00	$7,500.00	
Temporary Sediment Basin	2	EA	$2,500.00	$5,000.00	
Silt Fence	6,000	LF	$1.00	$6,000.00	
Permanent Seeding	30	AC	$600.00	$18,000.00	
Rock Sock	5	EA	$150.00	$750.00	
Erosion Control Blanket	23,193	SY	$2.00	$46,386.00	
Vehicle Tracking Control	2	EA	$3,000.00	$6,000.00	
Inlet/Outlet Protection	19	EA	$200.00	$3,800.00	
Soil Erosion Control Total				**$129,936.00**	

Earthwork

Item	Qty	Unit	Unit Cost	Item Cost	Description
Earthwork	150000	CY	$5.00	$750,000.00	Includes surface roughening
Import	87500	CY	$15.00	$1,312,500.00	
Earthwork Total				**$2,062,500.00**	

Open Space

Item	Qty	Unit	Unit Cost	Item Cost	Description
Trail	6,500	LF	$35.00	$227,500.00	Trail along Fulton Ditch
Landscape	1	LS	$750,000.00	$750,000.00	Est.
Site Work	1	LS	$225,000.00	$225,000.00	Est.
Site Furnishings	1	LS	$165,000.00	$165,000.00	Est.
9th Street Tree Lawn	3,315	LF	$42.00	$139,230.00	Est.
14th Street Tree Lawn	1,897	LF	$42.00	$79,674.00	Est.
County Road 31 Tree Lawn	1,339	LF	$42.00	$56,238.00	Est.
Open Space Total				**$1,642,642.00**	

Miscelaneous

Item	Qty	Unit	Unit Cost	Item Cost	Description
Soft Costs	1	LS	$1,405,000.00	$1,405,000.00	Est.
Open Space Total				**$1,405,000.00**	

Total

Sub-Total:	**$16,949,263.00**
20% contingency:	$3,389,852.60
Cottonwood Greens Metropolitan District TOTAL:	**$20,339,115.60**

Alyssa Knutson

From: Ruscio, John <John_Ruscio@comcast.com>
Sent: Monday, May 11, 2020 6:27 AM
To: Alyssa Knutson
Cc: Todd Hodges; Maria Lancto
Subject: RE: Cottonwood Greens PUD Final Plat - Filings 1 - 5; Project No. LUP2020-0010 & Plan No. FPL2020-0002

Follow Up Flag: Follow up
Flag Status: Completed

Thank you Alyssa,
No concerns.

From: Alyssa Knutson <AKnutson@Fortluptonco.gov>
Sent: Friday, May 8, 2020 2:38 PM
Cc: Todd Hodges <thodges@Fortluptonco.gov>; Maria Lancto <MLancto@Fortluptonco.gov>
Subject: [EXTERNAL] FW: Cottonwood Greens PUD Final Plat - Filings 1 - 5; Project No. LUP2020-0010 & Plan No. FPL2020-0002

Hello,

This is a reminder that comments for this project are due on Monday, and the case goes to City Council on Tuesday, May 19. If you have any comments you would like us to consider, please forward them by the end of the day on Monday.

Thank you,

Alyssa Knutson, AICP
Planner II & FLURA Staff Liaison
130 S. McKinley Ave.
Fort Lupton, CO 80621
Office: 303.857.6694
Direct: 720.466.6128
Mobile: 303.304.4498

This institution is an equal opportunity provider and employer.

From: Alyssa Knutson
Sent: Monday, April 20, 2020 1:18 PM
Cc: Todd Hodges <thodges@Fortluptonco.gov>; Maria Lancto <MLancto@Fortluptonco.gov>; Stephanie Darnell <sdarnell@Fortluptonco.gov>
Subject: Cottonwood Greens PUD Final Plat - Filings 1 - 5; Project No. LUP2020-0010 & Plan No. FPL2020-0002

Good Morning,

The documentation located at the following links are submitted to you for review and recommendation for a final plat for a residential subdivision being reviewed by the City of Fort Lupton. The application

documents can be reviewed at the following link:
https://www.fortlupton.org/DocumentCenter/Index/472.

Any comments you consider relevant to this request would be appreciated. Please reply by **May 11, 2020**, so that we may give full consideration to your recommendation. Any response not received before or on this date may be deemed to be a favorable response to the Planning & Building Department.

The public hearing for this matter will be held at Fort Lupton City Hall – 130 S. McKinley Avenue (unless due to COVID-19 it needs to be conducted virtually. You are advised to check the City of Fort Lupton website for information and updates on this) and are scheduled for the following dates:

- **City Council on Tuesday, May 19, 2020 at 7:00 PM**

Please send comments back to: PlanningDept@fortluptonco.gov.

Your time in this matter is greatly appreciated!

Alyssa Knutson, AICP
Planner II
130 S. McKinley Ave.
Fort Lupton, CO 80621
Office: 303.857.6694
Direct: 720.466.6128
Mobile: 303.304.4498

This institution is an equal opportunity provider and employer.

Alyssa Knutson, AICP
Planner II & FLURA Staff Liaison
130 S. McKinley Ave.
Fort Lupton, CO 80621
Office: 303.857.6694
Direct: 720.466.6128
Mobile: 303.304.4498

This institution is an equal opportunity provider and employer.

The information transmitted is intended only for the person or entity to which it is addressed and may contain CONFIDENTIAL material. If you receive this information in error, please delete or destroy the information.

Fort Lupton Fire Protection District
1121 Denver Avenue • Fort Lupton, Colorado 80621
Office: (303)857-4603 • Fax: (303)857-6619 • Website: www.fortluptonfire.org

Date: 10/18/2019
Project name: Cottonwood Greens Sub-Division Site Plan
Project address: 9th St and Collage Ave., Fort Lupton, Co 80621
FLFPD Project # 2019-0120
Plan reviewer: Taw Tamlin, Fire Marshal

The Fire District has reviewed the site plan submittal for **Cottonwood Greens Sub-Division Site Plan** located at **9th St and Collage Ave.**, Fort Lupton, CO 80621. The submittal was reviewed for compliance with *2012 International Fire Code (IFC)* and the current National Fire Protection Association (*NFPA)* standards as adopted by the Fort Lupton Fire Protection District and the City Council of Fort Lupton. The following specific and general requirements and conditions shall be met at time of construction.

Specific Requirements:

1. Where a fire hydrant is located on a fire apparatus access road, the minimum road width shall be 26 feet (7925 mm), exclusive of shoulders (see Figure D103.1). *2012 IFC, D103.1*

2. The minimum turning radius shall be determined by the fire code official. *2012 IFC, D103.3*
    a. See attached document showing the minimum turning radius needed

3. The minimum fire-flow and flow duration requirements for one- and two-family dwellings having a fire-flow calculation area that does not exceed 3,600 square feet (344.5 m2) shall be 1,000 gallons per minute (3785.4 L/min) for 1 hour. Fire-flow and flow duration for dwellings having a fire-flow calculation area in excess of 3,600 square feet (344.5m2) shall not be less than that specified in Table B105.1. *2012 IFC, B105.1*

    Exception: A reduction in required fire-flow of 50 percent, as approved, is allowed when the building is equipped with an approved automatic sprinkler system.

4. The minimum number of fire hydrants available to a building shall not be less than that listed in Table C105.1. The number of fire hydrants available to a complex or subdivision shall not be less than that determined by spacing requirements listed in Table C105.1 when applied to fire apparatus access roads and perimeter public streets from which fire operations could be conducted. *2012 IFC, C103.1*

5. New and existing buildings shall have approved address numbers, building numbers or approved building identification placed in a position that is plainly legible and visible from the street or road fronting the property. These numbers shall contrast with their background. Where required by the fire code official, address numbers shall be provided in additional approved locations to facilitate emergency response. Address numbers shall be Arabic numbers or alphabetical letters. Numbers shall be a minimum of 4 inches (101.6 mm) high with a minimum stroke width of 0.5 inch (12.7 mm). Where access is by means of a private road and the building cannot be viewed from the public way, a monument, pole or other sign or means shall be used to identify the structure. Address numbers shall be maintained. *2012 IFC, 505.1*

6. When fire apparatus access roads or a water supply for fire protection is required to be installed, such protection shall be installed and made serviceable prior to and during the time of construction except when approved alternative methods of protection are provided. Temporary street signs shall be installed at each street intersection when construction of new roadways allows passage by vehicles in accordance with Section 505.2. *2012 IFC, 501.4*

7. Approved vehicle access for firefighting shall be provided to all construction or demolition sites. Vehicle access shall be provided to within 100 feet (30 480 mm) of temporary or permanent fire department connections. Vehicle access shall be provided by either temporary or permanent roads, capable of supporting vehicle loading under all weather conditions. Vehicle access shall be maintained until permanent fire apparatus access roads are available. *2012 IFC, 3310.1*

Please contact Fire Marshal, Taw Tamlin at 303-857-4603 if you have questions or need further assistance.

CITY OF Fort Lupton EST 1836
COME PAINT YOUR FUTURE WITH US

Public Works

130 S. McKinley Avenue
Fort Lupton, CO 80621
Phone: 303-857-6694
Fax: 303.857.0351
www.fortlupton.org

MEMO

To: Todd Hodges
Alyssa Knutson
CC: Michael McGoldrick (Atwell)

From: Roy Vestal

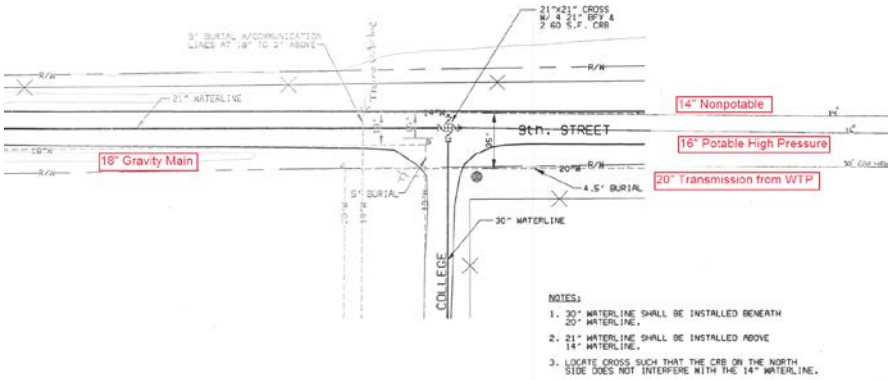
Date: May 11, 2020

Subject: Cottonwood Greens PUD Final Plat - Filings 1 - 5; Project No. LUP2020-0010 & Plan No. FPL2020-0002
Public Works Review

Public Works has reviewed the submitted documents for the above referenced development project with the following comments for inclusion with the Final Plat submittal. Be advised, review of construction drawings is for general compliance with city standards. There may be additional concerns as this design develops.

1. **Utilities**
    a. **Water - Chapter 3**
        i. City water system is located in CR 31 and 9th Street. The potable water main in 9th Street is a 21" PVC with connection with a wet tap at College Avenue. The main in CR 31 is a 12" PVC located on the east side of the roadway pavement installed in 2019. This connection will require a wet tap. The connection in 14th Street is already stubbed across the roadway pavement
        ii. The existing nonpotable water line is located in CR 31 and 9th Street. The main in 9th Street is a14" PVC with the connection at College replacing a 90 degree fitting with a Tee. Coordination with Tri State and Olson's greenhouse will be required for a short outage to replace the fitting. The main in CR 31 is immediately east of the roadway pavement and will require a wet tap.
        iii. Please label existing water mains.
            1. 9th St - east of College - North line is 14" nonpotable
                a. Center = 16" Potable main PVC
                b. South is 20" transmission main to tanks.
            2. 9th St - west of College - North is 21" High Pressure main PVC
                a. South is 18" gravity main PVC

2. **Plats**
    a. Alto and Keri should be Streets instead of Avenues.
    b. The existing utilities in 9th Street - Line labeled as IRR is the gravity potable water main. The existing water lines at 9th Street and College need to be sorted out. The nonpotable well line is not connecting to the indicated water line (see attached).



3. **Site Plan**
    a. The water line will require an easement dedication, 20' wide.
    b. Site Plan A-1 – Please move the gate from 14th Street entry to the property line. Need to leave adequate room for truck to park out of the street to open gate.

4. **Drainage**
    a. Final Drainage Study.
        i. Please add hydraulic grade line calculations and profiles.
        ii. Identify and quantify offsite basins. 2 points of interest at 14th Street and crossing from south at 9th Street.
    b. Consideration of offsite flows conveyance through this area must be made.
    c. Coordination with current staff planning for this basin is required.
        i. Proposed storm line in 14th needs to be coordinated with Tri-State planes from the east.

