



# PLANNING COMMISSION REGULAR MEETING

448 E. 1st Street, Room 190 Salida, Colorado 81201

Monday, August 23, 2021 - 6:00 PM

## AGENDA

Email public comments to: [publiccomment@cityofsalida.com](mailto:publiccomment@cityofsalida.com)

Please register for the Planning Commission meeting: <https://attendee.gotowebinar.com/rt/1909092342220683277>

### CALL TO ORDER BY CHAIRMAN – 6:00 PM

### ROLL CALL

### APPROVAL OF THE MINUTES

- 1. July 26, 2021 Draft Minutes**

### UNSCHEDULED CITIZENS

### AMENDMENT(S) TO AGENDA

### PUBLIC HEARINGS

Public Hearings will follow the following procedure:

- |   |   |  |
|---|---|--|
| A. Open Public Hearing                  | D. Applicant’s Presentation (if applicable) | G. Commission Discussion                 |
| B. Proof of Publication                 | E. Public Input                             | H. Commission Decision or Recommendation |
| C. Staff Review of Application/Proposal | F. Close Public Hearing                     |  |

- 2. Ordinance 2021-13 - Amending Chapter 16 of the Salida Municipal Code** - The amendment is to address changes to family child care homes required by recent State legislation.

- 3. West End Major Subdivision - Major Impact Review-** The applicants, Tory and Clee Upchurch, are requesting approval of a 24 lot major subdivision on a vacant 5.32 acre parcel located between County Road 140 and County Road 141 that was recently annexed into the City of Salida.

### COMMISSIONERS' COMMENTS

### ADJOURN

**\*\*An alternate can only vote on, or make a motion on an agenda item if they are designated as a voting member at the beginning of an agenda item. If there is a vacant seat or a conflict of interest, the Chairman shall designate the alternate that will vote on the matter. If a Voting member shows up late to a meeting, they cannot vote on the agenda item if the alternate has been designated.**

*Individuals with disabilities needing auxiliary aid(s) may request assistance by contacting the City Clerk at 448 E. 1st Street, Ste. 112, Salida, CO 81201, Ph.719-530-2630 at least 48 hours in advance.*

# PLANNING COMMISSION REGULAR MEETING

448 E. 1st Street, Room 190 Salida, Colorado 81201

July 26, 2021 - 6:00 PM

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## MINUTES

Email public comments to: [publiccomment@cityofsalida.com](mailto:publiccomment@cityofsalida.com)

Please register for the Planning Commission meeting:

<https://attendee.gotowebinar.com/rt/1909092342220683277>

### CALL TO ORDER BY CHAIRMAN – 6:00 PM

#### PRESENT

- Chairman Greg Follet
- Vice-Chair Francie Bomer
- Commissioner Judith Dockery
- Commissioner Giff Kriebel
- Commissioner Doug Mendelson
- Commissioner Michelle Walker
- Commissioner-Alternate Dave Haynes

#### ABSENT

- Commissioner-Alternate Suzanne Copping

### ROLL CALL

### APPROVAL OF THE MINUTES

#### 1. June 28, 2021 - Draft Minutes -

Motion made by Commissioner Kriebel, Seconded by Commissioner Dockery.

Voting Yea: Chairman Follet, Vice-Chair Bomer, Commissioner Dockery, Commissioner Kriebel, Commissioner Mendelson, Commissioner Walker, Commissioner-Alternate Haynes

### UNSCHEDULED CITIZENS

### AMENDMENT(S) TO AGENDA

### PUBLIC HEARINGS

Public Hearings will follow the following procedure:

- |   |  |
|---|--|
| A. Open Public Hearing                      | E. Public Input                          |
| B. Proof of Publication                     | F. Close Public Hearing                  |
| C. Staff Review of Application/Proposal     | G. Commission Discussion                 |
| D. Applicant’s Presentation (if applicable) | H. Commission Decision or Recommendation |

2. **Wood Minor Subdivision** - The request is for limited impact review approval to subdivide Tract A of the Hillside Minor Subdivision into two (2) individual lots to be known as Wood Minor Subdivision.

A. **Open Public hearing** -

B. **Proof of Publication -Yes**

C. **Staff Review of Application** – Staff recommends approval of the subdivision dependent on eight conditions.

D. **Applicant’s Presentation** – Applicant, P.T. Wood, reviews the application and answers questions from the Board about sewer and water services, utilities, zoning and the road.

E. **Public Input – NA**

F. **Close Public Hearing** -

G. **Commissioner Discussion** – Commission reviews the eight conditions that staff presented.

H. **Commission Decision** -

Motion made by Commissioner Kriebel, Seconded by Commissioner Dockery. Voting Yea: Chairman Follet, Vice-Chair Bomer, Commissioner Dockery, Commissioner Kriebel, Commissioner Mendelson, Commissioner Walker, Commissioner-Alternate Haynes

**MOTION PASSES**

3. **Chaffee County Government - Planned Development** - The request is for Major Impact Review approval for a Planned Development Overlay on the Chaffee County 3.87 acre parcel located at 104 Crestone Avenue. The parcel is zoned Single-Family Residential (R-1). The applicant would like the Planned Development Overlay to closely reflect the Commercial (C-1) zone district use and dimensional standards.

A. **Open Public hearing** -

B. **Proof of Publication -Yes**

C. **Staff Review of Application** – Staff recommends that Planning Commission approve the application subject to three conditions.

D. **Applicant’s Presentation** – Joe DeLuca presents the proposed planned development application. He reviews the campus attributes, the zoning overlay, the history of the building and the stewardship the county has shown.

E. **Public Input –NA**

F. **Close Public Hearing** -

**G. Commissioner Discussion** – Commission discusses the application, the planned development’s longevity and conformance.

**H. Commission Recommendation -**

Motion made by Commissioner Dockery to recommend City Council approve the Major Impact Review application for the Chaffee County Planned Development Overlay with the three (3) recommended conditions,

Seconded by Commissioner Mendelson.

Voting Yea: Chairman Follet, Vice-Chair Bomer, Commissioner Dockery, Commissioner Mendelson

Voting Nay: Commissioner Kriebel, Commissioner Walker, Commissioner-Alternate Haynes

**MOTION PASSES**

**UPDATES**

**COMMISSIONERS' COMMENTS**

**Almquist** introduces the new Planning Technician, Franco Palumbo.

**ADJOURN**



## STAFF REPORT

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**MEETING DATE:** August 23, 2021

**AGENDA ITEM TITLE:** Ordinance Amending Chapter 16 of the City of Salida Municipal Code to address changes to family child care homes required by recent State Legislation

**AGENDA SECTION:** Public Hearing

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### REQUEST:

The request is to amend Chapter 16 of the City of Salida Municipal Code, regarding land use and development, to address changes to the family child care homes required by recent State legislation.

### APPLICANT:

City of Salida, Community Development Department

### PROCESS:

State legislation regarding family child care homes will take effect on September 8, 2021. City Council conducted the first reading of Ordinance 2021-13 on August 17th, and Council will hold a public hearing on September 7<sup>th</sup>. Planning Commission will make a recommendation to City Council for the public hearing on September 7<sup>th</sup>.

### OBSERVATIONS:

HB21-1222 regarding the regulation of family child care homes will take effect on September 8, 2021. This act requires local governments to treat family child care homes as residential property when it comes to zoning, land use, fire and life safety, sanitation, and building code regulations. Local governments cannot impose regulations on family childcare homes unless the regulations apply to all residential properties. Under this bill, a family child care home is a type of state-licensed child care facility serving up to 12 children and operated by a person who resides in the same dwelling where the care is provided. A local government retains the ability to prohibit, on a case-by-case basis, the operation of childcare homes in immediately adjacent residences of two or more large family child care homes to manage the flow of traffic and parking.

The proposed ordinance is to amend Chapter 16 of the City of Salida Municipal Code to comply with HB21-1222.

### REVIEW AGENCY COMMENTS:

None.

### REVIEW STANDARDS:

None.

**RECOMMENDED FINDINGS:**

The proposed Ordinance 2021-13 addresses the changes required by recent State Legislation regarding family child care homes.

**STAFF RECOMMENDATION:**

Staff recommends the Planning Commission recommend the Council approve the proposed amendment.

**RECOMMENDED MOTION:**

“I make a motion to recommend the City Council approve Ordinance 2021-13 amending Chapter 16 of the City of Salida Municipal Code to address changes to family child care homes required by recent State legislation.”

Attachments:

Ordinance 2021-13

**CITY OF SALIDA, COLORADO  
ORDINANCE NO. 13  
(Series of 2021)**

**AN ORDINANCE OF THE CITY COUNCIL FOR THE CITY OF SALIDA,  
COLORADO AMENDING CHAPTER 16 OF THE SALIDA MUNICIPAL CODE,  
REGARDING LAND USE AND DEVELOPMENT, TO ADDRESS CHANGES TO  
FAMILY CHILD CARE HOMES REQUIRED BY RECENT STATE LEGISLATION**

**WHEREAS**, the City of Salida, Colorado (“City”) is a statutory city, duly organized and existing under the laws of the state of Colorado; and

**WHEREAS**, pursuant to C.R.S. § 31-15-401, the City by and through its City Council (“Council”), possesses the authority to adopt laws and ordinances within its police power in furtherance of the public health, safety and welfare; and

**WHEREAS**, pursuant to C.R.S. § 31-23-301 *et seq.*, the Salida City Council (“Council”) ALSO possesses the authority to adopt and enforce zoning regulations; and

**WHEREAS**, under such authority, the Council previously adopted land use and zoning regulations, codified as Chapter 16 of the Salida Municipal Code (“Code”); and

**WHEREAS**, pursuant to this authority, the City Council desires to amend and adopt certain regulations related to family child care homes, required by Colorado House Bill 21-1222; and

**WHEREAS**, current state law defines a “family child care home” as a type of state-licensed child care facility serving up to 12 children and operated by a person who resides in the same dwelling where the care is provided; and

**WHEREAS**, this new state legislature requires local governments to treat family child care homes as residential property use in the application of zoning, land use development, fire and life safety, sanitation and building code regulations; and

**WHEREAS**, the City of Salida City Council finds it desirable and appropriate, and in the best interest of the general health, safety and welfare of its citizens to amend Chapter 16 of the Code, as it relates to family child care homes, and to ensure compliance with new State law.

**NOW, THEREFORE, BE IT ORDAINED BY THE CITY COUNCIL FOR THE  
CITY OF SALIDA, COLORADO as follows:**

**Section 1.** The City Council incorporates the foregoing recitals as conclusions, facts, determinations and findings by the City Council.

**Section 2.** Section 16-1-80 of the Salida Municipal Code, concerning Definitions, is hereby amended, in part, as it relates to the definitions regarding day care, to read as follows:

**Sec. 16-1-80. – Definitions.**

...

~~Day care, large~~ means a residence, facility or preschool which provides regular care and supervision for more than eight (8) children at any one (1) time during the day for compensation.

~~Day care, small~~ means a residence, facility or preschool which provides regular care and supervision for eight (8) or less children at any one time during the day for compensation.

**Day Care Home means state-licensed child care facility serving up to twelve (12) children and operated by a person who resides in the same dwelling where the care is provided.**

**Day Care Center means a non-residential facility or preschool which provides regular care and supervision for any number of children during the day for compensation.**

**Section 3.** Section 16-4-190(f) of the Salida Municipal Code, regarding Review standards applicable to particular uses, Day Care, is hereby amended, to read as follows:

**Sec. 16-4-190. – Review standards applicable to particular uses.**

...

(f) Day Care, ~~Small, Large~~ **Home, Center,** and Adult.

**(1) Day Care Home. Day care homes shall meet all certification and licensing requirements of the State of Colorado, shall be operated by a person who resides in the same dwelling where the care is provided, and shall not serve more than twelve (12) children.**

**(2) Day Care Center and Adult Day Care.**

(1) **a.** Parking. A day care facility, ~~small, large or adult~~ **center or adult day care,** shall provide one (1) off-street parking space per nonresident employee. This space shall be provided in addition to any parking required for other uses of the property.

(2) **b.** Drop-off/Pickup Area. One (1) designated off-street drop-off/pick-up space shall be provided per each four (4) children at a ~~large~~ day care facility **center** and for every four (4) clients at an adult day care. The space shall be available during operating hours for loading and unloading of children or clients.

(3) ~~Outside Area Fence.~~ The required play or recreation area shall not be located in the property's front yard.

(4) **c.** State Codes. The day care facility shall comply with all applicable state codes.

(5) **d.** Hours of Operation. The hours of operation for the day care may be restricted in residential neighborhoods to limit adverse impacts of noise and traffic on neighboring properties.

**Section 4.** Table 16-D of the Salida Municipal Code, regarding Schedule of Uses, is hereby amended, in part, as it relates to day care homes and day care centers to read as follows:

**TABLE 16-D  
Schedule of Uses**

<b>N = Not Permitted</b> <b>P = Permitted</b> <b>AC = Administrative Conditional Use</b> <b>C = Conditional Use</b> <b>AR = Administrative Review</b> <b>LR = Limited Impact Review</b> <b>MR = Major Impact Review</b>									
<b>Residential Business Uses</b>	<b>R-1</b>	<b>R-2</b>	<b>R-3</b>	<b>R-4</b>	<b>RMU</b>	<b>C-2</b>	<b>C-1</b>	<b>I</b>	<b>Standards</b>
...									
Day care, adult	C	C	C	C	LR	AR	AR	LR	Sec. 16-4-190(f)
<del>Day care, small</del>	<del>AC</del>	<del>AC</del>	<del>AC</del>	<del>AC</del>	<del>AC</del>	<del>AC</del>	<del>AC</del>	<del>AC</del>	<del>Sec. 16-4-190(f)</del>
<b><u>Day care home</u></b>	<b><u>P</u></b>	<b><u>P</u></b>	<b><u>P</u></b>	<b><u>P</u></b>	<b><u>P</u></b>	<b><u>P</u></b>	<b><u>P</u></b>	<b><u>P</u></b>	Sec. 16-4-190(f)
<del>Day care, large</del> <b><u>Day care center</u></b>	C	C	C	C	C	AC	AC	C	Sec. 16-4-190(f)

**Section 4. Severability.** The provisions of this ordinance are severable and the invalidity of any section, phrase, clause or portion of the ordinance as determined by a court of competent jurisdiction shall not affect the validity or effectiveness of the remainder of the ordinance.