5. **Transportation**
    a. Additional ROW dedications are acceptable.

6. **Landscape / Grading** - *Chapter 2 Design Standards*
    a. A SWMP and Stormwater Discharge permit must be acquired from CDPH&E. Please submit proof of prior to receiving construction permits. Please provide copy of permit from CDPH&E.
    b. Review proposed landscape plans at street locations and evaluate for sight triangle conflicts.

7. **Utilities**

a. **Utility Memo**
   i. Water main in 9th Street being connected to at College is a 21" x 21" cross. (See attached record drawing)
   ii. Please include a network hydraulic modeling of the proposed development. We need to ensure the distribution system proposed will be adequate for future city growth.

b. Water - Chapter 3
   i. *Section 3.12.01 Water System Utility Study* required.
   ii. Section 3.21.00 All service lines 3/4 inch through 2 inch shall be copper and shall be installed continuous without joints between the corporation stop at the water main and the meter or curb stop.
   iii. Section 3.21.00 Water service lines shall be located a minimum of 10 feet away from all sewer services and a minimum of 5 feet away from all fire protection service lines (measured horizontally). All service lines shall be constructed perpendicular to the front property line of the property they are going to serve and not less than 5 feet from the side of a front property line.
   iv. Please specify pipe materials on the drawings. DIP as labeled is OK, but you may find PVC C900 for water lines less expensive.
   v. Specify "Red Mueller Super Centurion" hydrants in final construction drawings.
   vi. Connection to High Pressure main in 9th Street at Gianna Ave is incorrectly shown. The high pressure main is located on the north side of the street (currently labeled as irrigation line)
   vii. The potable water line connection at Street F and CR 31 is located on the potable water line located 10' farther to the east. Attached CAD drawing of project.
   viii. Dead end line in Mantova Ct should connect through Tract M to the main in 14th St.

c. Non Potable Irrigation
   i. Identify pipe material as PVC C900 - "PURPLE PIPE"
   ii. Add master meter south side of Teano Street.
   iii. Disconnect NP line from between Phases 3 and 4.
   iv. No connection to irrigation line at Gianna Av and 9th St.
   v. Add master meter location to NP in Tract H off of Alto Av for Phases 1, 2 and 3.
   vi. Add blow offs at high points in line profile.
   vii. Mantova Ct - end of line should not dip down. Let end of line be high point with the blow off.
   viii. Sheet 128 - missing line work in profile view.

d. Sanitary Sewer - Chapter 4

i. Please specify pipe materials on the drawings. SDR 35 for sanitary sewer.
ii. Route in 9th Street may not work with providing a 10' separation with the potable water lines. Alignment farther south will be available as United Power will be undergrounding the overhead lines further south of existing location
iii. Coordination of timing for offsite sanitary sewer in 9th Street will be required with City 9th Street project.

e. Storm Sewer - Chapter 5

i. 14th Street outfall to be coordinated with adjacent property development.

f. Roadway - Chapter 6

i. Details R1, R2 and R10 are not current (see attached).
ii. Water Meters require coordination with lawn trees. Species selection should be dependent on compatibility with sidewalk and roadway section requirements.
iii. Preliminary Soils Report indicates presence of swelling soils, collapsible soils and shallow groundwater.
iv. Future ramps at CR 31 and 14th St
v. Sheet 58 - 9th St Section greater than 2% cross slope.
vi. *Section 6.33.00* A Pavement Design Report is required prior to roadway paving. City preferred pavement section is a composite section of asphalt surface with Class VI base.
vii. *Section 6.18.02* At the intersection of two public streets or a private driveway and a public street, sight distance shall be evaluated across a "sight distance triangle" where obstructions are restricted according to the following criteria.
viii. Coordination on timing and/or participation of 9th Street Improvements with City project will be required.
ix. Cross walk ramps to the south at 9th / College intersection

g. Traffic Control - Chapter 8

i. Traffic markings will be required on College Avenue.
ii. No speed limit signs required within local streets (All local streets are 20 mph by ordinance). Speed limit on College Ave will be posted as 35 mph.
iii. 14th Street will require centerline and shoulder lines. Add stop sign at CR 31.
iv. Add detail for stop bar and cross walk.
v. 9th Street and College Avenue will remain an all way stop. Provide ramps to the south on both sides of College Av.

h. Construction Notes:

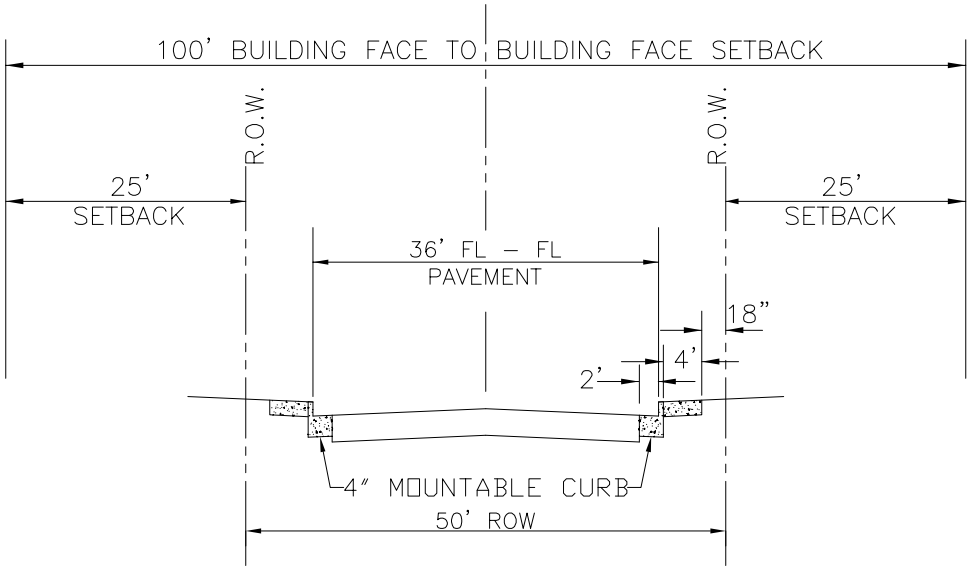
i. General Storm #3 - delete. PVC is not allowed for storm drainage.
ii. General Water-Sewer - Add nonpotable water line pipe material. Specify purple pipe. May be HDPE or PVC same standards as potable water lines.
iii. General Water-Sewer #27 - 4" sewer service minimum slope is 2%.

i. Design for Non-Potable system.
   i. Designate material as "PURPLE PIPE".
   ii. The tap from the manifold is to a 10"x10" Tee.
   iii. The main feed to each sub area system must be from a master metered vault location.

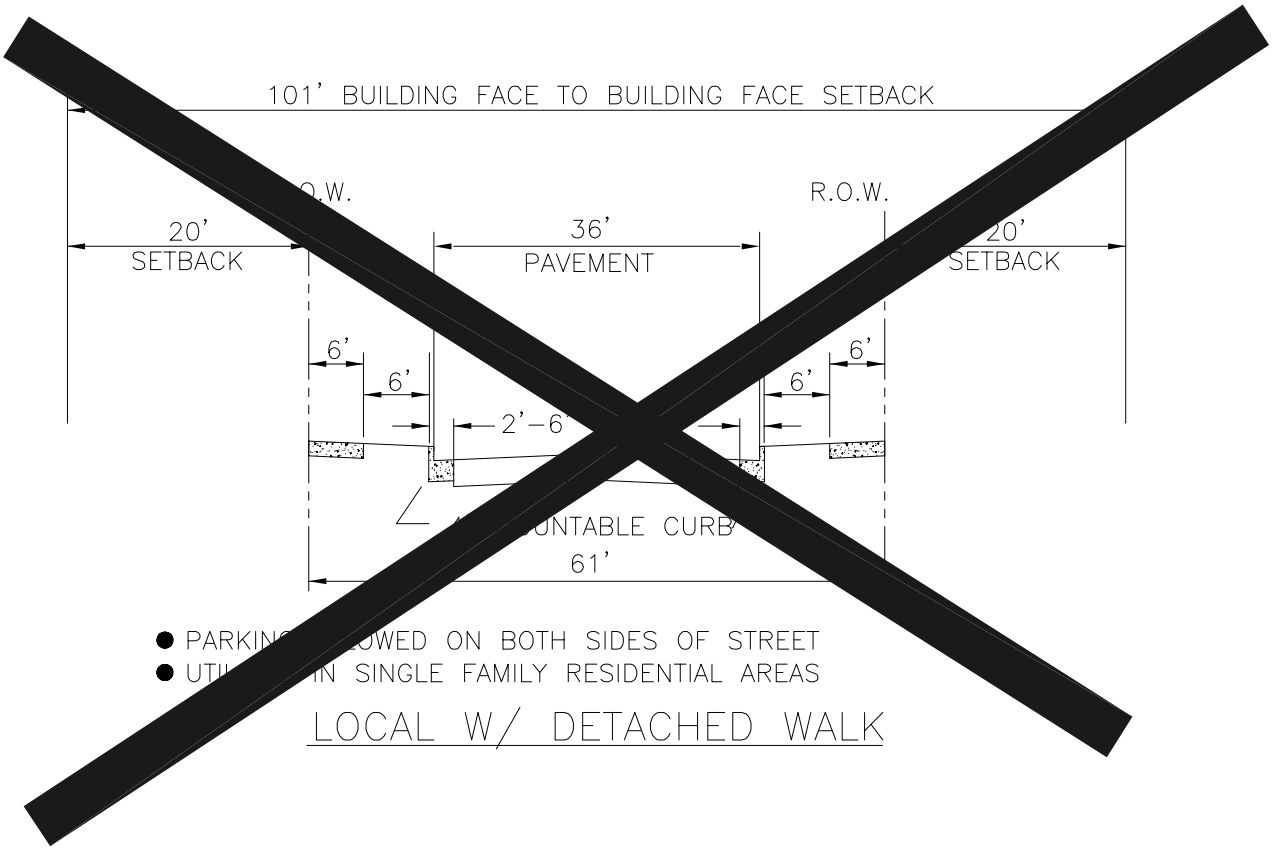
8. **A Public Works Permit** will be required for construction of the water line, nonpotable water line, sanitary sewer, storm system and street improvements.

9. **Public Improvement Agreement** – A Subdivision Improvements Agreement will be required for the construction of roadways, storm, water, sewer and nonpotable water systems. See attached template.

10. A Geotechnical report for final pavement design will be required prior to paving.



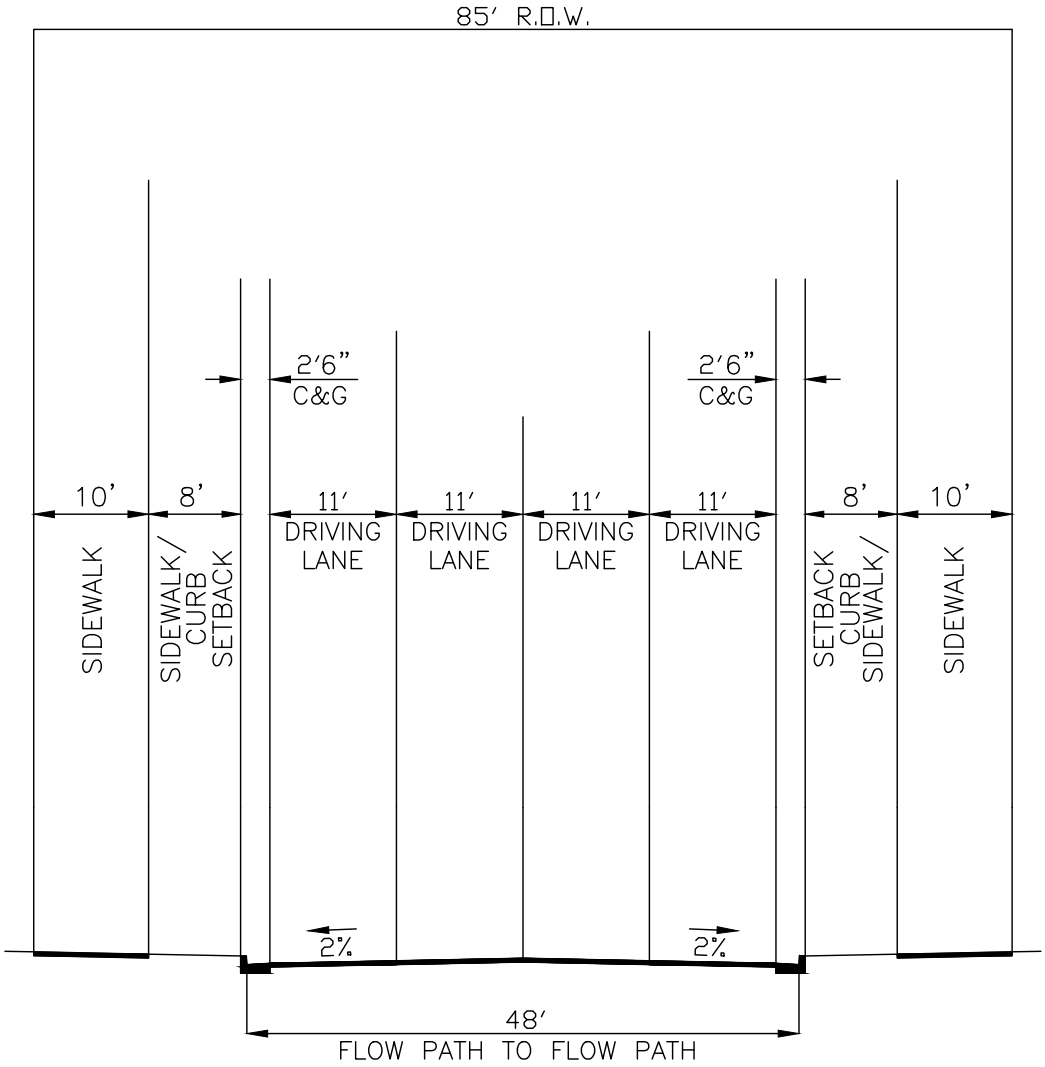
- PARKING ALLOWED ON BOTH SIDES OF STREET
- SINGLE FAMILY RESIDENTIAL AREAS



- PARKING ALLOWED ON BOTH SIDES OF STREET
- UTILITIES IN SINGLE FAMILY RESIDENTIAL AREAS

LOCAL W/ DETACHED WALK

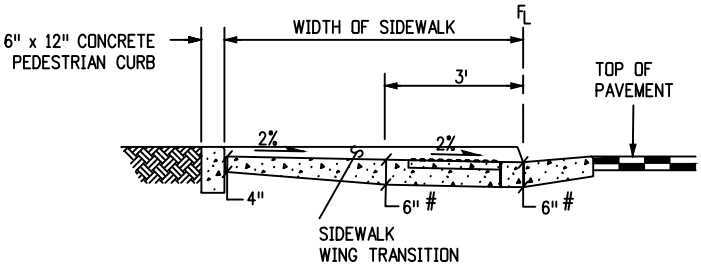
CITY OF Fort Lupton EST 1836 COME PAINT YOUR FUTURE WITH US	DESIGN STANDARDS	STANDARD DRAWING
	LOCAL TYPICAL SECTION	R1
		DATE: 6/16/18



- PROVIDE WIDENING AT INTERSECTIONS FOR LEFT TURN LANES AND ACCEL/DECEL LANES RIGHT-OF-WAY WIDTH TO BE INCREASED TO 105' IN THESE AREAS.
- NO PARKING ALLOWED
- USED IN AREAS WHERE THERE IS LIMITED ACCESS AND PROJECTED TRAFFIC VOLUMES ARE GREATER THAN 10,000 VEHICLES PER DAY.

COLLECTOR PHASE III

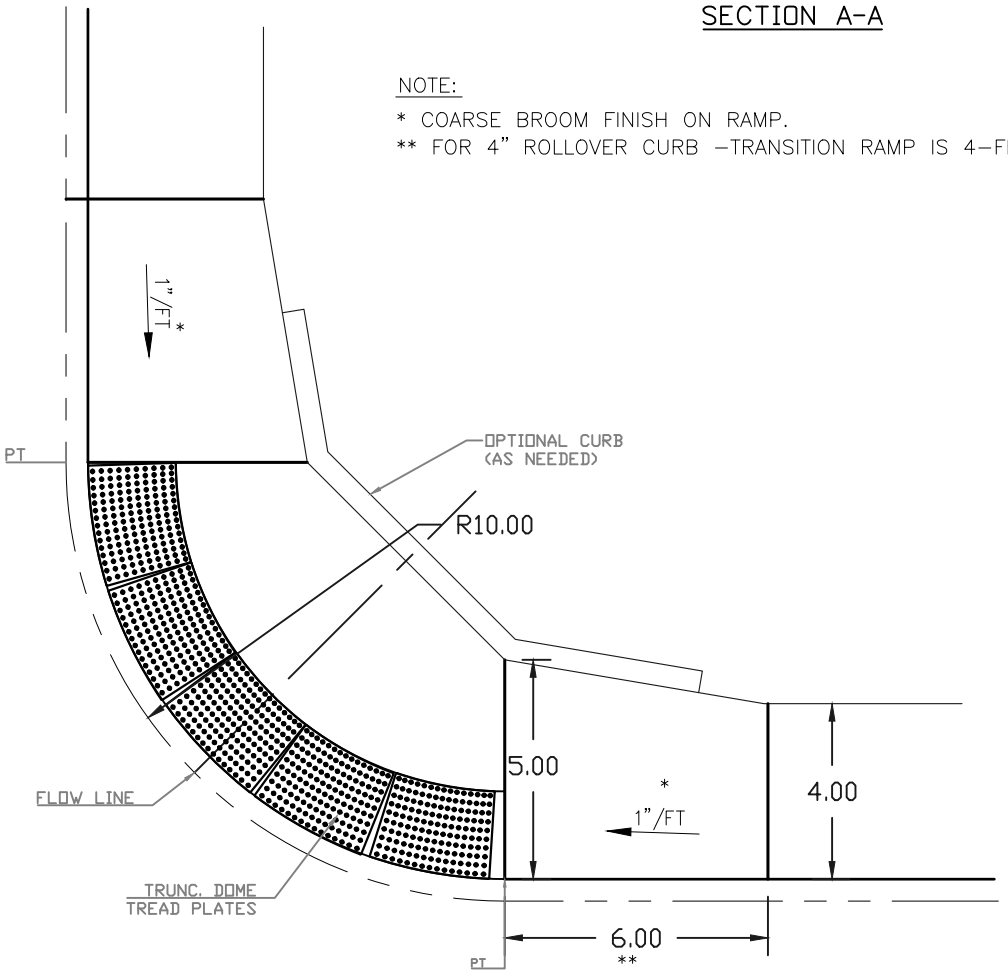
CITY OF Fort Lupton EST 1836 COME PAINT YOUR FUTURE WITH US	DESIGN STANDARDS	STANDARD DRAWING
	COLLECTOR - PHASE 3 TYPICAL SECTION	R2-3
		DATE: 11/21/19



SECTION A-A

NOTE:

* COARSE BROOM FINISH ON RAMP.
** FOR 4" ROLLOVER CURB –TRANSITION RAMP IS 4–FEET.



CURB RAMP DETAIL

SCALE: 1"=4'

CITY OF Fort Lupton EST 1836 COME PAINT YOUR FUTURE WITH US	DESIGN STANDARDS	STANDARD DRAWING
	CURB RAMP	R9
		DATE: 2/28/17

Alyssa Knutson

From: United Power Plat Referral <platreferral@UnitedPower.com>
Sent: Monday, May 11, 2020 2:19 PM
To: PlanningDept
Subject: RE: Cottonwood Greens PUD Final Plat - Filings 1 - 5; Project No. LUP2020-0010 & Plan No. FPL2020-0002

Follow Up Flag: Follow up
Flag Status: Completed

Hi,

I forgot to include and mention that United Power, Inc. has (I believe) and inactive underground line in filing No. 5 that used to service an irrigation well. The developer will have to work with United Power to remove this time before development begins. Thank you!

Thank you,

Samantha
Right of Way Administrative Assistant
303-637-1324
UNITEDPOWER
500 Cooperative Way | Brighton, CO 80603
Powering Lives, Powering Change, Powering the Future – The Cooperative Way
www.unitedpower.com

From: United Power Plat Referral
Sent: Monday, May 11, 2020 1:15 PM
To: planningdept@fortluptonco.gov
Subject: FW: Cottonwood Greens PUD Final Plat - Filings 1 - 5; Project No. LUP2020-0010 & Plan No. FPL2020-0002

Hello,

Thank you for inviting United Power Inc., to review and comment on the Cottonwood Greens PUD Final Plat - Filings 1 - 5; Project No. LUP2020-0010 & Plan No. FPL2020-0002. Please find attached our comments for filing 1 through 5.

Thank you,

Samantha
Right of Way Administrative Assistant
303-637-1324
UNITEDPOWER
500 Cooperative Way | Brighton, CO 80603
Powering Lives, Powering Change, Powering the Future – The Cooperative Way
www.unitedpower.com

From: Alyssa Knutson <AKnutson@Fortluptonco.gov>
Sent: Monday, April 20, 2020 1:18 PM
Cc: Todd Hodges <thodges@Fortluptonco.gov>; Maria Lancto <MLancto@Fortluptonco.gov>; Stephanie Darnell <sdarnell@Fortluptonco.gov>
Subject: Cottonwood Greens PUD Final Plat - Filings 1 - 5; Project No. LUP2020-0010 & Plan No. FPL2020-0002

CAUTION: This email originated from outside of United Power. Do not click links or open attachments unless you recognize the sender and know the content is safe.

Good Morning,

The documentation located at the following links are submitted to you for review and recommendation for a final plat for a residential subdivision being reviewed by the City of Fort Lupton. The application documents can be reviewed at the following link: https://www.fortlupton.org/DocumentCenter/Index/472.

Any comments you consider relevant to this request would be appreciated. Please reply by **May 11, 2020**, so that we may give full consideration to your recommendation. Any response not received before or on this date may be deemed to be a favorable response to the Planning & Building Department.

The public hearing for this matter will be held at Fort Lupton City Hall – 130 S. McKinley Avenue (unless due to COVID-19 it needs to be conducted virtually. You are advised to check the City of Fort Lupton website for information and updates on this) and are scheduled for the following dates:

- **City Council on Tuesday, May 19, 2020 at 7:00 PM**

Please send comments back to: PlanningDept@fortluptonco.gov.

Your time in this matter is greatly appreciated!

Alyssa Knutson, AICP
Planner II
130 S. McKinley Ave.
Fort Lupton, CO 80621
Office: 303.857.6694
Direct: 720.466.6128
Mobile: 303.304.4498

This institution is an equal opportunity provider and employer.

Alyssa Knutson, AICP
Planner II & FLURA Staff Liaison
130 S. McKinley Ave.
Fort Lupton, CO 80621
Office: 303.857.6694
Direct: 720.466.6128
Mobile: 303.304.4498

This institution is an equal opportunity provider and employer.

The information transmitted is intended only for the person or entity to which it is addressed and may contain CONFIDENTIAL material. If you receive this information in error, please delete or destroy the information.

Disclaimer

The information contained in this communication from the sender is confidential. It is intended solely for use by the recipient and others authorized to receive it. If you received this message in error, please contact the sender and delete the message. Any disclosure, copying, review reproduction, or distribution in relation to any of the contents of this information is strictly prohibited.

May 11, 2020

City of Fort Lupton Planning Department
130 S McKinley Ave
Fort Lupton, CO 80621

Attn: Alyssa Knutson

Re: Project No. LUP2020-0010 & Plan No. FPL2020-0002 - Cottonwood Greens PUD Final Plat - Filings 1 - 5

Dear Alyssa,

On behalf of United Power, Inc., thank you for inviting us to review and comment on the Cottonwood Greens PUD Final Plat - Filings 1 – 5. After review of the information, we have the following comments:

For All Filings:

- We request at least a 10' dry utility easement for anything along College Ave and WCR 31. Mostly likely we will bring the main feed along College Ave and WCR 31. This large equipment that will not fit into a 6' UE.
- We request at least an 8' to 10' wide UE in the front of lots and side lots abutting the road. We can only work with a 6' wide UE if gas is not within; however, most the time that is not the case.
- It is more cost effective to have blanket easements on tracts. Especially for all tracts where the rear lots abut to a tract. Without a blanket easement, this will double the amount of equipment needed, increase the cost, and time of the project.
- Streetlights – When streetlight locations are identified, we need a 5' wide dry utility easement along one side of the lot closest to the streetlight location. All streetlight locations must be approved and signed off by the city/town, etc.