INTRODUCED ON FIRST READING, on August 17, 2021, ADOPTED and ORDERED PUBLISHED IN FULL in a newspaper of general circulation by the City Council on this \_\_\_\_ day of \_\_\_\_\_, 2021 and set for second reading and public hearing on the 7<sup>th</sup> day of September, 2021.

INTRODUCED ON SECOND READING FINALLY ADOPTED and ORDERED PUBLISHED IN FULL, by the City Council on this 7<sup>th</sup> day of September, 2021.

City of Salida

\_\_\_\_\_  
Mayor P.T. Wood

ATTEST:

\_\_\_\_\_  
City Clerk/Deputy City Clerk



**PLANNING COMMISSION STAFF REPORT**

**MEETING DATE:** August 23, 2021

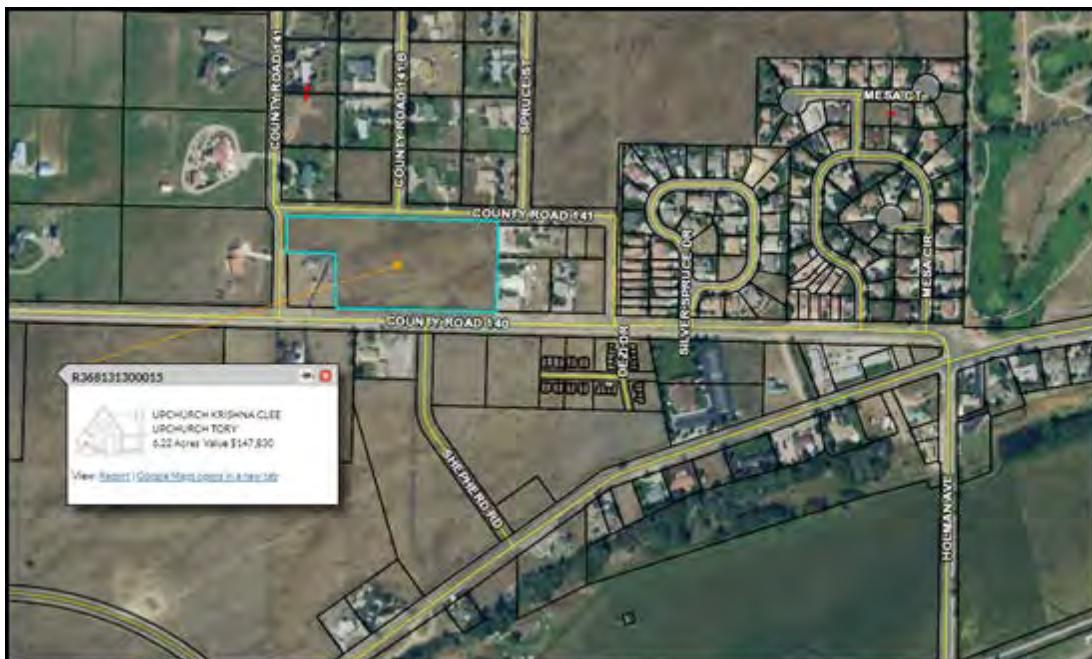
**AGENDA ITEM TITLE:** West End (Upchurch) Major Subdivision – Major Impact Review

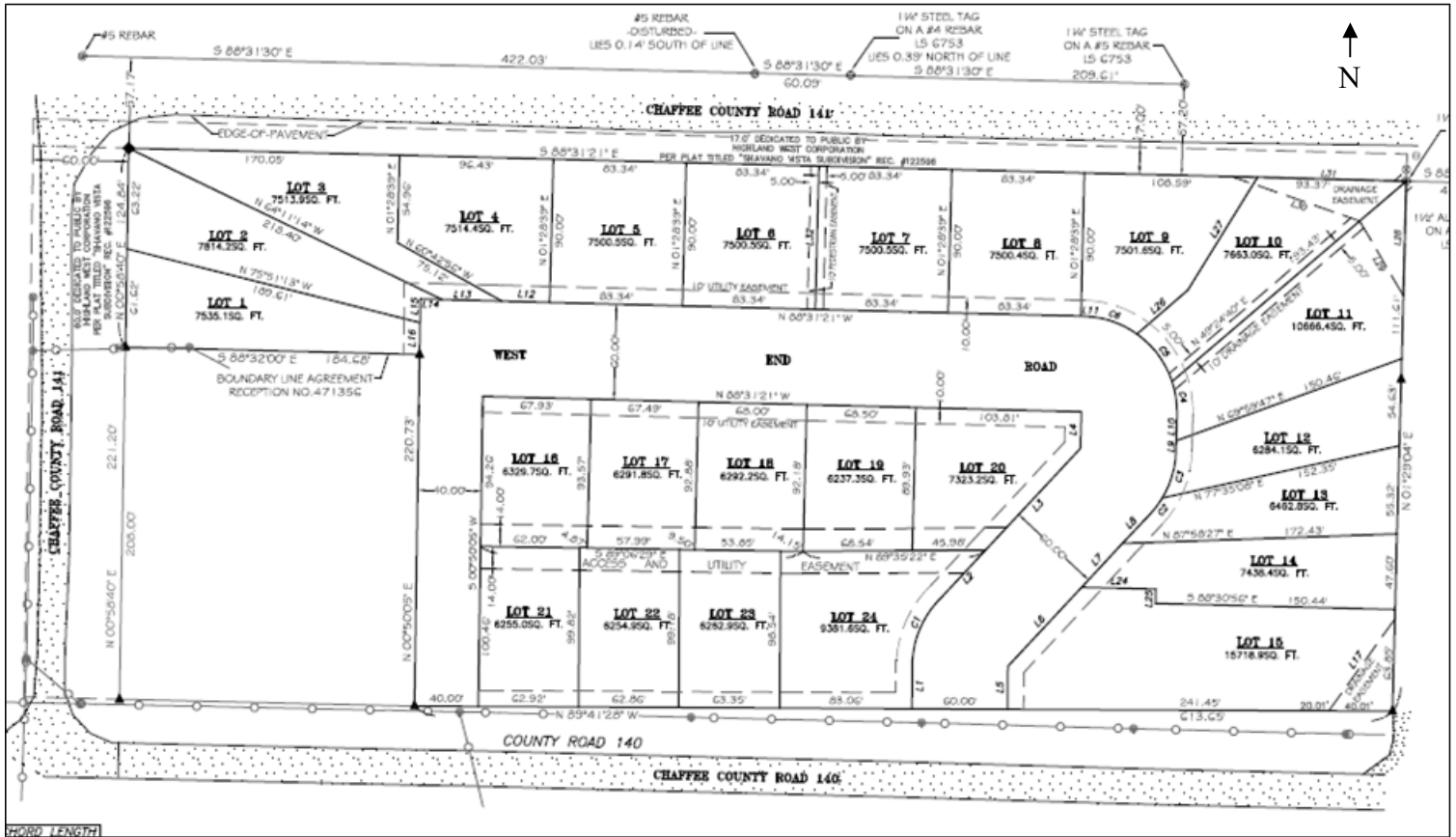
**AGENDA SECTION:** Public Hearing

**REQUEST / BACKGROUND:**

The applicants, Tory and Clee Upchurch, are requesting approval of a 24-lot major subdivision on a 5.32 acre parcel located between County Road 140 and County Road 141, legally known as a “Tract in the SE ¼ SW ¼ of Section 31 T50N R9E of the N.M.P.M., Chaffee County, Colorado.” The site is zoned Medium-Density Residential (R-2) and was recently annexed into the city of Salida. A conceptual review of the proposed subdivision initially occurred on January 4<sup>th</sup>, 2021, and an updated version of the subdivision concept was provided during the subsequent annexation hearings on March 22 and April 20, 2021. Development of the property is subject to a variety of conditions contained within the (Upchurch) annexation agreement (Resolution 2021-11), which are discussed as relevant herein and attached to the end of this report.

The proposed lots range in size from 6,237 SF (.14 ac) to 15,719 SF (.36 ac). The applicants have indicated an intent to build single-family homes along the northern edge of the subdivision (consistent with a requirement of the annexation agreement), a likely mix of duplex and triplex units on lots within the interior and eastern edge of the subdivision, and five inclusionary housing units in the southeast corner (Lot 15). The vicinity map and proposed subdivision layout are shown below:





**B. MAJOR SUBDIVISION PLAT REVIEW**

A major subdivision requires a recommendation from the Planning Commission and final approval by the City Council. The applicant is requesting that the Planning Commission recommend approval of a 24-lot residential subdivision with an internal loop street, pedestrian easement/access connecting to CR 141 to the north, and other infrastructural improvements. The proposed subdivision must comply with the following standards:

**1. Comprehensive Plan.**

The proposed subdivision is consistent with the Comprehensive Plan, which promotes diverse residential housing types (including affordable housing) and efficient use of existing services. In addition, the proposal will provide for a logical extension of the City boundary to support the demand for residentially-zoned land, as prescribed in the Land Use and Growth section of the Comp Plan. Staff finds that the subdivision’s design and proposed use is compatible with surrounding land uses and will not create unreasonable adverse effects on neighboring properties, especially as conditioned by the requirements of the annexation agreement. This standard is met.

**2. Zone District Standards.**

The proposed subdivision will comply with the underlying Medium-Density R-2 zoning district standards and other applicable standards of the Land Use and Development Code, with the exceptions specifically granted and detailed in the annexation agreement (and conditioned below as plat notes), including minimum rear lot line frontage onto CR 141 and minimum lot frontage for lots in the northwest corner of the development, among others.

**3. Improvements.**

The applicants propose to dedicate right-of-way and utilities for the loop road (“West End Road”) that circulates within the development. The applicant also proposes various improvements to and along CR 140, as required by the annexation agreement and conditioned herein. Public Works staff has also reviewed the plans and recommends the following conditions:

- Given that the point discharge from the detention pond is into County Road ROW, it is recommended that County requirements be reviewed for design storm, etc. and that consideration be given to additional storage to provide full retention.
- ADA ramps shall be provided on the south side of County Road 140 (Airport Road) at the proposed intersections in order to provide pedestrian and ADA accessibility to the existing concrete sidewalk on the south side of the roadway. A temporary surface improvement (crusher fine path and culvert) may be considered at the crosswalk adjacent to Shepherd Road ROW until the time of Angelview Subdivision intersection improvements.
- Curb inlets shall be provided at the drainage low point at Shepherd Road.
- The applicant shall review design intent of water services to all lots, as it would appear that many of the lots are anticipated to be duplexes and Lot 15 shows five water services.

Xcel Energy also provided feedback regarding required easements. As a plat note, staff recommends the following condition:

- 5-foot side lot easements shall be added to all lots, with the exception of Lots 16 & 21 which need a 10-foot easements on the side touching the road. Additionally, rear lot easements will be required, including 10-foot easements on the lots that do not have one shown already.

All other required improvements are proposed for the subdivision, and no phasing is proposed.

**4. Natural Features.**

The site is flat and void of any trees. Staff is unaware of any extraordinary natural features on the site. The lot layout is designed in a manner to take advantage of views in every direction.

**5. Floodplains.**

This property does not reside in the floodplain. This standard does not apply.

**6. Noise Reduction.**

This property is does not border a highway. This standard does not apply.

**7. Future Streets.**

The subdivided lots are not intended for future re-subdivision, with the exception of possible attached duplex and triplex lots. It is noted and recommended to be conditioned below that no vehicle access to or from CR 141 shall be allowed in any future development on the Property without either the approval of Chaffee County, or annexation of relevant portions of CR 141 into the City of Salida through the applicable City review and approval process.

All other required access and utility easements are provided through this development.

**8. Parks, Trails and Open Space.**

No public open space dedication is proposed nor desired by the City within this development, primarily due to the easy access to the CR 140 shared use path and likely future open space nearby. However, as part of the annexation agreement, the applicant is required to provide a public access easement along the northern portion of the development (as shown) to guarantee continuous pedestrian access between CR 140 and the northern portion of CR 140. As plat notes, staff recommends the following conditions:

- The applicant shall build and maintain a crusher-fine path across the 10-foot pedestrian access between West End Road and CR 141.
- Fees-in-lieu for Open Space and for Fair Contributions to Schools shall be required prior to certificate of occupancy for all units.

**9. Common Recreation Facilities.**

The only common recreation facility proposed is the public access easement between Lots 6 and 7. This pathway will be accessible to residents of the development as well as to the general public, and will not interfere with neighboring developments.

**10. Lots and Blocks.**

The size, shape, and orientation of the lots are appropriate to the design and location of proposed subdivision and type of development contemplated, especially in light of the prohibition of direct vehicular access from the development to CR 141 and exceptions granted via the annexation agreement, incorporated in conditions herein. This standard is met.

**11. Architecture.**

The applicant states that building designs will have variations that meet this review standard and “will provide a level of visual interest to the neighbors and community members.” As a plat note, staff recommends the following condition:

- The applicant shall provide staff, at time of building permits, with elevations of any and all existing homes (or homes under construction) along the same side of the street and (if applicable) the home(s) directly across the street, to ensure that the subdivision architectural standards will be met.

**12. Codes.**

The subdivision will comply with all applicable City building, fire and safety codes for the proposed development.

**13. Inclusionary Housing.**

The applicants have indicated that they will meet the Inclusionary Housing standards with the construction of a minimum of 12.5% of all total units within the development, likely through an agreement with the Chaffee Housing Trust (CHT) on Lot 15. The applicants also note that, if CHT is for some reason unable to build the units, that the applicants’ development firm, SGC LLC, will construct the required units per the requirements of the annexation agreement. To ensure that the affordable units are built in a timely fashion and made available for occupation, staff has included recommended plat notes as conditions of approval below, consistent with the annexation agreement.