Filing No. 5:

- We request blanket easements for tracts B, A. This allows us to cross tracts, gives us the opportunity to set above ground equipment, and we avoid doubling up on the equipment. Not only does this save time but is more cost effective for the developer. If we cannot have a blanket easement, then we will need:
    - 8' to 10' wide dry utility easement (prefer 10') around the perimeter, long perimeter of tracts abutting roads, and through tracts between lots.
    - We request that at least an 8' wide UE go through tract A and connect to the UE along the west side of block 1, Lot 15.
    - West side of tract B, we will need at least an 8' wide UE going across on Block 2, between lots 14 to Lot 1.
    - We request at least a 10' dry utility easement for anything along College Ave. Mostly likely will bring the main feed along College Ave and will have large equipment that will not fit into a 6' UE.
- We request at least an 8' to 10' wide UE in the front of lots and side lots abutting the road. We can only work with a 6' wide UE if gas is not within; however, most the time that is not the case.

Filing No. 4:

- We request blanket easements for tracts A, B, F, C, E, D - This allows us to cross tracts, gives us the opportunity to set above ground equipment, and we avoid doubling up on the equipment. Not only does this save time but is more cost effective for the developer. If we cannot have a blanket easement, then we will need:
    - Tract A and F - We request at least a 10' dry utility easement for anything along College Ave. Mostly likely will bring the main feed along College Ave and will have large equipment that will not fit into a 6' UE.

- Around the perimeter of Tract A, we request no smaller than an 10’ wide UE
- We request at least an 8’ to 10’ wide UE in the front of lots and side lots abutting the road. We can only work with a 6’ wide UE if gas is not within; however, most the time that is not the case.
- Tract C – We will need at least an 8’ wide UE going through tract C, at block 11, from Lot 1 to Lot 28. This connection will allow us to go through the tract and avoid going around.
- Tract D, west side of Block 2, we need an 8’ wide UE going through the tract and connecting lots 15 and 14.
- Tract E – We need the 8’ wide UE along the rear of the lots at block 3, lot 1 to continue through tract E to College Ave.
- Tract E – We will need an 8’ Wide UE that goes through the tract on block 3, lot 18.
- Tract B and Tract E - We request at least a 10’ dry utility easement for anything along WCR 31. Mostly likely will bring the main feed along College Ave and will have large equipment that will not fit into a 6’ UE.

Filing No. 3:

- We request at least a 10’ dry utility easement for anything along College Ave and WCR 31. Mostly likely will bring the main feed along College Ave and will have large equipment that will not fit into a 6’ UE.
- We request at least an 8’ to 10’ wide UE in the front of lots and side lots abutting the road. We can only work with a 6’ wide UE if gas is not within; however, most the time that is not the case.
- We request blanket easements for tracts A, B, C, E, D - This allows us to cross tracts, gives us the opportunity to set above ground equipment, and we avoid doubling up on the equipment. Not only does this save time but is more cost effective for the developer. If we cannot have a blanket easement, then we will need:
    - Tract C, block 3, between lot 6 and lot 7 – Please ensure the 8’ wide UE continue through the tract.
    - There is an unidentified section on sheet 3 of 6, block 1, between lots 29 and 30. We request that the rear 8’ wide UE easement continue through this section.

Filling No. 2:

- We request at least an 8’ to 10’ wide UE in the front of lots and side lots abutting the road. We can only work with a 6’ wide UE if gas is not within; however, most the time that is not the case.
- We request blanket easements for tracts A, & B, - This allows us to cross tracts, gives us the opportunity to set above ground equipment, and we avoid doubling up on the equipment. Not only does this save time but is more cost effective for the developer.

Filing No. 1:

- We request at least an 8’ to 10’ wide UE in the front of lots and side lots abutting the road. We can only work with a 6’ wide UE if gas is not within; however, most the time that is not the case.
- On sheet 3 of 5 on block 1 by lot 1 – We request at least a 10’ wide UE abutting the side of lot 1 off what I believe would be Christina St. – Mostly likely this will be a tapping point to run up to College Ave.
- We request blanket easements for tracts A, B, C, D, E - This allows us to cross tracts, gives us the opportunity to set above ground equipment, and we avoid doubling up on the equipment. Not only does this save time but is more cost effective for the developer. If we cannot have a blanket easement, then we will need:
    - Ensure at least an 8’ wide UE continues through on tract C, block 2 by lots 1-6.
    - Tract A - We request at least a 10’ dry utility easement for anything along College Ave and WCR 31. Mostly likely will bring the main feed along College Ave and will have large equipment that will not fit into a 6’ UE.
    - Tract B - It would be best if there was a blanket easement for all tracts that abut to the rear lots and not another rear lot, without a blanket easement, this will double the amount of equipment needed to be set and increase the cost and time of the project.
    - Tract D – We request at least an 8’ wide UE around the perimeter of tract D by block 4, lots 1-6
- We request a 6’ wide UE on the side lot on block 5 between lots 1 and 2.
- Am unable to identify if there is a UE along the side lot of lot 1 on block 5, please ensure there is a at least a 6’ wide UE on the side of this lot.

- I am unable to identify if there is a UE along Alto Ave between block 5 and block 4 on the south side of Alto Ave on the south side. We request at least an 8’ to 10 wide UE.

In general, our requirements:

- **General** – United Power requires continuous dry utility easements for reliable electric facility installation. This allows United Power to install electric facilities in a continuous manner for our loop feed which provides reliability. For front lot distribution, we will need 10’-15’ wide dry utility easements and for rear lot distribution, we will need at least 8’ to 10’ wide dry utility easements. These utility easements will need to be on sides of lots abutting roads, and across tracts.
- **Tracts/Open Space/Parks** - 8’ to 10’ wide dry utility easements along perimeter of tracts, along perimeter of tracts abutting roads, and through tracts between lots. United Power prefers blanket utility use within tracts be dedicated as this gives us the opportunity to set above ground equipment, if needed and coordinated with the developer.
- **Streetlights** – When streetlight locations are identified, we need a 5' wide dry utility easement along one side of the lot closest to the streetlight location. All streetlight locations must be approved and signed off by the city/town, etc.

Please note, the property owner/developer/contractor must submit an application along with CAD data for new electric service via https://www.unitedpower.com/construction. United Power would like to work with these persons early in the construction process on getting an electric design prepared so that we can request any additional easements needed and hopefully have those easements dedicated on the plat rather than obtaining separate document(s). Obtaining easements via a separate document can be time consuming and could cause delays.

As a Reminder: No permanent structures are acceptable within the dry utility easement(s); such as, window wells, wing walls, retaining walls, basement walls, roof overhang, anything affixed to the house like decks, etc. United Power considers any structure that impedes the access, maintenance, and safety of our facilities a permanent structure. No exceptions will be allowed, and any encroachments could result in penalties.

We look forward to safely and efficiently providing reliable electric power and outstanding service to our members.

Thank you,

Samantha Riblett
United Power, Inc.
Right of Way Administrative Assistant
O: 303-637-1324 | Email: platreferral@unitedpower.com

DEPARTMENT OF PLANNING SERVICES
1555 N. 17th Ave
Greeley, CO 80631
Website: www.weldgov.com
Email: jflesher@weldgov.com
Phone: (970) 400-3552
Fax: (970) 304-6498

Via Email

May 11, 2020

Alyssa Knutson, Planner
City of Fort Lupton
130 S. McKinley Avenue
Fort Lupton, CO 80621

Subject: Cottonwood Greens PUD Final Plat

Dear Alyssa:

The Weld County Department of Planning Services has reviewed this proposal and submits the following comments for your consideration.

There is no County commitment to upgrade County roads and bridges to accommodate municipal developments.

Weld County Planning recommends ensuring rights-of-way are cleared of easements and pipelines prior to acceptance.

The present zoning of adjacent and surrounding unincorporated properties are predominantly Agricultural. Owners of property in the area of this proposal should be made aware that agricultural uses, even when done in a manner consistent with good agricultural practices, may generate impacts such as noise, dust, flies, odors, aerial spraying, and slow-moving equipment on County roadways. It is important for future residents to note that adjacent properties may be in unincorporated Weld County and that Weld County has adopted a Right-to-Farm Statement and a Right to Extract Mineral Resources Statement and recommends they be placed on all plats adjacent to unincorporated areas:

Right-to-Farm Statement

Weld County is one of the most productive agricultural counties in the United States, typically ranking in the top ten counties in the country in total market value of agricultural products sold. The rural areas of Weld County may be open and spacious, but they are intensively used for agriculture. Persons moving into a rural area must recognize and accept there are drawbacks, including conflicts with long-standing agricultural practices and a lower level of services than in town. Along with the drawbacks come the incentives which attract urban dwellers to relocate to rural areas: open views, spaciousness, wildlife, lack of city noise and congestion, and the rural atmosphere and way of life. Without neighboring farms, those features which attract urban dwellers to rural Weld County would quickly be gone forever.

Agricultural users of the land should not be expected to change their long-established agricultural practices to accommodate the intrusions of urban users into a rural area. Well-run agricultural activities will generate off-site impacts, including noise from tractors and equipment; slow-moving farm vehicles on rural roads; dust from animal pens, field work, harvest and gravel roads; odor from animal confinement, silage and manure; smoke from ditch burning; flies and mosquitoes; hunting and trapping activities; shooting sports, legal hazing of nuisance wildlife; and the use of pesticides and fertilizers in the fields, including the use of aerial spraying. It is common practice for agricultural producers to utilize an accumulation of agricultural machinery and supplies to assist in their agricultural operations. A concentration of miscellaneous agricultural materials often produces a visual disparity between rural and urban areas of the County. Section 35-3.5-102, C.R.S., provides that an agricultural operation shall not be found to be a public or private nuisance if the agricultural operation alleged to be a nuisance employs methods or practices that are commonly or reasonably associated with agricultural production.

Water has been, and continues to be, the lifeline for the agricultural community. It is unrealistic to assume that ditches and reservoirs may simply be moved "out of the way" of residential development. When moving to the

County, property owners and residents must realize they cannot take water from irrigation ditches, lakes or other structures, unless they have an adjudicated right to the water.

Weld County covers a land area of approximately four thousand (4,000) square miles in size (twice the size of the State of Delaware) with more than three thousand seven hundred (3,700) miles of state and County roads outside of municipalities. The sheer magnitude of the area to be served stretches available resources. Law enforcement is based on responses to complaints more than on patrols of the County, and the distances which must be traveled may delay all emergency responses, including law enforcement, ambulance and fire. Fire protection is usually provided by volunteers who must leave their jobs and families to respond to emergencies. County gravel roads, no matter how often they are bladed, will not provide the same kind of surface expected from a paved road. Snow removal priorities mean that roads from subdivisions to arterials may not be cleared for several days after a major snowstorm. Services in rural areas, in many cases, will not be equivalent to municipal services. Rural dwellers must, by necessity, be more self-sufficient than urban dwellers.

People are exposed to different hazards in the County than in an urban or suburban setting. Farm equipment and oil field equipment, ponds and irrigation ditches, electrical power for pumps and center pivot operations, high-speed traffic, sand burs, puncture vines, territorial farm dogs and livestock and open burning present real threats. Controlling children's activities is important, not only for their safety, but also for the protection of the farmer's livelihood.

Weld County Right to Extract Mineral Resources Statement

Weld County has some of the most abundant mineral resources, including, but not limited to, sand and gravel, oil, natural gas, and coal. Under title 34 of the Colorado Revised Statutes, minerals are vital resources because (a) the State's commercial mineral deposits are essential to the State's economy; (b) the populous counties of the state face a critical shortage of such deposits; and (c) such deposits should be extracted according to a rational plan, calculated to avoid waste of such deposits and cause the least practicable disruption of the ecology and quality of life of the citizens of the populous counties of the state.

Mineral resource locations are widespread throughout the County and person moving into these areas must recognize the various impacts associated with this development. Often times, mineral resource sites are fixed to their geographical and geophysical locations. Moreover, these resources are protected property rights and mineral owners should be afforded the opportunity to extract the mineral resource.

Thank you for the opportunity to comment on this proposal. This response addresses general requirements, concerns, or issues and is intended to assist in your community's decision-making process regarding this land use proposal. Weld County respectfully reserves the right to make further comment on information or issues as they are discovered.

Sincerely,

Jim Flesher, AICP
Long-Range Planner
Weld County

Right of Way & Permits

1123 West 3rd Avenue
Denver, Colorado 80223
Telephone: **303.571.3306**
Facsimile: 303. 571. 3284
donna.l.george@xcelenergy.com

May 9, 2020

City of Fort Lupton Planning Department – Alyssa Knutson and Todd Hodges
130 South McKinley Avenue
Fort Lupton, CO 80621

Attn: Alyssa Knutson and Todd Hodges

Re: Cottonwood Greens PUD and Filings 1-5 Final Plats
Case #s LUP2020-0010 and FPL2020-0002

Public Service Company of Colorado's (PSCo) Right of Way & Permits Referral Desk has reviewed the documentation for **Cottonwood Greens PUD and Filings 1-5 Final Plats** and requests that the perimeter utility easements within the tracts are increased to 10-feet wide to accommodate all dry utilities for connectivity throughout the entire Cottonwood Greens development/all plats, especially along public rights-of-way.

PSCo also requests that the following language or plat note is placed on the preliminary and final plats for the subdivision:

> *These easements are dedicated to the City of Fort Lupton for the benefit of the applicable utility providers for the installation, maintenance, and replacement of electric, gas, television, cable, and telecommunications facilities (Dry Utilities). Utility easements shall also be granted within any access easements and private streets in the subdivision. Permanent structures, improvements, *objects, buildings, wells, water meters and other objects that may interfere with the utility facilities or use thereof (Interfering Objects) shall not be permitted within said utility easements and the utility providers, as grantees, may remove any Interfering Objects at no cost to such grantees, including, without limitation, vegetation. Public Service Company of Colorado (PSCo) and its successors reserve the right to require additional easements and to require the property owner to grant PSCo an easement on its standard form.*

The property owner/developer/contractor must complete the application process for any new natural gas service via xcelenergy.com/InstallAndConnect. It is then the responsibility of the developer to contact the Designer assigned to the project for approval of design details. Additional easements may need to be acquired by separate document for new facilities.

As a safety precaution, PSCo would like to remind the developer to call the Utility Notification Center by dialing 811 for utility locates prior to construction.

Donna George
Right of Way and Permits
Public Service Company of Colorado dba Xcel Energy
Office: 303-571-3306 – Email: donna.l.george@xcelenergy.com

CITY OF FORT LUPTON
CITY COUNCIL

CITY OF Fort Lupton EST 1836

COME PAINT YOUR FUTURE WITH US

Zo Stieber, Mayor

Shannon Rhoda, Ward 1
Chris Ceretto, Ward 2
Michael Sanchez, Ward 3

David Crespin, Ward 1
Tommy Holton, Ward 2
Bruce Fitzgerald, Ward 3

AM 2020-100

APPROVE PURCHASE OF TRACTOR AND MOWER FOR PUBLIC WORKS STREETS FROM HIGH PLAINS FOR NOT TO EXCEED $102,353.00 FROM THE GENERAL FUND PUBLIC WORKS STREETS BUDGET

I. **Agenda Date:** Council Meeting – May 19, 2020

II. **Attachments:**
a. High Plains quotation
b. 2-additional quotes

III. **Summary Statement:**

Accept mower quote from High Plains for the mower for $102,353.00 from the General Fund Public Works Streets Budget.

IV. **Submitted by:** _____
Public Works Director

V. **Finance Reviewed** _____
Finance Director

VI. **Approved for Presentation:** _____
City Administrator

VII. **Attorney Reviewed** _____ Approved _____ Pending Approval

VIII. **Certification of Council Approval:** _____ _____
City Clerk Date

IX. Detail of Issue/Request:

The new tractor is needed by Public Works for street mowing operations. The current machine is a 1998 New Holland tractor with jury rigged attachments. Repair parts are becoming difficult to acquire. In 2019 we lost approximately 2 weeks of mowing time waiting for repairs.

Three quotes were solicited through Sourcewell (NJPA) from High Plains, Wickham Tractor Company and Deere & Company.

High Plains	*New Holland TS6.120 T4B*	*$102,353.00*
w/ mower, snow blade & rear window guard		
Wickham Tractor Company	*Kubota M6-131DTC-F*	*$111,954.35*
w/ mower		
Deere & Company	*Joh Deere 6120M*	*$135,610.84*
w/loader & mower		

All three quotes are comparably sized machines. The New Holland tractor was selected as the low quote with all the accessories we needed and because of the City's past experience with New Holland equipment and close proximity for maintenance if needed.

Total cost is $102,353.00 of which the Public Works Street Budget for 2020 included $120,000.00.

X. Legal/Political Considerations:

Not Applicable.

XI. Alternatives/Options:

- *Accept quote*
- *Reject quotes*
- *Delay system purchase to a later date*

XII. Financial Considerations:

2020 Budget includes $120,000.00 in the General Fund Public Works Street budget.

XIII. Staff Recommendation:

Staff recommends approving purchase of the tractor and mower from High Plains for $102,353.00.

970-702-1855
Jerry Hart

23295 US Hwy 85 Lasalle

High Plains NEW HOLLAND

NEW HOLLAND AGRICULTURE | NEW HOLLAND CONSTRUCTION

EQUIPPED FOR A NEW WORLD™

FARM AND INDUSTRIAL EQUIPMENT
SALES QUOTATION

Date: 4-29-2020

Customer Name: City of Fort Lupton

Address: 303-994-7613

City: _____ State: _____ Zip: _____

County: _____ Phone: _____

QTY	Model	Machines and Attachments		Serial #	STK #	TOTAL $
	COMMERCIAL MODEL	TS6.120 T4B	-TS6.120 T4B			
	EMISSIONS	TIER 4B	-TIER 4B TIER 4B			
	MODEL	TS6.120	-TS6.120		NJPA	
	TRACTION	4WD	-MFD			
	VERSION	CAB	-Cab		Gov Dis	
	Base machine price					
	PACKAGING	X0256XX	-PLUS			
	SPEED	337280	-40 KPH			
	TRANSMISSION	330061	-16x8 With Power Shuttle			
	CREEPER or Interlock	390266	-L/CREEPER FOR 8+8			
	REAR AXLE	330331	-98 in. bar axle (Steel Wheels)		TS6.120	
	FRONT WHEELS AND TIRES	8201704	-14.9R28 MICHELIN			
	REAR WHEELS AND TIRES	8301706	-18.4R38 MICH BAR S		with	
	REAR REMOTES	429473	-3 Bosch RR Flow Ctrl			
	LOADER BRACKETS	429475	-Loader Ready 429475		835 Loader	
	AUX RAMS	336784	-Hyd Lift w/ 1 int. & 1 ext cyl			
	EXTERNAL LIFT CONTROL	330845	-External 3-pt Control for MDC			
	FRONT BALLAST	390215	-Less Front Carrier and Weights			
	REAR BALLAST	336935	-6 Rear wheel weights		$81,353.00	
	HIGH VISIBILITY WINDOW	334743	-High-visibility window			
	SEAT	336923	-Air suspension seat w/swivel			
	INSTRUCTOR SEAT	336937	-Instructor seat			
	REAR WIPER & WASHER	330642	-Rear wiper/washer - CAB			
	RADIO READY	392295	-Radio 392295			
	FRONT FENDERS	390860	-Less Front Fenders			
	FRONT AXLES ACCESSO	331497	-Axle oscillation stops		Subtotal:	
	COMMERCIAL MODEL	835LA EURO	-835LA EURO			
	LEVELING	MSL	-Mechanical Self Leveling			
	MODEL	835LA	-835LA			
	SPECIALTY	EURSTYL	-Euro Style			
	VERSION	BASE	-BASE			
	Base machine price					
	SINGLE LEVER MULTI-COUPLER	713621	-2 Function Multi Coupler			
	95" STD MATERIAL BUCKET	717421	-95" Standard Mat bkt Euro Styl			
	Woods BW 15.50		$15,500.00			
	Bat Wing Mower					

Thank Jerry Hart

WOSBG-2710A 9 FT Snow Blade

And Set up Hose $4,800.00

700 Total

Date: _____

Date: _____

Dustin
701-866-0434

Bill of Sale

Date	April 30, 2020

WICKHAM TRACTOR COMPANY
FARM • FEED • FUN

15447 U.S. 34
Fort Morgan, CO 80701
(970) 867-5669

4100 S Valley Drive
Longmont, CO 80504
(970) 535-3310

PO Box 1990
301 E. 8th Street
Greeley, CO 80631
(970) 352-2288

www.wickhamtractor.com

18875 County Road 24
Sterling, CO 80751
(970) 521-9999

1828 E. Mulberry ST.
Fort Collins, CO 80524
(970) 631-8289

Prepared For

CITY OF FORT LUPTON
130 S MCKINLEY AVE
FORT LUPTON, CO 80621

Deliver To

Prepared By

Dustin Kennedy

Purchase Order	Tax Number	Shipped Via	Valid Through
			May 13, 2020

Qty	Description	Each	Extended
NEW UNITS			
	Unit Number: 16932, Description: TRACTOR, Make: KUBOTA, Model: M6-131DTC-F, Serial Number: 11056-M61, Warranty Code: 02, Warranty Expiration Date: 05/01/22, Specs: M6-131DTC-F 4WD TRA W/24-SPD INTELLI-SHIFT TRNS AMR8560A F-TIRE 380/85R24 R1W GY OPTITRAC WAF AMR8571A R-TIRE 460/85R38 R1W GY OPTITRAC CAST M8126A REAR WHL WHGT (SETOF2) MOLD#514A M8127B BOLT KIT FOR 2ND & 3RD SET OF M8126A LM8125A BOLT KIT FOR 1ST SET OF LM8124 & M8126A		**$96,170.00**
	Unit Number: 16932L, Description: LOADER, Make: KUBOTA, Model: LA2255, Serial Number: A1676-LA2, Warranty Code: 02, Warranty Expiration Date: 05/01/22, Specs: LA2255 FRONT LOADER W/2-LOEVER TYPE Q.A. M6929 HYD SELF LEVELING LOADER VALVE M6912 GRILL GUARD M1886 96" QUICK ATTACH BUCKET		**Included**
	Unit Number: 17594, Description: ROTARY CUTTE, Make: LANDPRIDE, Model: RC3715, Serial Number: 1457296, Warranty Code: 01, Warranty Expiration Date: 05/01/21, Specs: RC3715 15' 540 ROTARY CUTTER 17 24" USED ACFF 6 TIRES 32 DRV 540 CV MAIN C4 WING 40 SINGLE CHAIN GUARDS 61 15' 540 DECK ASSY W / DR 65 SINGLE ACTING FOLD ASSY 70 SWIVEL CLEVIS HITCH		**$15,784.35**

* All prices subject to applicable taxes

Bill of Sale

Date	April 30, 2020

WICKHAM TRACTOR COMPANY
FARM • FEED • FUN

15447 U.S. 34
Fort Morgan, CO 80701
(970) 867-5669

4100 S Valley Drive
Longmont, CO 80504
(970) 535-3310

PO Box 1990
301 E. 8th Street
Greeley, CO 80631
(970) 352-2288

www.wickhamtractor.com

18875 County Road 24
Sterling, CO 80751
(970) 521-9999

1828 E. Mulberry ST.
Fort Collins, CO 80524
(970) 631-8289

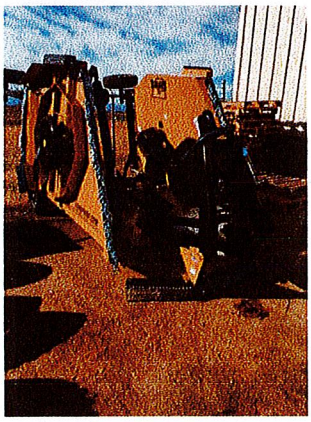
Prepared For
CITY OF FORT LUPTON
130 S MCKINLEY AVE
FORT LUPTON, CO 80621

Deliver To

Prepared By
Dustin Kennedy

Purchase Order	Tax Number	Shipped Via	Valid Through
			May 13, 2020

Qty	Description	Each	Extended



Subtotal **$111,954.35**

Title to all machinery and the proceeds of any resale thereof shall remain in Wickham Tractor Company until price has been paid in cash or finance documents have been received and approved by it. The undersigned understands and agrees that the machinery sold as "new" is warranted only as provided in the factory of manufacture's warrant and is sold free of any express, implied, or statutory warranty by Wickham Tractor Company, except warranty of clear title. Wickham Tractor Company's only responsibility for defects will be to help the customer to get a proper adjustment from the factory. Used or second-hand articles are sold as is without any warranty, express, implied or statutory, except warranty of clear title and as set forth in the writing on this document. No representative of Wickham Tractor Company has authority to make any warranty except as set for in this paragraph or upon approval of the management of Wickham Tractor Company. Wickham Tractor Company shall be excused and not liable for delays in shipment caused by customer's request, labor troubles, shortages in material, damage to plant, governmental regulations, or other similar or otherwise beyond its control. There are no conditions or understandings except as expressed on this order which sets forth the entire agreement. This order is subject to acceptance by an executive officer or a sales manager of Wickham Tractor Company.