**RESPONSE FROM REFERRAL DEPARTMENTS AND AGENCIES:**

Requests to referral agencies and City departments were sent on August 12, 2021. Comments received are as follows:

- Salida Fire Department: Kathy Rohrich, Fire Plan Review responded “The Fire Department has no concerns at this time. We will need to discuss hydrant placement but that is down the road.”
- Salida Police Department: Russ Johnson, Police Chief responded “I have reviewed the plans that have been submitted and have no concerns at this time.”
- Chaffee County Planning Department: There has not been a response at the time of this writing.
- Salida School District: David Blackburn, Superintendent responded “Fees in lieu of land is acceptable in this project.”
- Salida Utilities: Renee Thonoff, Senior Accountant stated “Regarding West End Subdivision, this property currently has no City Services (i.e. water/sewer). Development would require the purchase of water/sewer taps and meters. The City charges system development fees per unit, how the developer chooses to meter could result in each dwelling unit being metered individually or by building.”
- Atmos Energy: There has not been a response at the time of this writing.
- Salida Public Works Department: Public Works Director, David Lady, submitted the following comments:
  - 1) The general site plan of the streets, utilities and drainage improvements appear to be consistent with design criteria.
  - 2) A drainage easement is provided for stormwater detention. The point discharge from the detention pond is into County Road ROW. It is recommended that the County requirements be reviewed for design storm, etc. and consideration of additional storage to provide full retention.
  - 3) ADA ramps to be provided on the south side of County Road 140 (Airport Road) at proposed intersections in order to provide pedestrian and ADA accessibility to the existing concrete sidewalk on the south side of the roadway. A temporary surface improvement (crusher fine path and culvert) may be considered at the crosswalk adjacent to Shepherd Road ROW until the time of Angel View Subdivision intersection improvements.
  - 4) Curb inlets to be provided at the drainage low point at Shepherd Road.
  - 5) Review design intent of water services to lots as it would appear many of the lots are anticipated to be duplexes. Lot 15 shows five water services.
- Xcel Energy: Sterling Waugh responded: “We will need to add side lot easements, 5’, and lots 16 & 21 need a 10’ easement on the side touching the road. Need rear lot easements as well, 10’ on the lots that don’t have one already.”

**STAFF RECOMMENDATIONS:**

Staff recommends approval of the major subdivision requests with the following conditions:

1. The applicant shall add the following notes to the final subdivision plat, consistent with requirements of the annexation agreement:
  - Any lots created on property immediately adjacent to CR 141 shall be developed with detached single-family primary dwellings, shall have a minimum lot size of 7,500 square feet (“SF”), and shall have no less than 50 feet of rear lot line frontage onto CR 141. If accessory dwelling units (“ADUs”) are developed on lots immediately adjacent to CR 141, said ADUs shall be subject to the same frontage restrictions of the primary dwellings.

- Up to three (3) lots at or around the northwest corner may have less than the required minimum lot frontage facing onto the proposed internal street, but such frontage shall be no less than 20 feet, and proposed development upon said lots shall follow the applicable approval processes set forth in the City Code.
- No primary or accessory dwelling units within any future development on the Property shall have frontage on CR 141 without either the approval of Chaffee County, or annexation of relevant portions of CR 141 into the City of Salida through the applicable City review and approval process.
- Developer shall enter into either a subdivision improvement agreement or development agreement that includes guarantees for the construction of the public street improvements, the extension of public water and sewer mains, and guarantees the construction, prior to recordation of the subdivision or development.
- Developer shall, at time of development of the Property, improve the annexed portion of CR 140 fronting the Property site, pursuant to City Code and all City Design Standards, including and relating, but not limited to, curb, gutter, sidewalk, street trees and parking on the north side; provide a crosswalk across CR 140 to the shared path on the south side in a location approved by City staff; and provide a minimum 2-inch overlay over both drive lanes of CR 140 along the frontage of the annexed property and extended to the west intersection with CR 141, or reconstruct said road if it is for grade, at the direction of the Public Works Director.
- Roads shall be designed in accordance with the City Design Standards, including, but not limited to, applicable requirements related to sidewalk construction and of right-of-way dedication, unless otherwise permitted by the Public Works Director. It is noted that a 40-foot ROW on the west end of such a subdivision, in addition to other access requirements, would be sufficient and a sidewalk would only be required on the east side of said ROW. A 20-foot dedication of ROW will be required of the adjacent property to the west at time of annexation for that parcel.
- No vehicle access to or from CR 141 shall be allowed in any future development on the Property without either the approval of Chaffee County, or annexation of relevant portions of CR 141 into the City of Salida through the applicable City review and approval process.
- The first built inclusionary housing units shall receive certificate of occupancy (“CO”) prior to the eighth (8th) unit on the Property receiving CO or, if provided via multi-family housing, the first of such required inclusionary housing units shall receive CO prior to the twelfth (12th) unit on the Property receiving CO, and the last of such required units shall receive CO prior to the 24th unit on the Property receiving CO. The number of units required to be physically built will be specified within the subdivision improvement agreement or development agreement, based upon the 12.5% City Code requirement.
- For any affordable inclusionary housing unit(s) required to be built within the development, the developer shall be required to deposit the applicable Inclusionary Housing fee-in-lieu for each required unit at the time of issuance of a building permit. Once the required affordable unit(s) has received certificate of occupancy, such fees-in-lieu deposit shall be returned to the developer.
- Developer shall give preference to current Chaffee County residents or workforce for a minimum of six (6) non-inclusionary housing units within any development on the Property, to the extent permitted by law. Such marketing and vetting shall be the

developer’s responsibility, with guidance provided by City staff and the Chaffee Housing Authority.

- Fees-in-lieu for Open Space and for Fair Contributions to Schools shall be required prior to certificate of occupancy for all units.
2. The following note shall also be added to the final subdivision plat: “The applicant shall build and maintain a crusher-fine path across the 10-foot wide pedestrian access between West End Road and CR 141.”
  3. The following note shall also be added to the final subdivision plat: “The applicant shall provide staff, at time of building permits, with elevations of any and all existing homes (or homes under construction) along the same side of the street and (if applicable) the home(s) directly across the street, to ensure that the subdivision architectural standards will be met.”
  4. Given that the point discharge from the detention pond is into County Road ROW, it is recommended that County requirements be reviewed for design storm, etc. and that consideration be given to additional storage to provide full retention.
  5. ADA ramps shall be provided on the south side of County Road 140 at the proposed intersections in order to provide pedestrian and ADA accessibility to the existing concrete sidewalk on the south side of the roadway. A temporary surface improvement (crusher fine path and culvert) may be considered at the crosswalk adjacent to Shepherd Road ROW until the time of Angelview Subdivision intersection improvements.
  6. Curb inlets shall be provided at the drainage low point at Shepherd Road.
  7. The applicant shall review design intent of water services to all lots, as it would appear that many of the lots are anticipated to be duplexes and Lot 15 shows five water services.
  8. 5-foot side lot easements shall be added to all lots, with the exception of Lots 16 & 21 which need a 10-foot easements on the side touching the road. Additionally, rear lot easements will be required, including 10-foot easements on the lots that do not have one shown already.
  9. The construction plans shall be signed and stamped for final review.
  10. After approval of a SIA, the applicant is to coordinate product submittals and preconstruction meeting with Public Works prior to initiation of work.

**RECOMMENDED MOTIONS:**

- A. “I make a motion to recommend the City Council approve the proposed West End Major Subdivision, subject to the conditions recommended by staff.”

Attachments:

- Major Subdivision Application Materials and Preliminary Plat
- Civil Drawings
- Traffic Study
- Upchurch Annexation Agreement
- Proof of Notice



# GENERAL DEVELOPMENT APPLICATION

448 East First Street, Suite 112  
Salida, CO 81201  
Phone: 719-530-2626 Fax: 719-539-5271  
Email: [planning@cityofsalida.com](mailto:planning@cityofsalida.com)

## 1. TYPE OF APPLICATION (Check off as appropriate)

- |  |   |
|--|---|
| <input type="checkbox"/> Annexation                      | <input type="checkbox"/> Administrative Review:<br>(Type) _____                                     |
| <input type="checkbox"/> Pre-Annexation Agreement        | <input type="checkbox"/> Limited Impact Review:<br>(Type) _____                                     |
| <input checked="" type="checkbox"/> Variance             | <input checked="" type="checkbox"/> Major Impact Review:<br>(Type) <small>Subdivision</small> _____ |
| <input type="checkbox"/> Appeal Application              | <input type="checkbox"/> Other: _____   |
| <input type="checkbox"/> Certificate of Approval         |   |
| <input type="checkbox"/> Creative Sign Permit            |   |
| <input type="checkbox"/> Historic Landmark/District      |   |
| <input type="checkbox"/> License to Encroach             |   |
| <input type="checkbox"/> Text Amendment to Land Use Code |   |
| <input type="checkbox"/> Watershed Protection Permit     |   |
| <input type="checkbox"/> Conditional Use                 |   |

## 2. GENERAL DATA (To be completed by the applicant)

### A. Applicant Information

Name of Applicant: Tory Upchurch

Mailing Address: 4934 W. Hwy 290 Sunset Valley, Texas 78735.

Telephone Number: 512.826.6152 FAX: \_\_\_\_\_

Email Address: toryup@gmail.com

Power of Attorney/ Authorized Representative: Ravi Reddy/Bill Hussey  
(Provide a letter authorizing agent to represent you, include representative's name, street and mailing address, telephone number, and FAX)

### B. Site Data

Name of Development: WestEnd

Street Address: Between CR 140 and CR 141 North of Shepard Rd.

Legal Description: Lot \_\_\_\_\_ Block \_\_\_\_\_ Subdivision \_\_\_\_\_ (attach description)

Disclosure of Ownership: List all owners' names, mortgages, liens, easements, judgments, contracts and agreements that run with the land. (May be in the form of a current certificate from a title insurance company, deed, ownership and encumbrance report, attorney's opinion, or other documentation acceptable to the City Attorney)

I certify that I have read the application form and that the information and exhibits herewith submitted are true and correct to the best of my knowledge.

Signature of applicant/agent:  Date: 7/23/21

Signature of property owner:  Date: 7/23/21



# LIMITED IMPACT & MAJOR IMPACT SUBMITTAL REQUIREMENTS

448 East First Street, Suite 112  
Salida, CO 81201  
Phone: 719-530-2626 Fax: 719-539-5271  
Email: [planning@cityofsalida.com](mailto:planning@cityofsalida.com)

*An application is meant to highlight the requirements and procedures of the Land Use Code. With any development application, it is the responsibility of the applicant to read, understand, and follow all of the provisions of the Land Use Code.*

## 1. PROCEDURE (Section 16-3-80)

**A. Development Process** (City Code Section 16-3-50) Any application for approval of a development permit shall include a written list of information which shall constitute the applicant's development plan, which shall be that information necessary to determine whether the proposed development complies with this Code. The development plan shall include the following, as further specified for each level of review on the pre-application checklist:

1. Pre-Application Conference (Limited Impact and Major Impact Review Applications)
2. Submit Application
4. Staff Review. Staff report or decision forwarded to the applicant (Administrative review)
5. Public Notice
6. Public Hearing with Planning Commission (Limited Impact and Major Impact Review Applications)
7. Public Notice
8. Hearing Conducted by City Council (Major Impact Review)

**B. Application Contents** (City Code Section 16-3-50)

- 1. A General Development Agreement completed.
- 2. A copy of a current survey or the duly approved and recorded subdivision plat covering the subject lots where the proposal is for development on previously subdivided or platted lots;
- 3. A brief written description of the proposed development signed by the applicant;
- 4. Special Fee and Cost Reimbursement Agreement completed.
- 5. Public Notice.
  - a) List. A list shall be submitted by the applicant to the city of adjoining property owners' names and addresses. A property owner is considered adjoining if it is within 175 feet of the subject property regardless of public ways. The list shall be created using the current Chaffee County tax records.
  - b) Postage Paid Envelopes. Each name on the list shall be written on a postage-paid envelope. Postage is required for up to one ounce. Return Address shall be: City of Salida, 448 E. First Street, Suite 112, Salida, CO 81201.
  - c) Applicant is responsible for posting the property and submittal of notarized affidavits for proof of posting the public notice.

7. Developments involving construction shall provide the following information:

(i) A development plan map, at a scale of one (1) inch equals fifty (50) feet or larger with title, date, north arrow and scale on a minimum sheet size of eight and one-half (8½) inches by eleven (11) inches, which depicts the area within the boundaries of the subject lot, including:

a. The locations of existing and proposed land uses, the number of dwelling units and the square footage of building space devoted to each use;

b. The location and dimensions, including building heights, of all existing and proposed Buildings or structures and setbacks from lot lines or building envelopes where exact dimensions are not available;

c. Parking spaces;

d. Utility distribution systems, utility lines, and utility easements;

e. Drainage improvements and drainage easements;

f. Roads, alleys, curbs, curb cuts and other access improvements;

g. Any other improvements;

h. Any proposed reservations or dedications of public right-of-way, easements or other public lands, and

i. Existing topography and any proposed changes in topography, using five-foot contour intervals or ten-foot contour intervals in rugged topography.

(ii) 24” x 36” paper prints certified by a licensed engineer and drawn to meet City specifications to depict the following:

a. Utility plans for water, sanitary sewer, storm sewer, electric, gas and telephone lines;

b. Plans and profiles for sanitary and storm sewers; and

c. Profiles for municipal water lines; and

d. Street plans and profiles.

(iii) Developments in the major impact review procedure shall provide a development plan map on paper prints of twenty-four (24) inches by thirty-six (36) inches, with north arrow and scale, and with title and date in lower right corner, at a scale of one (1) inch equals fifty (50) feet or larger which depicts the area within the boundaries of the subject lots and including those items in Section 16-3-40(a) (3).

8. Any request for zoning action, including review criteria for a requested conditional use (Sec. 16-4-190 ) or zoning variance (Sec. 16-4-180);

9. Any subdivision request including a plat meeting the requirements of Section 16-6-110;

10. Any other information which the Administrator determines is necessary to determine whether the proposed development complies with this Code, including but not limited to the following:

(i) A tabular summary of the development proposal, which identifies the total proposed development area in acres, with a breakdown of the percentages and amounts devoted to specific land uses; total number and type of proposed residential units; total number of square feet of proposed nonresidential space; number of proposed lots; and sufficient information to demonstrate that the plat conforms with all applicable dimensional standards and off-street parking requirements.

(ii) A description of those soil characteristics of the site which would have a significant influence on the proposed use of the land, with supporting soil maps, soil logs and classifications sufficient to enable evaluation of soil suitability for development purposes. Data furnished by the USDA Natural Resource Conservation Service or a licensed engineer shall be used. The data shall include the shrink/swell potential of the soils, the groundwater levels and the resulting foundation requirements. Additional data may be required by the City if deemed to be warranted due to unusual site conditions.

(iii) A report on the geologic characteristics of the area, including any potential natural or man-made hazards which would have a significant influence on the proposed use of the land, including but not limited to hazards from steep or unstable slopes, rockfall, faults, ground subsidence or radiation, a determination of what effect such factors would have, and proposed corrective or protective measures.

(iv) Engineering specifications for any improvements.

(v) A plan for erosion and sediment control, stabilization and revegetation.

(vi) A traffic analysis prepared by a qualified expert, including projections of traffic volumes to be generated by the development and traffic flow patterns, to determine the impacts of a proposed development on surrounding City streets and to evaluate the need for road improvements to be made.

(vii) A storm drainage analysis consisting of the following:

(a) A layout map (which may be combined with the topographic map) showing the method of moving storm sewer water through the subdivision shall be provided. The map shall also show runoff concentrations in acres of drainage area on each street entering each intersection. Flow arrows shall clearly show the complete runoff flow pattern at each intersection. The location, size and grades of culverts, drain inlets and storm drainage sewers shall be shown, as applicable.

(b) The applicant shall demonstrate the adequacy of drainage outlets by plan, cross-section and/or notes and explain how diverted stormwater will be handled after it leaves the subdivision. Details for ditches and culverts shall be submitted, as applicable.

(c) The projected quantity of stormwater entering the subdivision naturally from areas outside of subdivision and the quantities of flow at each pickup point shall be calculated.

(viii) Evidence of adequate water supply and sanitary sewer service - Data addressing the population planned to occupy the proposed subdivision and future development phases and other developments that may need to be served by extensions of the proposed water supply and sewage disposal systems. The resulting domestic, irrigation and fire flow demands shall be expressed in terms of

gallons of water needed on an average day and at peak time, and the resulting amounts of sewage to be treated shall be expressed in gallons per day.

(ix) An analysis shall be submitted addressing how water for domestic use and for fire flows is to be provided, along with the collection and treatment of sewage generated by the property to be subdivided.

(x) A statement shall be submitted addressing the quantity, quality and availability of any water that is attached to the land.

(xi) A preliminary estimate of the cost of all required public improvements, tentative development schedule (with development phases identified), proposed or existing covenants and proposed maintenance and performance guarantees. The applicant shall submit, at least in summary or outline form, any agreements as may be required by Section 16-2-70, relating to improvements and dedications.

(xii) If intending to use solar design in the development, include a description of the steps that have been taken to protect and enhance the use of solar energy in the proposed subdivision. This shall include how the streets and lots have been laid out and how the buildings will be sited to enhance solar energy usage.

(xiii) If applicable, a report shall be submitted identifying the location of the one-hundred-year floodplain and the drainage ways near or affecting the property being subdivided. If any portion of a one-hundred-year floodplain is located on the property, the applicant shall also identify the floodway and floodway fringe area. The applicant shall also describe the steps that will be taken to ensure that development locating in the floodway fringe area is accomplished in a manner which meets Federal Insurance Administration standards.

(xiv) If applicable, a report shall be submitted on the location of wetlands, as defined by the U.S. Army Corp of Engineers, on or affecting the property being subdivided. The report shall outline the development techniques planned to ensure compliance with federal, state and local regulations.

(xv) A landscape plan, meeting the specifications of Section 16-8-90.

(xvi) If applicable, a description of how the proposal will comply with the standards of any of the overlays.

(xvii) A site plan for parks, trails and/or open space meeting the requirements of Section 16-6-110 below. If an alternate site dedication or fee in lieu of dedication is proposed, detailed information about the proposal shall be submitted.

(xviii) All development and subdivision naming shall be subject to approval by the City. No development or subdivision name shall be used which will duplicate or be confused with the name of any existing street or development in the City or the County;

11. An access permit from the Colorado Department of Transportation; and

12. A plan for locations and specifications of street lights, signs and traffic control devices.

**2. REVIEW STANDARDS** (If necessary, attach additional sheets)

The application for Limited or Major Impact Review shall comply with the following standards.

**1. Consistency with Comprehensive Plan.** The use shall be consistent with the City’s Comprehensive Plan.

The neighborhood will provide a variety of housing choices and create a community that honors Salida’s traditional neighborhoods and the vision of Salida as directed within the Comprehensive Plan.

**2. Conformance to Code.** The use shall conform to all other applicable provisions of this Land Use Code, including, but not limited to:

a. **Zoning District Standards.** The purpose of the zone district in which it is located, the dimensional standards of that zone district, and any standards applicable to the particular use, all as specified in Article 5, Use and Dimensional Standards.

R2 zoning creates a medium density development with lot sizes ranging from 5,985 square feet to 15,639 square feet. The lots on the north and west border of the property will be built based on R1 lot size standards with the goal of seamlessly integrating with neighbors in the county. We will increase the density of units to the south and east of the property. This will allow us Diverse Housing to provide a mix of residential units to support varied housing.

b. **Site Development Standards.** The parking, landscaping, sign and improvements standards.

The subdivision will comply with R2 zone requirements for parking. Each lot will meet code standards for off street parking (based on the inclusionary housing incentive). We have also minimized the number of driveway cuts in order to maximize the number of street parking spaces. The off street parking will be accessed either from an alley, when available, or from shared accesses off the street when it makes sense.

A minimum of one tree per lot will be planted prior to certificate of occupancy. If not in planting season, a deposit will be placed with the city, to be fully refunded once the tree is planted. Since lot widths are all narrower than 50’, this will meet code section 16-8-90. An effort will be made to repeat the distances between trees.

The WestEnd H.O.A. will maintain the private alleys, parkways, and drainage easements in the development. The planned right-of-way through the development will be a public road and connect to CR 140. The right-of -way will be maintained by the city.

**3. Use Appropriate and Compatible.** The use shall be appropriate to its proposed location and be compatible with the character of neighboring uses, or enhance the mixture of complementary uses and activities in the immediate vicinity.

We have designed the neighborhood increase density as you move south and east on the property. Lots 1-10 across the north border will be single family homes which will be closest to the neighbors. The density of units will increase as you move south and east to minimize any undesirable noise and to compatible with the surrounding neighbors.

The development is designed for connectivity to the surrounding area and to the City of Salida. We will be building two sidewalks connecting the neighborhood to CR 141 and a sidewalk on the annexed portion of CR140 which will increase the likelihood that residents and surrounding neighbors will bike to town.

**4. Nuisance.** The operating characteristics of the use shall not create a nuisance and the impacts of the use on surrounding properties shall be minimized with respect to noise, odors, vibrations, glare, and similar conditions.

We will follow all of the guidelines for construction in order to minimize noise and being a nuisance to the neighborhood.

**5. Facilities.** There shall be adequate public facilities in place to serve the proposed use, or the applicant shall propose necessary improvements to address service deficiencies which the use would cause.

We will provide public facilities and propose any necessary improvements.

**6. Environment.** The use shall not cause significant deterioration to water resources, wetlands, wildlife habitat, scenic characteristics, or other natural features. As applicable, the proposed use shall mitigate its adverse impacts on the environment.

There are no unique environmental resources required on this project and there will be little to no impact on the environment.

## Information for Major Impact Review (Major Subdivision) Application: WestEnd Development

**PREPARED BY:** Tory Upchurch  
Address: 4934 W. Hwy 290 Sunset Valley, Texas 78735  
Prepared for: City of Salida Planning Commission

**PURPOSE OF REPORT:** Tory Upchurch of SGP LLC is submitting applications to the City of Salida for a Major Subdivision/ Major Impact Review. This narrative report provides development information of the Subdivision and explains how the project meets the city’s review standards and code.

**BASIC SITE INFORMATION:** General Description: The 5.32 acre site is located on the west boundary of Salida. The property sits north of CR 140 or Airport Rd., south of CR 141 or Ouray Ave., and east of Pinion Dr. It is currently raw and empty land. The AngelView Condominium Development is located across Airport Rd to the south. The property is zoned R2 and our plan is to subdivide the property into 24 lots. We will be building 43 housing units (10 Single Family, 22 Duplex Units, 6 Triplex Units and 5 additional units dedicated to inclusionary housing).



Parcel ID: 368131300015  
Owner: Tory & Clee Upchurch  
Applicant: SGP LLC, 4934 W. Hwy 290 Sunset Valley, Texas 78735  
Street Address: TBD CR 140  
Zoning: R2

**WRITTEN NARRATIVE**  
**WestEnd Subdivision**

**Purpose and Objective and Statement of Planning Objectives:** The proposed major subdivision will subdivide a 5.32 acre parcel into 24 lots for use as residential construction.

- R2 zoning creates a medium density development with lot sizes ranging from 5,985 square feet to 15,639 square feet.

The neighborhood will provide a variety of housing choices and create a community that honors Salida’s traditional neighborhoods and the vision of Salida as directed within the Comprehensive Plan by proposing:

- **Diverse Housing:** Something for everyone. Provide a mix of residential units to support varied housing.
- **Affordable Housing:** Provide parcels for high density attached units and affordable housing offering both traditional inclusionary housing units plus 6 Triplex units that will be exclusively offered to Chaffee Country residents for the first 6 months during development.
- Provide varying sized lots for our diverse housing needs. The lots on the north and west border of the property will be built based on R1 lot size standards with the goal of seamlessly integrating with neighbors in the county. We will increase the density of units to the south and east of the property.
- **Pedestrian Connectivity:** We are dedicating a 10 foot gravel easement per the annexation agreement connecting Shepard RD to CR 141.
- Our goal is to build homes with porches front facing and garages in a rear alley when possible
- A well-maintained development. A professionally managed HOA will maintain the landscaping, private alleys, parkways, drainage easements.

**Off street parking:** The subdivision will comply with R2 zone requirements for parking. Each lot will meet code standards for off street parking (based on the inclusionary housing incentive). We have also minimized the number of driveway cuts in order to maximize the number of street parking spaces. The off street parking will be accessed either from an alley, when available, or from shared accesses off the street when it makes sense.

**Livability and Community:** The development is designed for connectivity to the surrounding area and to the City of Salida. We will be building two sidewalks connecting the neighborhood to CR 141 and a sidewalk on the annexed portion of CR140 which will increase the likelihood that residents and surrounding neighbors will bike to town.

**Inclusionary Housing Obligations:** Per our negotiated Annexation Agreement, we “shall meet the affordable housing requirement of 12.5% of all future units built.” Thus, given that we are proposing to build 43 units, we will provide five (5) affordable housing units in a manner that complies with the requirements of the Inclusionary Housing ordinance. The current plan is to sell Lot 24 (15,639 sq. ft.) to the Chaffee County Housing Trust. As we work through the details of the project, we will make a determination who will actually build the units based on the cost of construction.

If for some reason we are unable to work with CHT to build the units, SGP LLC will build the units as per the Annexation Agreement, and will abide by the following language from the agreement in terms of the order of units built:

“The first of such built inclusionary housing units shall receive certificate of occupancy (“CO”) prior to the eighth (8th) unit on the Property receiving CO or, if provided via multi-family housing, the first of such required inclusionary housing units shall receive CO prior to the twelfth (12th) unit on the Property receiving CO, and the last of such required units shall receive CO prior to the 24th unit on the Property receiving CO. The number of units required to be physically built will be specified within the subdivision improvement agreement or development agreement, based upon the 12.5% City Code requirement.”

**Statement of Proposed Ownership of Public and Private areas:** The WestEnd H.O.A. will maintain the private alleys, parkways, and drainage easements in the development. The planned right-of-way through the development will be a public road and connect to CR 140. The right-of -way will be maintained by the city.

**Landscaping:** A minimum of one tree per lot will be planted prior to certificate of occupancy. If not in planting season, a deposit will be placed with the city, to be fully refunded once the tree is planted. Since lot widths are all narrower than 50’, this will meet code section 16-8-90. An effort will be made to repeat the distances between trees.

**Statement of Proposed Methods to Reduce Fiscal Impacts of the development on the City:** Establishing development owned storm drain systems and easements to be maintained by the H.O.A. reduces the fiscal impacts to the City. Additionally, the entire annexed portion of CR140 will get repaved, and a curb and sidewalk will be installed along the development frontage, as depicted on the civil engineering plans.

**Parks and Open Space Dedication:** The developer will be paying a \$3,000 per unit fee in lieu of open spaces.

**Fair Contributions to Schools:** The development will be subject to fair contributions to schools. \$444.66 dollars or the amount then in effect will be due at the time of building permit for each residential unit.

**Building Dimensions:** All buildings will comply with the City of Salida Land Use code and other applicable codes and agreements. We currently anticipate a mix of 2 and 3 story buildings that will range in height from 24' – 35' as per code.

**Statement of Proposed Development Phasing Schedule:** We propose to develop all the infrastructure in one phase. Additionally, the plan is to build units 8-10 at a time with the goal of completing the project by October 2022.

**Physiographic and Environmental Studies:** There is no evidence to suggest any contamination to this site or any adjacent site. Therefore, no environmental studies will be completed.

**Outstanding Site Development Issues:** There are currently no outstanding development issues on the site.

**Public Works Administrative Variance Requests:**

1. 34 ft wide street curb face to face on Shepard Dr.
2. On sheet 15 of the engineering documents, structures 2, 3, and 4 should have 0.2, 0.2, and 0.3' drops per standards. They were designed with 0.1' drops to maintain adequate cover as we buck grade on Shepherd Drive.

**16-6-120. Subdivision review standards.**

In order to achieve the intent and purpose of this Chapter, the proposed subdivision shall comply with the following standards:

(1) Comprehensive Plan. The proposed subdivision shall carry out the purpose and spirit of the Comprehensive Plan and conform with all of the Plan's applicable objectives, guiding principles and recommended actions. It shall be designed to be compatible with surrounding land uses and to protect neighbors from undesirable noise, glare and shadows, and shall not cause adverse effects on their privacy, solar access and views.

We have designed the neighborhood increase density as you move south and east on the property. Lots 1-10 across the north border will be single family homes which will be closest to the neighbors. The density of units will increase as you move south and east to minimize any undesirable noise and to compatible with the surrounding neighbors.