Purchaser:_____ Date:_____

Authorized Dealer Signature:_____

TOTAL
*** $111,954.35**

* All prices subject to applicable taxes

JOHN DEERE

YOUR CONTRACT. YOUR QUOTE. YOUR HELP REQUESTED.

Ensure your equipment arrives with no delay. Issue your Purchase Order or Letter of Intent.

To expedite the ordering process, please include the following information in Purchase Order or Letter of Intent:

- ☐ Shipping address
- ☐ Billing address
- ☐ Vendor: John Deere Company 2000 John Deere Run Cary, NC 27513
- ☐ Contract name and/or number
- ☐ Signature
- ☐ Tax exempt certificate, if applicable

For any questions, please contact:

Cody Gaab

4 Rivers Equipment
4322 Highway 66
Longmont, CO 80504

Tel: 970-535-4474
Fax: 970-535-4556
Email: cgaab@4riversequipment.com

The John Deere Government Sales Team

JOHN DEERE

ALL PURCHASE ORDERS MUST BE MADE OUT TO (VENDOR):
Deere & Company
2000 John Deere Run
Cary, NC 27513
FED ID: 36-2382580; DUNS#: 60-7690989

ALL PURCHASE ORDERS MUST BE SENT TO DELIVERING DEALER:
4 Rivers Equipment
4322 Highway 66
Longmont, CO 80504
970-535-4474
cmcarthur@4riversequipment.com

Quote Summary

Prepared For:
City Of Fort Lupton
130 S Mckinley Ave
Fort Lupton, CO 80621
Business: 303-857-4080
TBARNETT@FORTLUPTONCO.GOV

Delivering Dealer:
4 Rivers Equipment
Cody Gaab
4322 Highway 66
Longmont, CO 80504
Phone: 970-535-4474
cgaab@4riversequipment.com

Quote ID:	21743822
Created On:	29 April 2020
Last Modified On:	30 April 2020
Expiration Date:	29 May 2020

Equipment Summary	Selling Price		Qty		Extended
JOHN DEERE 6120M Cab Tractor - 1L06120MCKG951137 **Contract:** Sourcewell Ag Tractors 110719-JDC (PG 1P CG 70) **Price Effective Date:** January 22, 2020	$ 99,728.20	X	1	=	$ 99,728.20
JOHN DEERE 620R Standard Farm Loader **Contract:** Sourcewell Ag Tractors 110719-JDC (PG 1P CG 70) **Price Effective Date:** April 29, 2020	$ 12,330.24	X	1	=	$ 12,330.24
JOHN DEERE R15 Flex wing Rotary Cutter **Contract:** Sourcewell Ag Tractors 110719-JDC (PG 1P CG 70) **Price Effective Date:** April 30, 2020	$ 23,552.40	X	1	=	$ 23,552.40
Equipment Total					**$ 135,610.84**

* Includes Fees and Non-contract items

Quote Summary	
Equipment Total	$ 135,610.84
Trade In	
SubTotal	**$ 135,610.84**
Est. Service Agreement Tax	$ 0.00

Salesperson : X _____

Accepted By : X _____

JOHN DEERE

ALL PURCHASE ORDERS MUST BE MADE OUT TO (VENDOR):
Deere & Company
2000 John Deere Run
Cary, NC 27513
FED ID: 36-2382580; DUNS#: 60-7690989

ALL PURCHASE ORDERS MUST BE SENT TO DELIVERING DEALER:
4 Rivers Equipment
4322 Highway 66
Longmont, CO 80504
970-535-4474
cmcarthur@4riversequipment.com

Total	$ 135,610.84
Down Payment	(0.00)
Rental Applied	(0.00)
Balance Due	**$ 135,610.84**

Salesperson : X _____

Accepted By : X _____

JOHN DEERE

Selling Equipment

Quote Id: 21743822 **Customer Name:** CITY OF FORT LUPTON

ALL PURCHASE ORDERS MUST BE MADE OUT TO (VENDOR):
Deere & Company
2000 John Deere Run
Cary, NC 27513
FED ID: 36-2382580; DUNS#: 60-7690989

ALL PURCHASE ORDERS MUST BE SENT TO DELIVERING DEALER:
4 Rivers Equipment
4322 Highway 66
Longmont, CO 80504
970-535-4474
cmcarthur@4riversequipment.com

JOHN DEERE 6120M Cab Tractor - 1L06120MCKG951137

Hours: 0000
Stock Number:
Contract: Sourcewell Ag Tractors 110719-JDC (PG 1P CG 70)
Selling Price * $ 99,728.20
Price Effective Date: January 22, 2020

* Price per item - includes Fees and Non-contract items

Code	Description	Qty	List Price	Discount%	Discount Amount	Contract Price	Extended Contract Price
4298L	6120M STAND.CAB TRACTOR	1	$ 108,756.00	24.00	$ 26,101.44	$ 82,654.56	$ 82,654.56
	Standard Options - Per Unit						
0202	UNITED STATES	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
0409	ENGLISH	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
0501	NO PACKAGE	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
873U	LIGHT PACKAGE - STANDARD	1	$ 456.00	24.00	$ 109.44	$ 346.56	$ 346.56
878H	MULTI POWER OUTLET STRIP	1	$ 92.00	24.00	$ 22.08	$ 69.92	$ 69.92
878M	CONDENSER SCREEN	1	$ 22.00	24.00	$ 5.28	$ 16.72	$ 16.72
1436	POWRQUAD PLUS LHR 24/24 40K	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
2073	STANDARD CAB	1	$ 2,801.00	24.00	$ 672.24	$ 2,128.76	$ 2,128.76
2127	ECONOMY SEAT	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
2511	MIRROR-LH&RH MANUAL TELESCOP	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
2631	PANORAMA FRONT WINDSHIELD	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
2663	BUSINESS RADIO PACKAGE	1	$ 337.00	24.00	$ 80.88	$ 256.12	$ 256.12
3223	HYDRAULIC PUMP - 114 L/MIN	1	$ 1,800.00	24.00	$ 432.00	$ 1,368.00	$ 1,368.00
3338	1,2&3 MECHANIC.SCV 450SERIES	1	$ 1,040.00	24.00	$ 249.60	$ 790.40	$ 790.40
3820	REAR PTO 540/1000 REVERSIBLE	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
4121	DLINKS W/ TEL.BALL CAT3N/3	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00

JOHN DEERE

Selling Equipment

Quote Id: 21743822 **Customer Name:** CITY OF FORT LUPTON

ALL PURCHASE ORDERS MUST BE MADE OUT TO (VENDOR):
Deere & Company
2000 John Deere Run
Cary, NC 27513
FED ID: 36-2382580; DUNS#: 60-7690989

ALL PURCHASE ORDERS MUST BE SENT TO DELIVERING DEALER:
4 Rivers Equipment
4322 Highway 66
Longmont, CO 80504
970-535-4474
cmcarthur@4riversequipment.com

4213	CLINK WITH BALL END - CAT 3	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
4410	SWAY CONTROL BLOCKS	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
5040	REAR AXLE 79 MM SHAFT	1	$ 2,582.00	24.00	$ 619.68	$ 1,962.32	$ 1,962.32
5091	ADJUSTABLE CAST WHEELS REAR	1	$ 181.00	24.00	$ 43.44	$ 137.56	$ 137.56
5221	REAR WHEEL SIZE 420/85R38	1	$ 428.00	24.00	$ 102.72	$ 325.28	$ 325.28
5999	NO TIRE PREFERENCE (REAR/FRO)	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
6045	MFWD FA - UNSUSPENDED	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
6092	ADJUSTAB. STEEL WHEELS FRONT	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
6220	FRONT WHEEL SIZE 380/85R24	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
7702	SHIPMENT P.-BY SHIP OVERSEAS	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
8002	TOOL BOX	1	$ 85.00	24.00	$ 20.40	$ 64.60	$ 64.60
8300	COLD START PACKAGE I	1	$ 340.00	24.00	$ 81.60	$ 258.40	$ 258.40
8385	HEAVY DUTY REAR PTO	1	$ 319.00	24.00	$ 76.56	$ 242.44	$ 242.44
8424	DRAFT CONTROL	1	$ 652.00	24.00	$ 156.48	$ 495.52	$ 495.52
8457	HIGHER LIFT CAPACITY	1	$ 399.00	24.00	$ 95.76	$ 303.24	$ 303.24
8742	ALTERNATOR 14V/200A	1	$ 280.00	24.00	$ 67.20	$ 212.80	$ 212.80
8747	BATTERY 12V / 174AH	1	$ 126.00	24.00	$ 30.24	$ 95.76	$ 95.76
8763	HEAVY DUTY REAR WHEEL BRAKES	1	$ 136.00	24.00	$ 32.64	$ 103.36	$ 103.36
8765	POWERFILL BRAKE	1	$ 531.00	24.00	$ 127.44	$ 403.56	$ 403.56
8924	M-SCV 3 FUNCTIONS	1	$ 3,405.00	24.00	$ 817.20	$ 2,587.80	$ 2,587.80
8951	FRONT BASE WEIGHT-110KG	1	$ 377.00	24.00	$ 90.48	$ 286.52	$ 286.52
	Standard Options Total		**$ 16,389.00**		**$ 3,933.36**	**$ 12,455.64**	**$ 12,455.64**
	Technology Options/Non-Contract/Open Market						
1832	AUTOTRAC READY	1	$ 4,618.00	0.00	$ 0.00	$ 4,618.00	$ 4,618.00
1835	NO STARFIRE RECEIVER	1	$ 0.00	0.00	$ 0.00	$ 0.00	$ 0.00
1867	LESS SOFTWARE	1	$ 0.00	0.00	$ 0.00	$ 0.00	$ 0.00
	Technology Options Total		**$ 4,618.00**		**$ 0.00**	**$ 4,618.00**	**$ 4,618.00**
	Value Added Services Total		**$ 0.00**			**$ 0.00**	**$ 0.00**

JOHN DEERE

Selling Equipment

Quote Id: 21743822 **Customer Name:** CITY OF FORT LUPTON

ALL PURCHASE ORDERS MUST BE MADE OUT TO (VENDOR):
Deere & Company
2000 John Deere Run
Cary, NC 27513
FED ID: 36-2382580; DUNS#: 60-7690989

ALL PURCHASE ORDERS MUST BE SENT TO DELIVERING DEALER:
4 Rivers Equipment
4322 Highway 66
Longmont, CO 80504
970-535-4474
cmcarthur@4riversequipment.com

Total Selling Price	$ 129,763.00	$ 30,034.80	$ 99,728.20	$ 99,728.20

JOHN DEERE 620R Standard Farm Loader

Equipment Notes:
Hours:
Stock Number:
Contract: Sourcewell Ag Tractors 110719-JDC (PG 1P CG 70)
Price Effective Date: April 29, 2020

Selling Price *
$ 12,330.24

* Price per item - includes Fees and Non-contract items

Code	Description	Qty	List Price	Discount%	Discount Amount	Contract Price	Extended Contract Price
0BQDP	620R Standard Farm Loader	1	$ 12,929.00	24.00	$ 3,102.96	$ 9,826.04	$ 9,826.04
	Standard Options - Per Unit						
0202	United States	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
0409	English	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
0962	6R/6M Small-Frame and 6X30/Premium Field Installed Loader	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
1620	Mounting Frame	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
2624	620R Mechanical Self-Leveling (MSL) Farm Loader Three-Function	1	$ 2,746.00	24.00	$ 659.04	$ 2,086.96	$ 2,086.96
3627	Three-function Hoses and Parts for FT4 6110M and 6120M	1	$ 205.00	24.00	$ 49.20	$ 155.80	$ 155.80
4617	Three-Function Single-Point Hydraulic Connection	1	$ 344.00	24.00	$ 82.56	$ 261.44	$ 261.44
5610	Hood Guard	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
6995	Less Ballast Box	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
8230	2150-mm (85-in.) Global Heavy-Duty Bucket with Grapple Brackets	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
	Standard Options Total		**$ 3,295.00**		**$ 790.80**	**$ 2,504.20**	**$ 2,504.20**
Total Selling Price			$ 16,224.00		$ 3,893.76	$ 12,330.24	$ 12,330.24