(2) Zone District Standards. The proposed subdivision shall comply with the use and dimensional standards of the underlying zone district and shall provide off-street parking as required for the uses.

We will comply with R1 lot size standards on lots 1-10. The remaining lots will comply with R2 Zoning standards.

(3) Improvements. The proposed subdivision shall be provided with improvements which comply with Section 16-2-60 and landscaping which complies with Section 16-8-90.

(i) Streets. Existing and proposed streets shall be suitable and adequate to carry anticipated traffic within and in the vicinity of the proposed subdivision.

Based on the traffic study that was conducted, the road we will build and improvements to CR 140 will be adequate to carry anticipated traffic.

(ii) Utilities. Existing and proposed utility services shall be suitable and adequate to meet the needs of the proposed subdivision.

All utility development will be suitable and adequate to meet the needs of the subdivision.

(iii) Phases. If the subdivision is to be developed in phases, each phase shall contain the required parking spaces, landscape areas, utilities and streets that are necessary for creating and sustaining a stable environment.

Our goal is complete infrastructure build out in one phase.

(4) Natural Features. The layout of lots and blocks shall provide desirable settings for structures by making use of natural contours and maintaining existing views, affording privacy for residents and protecting them from adverse noise and vehicular traffic. The system of roadways and the lot layout shall be designed to take advantage of visual qualities of the area. Natural features and native vegetation shall be preserved whenever possible. Tree masses and individual trees of six-inch caliper or greater shall be preserved.

As per the Annexation Agreement, there will be no front facing lots onto CR 140. Even with this restriction, our goal is to ensure that each house has the ability to appreciate the visual qualities of Salida. There are no trees or other vegetation on the property currently.

(5) Floodplains. Tracts of land or portions thereof lying within the 100-year floodplain may only be subdivided for open space until the subdivider has shown that compliance with the requirements of the City's floodplain regulations can be met.

The land is not in a 100 year floodplain.

(6) Noise Reduction. Where a subdivision borders on or contains a highway right-of-way, the City shall require adequate provisions for reduction of noise. A parallel street, landscaping, screening, easement, greater lot depth, increased rear yard setbacks and fencing are potentially appropriate solutions, among others.

As we move further into the project, we will ensure that the units that front CR 140 we take the appropriate steps to provide adequate noise reduction.

(7) Future Streets. When a tract is subdivided into lots or parcels which are intended for future resubdivision, such lots or parcels shall be arranged so as to permit the logical location and opening of future streets and appropriate resubdivision, with provision for adequate utility easements and connectors for such resubdivision.

Not applicable

(8) Parks, Trails and Open Space. Each subdivision, minor or major, or condominium project with five (5) units or more, shall dedicate and develop land or pay a fee-in-lieu for the purpose of providing active parks, open space, passive recreation facilities and/or recreation trails or other public purposes as determined by the City for the benefit of those who occupy the property and be made accessible to the public. The intent of this regulation is to ensure that a comprehensive, integrated network of parks, trails and open spaces is developed and preserved as the community grows.

We will be paying the \$3000/unit fee in-lieu

(9) Common Recreation Facilities. Where a development is proposed to contain common recreation facilities, such facilities shall be located within the development so as to be easily accessible to the residents and to least interfere with neighboring developments.

There will not be a common recreation facility in the development.

(10) Lots and Blocks.

(i) Pattern. The size, shape and orientation of lots shall be appropriate to the design and location of the proposed subdivision and to the type of development contemplated. Where appropriate, lots shall be laid out to respect the existing City pattern. Blocks generally shall not be less than three hundred (300) feet nor more than one thousand two hundred (1,200) feet in length.

We have designed the subdivision to mimic other R2 Zoned neighborhoods in Salida with the goal of providing varying type of housing to the community.

(ii) Frontage. Residential lots should front only on local streets; however, when necessary, lots designated to face a collector street shall provide adequate means for automobile turnaround within the lot and should provide consolidated access points to the maximum extent feasible.

All units front the either CR 140 or the road that will be built.

(iii) Right angles. Side lot lines shall be approximately at right angles or radial to street lines.

We have provided approximate right angles where possible.

(iv) Double frontage lots. Double frontage lots are prohibited, except where they are necessary to provide for the separation of residential development from collector or arterial streets or to overcome specific limitations of topography or orientation. A planting and screening easement of at least ten (10) feet shall be provided along the portion of the lot which abuts such a collector or arterial street. There shall be no right of access across a planting and screening easement. The screening easement shall be maintained by the property owner.

There are no double frontage lots in the development.

(v) "T" intersections. The building area of lots shall not face directly into the oncoming traffic of an intersecting street of a "T" intersection.

There are no "T" intersections in the development.

(11) Architecture. The following architectural standard is intended to prevent monotonous streetscapes and offer consumers a wider choice of housing styles. To avoid uniformity and lack of variety in design among housing units within the subdivision, no residential façade elevation shall be repeated more than once every five (5) lots on the same side of the street (e.g., the first and fifth lots in a row may contain the same façade elevation, but the second, third, and fourth lots must contain some different façade elevations). No residential elevation shall be repeated directly across the street from the same façade elevation. Mirror images of the same residential façade shall not count as two (2) distinctly different façades. In unusual circumstances, the Planning Commission may grant a petition seeking waiver of this requirement. Such an exception may be granted if the petitioner demonstrates that the proposed plan uses repetition for an architectural purpose, such as allusion to historical repetition that would not create a monotonous streetscape of the type this standard seeks to prevent.

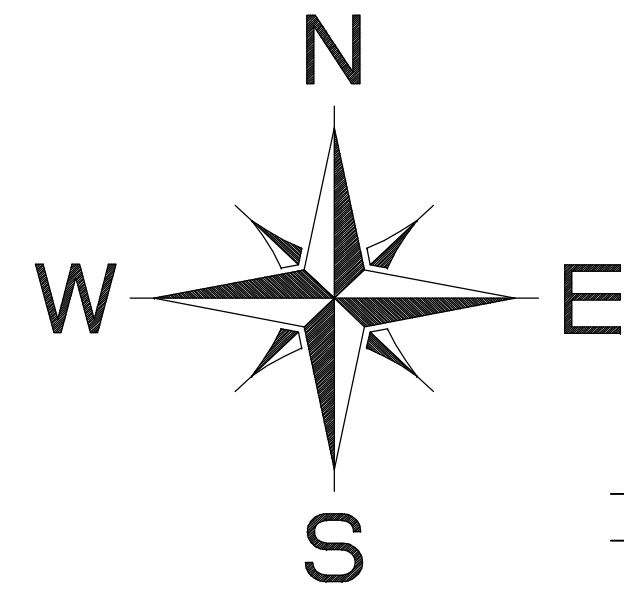
Our building designs will have variations that meet the subdivision requirements and provide a level of visual interest to the neighbors and community members

(12) Codes. The subdivision shall comply with all applicable City building, fire and safety codes for the proposed development.

We will meet all applicable City building, fire and safety codes for the development.

(13) Inclusionary Housing. Minor and major subdivisions; and condominium plats of five (5) units or greater must meet the requirements of Article XIII. Inclusionary Housing.

We will meet all requirement in the Annexation Agreement and Article XIII.



SCALE  
1" = 50'

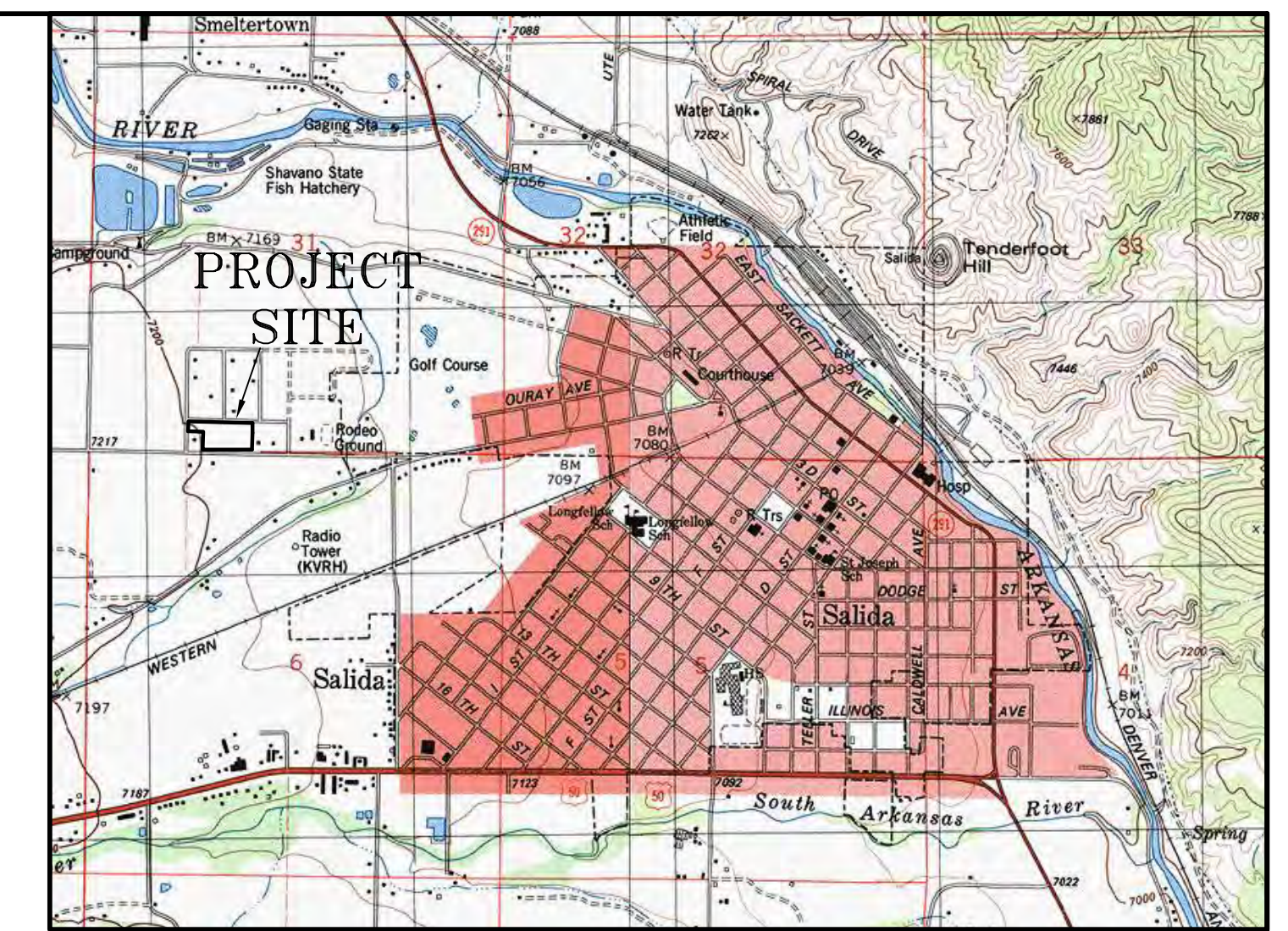


LEGEND

- ⊙ FOUND MONUMENT AS NOTED
- ◆ SET 1 1/2" ALUMINUM CAP LS 37937
- ⊙ FOUND 1" ALUMINUM CAP LS 1776
- ⊙ WATER VALVE
- ⊙ POWER POLE
- ⊙ SEWER MAN HOLE
- ⊙ TELEPHONE PEDESTAL
- ⊙ FENCE
- ⊙ OVERHEAD UTILITY

# WEST END MAJOR SUBDIVISION

LOCATED IN THE SE 1/2 SW 1/4 OF SECTION 31  
T50N R9E OF THE N.M.P.M.  
CITY OF SALIDA,  
CHAFFEE COUNTY, COLORADO

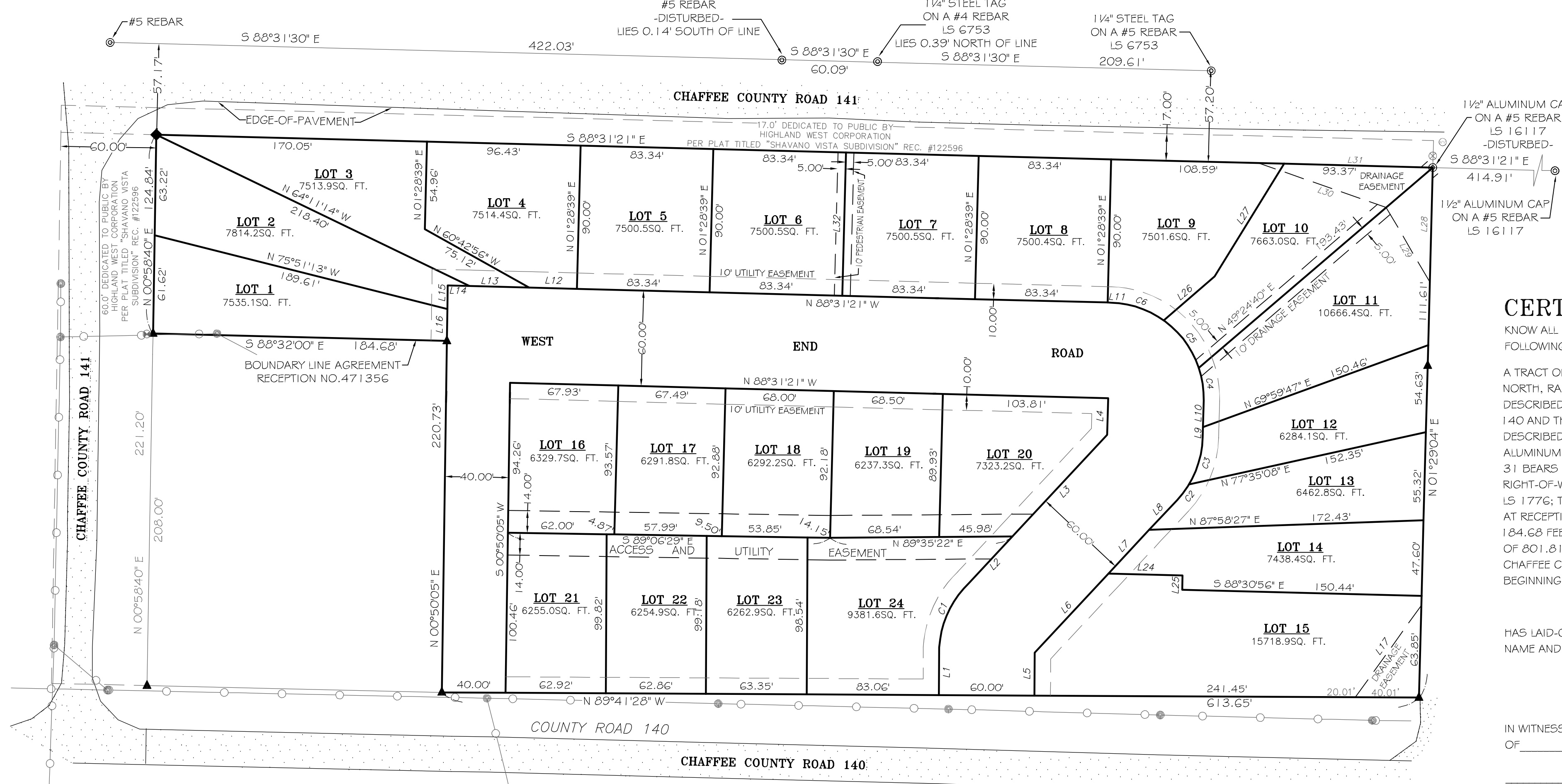


VICINITY MAP  
NOT TO SCALE

LINE	BEARING	DISTANCE
L1	N 00°18'32" E	30.00'
L2	N 43°00'16" E	39.66'
L3	N 43°00'16" E	87.26'
L4	N 01°29'04" E	23.08'
L5	N 00°18'32" E	26.96'
L6	N 43°00'16" E	67.86'
L7	N 43°00'16" E	37.50'
L8	N 43°00'16" E	25.69'
L9	N 01°29'04" E	6.38'
L10	N 01°29'04" E	16.70'
L11	N 88°31'21" W	1.95'
L12	N 88°31'21" W	29.99'
L13	N 88°31'21" W	37.50'
L14	N 88°31'21" W	13.62'
L15	S 00°50'05" W	14.81'
L16	S 00°50'05" W	20.00'
L17	N 35°43'42" E	71.08'
L18	N 01°29'04" E	15.45'
L19	N 35°43'42" E	55.10'
L20	N 69°59'47" E	119.05'
L21	N 90°00'00" E	29.23'
L22	N 69°59'47" E	97.44'
L23	S 01°29'04" W	117.44'
L24	S 88°30'56" E	46.53'
L25	S 01°29'04" W	8.96'
L26	N 49°05'05" E	42.28'
L27	N 31°40'00" E	83.08'
L28	S 01°29'04" W	71.80'
L29	N 30°19'10" W	54.23'
L30	N 70°51'22" W	84.72'
L31	N 88°31'21" W	109.31'
L32	N 01°28'39" E	90.00'

AREA TABLE	
LOTS	4.19 ACRES (182,743.5 SQ.FT.)
STREETS	1.13 ACRES (49,110.9 SQ.FT.)
TOTAL	5.32 ACRES (231,854.4 SQ.FT.)

CURVE	ARC LENGTH	RADIUS	DELTA ANGLE	CHORD BEARING	CHORD LENGTH
C1	45.83'	61.51'	42°41'44"	S 25°00'00" E	44.78'
C2	12.37'	60.00'	11°48'53"	N 37°06'50" E	12.35'
C3	31.11'	60.00'	29°42'19"	N 16°20'14" E	30.76'
C4	20.83'	60.00'	19°53'18"	N 08°27'35" W	20.72'
C5	37.72'	60.00'	36°00'57"	N 36°24'42" W	37.10'
C6	35.71'	60.00'	34°06'06"	N 71°28'14" W	35.19'



## CERTIFICATE OF DEDICATION AND OWNERSHIP

KNOW ALL PERSONS BY THESE PRESENTS THAT KRISHNA CLEE QUICK UPCHURCH AND TORY UPCHURCH, THE FEE OWNERS OF THE FOLLOWING DESCRIBED PROPERTY:

A TRACT OF LAND LOCATED WITHIN THE SOUTHEAST QUARTER OF THE SOUTHWEST QUARTER OF SECTION 31, TOWNSHIP 50 NORTH, RANGE 9 EAST OF THE NEW MEXICO PRINCIPAL MERIDIAN, CHAFFEE COUNTY COLORADO, BEING MORE PARTICULARLY DESCRIBED AS FOLLOWS: COMMENCING AT THE INTERSECTION OF THE NORTH RIGHT-OF-WAY OF CHAFFEE COUNTY ROAD NO. 140 AND THE EAST RIGHT-OF-WAY OF CHAFFEE COUNTY ROAD 141 AND THE SOUTHWEST CORNER OF THE PROPERTY DESCRIBED IN BOOK 379 AT PAGE 269 IN THE RECORDS OF THE CHAFFEE COUNTY CLERK & RECORDER, MARKED BY A 1" ALUMINUM CAP STAMPED LS 1776, FROM WHENCE THE REFERENCE MONUMENT MARKING THE SOUTH 1/4 OF SAID SECTION 31 BEARS SOUTH 88°35'32" EAST, A DISTANCE OF 1261.06 FEET; THENCE SOUTH 88°40'42" EAST, ALONG SAID NORTH RIGHT-OF-WAY, A DISTANCE OF 185.23 FEET TO THE POINT OF BEGINNING, BEING MARKED BY A 1" ALUMINUM CAP STAMPED LS 1776; THENCE NORTH 00°50'05" EAST, A DISTANCE OF 220.73 FEET TO AN AGREED UPON BOUNDARY LINE AS RECORDED AT RECEPTION NO.471356; THENCE NORTH 88°32'00" WEST, ALONG SAID AGREED UPON BOUNDARY LINE, A DISTANCE OF 184.65 FEET; THENCE NORTH 00°58'40" EAST, A DISTANCE OF 124.84 FEET; THENCE SOUTH 88°31'21" EAST, A DISTANCE OF 801.81 FEET; THENCE SOUTH 01°29'04" WEST, A DISTANCE OF 333.01 FEET TO THE SAID NORTH RIGHT-OF-WAY OF CHAFFEE COUNTY ROAD NO. 140; THENCE NORTH 89°41'28" WEST, A DISTANCE OF 613.65 FEET TO THE POINT OF BEGINNING, CONTAINING 5.32 ACRES

HAS LAID-OUT, PLATTED AND SUBDIVIDED THE SAME INTO LOTS, ROADWAY AND EASEMENTS, AS SHOWN ON THIS PLAT UNDER THE NAME AND STYLE OF:

**WEST END MAJOR SUBDIVISION**  
IN THE  
CITY OF SALIDA  
CHAFFEE COUNTY, COLORADO

IN WITNESS WHEREOF THE UNDERSIGNED HAS CAUSED THESE PRESENTS TO BE EXECUTED THIS \_\_\_\_ DAY OF \_\_\_\_ 2021

BY: KRISHNA CLEE QUICK UPCHURCH BY: TORY UPCHURCH

COUNTY OF CHAFFEE )  
) SS.  
STATE OF COLORADO )

THE FORGOING DEDICATION WAS ACKNOWLEDGED BEFORE ME THIS \_\_\_\_ DAY OF \_\_\_\_ 2021, BY KRISHNA CLEE QUICK UPCHURCH AND TORY UPCHURCH. WITNESS MY HAND AND SEAL.

MY COMMISSION EXPIRES \_\_\_\_\_

NOTARY PUBLIC \_\_\_\_\_

## ACKNOWLEDGMENT OF LIEN HOLDER

\_\_\_\_\_, AS LIEN HOLDER, HEREBY ACKNOWLEDGES AND APPROVES THE TERMS, CONDITIONS AND DEDICATION AS DISCLOSED UPON THIS PLAT.

REPRESENTATIVE \_\_\_\_\_ DATE \_\_\_\_\_

COUNTY OF \_\_\_\_\_ )  
) SS.  
STATE OF \_\_\_\_\_ )

THE FORGOING ACKNOWLEDGMENT OF LIEN HOLDER WAS ACKNOWLEDGED BEFORE ME THIS \_\_\_\_ DAY OF \_\_\_\_ 2021, BY \_\_\_\_\_, WITNESS MY HAND AND SEAL.

MY COMMISSION EXPIRES \_\_\_\_\_

NOTARY PUBLIC \_\_\_\_\_

## CITY ADMINISTRATOR APPROVAL

THIS PLAT IS APPROVED BY THE CITY OF SALIDA ADMINISTRATOR THIS \_\_\_\_ DAY OF \_\_\_\_ 2021.

ADMINISTRATOR, CITY OF SALIDA \_\_\_\_\_

## CITY OF SALIDA ACCEPTANCE

THE UNDERSIGNED CHAIR OF THE PLANNING COMMISSION OF THE CITY OF SALIDA, COLORADO, DOES HEREBY ACKNOWLEDGE AND ACCEPT THIS MAJOR SUBDIVISION PLAT. DATED THIS \_\_\_\_ DAY OF \_\_\_\_ 2021.

CHAIR OF PLANNING COMMISSION, CITY OF SALIDA \_\_\_\_\_

## GENERAL NOTES

- 1) BASIS OF BEARING FOR THIS SURVEY IS GRID NORTH FROM COLORADO STATE PLANE COORDINATE SYSTEM CENTRAL ZONE, BASED ON G.P.S. OBSERVATIONS ALONG THE NORTHERLY RIGHT-OF-WAY OF CHAFFEE COUNTY ROAD 140 BETWEEN TWO 1" ALUMINUM CAPS STAMPED 'LS 1776' HAVING A BEARING OF NORTH 89°41'28" WEST.
- 2) ZONE: MEDIUM DENSITY RESIDENTIAL (R-2)
- 3) AS REQUIRED UNDER SECTION 16.6.140 OF THE SALIDA MUNICIPAL CODE, A PAYMENT IN LIEU OF LAND DEDICATION FOR FAIR CONTRIBUTIONS FOR PUBLIC SCHOOL SITES SHALL BE PAID BY THE OWNER OF EACH LOT WITHIN THIS SUBDIVISION PRIOR TO ISSUANCE OF A BUILDING PERMIT FOR ANY NEW RESIDENCE ON SUCH LOT

## CERTIFICATION OF TITLE

I, \_\_\_\_\_, A LICENSED TITLE INSURANCE AGENT IN THE STATE OF COLORADO, DO HEREBY CERTIFY THAT I HAVE EXAMINED THE TITLE TO THE PROPERTY HEREBY DEDICATED AND AS SHOWN AND DESCRIBED ON THIS PLAT AND FOUND TITLE VESTED IN KRISHNA CLEE QUICK UPCHURCH AND TORY UPCHURCH, FREE AND CLEAR OF ALL LIENS AND ENCUMBRANCES EXCEPT AS LISTED BELOW:

DATED THIS \_\_\_\_ DAY OF \_\_\_\_ 2021.

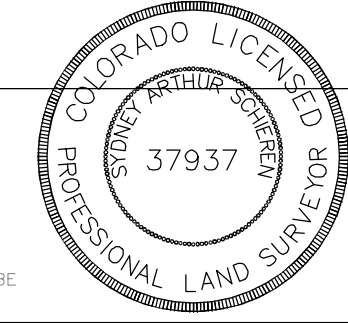
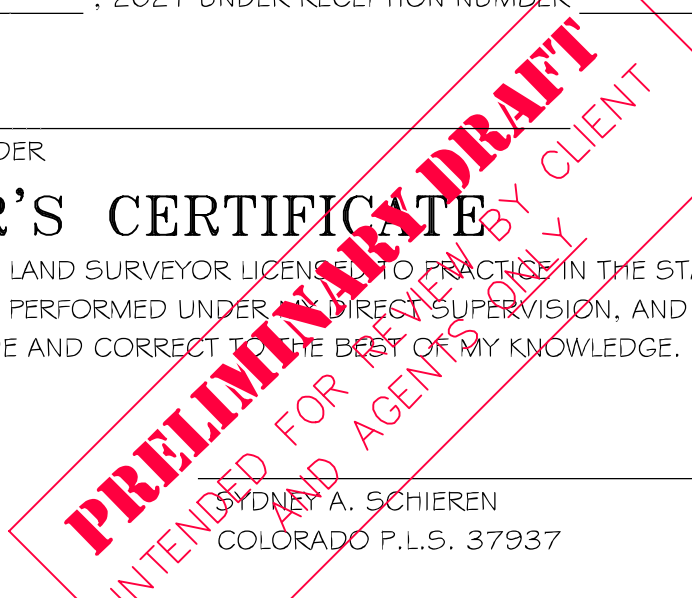
TITLE AGENT \_\_\_\_\_

## CLERK AND RECORDER'S CERTIFICATE

THIS PLAT WAS FILED IN THE OFFICE OF THE CLERK AND RECORDER OF CHAFFEE COUNTY, COLORADO, AT \_\_\_\_ M. ON THIS \_\_\_\_ DAY OF \_\_\_\_ 2021 UNDER RECEPTION NUMBER \_\_\_\_\_.

## LAND SURVEYOR'S CERTIFICATE

I, SYDNEY A. SCHIEREN, A REGISTERED LAND SURVEYOR LICENSED TO PRACTICE IN THE STATE OF COLORADO, DO HEREBY CERTIFY THAT THIS LAND SURVEY WAS PERFORMED UNDER MY DIRECT SUPERVISION, AND THAT THE PLAT REPRESENTS THE RESULTS OF SAID SURVEY AND IS TRUE AND CORRECT TO THE BEST OF MY KNOWLEDGE.



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 SURVEYOR'S AGREEMENT CONTAINED HEREON.