JOHN DEERE

Selling Equipment

Quote Id: 21743822 **Customer Name:** CITY OF FORT LUPTON

ALL PURCHASE ORDERS MUST BE MADE OUT TO (VENDOR):
Deere & Company
2000 John Deere Run
Cary, NC 27513
FED ID: 36-2382580; DUNS#: 60-7690989

ALL PURCHASE ORDERS MUST BE SENT TO DELIVERING DEALER:
4 Rivers Equipment
4322 Highway 66
Longmont, CO 80504
970-535-4474
cmcarthur@4riversequipment.com

JOHN DEERE R15 Flex wing Rotary Cutter

Equipment Notes:
Hours:
Stock Number:
Contract: Sourcewell Ag Tractors 110719-JDC (PG 1P CG 70)
Price Effective Date: April 30, 2020

Selling Price *
$ 23,552.40

* Price per item - includes Fees and Non-contract items

Code	Description	Qty	List Price	Discount%	Discount Amount	Contract Price	Extended Contract Price
2340P	R15 Flex wing Rotary Cutter	1	$ 27,205.00	24.00	$ 6,529.20	$ 20,675.80	$ 20,675.80
	Standard Options - Per Unit						
0202	United States	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
2540	Outward Rotation	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
3335	8 Foam-Filled Tires - (Double tires on center and wings) - Severe duty ag tires	1	$ 1,455.00	24.00	$ 349.20	$ 1,105.80	$ 1,105.80
3511	540 RPM Driveline - Cat 6	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
3602	540 RPM - 125 hp Gearbox - Commercial duty	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
5140	Swivel Hitch	1	$ 445.00	24.00	$ 106.80	$ 338.20	$ 338.20
5290	Suspended Tongue	1	$ 696.00	24.00	$ 167.04	$ 528.96	$ 528.96
9130	Independent Control Valve - 3 Function with Hoses and ROPS Mounting Bracket(For Separate Wing and Lift Control)	1	$ 881.00	24.00	$ 211.44	$ 669.56	$ 669.56
9400	Front Safety Shield - Second row chain	1	$ 154.00	24.00	$ 36.96	$ 117.04	$ 117.04
9410	Rear Safety Shield - Second row chain	1	$ 154.00	24.00	$ 36.96	$ 117.04	$ 117.04
	Standard Options Total		**$ 3,785.00**		**$ 908.40**	**$ 2,876.60**	**$ 2,876.60**
Total Selling Price			**$ 30,990.00**		**$ 7,437.60**	**$ 23,552.40**	**$ 23,552.40**

JOHN DEERE

YOUR CONTRACT.
YOUR QUOTE.
YOUR HELP REQUESTED.

Ensure your equipment arrives with no delay. Issue your Purchase Order or Letter of Intent.

To expedite the ordering process, please include the following information in Purchase Order or Letter of Intent:

- ☐ Shipping address
- ☐ Billing address
- ☐ Vendor: John Deere Company 2000 John Deere Run Cary, NC 27513
- ☐ Contract name and/or number
- ☐ Signature
- ☐ Tax exempt certificate, if applicable

For any questions, please contact:

Cody Gaab

4 Rivers Equipment
4322 Highway 66
Longmont, CO 80504

Tel: 970-535-4474
Fax: 970-535-4556
Email: cgaab@4riversequipment.com

The John Deere Government Sales Team

JOHN DEERE

ALL PURCHASE ORDERS MUST BE MADE OUT TO (VENDOR):
Deere & Company
2000 John Deere Run
Cary, NC 27513
FED ID: 36-2382580; DUNS#: 60-7690989

ALL PURCHASE ORDERS MUST BE SENT TO DELIVERING DEALER:
4 Rivers Equipment
4322 Highway 66
Longmont, CO 80504
970-535-4474
cmcarthur@4riversequipment.com

Quote Summary

Prepared For:
City Of Fort Lupton
130 S Mckinley Ave
Fort Lupton, CO 80621
Business: 303-857-4080
TBARNETT@FORTLUPTONCO.GOV

Delivering Dealer:
4 Rivers Equipment
Cody Gaab
4322 Highway 66
Longmont, CO 80504
Phone: 970-535-4474
cgaab@4riversequipment.com

Quote ID:	21743822
Created On:	29 April 2020
Last Modified On:	05 May 2020
Expiration Date:	29 May 2020

Equipment Summary	**Selling Price**		**Qty**		**Extended**
JOHN DEERE 6110M Cab Tractor - 1L06110MHLG961877 **Contract:** Sourcewell Ag Tractors 110719-JDC (PG 1P CG 70) **Price Effective Date:** April 29, 2020	$ 97,631.44	X	1	=	$ 97,631.44
JOHN DEERE M15 Flex Wing Rotary Cutter - 1P00M15CLLB001737 **Contract:** Sourcewell Ag Tractors 110719-JDC (PG 1P CG 70) **Price Effective Date:** February 24, 2020	$ 17,951.20	X	1	=	$ 17,951.20
JOHN DEERE 620R Standard Farm Loader - 1P0620RXCKC007753 **Contract:** Sourcewell Ag Tractors 110719-JDC (PG 1P CG 70) **Price Effective Date:** September 20, 2019	$ 9,629.20	X	1	=	$ 9,629.20
Equipment Total					**$ 125,211.84**

* Includes Fees and Non-contract items

Quote Summary	
Equipment Total	$ 125,211.84
Trade In	
SubTotal	**$ 125,211.84**
Est. Service Agreement Tax	$ 0.00

Salesperson : X _____

Accepted By : X _____

JOHN DEERE

ALL PURCHASE ORDERS MUST BE MADE OUT TO (VENDOR):
Deere & Company
2000 John Deere Run
Cary, NC 27513
FED ID: 36-2382580; DUNS#: 60-7690989

ALL PURCHASE ORDERS MUST BE SENT TO DELIVERING DEALER:
4 Rivers Equipment
4322 Highway 66
Longmont, CO 80504
970-535-4474
cmcarthur@4riversequipment.com

Total	$ 125,211.84
Down Payment	(0.00)
Rental Applied	(0.00)
Balance Due	**$ 125,211.84**

Salesperson : X _____

Accepted By : X _____

JOHN DEERE

Selling Equipment

Quote Id: 21743822 **Customer Name:** CITY OF FORT LUPTON

ALL PURCHASE ORDERS MUST BE MADE OUT TO (VENDOR):
Deere & Company
2000 John Deere Run
Cary, NC 27513
FED ID: 36-2382580; DUNS#: 60-7690989

ALL PURCHASE ORDERS MUST BE SENT TO DELIVERING DEALER:
4 Rivers Equipment
4322 Highway 66
Longmont, CO 80504
970-535-4474
cmcarthur@4riversequipment.com

JOHN DEERE 6110M Cab Tractor - 1L06110MHLG961877

Hours: 0000
Stock Number:
Contract: Sourcewell Ag Tractors 110719-JDC (PG 1P CG 70)
Selling Price * $ 97,631.44
Price Effective Date: April 29, 2020

* Price per item - includes Fees and Non-contract items

Code	Description	Qty	List Price	Discount%	Discount Amount	Contract Price	Extended Contract Price
4227L	6110M STANDARD CAB TRACTOR	1	$ 106,507.00	24.00	$ 25,561.68	$ 80,945.32	$ 80,945.32
	Standard Options - Per Unit						
183A	LESS JDLINK	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
185A	LESS SUBSCRIPTION	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
0202	UNITED STATES	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
0409	ENGLISH	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
0501	NO PACKAGE	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
873F	LIGHT PACKAGE - ECONOMY	1	$ 521.00	24.00	$ 125.04	$ 395.96	$ 395.96
873O	2 BELTLINE ROAD LIGHTS H4	1	$ 517.00	24.00	$ 124.08	$ 392.92	$ 392.92
1436	POWRQUAD PLUS LHR 24/24 40K	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
1756	AUTOTRAC READY	1	$ 4,618.00	24.00	$ 1,108.32	$ 3,509.68	$ 3,509.68
1950	W/O AUTOTRAC ACTIVATION	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
2083	6M CAB BASIC WITH RH CONSOLE	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
2141	ECONOMY SEAT	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
2510	MIRROR-LH & RH STANDARD	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
2665	STANDARD RADIO	1	$ 347.00	24.00	$ 83.28	$ 263.72	$ 263.72
3223	HYDRAULIC PUMP - 114 L/MIN	1	$ 1,861.00	24.00	$ 446.64	$ 1,414.36	$ 1,414.36
3338	1,2&3 MECHANIC.SCV 450SERIES	1	$ 1,075.00	24.00	$ 258.00	$ 817.00	$ 817.00
3820	REAR PTO 540/1000 REVERSIBLE	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00

JOHN DEERE

Selling Equipment

Quote Id: 21743822 **Customer Name:** CITY OF FORT LUPTON

ALL PURCHASE ORDERS MUST BE MADE OUT TO (VENDOR):
Deere & Company
2000 John Deere Run
Cary, NC 27513
FED ID: 36-2382580; DUNS#: 60-7690989

ALL PURCHASE ORDERS MUST BE SENT TO DELIVERING DEALER:
4 Rivers Equipment
4322 Highway 66
Longmont, CO 80504
970-535-4474
cmcarthur@4riversequipment.com

4120	DLINKS W/ TEL.BALL CAT2	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
4210	CLINK WITH BALL END - CAT 2	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
4410	SWAY CONTROL BLOCKS	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
5040	R&P REAR AXLE 79 MM SHAFT	1	$ 2,670.00	24.00	$ 640.80	$ 2,029.20	$ 2,029.20
5091	ADJUSTABLE CAST WHEELS REAR	1	$ 185.00	24.00	$ 44.40	$ 140.60	$ 140.60
5221	REAR WHEEL SIZE 420/85R38	1	$ 442.00	24.00	$ 106.08	$ 335.92	$ 335.92
5999	NO TIRE PREFERENCE (REAR/FRO)	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
6045	MFWD FA - UNSUSPENDED	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
6092	ADJUSTAB. STEEL WHEELS FRONT	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
6220	FRONT WHEEL SIZE 380/85R24	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
7702	SHIPMENT P.-BY SHIP OVERSEAS	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
8002	TOOL BOX	1	$ 88.00	24.00	$ 21.12	$ 66.88	$ 66.88
8012	TURNABLE MFWD FRONT FENDER	1	$ 933.00	24.00	$ 223.92	$ 709.08	$ 709.08
8254	PASSENGER/ INSTRUCTIONAL SEAT	1	$ 599.00	24.00	$ 143.76	$ 455.24	$ 455.24
8300	COLD START PACKAGE I	1	$ 352.00	24.00	$ 84.48	$ 267.52	$ 267.52
8386	PTO REMOTE CONTROL	1	$ 68.00	24.00	$ 16.32	$ 51.68	$ 51.68
8424	DRAFT CONTROL	1	$ 674.00	24.00	$ 161.76	$ 512.24	$ 512.24
8457	HIGHER HITCH LIFT CAPACITY	1	$ 413.00	24.00	$ 99.12	$ 313.88	$ 313.88
8742	ALTERNATOR 14V/200A	1	$ 290.00	24.00	$ 69.60	$ 220.40	$ 220.40
8747	BATTERY 12V / 174AH	1	$ 130.00	24.00	$ 31.20	$ 98.80	$ 98.80
8924	LOADER PREP. M-SCV 3 FUNCT.	1	$ 3,427.00	24.00	$ 822.48	$ 2,604.52	$ 2,604.52
8951	FRONT BASE WEIGHT-110KG	1	$ 377.00	24.00	$ 90.48	$ 286.52	$ 286.52
	Standard Options Total		**$ 19,587.00**		**$ 4,700.88**	**$ 14,886.12**	**$ 14,886.12**
	Technology Options/Non-Contract/Open Market						
1801	NO AUTOTRAC PACKAGE	1	$ 0.00	0.00	$ 0.00	$ 0.00	$ 0.00
1880	NO STARFIRE RECEIVER	1	$ 0.00	0.00	$ 0.00	$ 0.00	$ 0.00