REVISED: JULY 30, 2021	<p><b>WEST END MAJOR SUBDIVISION</b></p> <p>LOCATED IN THE SE 1/2 SW 1/4 OF SECTION 31 T50N R9E OF THE N.M.P.M. CITY OF SALIDA, CHAFFEE COUNTY, COLORADO</p>
JOB # 20165	
DATE: JULY 21, 2021	
SHEET 1 OF 1	
<p><b>LANDMARK SURVEYING &amp; MAPPING</b></p> <p>P.O. BOX 668 SALIDA, CO 81201 PH 719.539.4021 FAX 719.539.4031</p>	

# UPCHURCH SUBDIVISION CIVIL ENGINEERING PLANS

SALIDA, CO  
AUGUST, 2021



VICINITY MAP  
(NO SCALE)



### CIVIL ENGINEERING PLANS SHEET INDEX

SHEET NO.	DESCRIPTION
1.	CIVIL COVER SHEET
2.	STREET PLANS - STREET COVER
3.	STREET PLANS - TYPICAL SECTIONS
4.	STREET PLANS - DETAILS
5.	CR140 - STA 1+00.00 TO STA 5+50.00
6.	CR140 - STA 5+50.00 TO STA 10+00.00
7.	CR140 - STA 10+00.00 TO STA 13+74.52
8.	PENNY LANE - STA 1+00.00 TO STA 3+64.22
9.	SHEPHERD DRIVE - STA 1+00.00 TO STA 6+00.00
10.	SHEPHERD DRIVE - STA 6+00.00 TO STA 8+34.54
11.	EAST SIDE - STA 1+00.00 TO STA 4+32.50
12.	SEWER PLANS - SEWER COVER SHEET
13.	SEWER PLANS - SEWER DETAILS
14.	CR140 SEWER - STA 1+00.00 TO STA 4+28.21
15.	SHEPHERD SEWER - STA 1+00.00 TO STA 5+00.00
16.	SHEPHERD SEWER - STA 5+00.00 TO STA 8+58.04
17.	WATER PLANS - WATER COVER SHEET
18.	WATER PLANS - WATER DETAILS
19.	WATER MAIN - STA 1+00.00 TO STA 3+75.00
20.	WATER MAIN - STA 3+75.00 TO STA 7+50.00
21.	WATER MAIN - STA 7+50.00 TO STA 10+57.95
22.	WATER SVC CR140

### GENERAL NOTES:

- ANY CHANGES FROM THE PLAN, STANDARD NOTES, STANDARD DESIGNS, OR SPECIFICATIONS SHALL BE CONSIDERED NON-CONFORMING UNLESS APPROVED IN WRITING BY THE ENGINEER OF RECORD. INSTALLATIONS NOT CONFORMING TO THE ABOVE SHALL BE REMOVED AND REPLACED AND/OR CORRECTED AT THE CONTRACTOR'S EXPENSE.
- THE CONTRACTOR SHALL PROVIDE SUBMITTALS FOR ALL MATERIALS A MINIMUM OF 1 WEEK PRIOR TO START OF CONSTRUCTION FOR REVIEW AND APPROVAL BY THE ENGINEER. ANY MATERIALS NOT RECEIVING APPROVAL PRIOR TO INSTALLATION MAY BE DISALLOWED FOR PAYMENT AND/OR BE REQUIRED TO BE REMOVED AND REPLACED AT THE CONTRACTOR'S EXPENSE.
- THE CONTRACTOR SHALL PROVIDE CONSTRUCTION STAKING FOR ALL ALIGNMENTS AND GRADES BY A LICENSED SURVEYOR. CONSTRUCTION SURVEYING AND FIELD STAKES SHALL UTILIZE THE SAME HORIZONTAL AND VERTICAL DATUM AND BASIS OF BEARING AS THE DESIGN.
- ALL AREAS DISTURBED BY CONSTRUCTION SHALL BE RESTORED TO ORIGINAL CONDITION. CONTRACTOR IS RESPONSIBLE FOR DOCUMENTING EXISTING CONDITIONS WITH DIGITAL PICTURES, TO BE STORED IN THE PROJECT ELECTRONIC FILES.
- THE CONTRACTOR SHALL LOCATE ALL UTILITIES AND MONUMENTS OF EVERY NATURE, WHETHER SHOWN HEREON OR NOT, AND PROTECT THEM FROM DAMAGE. ALL UTILITIES AND MONUMENTS SHOULD BE FLAGGED PRIOR TO CONSTRUCTION. THE CONTRACTOR SHALL BEAR THE TOTAL EXPENSE OF REPAIR OR REPLACEMENT OF UTILITIES AND MONUMENTS DAMAGED OR DESTROYED.
- ANY MONUMENTS DISTURBED DURING CONSTRUCTION MUST BE RESET BY A LICENSED SURVEYOR. NOTE THAT RESETTING OF SURVEY MONUMENTS BY ANYONE OTHER THAN A LICENSED SURVEYOR IS A CRIME.
- THE CONTRACTOR SHALL COMPLY WITH ALL APPLICABLE FEDERAL, STATE, AND LOCAL REGULATIONS INCLUDING BUT NOT LIMITED TO:
  - OSHA REGULATIONS
  - NPDES STORMWATER REGULATIONS
  - LOCAL, STATE, AND FEDERAL PERMITS
  - CLEAN WATER ACT
  - CITY OF SALIDA CONSTRUCTION STANDARDS AND SPECIFICATIONS.
- THE CONTRACTOR SHALL BE RESPONSIBLE FOR OBTAINING ALL PERMITS NECESSARY FOR COMPLETION OF THE WORK, UNLESS SPECIFICALLY NOTED OTHERWISE.
- THE CONTRACTOR SHALL WARRANTY ALL WORK FOR A PERIOD OF ONE YEAR COMMENCING FROM THE TIME OF FINAL ACCEPTANCE. THE CONTRACTOR SHALL BE RESPONSIBLE FOR REPAIR AND REPLACEMENT OF ALL FAILURES DETERMINED BY THE ENGINEER TO BE CAUSED BY DEFECTS IN MATERIAL OR WORKMANSHIP DURING THE WARRANTY PERIOD.
- THE CONTRACTOR SHALL MAINTAIN A SET OF PLANS ON THE JOB SITE AT ALL TIMES AND PROVIDE SUBCONTRACTORS WITH A SET OF PLANS. THE CONTRACTOR SHALL MAINTAIN A RED-LINED SET OF PLANS, INDICATING ALL CONSTRUCTION CHANGES, AND KEEP IT UP TO DATE AT ALL TIMES. INCOMPLETE REDLINES SHALL BE SUFFICIENT CAUSE FOR REJECTION OF PAYMENT APPLICATIONS. A COMPLETED RED LINE SET SHALL BE SUBMITTED TO THE ENGINEER PRIOR TO SUBSTANTIAL COMPLETION.
- ALL CONSTRUCTION SHALL COMPLY WITH THE CONSTRUCTION CONTRACT, THESE PLANS AND THE APPROVAL AGENCY CONSTRUCTION STANDARDS AND SPECIFICATIONS IN FORCE AT THE TIME OF THE BID AWARD. IN CASE OF CONFLICT THE FIRST LISTED IN THE ORDER ABOVE SHALL RULE.
- CONTRACTOR SHALL BE RESPONSIBLE FOR SCHEDULING WITH THE TESTING AGENCIES AND PROJECT ENGINEER TO ENSURE THAT ALL REQUIRED TESTING IS COMPLETED PRIOR TO PROCEEDING WITH THE WORK. RETESTING REQUIRED DUE TO FAILED MATERIAL TESTS AND/OR REQUESTS FOR TESTING OUTSIDE OF NORMAL BUSINESS HOURS SHALL BE AT THE CONTRACTOR'S EXPENSE.
- CONTRACTOR SHALL PROVIDE BUSINESSES AND PRIVATE RESIDENCES NOTICE A MINIMUM OF 48 HOURS PRIOR TO COMMENCING WORK THAT WILL IMPACT ACCESS OR SERVICES TO THEIR PROPERTIES.
- CONTRACTOR SHALL PROVIDE THE APPLICABLE PUBLIC WORKS DEPARTMENT NOTICE A MINIMUM OF 7 DAYS PRIOR TO COMMENCING WORK THAT WILL IMPACT PUBLIC ACCESS OF SERVICES.
- THE CONTRACTOR SHALL AT ALL TIMES MAINTAIN PROPER BARRICADING, DUST CONTROL, TRAFFIC CONTROL, SHORING AND SAFETY MEASURES OF EVERY NATURE. ALL EXCAVATIONS LEFT OPEN OVERNIGHT MUST BE BARRICADED TO PREVENT VEHICULAR AND PEDESTRIAN ACCESS.
- THE CONTRACTOR SHALL OBTAIN WRITTEN AGREEMENT TO UTILIZE OFF-SITE PROPERTIES FOR STAGING OR STORAGE OF MATERIALS. CONTRACTOR SHALL TAKE ALL NECESSARY PRECAUTIONS TO MINIMIZE ANY NUISANCE CONDITIONS ARISING FROM THEIR STAGING AND MATERIAL STORAGE AREAS.
- THE CONTRACTOR SHALL COORDINATE WITH THE APPLICABLE PUBLIC WORKS DEPARTMENT TO ARRANGE FOR ANY CONSTRUCTION WATER NEEDED PRIOR TO THE START OF CONSTRUCTION.
- THE CONTRACTOR SHALL SUBMIT A TRAFFIC CONTROL PLAN FOR APPROVAL BY THE GOVERNING ENTITY, WHICH MUST BE APPROVED PRIOR TO COMMENCING WITH THE WORK.
- CONTRACTOR SHALL KEEP WEIGHT TICKETS, BATCH TICKET, INVOICES, ETC. FOR ALL MATERIAL INCORPORATED INTO THE PROJECT. COPIES MUST BE SUBMITTED TO THE ENGINEER PRIOR TO PAYMENT FOR ITEMS.
- THE CONTRACTOR SHALL SCHEDULE THE WORK TO MINIMIZE THE DISTURBANCE OF MAIL DELIVERY TO ALL AFFECTED ADDRESS. WHEN NECESSARY, CONTRACTOR SHALL NOTIFY EXISTING RESIDENCES OF IMPENDING DISTURBANCE A MINIMUM OF ONE WEEK PRIOR TO REMOVING/OBSTRUCTING MAILBOXES.
- THE CONTRACTOR IS RESPONSIBLE FOR REPLACING OR REPAIRING ANY DAMAGE TO PRIVATE PROPERTY IMPROVEMENTS AND FOR FINAL CLEAN UP AND STREET SWEEPING OF THE JOB SITE.

### LEGEND

	PROJECT BOUNDARY/RIGHT-OF-WAY
	EXISTING/ADJACENT RIGHT-OF-WAY
	NEW PROPERTY LINE
	EXISTING LOT/PROPERTY LINE
	EDGE OF EXISTING ROADWAY
	EXISTING ROAD CENTERLINE
	EXISTING FENCE LINE
	EXISTING OVERHEAD ELECTRIC/TELEPHONE/TV
	EXISTING UNDERGROUND TELEPHONE
	EXISTING GAS LINE
	EXISTING ELECTRIC LINE
	EXISTING SEWER MAIN
	NEW 8" SEWER MAIN
	NEW SEWER SERVICE LINE
	EXISTING WATER MAIN
	NEW 8" WATER MAIN
	NEW WATER SERVICE LINE
	EXISTING MAJOR CONTOUR
	EXISTING MINOR CONTOUR
	PUBLIC UTILITY EASEMENT
	SAW-CUT LINE
	LIMITS OF REMOVAL
	NEW SEWER MANHOLE
	NEW WATER TEE
	NEW WATER BEND
	NEW WATER VALVE
	NEW FIRE HYDRANT
	NEW CURB STOP (WATER)
	NEW METER BOX (WATER)
	CONSTRUCTION NOTE CALL-OUT
	NEW GRADIENT
	DEPTH
	RADIUS
	POWER POLE
	TOP OF PIPE
	FIRE HYDRANT
	INVERT

**BEFORE YOU DIG, CALL: 811**

CALL AT LEAST TWO WORKING DAYS PRIOR TO EXCAVATING

UTILITY NOTIFICATION CENTER OF COLORADO

FOR WATER EMERGENCIES, WATER LEAKS, OR DAMAGED PIPELINES, THE CONTRACTOR SHALL CALL:  
**SALIDA PUBLIC WORKS - (719) 539-6257**

### BASIS OF BEARINGS:

GRID NORTH FROM COLORADO STATE PLANE COORDINATE SYSTEM CENTRAL ZONE

**OWNER:**  
TORY UPCHURCH  
2112 ANN ARBOR AVE  
AUSTIN, TX 78704  
PHONE: 512-826-6152

**SURVEYOR:**  
LANDMARK SURVEYING & MAPPING  
202 N F ST  
SALIDA, CO 81201  
PH: (719) 539-4021  
CONTACT: SYD SCHIEREN