JOHN DEERE

Selling Equipment

Quote Id: 21743822 **Customer Name:** CITY OF FORT LUPTON

ALL PURCHASE ORDERS MUST BE MADE OUT TO (VENDOR):
Deere & Company
2000 John Deere Run
Cary, NC 27513
FED ID: 36-2382580; DUNS#: 60-7690989

ALL PURCHASE ORDERS MUST BE SENT TO DELIVERING DEALER:
4 Rivers Equipment
4322 Highway 66
Longmont, CO 80504
970-535-4474
cmcarthur@4riversequipment.com

1900	LESS DISPLAY	1	$ 0.00	0.00	$ 0.00	$ 0.00	$ 0.00
	Technology Options Total		**$ 0.00**		**$ 0.00**	**$ 0.00**	**$ 0.00**
	Value Added Services Total		**$ 0.00**			**$ 0.00**	**$ 0.00**
	Other Charges						
	Freight	1	$ 1,800.00			$ 1,800.00	$ 1,800.00
	Other Charges Total		**$ 1,800.00**			**$ 1,800.00**	**$ 1,800.00**
	Suggested Price						**$ 97,631.44**
Total Selling Price			$ 127,894.00		$ 30,262.56	$ 97,631.44	$ 97,631.44

JOHN DEERE M15 Flex Wing Rotary Cutter - 1P00M15CLLB001737

Equipment Notes:
Hours: 0000
Stock Number:
Contract: Sourcewell Ag Tractors 110719-JDC (PG 1P CG 70)
Price Effective Date: February 24, 2020

Selling Price *
$ 17,951.20

* Price per item - includes Fees and Non-contract items

Code	Description	Qty	List Price	Discount%	Discount Amount	Contract Price	Extended Contract Price
2310P	M15 ROTARY CUTTER	1	$ 23,620.00	24.00	$ 5,668.80	$ 17,951.20	$ 17,951.20
	Standard Options - Per Unit						
0202	DESTINATION UNITED STATES	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
1200	SPRING SUSPENSION	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
2500	BLADE PAN-1OOHP HUB	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
2540	OUTWARD BLADE ROTATION	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
3025	PNEUMATIC TIRES KIT (6)	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
3510	540 RPM PTO DRIVELINE CAT5	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
3600	M15&M20 540RPM 100HP	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
5110	CLEVIS HITCH	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00

JOHN DEERE

Selling Equipment

Quote Id: 21743822 **Customer Name:** CITY OF FORT LUPTON

ALL PURCHASE ORDERS MUST BE MADE OUT TO (VENDOR):
Deere & Company
2000 John Deere Run
Cary, NC 27513
FED ID: 36-2382580; DUNS#: 60-7690989

ALL PURCHASE ORDERS MUST BE SENT TO DELIVERING DEALER:
4 Rivers Equipment
4322 Highway 66
Longmont, CO 80504
970-535-4474
cmcarthur@4riversequipment.com

5280	RIGID TONGUE	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
	Standard Options Total		**$ 0.00**		**$ 0.00**	**$ 0.00**	**$ 0.00**
Total Selling Price			$ 23,620.00		$ 5,668.80	$ 17,951.20	$ 17,951.20

JOHN DEERE 620R Standard Farm Loader - 1P0620RXCKC007753

Equipment Notes:
Hours: 0000
Stock Number:
Contract: Sourcewell Ag Tractors 110719-JDC (PG 1P CG 70)
Price Effective Date: September 20, 2019

Selling Price *
$ 9,629.20

* Price per item - includes Fees and Non-contract items

Code	Description	Qty	List Price	Discount%	Discount Amount	Contract Price	Extended Contract Price
0BQDP	620R STANDARD FARM LOADER	1	$ 12,463.00	24.00	$ 2,991.12	$ 9,471.88	$ 9,471.88
	Standard Options - Per Unit						
0202	USA	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
0409	ENGLISH OM	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
0963	6R/6M SMALL FRAME LDR READY	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
1995	LESS MTG FRAME	1	$ -1,807.00	24.00	$ -433.68	$ -1,373.32	$ -1,373.32
2624	620R SL LDR 3FN	1	$ 2,666.00	24.00	$ 639.84	$ 2,026.16	$ 2,026.16
3995	LESS HYDRAULIC HOSES	1	$ -318.00	24.00	$ -76.32	$ -241.68	$ -241.68
4650	3F, SINGLE-POINT COUPLER,	1	$ 104.00	24.00	$ 24.96	$ 79.04	$ 79.04
5995	LESS HOOD GUARD	1	$ -438.00	24.00	$ -105.12	$ -332.88	$ -332.88
6995	LESS BALLAST BOX	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
8230	85IN HEAVY DUTY BCKT	1	$ 0.00	24.00	$ 0.00	$ 0.00	$ 0.00
	Standard Options Total		**$ 207.00**		**$ 49.68**	**$ 157.32**	**$ 157.32**
Total Selling Price			$ 12,670.00		$ 3,040.80	$ 9,629.20	$ 9,629.20

CITY OF FORT LUPTON
CITY COUNCIL

CITY OF Fort Lupton EST 1836

COME PAINT YOUR FUTURE WITH US

Zo Stieber, Mayor

Shannon Rhoda, Ward 1
Chris Ceretto, Ward 2
Michael Sanchez, Ward 3

David Crespin, Ward 1
Tommy Holton, Ward 2
Bruce Fitzgerald, Ward 3

AM 2020-101

ESCROW AGREEMENT BETWEEN THE CITY OF FORT LUPTON, COLORADO AND FULTON VILLAGE LAND DEVELOPERS, LLC FOR PAYMENT OF CASH IN LIEU FOR 65 LOTS IN FULTON VILLAGE PUD FILING 2.

I. Agenda Date: Council Meeting – May 19, 2020

II. Attachments:
a. Escrow Agreement
b. Exhibit A

III. Summary Statement:

Fulton Village Land Developers, LLC are in the process of finalizing plans for the Fulton Village PUD residential development. The development will result in a total of 75 single family lots. Filing 1 has been approved and recorded for 10 lots. The cash in lieu water has been paid for to cover the 10 lots. 65 lots will require the payment of cash in lieu prior to recording the final plat for filing 2. The escrow agreement allows the payment required for the 65 lots to be paid prior to closing at the current City rate of $55,000 per share of CBT.

IV. Submitted by: _____
Todd A. Hodges, Planning Director

V. Finance Reviewed _____
Finance Director

VI. Approved for Presentation: _____
City Administrator

VII. Attorney Reviewed _____ Approved _____ Pending Approval

VIII. Certification of Council Approval: _____ _____
City Clerk Date

IX. Detail of Issue/Request:

Fulton Village Land Developers, LLC are in the process of finalizing plans for the Fulton Village PUD residential development. The development will result in a total of 75 single family lots. Filing 1 has been approved and recorded for 10 lots. The cash in lieu water has been paid for to cover the 10 lots. 65 lots will require the payment of cash in lieu prior to recording the final plat for filing 2. The escrow agreement allows the payment required for the 65 lots to be paid prior to closing at the current City rate of $55,000 per share of CBT. The payment will be in the amount of $715,000.00 in a form described in the escrow agreement. Once the Fulton Village Land Developers, LLC close on the Filing 2 the payment will be non-refundable. If Fulton Village Land Developers, LLC does not close within 60 days of the date of the Escrow Agreement, the funds shall be returned

X. Legal/Political Considerations:

The City Attorney drafted the Escrow Agreement and this is to allow for the pre-payment of the required water for Filing 2 of the Lupton Village PUD.

XI. Alternatives/Options:

1. *Approve escrow agreement for Mayor to sign.*
2. *Deny escrow agreement.*

XII. Financial Considerations:

The payment will be held until the Fulton Village Land Developers, LLC close on Filing 2 of Fulton Village PUD. Once they close the payment is non-refundable and may be transferred to the applicable fund.

XIII. Staff Recommendation:

Staff recommends approval of the escrow agreement and for Mayor to sign.

ESCROW AGREEMENT

This Agreement is entered into by and between the City of Fort Lupton, Colorado (hereinafter "City") and FULTON VILLAGE LAND DEVELOPERS, LLC ,(hereinafter "FVLD").

WHEREAS, the City has been working with FVLD pertaining to water dedication for a proposed development within the City;

WHEREAS, the parties desire to set a cash in lieu price for required water dedication in the event FVLD closes on the subject property currently under contract within the City;

WHEREAS, the parties hereto agree in consideration of the covenants set forth herein as follows:

1. **FVLD PAYMENT INTO ESCROW.** As cash in lieu of actual water share dedication, FVLD shall pay $715,000 to the City for 65 single family units. Said payment to be made in cashier's check or wire and shall be held by the City in escrow until certain conditions set forth below are met. Payment shall be tendered immediately upon execution of this Agreement. If the payment is not made upon execution, this Agreement shall terminate automatically.

2. **CONDITIONS OF ESCROW.** The $715,000 payment referenced in paragraph 1 above, shall be held in escrow by the City until FVLD closes on the property more accurately described in Exhibit A attached hereto and incorporated herein. Once the property has closed, the $715,000 payment shall be non-refundable and may be transferred by the City to the applicable fund at the City's discretion. If FVLD does not close on the subject property within 60 days of the date of this Escrow Agreement, the funds shall be returned by the City to FVLD. If the property does not close and the funds are returned to FVLD, the cash in lieu price utilized to establish this escrow payment, shall be null and void.

3. **COMPLETE AGREEMENT.** This Agreement, and the exhibit attached hereto and incorporated herein, shall constitute the entire agreement between the parties with respect to the subject matter hereof and there are no agreements, representations, approvals or warranties other than as specifically set forth herein. Nothing in this Agreement, express or implied, is intended to confer upon any third party any rights or remedies. This Agreement does not confer any rights or approvals of any possible plans or submittals FVLD may tender to the City or that may be pending before the City.

4. **SEVERABILITY.** In the event any portion of this Agreement is held to be unenforceable, the unenforceable portion of this Agreement will be deleted and the remaining provisions of the Agreement shall continue in full force and effect.

5. **GOVERNING LAW.** This Agreement shall be governed by the laws of the State of Colorado. All parties agree that any dispute regarding enforcement of this Agreement shall be filed in Weld County District Court after first attempting in good faith to submit the dispute to mediation. Submission of any dispute to mediation shall be a condition precedent to filing litigation in this matter, other than the request for injunctive relief.

6. **NO WAIVER OF GOVERNMENTAL IMMUNITY.** The City, its elected officials, officers and employees are relying upon, and do not waive or intent to waive by any provision of this Agreement, the monetary limitations or any other rights, immunities and protections provided by the Colorado Governmental Immunity Act, C.R.S. Sec. 24-10-101 et seq. as amended or otherwise available to the City. Nothing herein shall operate as a waiver of any right the City has of governmental immunity under Colorado law which is specifically herein reserved.

7. **INDEPENDENT CONTRACTOR.** FVLD is a separate, legal entity from the City and the parties make this Agreement accordingly with the understanding that FVLD at all times is acting independently and not as an employee or agent of the City. FVLD does not have the authority to bind the City by contract or otherwise

8. **APPROVAL REQUIRED.** This Agreement is subject to the final approval of the Fort Lupton City Council and signature by the Mayor of Fort Lupton.

EXECUTED THIS _____ DAY OF _____, 2020.

CITY OF FORT LUPTON, COLORADO

City of Fort Lupton, Colorado

_____

Zo Stieber, Mayor

FULTON VILLAGE LAND DEVELOPERS, LLC.

_____

BY:_____

TITLE:_____

Exhibit A

LEGAL DESCRIPTION

FULTON VILLAGE FINAL PUD PLAT FILING NO. 1

Outlots A, B, C, D and E of Fulton Village Final PUD Plat Filing No. 1, City of Fort Lupton, County of Weld, State of Colorado

CITY OF

Fort Lupton

EST 1836

COME PAINT YOUR FUTURE WITH US

Upcoming Events

April 20th	Shredding Day, 130 S. McKinley Ave. **Cancelled**
April 23 – 24th	Clean-Up Day for Senior/Disabled Curbside Pick Up **Cancelled**
April 25th	Clean-Up Day, Public Works Shop, 800 12th St. **Cancelled**
April 25th	Fort Lupton Annual Vaccination Clinic, **Cancelled** Fort Lupton Veterinary Hospital, 1025 1st St.
April 28th	Virtual Town Hall Meeting, 130 S. McKinley Ave. 6:30 p.m.
May 5th	Virtual City Council Meeting, 130 S. McKinley Ave. 7:00 p.m.