PROGRESS SET 8/4/21

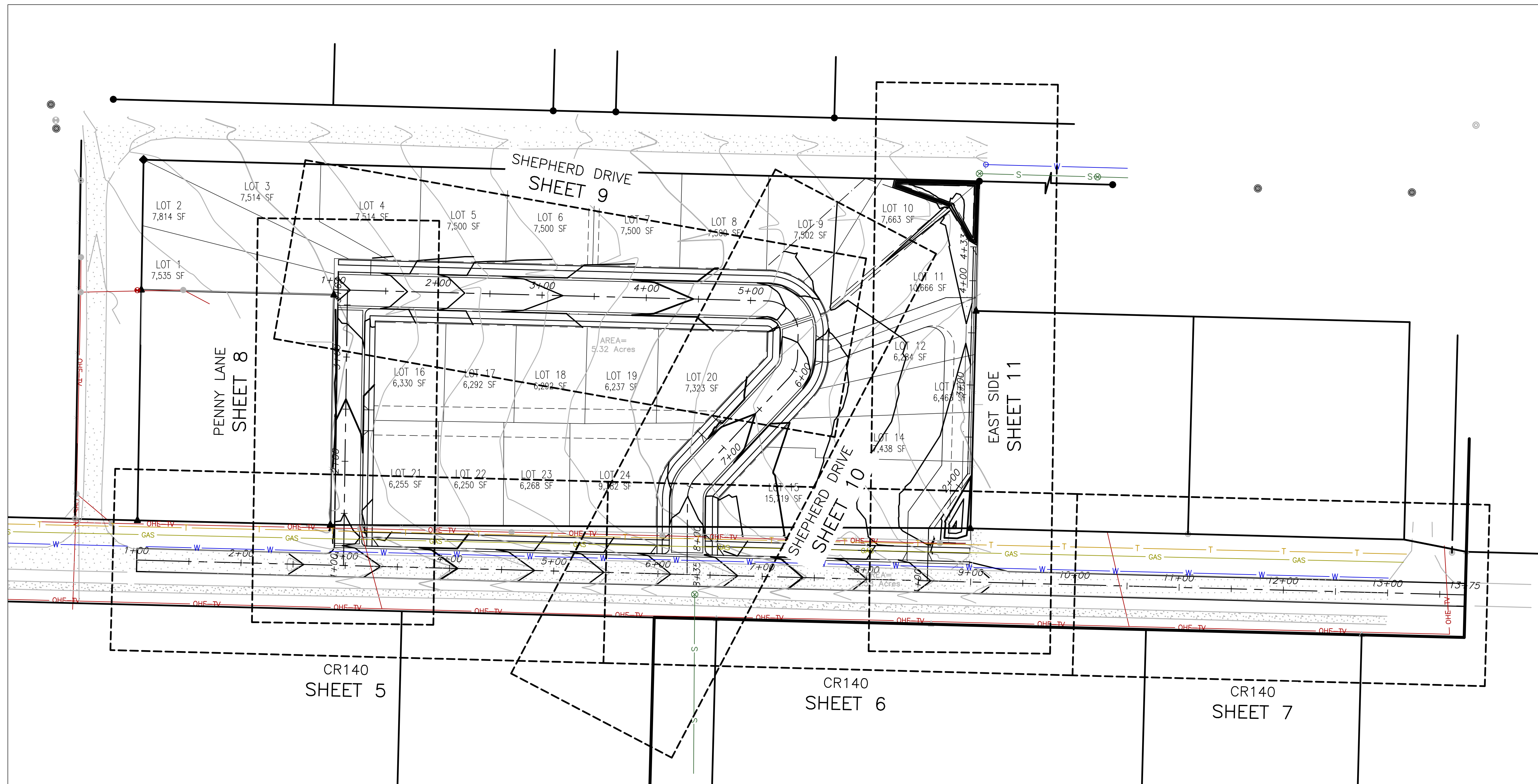
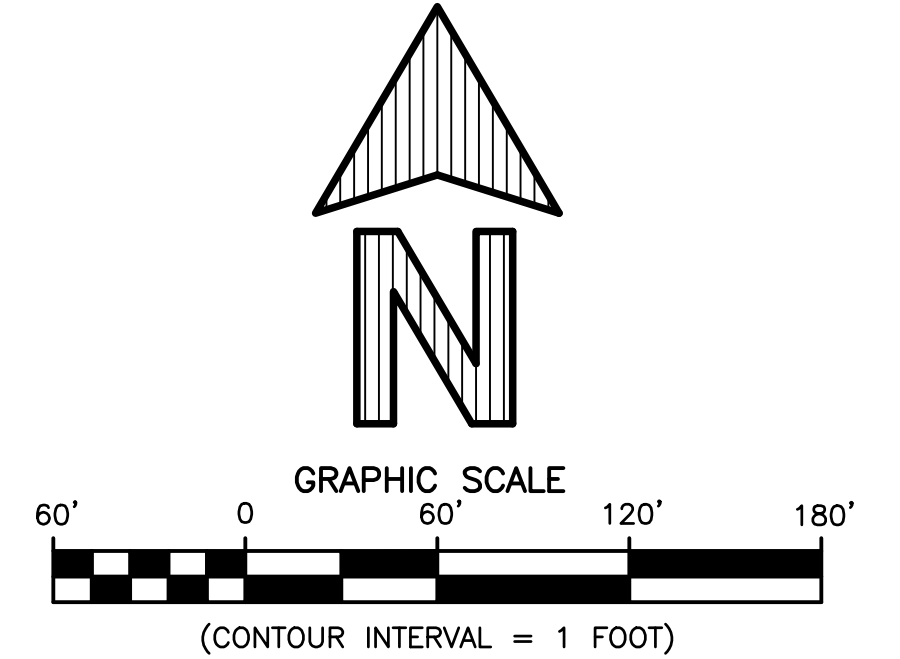
PRIVATE ENGINEER'S NOTES TO CONTRACTOR THE EXISTENCE AND LOCATION OF ANY UNDERGROUND UTILITY PIPES, CONDUITS OR STRUCTURES SHOWN ON THESE PLANS ARE OBTAINED BY A SEARCH OF THE AVAILABLE RECORDS TO THE BEST OF OUR KNOWLEDGE THERE ARE NO EXISTING UTILITIES EXCEPT AS SHOWN ON THESE PLANS. THE CONTRACTOR IS REQUIRED TO TAKE DUE PRECAUTIONARY MEASURES TO PROTECT THE UTILITY LINES SHOWN ON THESE DRAWINGS. THE CONTRACTOR FURTHER ASSUMES ALL LIABILITY AND RESPONSIBILITY FOR THE UTILITY PIPES, CONDUITS, OR STRUCTURES SHOWN OR NOT SHOWN ON THESE DRAWINGS. CONTRACTOR AGREES THAT HE SHALL ASSUME SOLE COMPLETE RESPONSIBILITY FOR THE JOB SITE CONDITIONS DURING THE COURSE OF CONSTRUCTION OF THE PROJECT, INCLUDING SAFETY OF ALL PERSONS AND PROPERTY; THAT THIS REQUIREMENT SHALL APPLY CONTINUOUSLY AND NOT BE LIMITED TO NORMAL WORKING HOURS; AND THAT THE CONTRACTOR SHALL DEFEND, INDEMNIFY AND HOLD THE COUNTY, THE CITY, THE OWNER AND THE ENGINEER HARMLESS FROM ANY AND ALL LIABILITY, REAL OR ALLEGED, IN CONNECTION WITH THE PERFORMANCE OF WORK ON THIS PROJECT, EXCEPTING FOR LIABILITY ARISING FROM THE SOLE NEGLIGENCE OF THE OWNER OR THE ENGINEER.	PREPARED FOR: <b>TORY UPCHURCH</b> 2112 ANN ARBOR AVE AUSTIN, TX 78704 PHONE: 512-826-6152 PREPARED UNDER THE DIRECTION OF: _____ DATE _____ WILLIAM BERNARD HUSSEY      CRABTREE GROUP, INC L.C.E. NO. 56989                  EXP. DATE 10/31/21	PREPARED BY:  <b>CRABTREE GROUP INC.</b> ENGINEERING SMART GROWTH™ 328 D STREET                                  818 CUYAMA ROAD SALIDA, CO 81201                              OJAI, CA 91028 PH: 719-539-1875                                  PH: 719-221-1799	SEAL         DATE _____ BY _____ MARK _____ ENGINEER	REVISIONS <table border="1" style="width: 100%; border-collapse: collapse;"> <tr><th>NO.</th><th>DATE</th><th>DESCRIPTION</th></tr> <tr><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td></tr> </table>	NO.	DATE	DESCRIPTION																												CITY OF SALIDA DESIGNED BY <b>WBH</b> APPROVED BY: _____ DRAWN BY <b>BH, CA</b> CHECKED BY <b>BH, TV</b> AGENCY HEAD _____ DATE _____ SCALE (NO SCALE) DATE <b>AUG. 2021</b> BENCHMARK: SEE PLAN AND PROFILE SHEETS FOR BENCHMARKS, ONE PER BLOCK	UPCHURCH SUBDIVISION SALIDA, CO CIVIL ENGINEERING PLANS <b>CIVIL COVER SHEET</b> NOTES, LEGEND, SHEET INDEX, VICINITY MAP	SHEET NO. 1 OF 22 SHEETS. PROJECT NO. 20036
NO.	DATE	DESCRIPTION																																			

UPCHURCH SUBDIVISION - CIVIL ENGINEERING PLANS

# UPCHURCH SUBDIVISION

## STREET PLANS

SALIDA, CO  
AUGUST, 2021



### INDEX MAP

SCALE: 1"=60' AT 24X36"

### STREET NOTES:

- THE FOLLOWING SUBMITTALS ARE REQUIRED AND MUST BE RECEIVED AND APPROVED BY THE PROJECT ENGINEER PRIOR TO COMMENCEMENT OF THE WORK:
  - GRADATION AND PROCTOR TEST FOR THE BASE COURSE MATERIAL.
  - ASPHALT MIX DESIGN STAMPED BY A PROFESSIONAL ENGINEER.
  - CONCRETE MIX DESIGN.
- ASPHALT PAVEMENT SHALL BE GRADE PG58-28 (S OR SX GRADING), PLACED IN ACCORDANCE WITH CDOT STANDARD SPECIFICATIONS, SECTION 401, UNLESS NOTED OTHERWISE. IF THE MIX IS NOT ON THE CDOT APPROVED PRODUCTS LIST, THE CONTRACTOR SHALL SUBMIT A MIX DESIGN TO THE PROJECT ENGINEER FOR APPROVAL.
- CONCRETE FOR CURBS, GUTTERS, EDGING, CROSSPANS, ETC. SHALL BE "CLASS B" IN CONFORMANCE WITH CDOT STANDARD SPECIFICATIONS, SECTION 601 "STRUCTURAL CONCRETE". ALL CONCRETE SHALL BE CURED WITH CURING COMPOUND, CONFORMING TO AASHTO M148, IMMEDIATELY AFTER FINISHING.
- CONCRETE SHALL CONTAIN FIBER REINFORCEMENT COMPLYING WITH ASTM C1116 AT A RATE OF 1.5 LBS PER CUBIC YARD, UNLESS NOTED OTHERWISE.
- PRIOR TO PLACEMENT OF AGGREGATE BASE COURSE OR ROAD SURFACING MATERIAL, SUBGRADE SHALL BE PREPARED BY REMOVING ALL ORGANICS, DEBRIS, OR OTHER DELETERIOUS MATERIAL, SCARIFYING, AND RECOMPACTING A MINIMUM OF 1 FT. DEPTH. COMPACTION WILL BE VERIFIED BY WHEEL ROLL TESTING.
- AGGREGATE BASE COURSE SHALL BE CDOT CLASS 6, COMPACTED TO A MINIMUM OF 95% PER ASTM D1557 (MODIFIED PROCTOR), AND PLACED IN MAXIMUM LIFTS OF 6" (COMPACTED THICKNESS).
- ASPHALT PAVING SHALL BE LAID IN LIFTS NOT TO EXCEED 3" UNLESS NOTED OTHERWISE.
- ALL JOINTS BETWEEN NEW ASPHALT AND EXISTING ASPHALT AND/OR CONCRETE SHALL BE TACKED WITH DILUTED EMULSIFIED ASPHALT (SLOW SETTING) AT A MINIMUM RATE OF 0.1 GALLONS PER SQUARE YARD. TACKING OF JOINTS SHALL BE CONSIDERED INCIDENTAL TO THE STREET PAVING AND WILL NOT BE PAID FOR SEPARATELY.
- CONTRACTOR SHALL PROVIDE TRAFFIC CONTROL PERSONNEL AND DEVICES REQUIRED FOR THE PROJECT. ACCESS TO PRIVATE PROPERTIES SHALL BE MAINTAINED TO THE MAXIMUM EXTENT POSSIBLE. TRAFFIC CONTROL IS CONSIDERED INCIDENTAL TO THE CONSTRUCTION AND SHALL NOT BE PAID SEPARATELY.
- CONTRACTOR SHALL BE RESPONSIBLE FOR REMOVAL AND REPAIR OF PAVEMENT FAILING TO MEET THE PROJECT SPECIFICATIONS.
- CONCRETE SIDEWALKS, CURBS AND GUTTERS SHALL HAVE CONTROL JOINTS, SPACED AT A MAXIMUM OF 10' ON-CENTER, ALONG THE LONGITUDINAL LENGTH. CONTROL JOINTS MUST BE HAND FORMED OR SAWCUT WITHIN 24 HOURS OF INITIAL CONCRETE PLACEMENT. EXPANSION JOINTS SHALL BE FORMED, UTILIZING 1/2" PREFORMED EXPANSION JOINT FILLER, AT A MAXIMUM INTERVAL OF 300' AND AT ALL FIXED STRUCTURES.
- CONTRACTOR SHALL PROVIDE THE CITY OF PUBLIC WORKS DEPARTMENT WITH NOTICE A MINIMUM OF 7 DAYS PRIOR TO COMMENCING WORK THAT WILL IMPACT THE PUBLIC.
- CONTRACTOR SHALL BE RESPONSIBLE FOR ADJUSTING ALL VALVE BOXES, MANHOLES, AND OTHER STRUCTURES TO GRADE PRIOR TO OR DURING PAVING OPERATIONS.
- CONTRACTOR SHALL NOTIFY THE PROJECT ENGINEER, PUBLIC WORKS DEPARTMENT, AND/OR TESTING AGENCIES A MINIMUM OF 2 WORKING DAYS PRIOR TO REQUESTED INSPECTION AND/OR TESTING TIMES.
- THE FOLLOWING SHALL BE CONSIDERED MANDATORY INSPECTION POINTS AND WORK SHALL NOT PROGRESS BEYOND THOSE POINTS WITHOUT OBTAINING WRITTEN APPROVAL OF THE ENGINEER:
  - SUBGRADE PLACEMENT AND COMPACTION PRIOR TO BASE PLACEMENT.
  - AGGREGATE BASE COURSE PLACEMENT AND COMPACTION PRIOR TO PAVING.
  - CONCRETE FORM-WORK AND REINFORCING PRIOR TO CONCRETE PLACEMENT.
  - STRING LINING OF BASE COURSE PRIOR TO PAVING OPERATIONS.
- CONTRACTOR SHALL SWEEP THE STREET AND CLEAN THE JOBSITE OF ALL EXCESS ASPHALT MATERIAL, CONCRETE, AND OTHER DELETERIOUS MATERIAL WITHIN 48 HOURS AFTER PAVING COMPLETION.

PROGRESS SET 8/4/21


**PRIVATE ENGINEER'S NOTES TO CONTRACTOR**  
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**PREPARED FOR:**  
TORY UPCHURCH  
2112 ANN ARBOR AVE  
AUSTIN, TX 78704  
PHONE: 512-826-6152

**PREPARED UNDER THE DIRECTION OF:**  
DATE

WILLIAM BERNARD HUSSEY      CRABTREE GROUP, INC.  
L.C.E. NO. 56989      EXP. DATE 10/31/21

**PREPARED BY:**



**CRABTREE GROUP INC.**  
ENGINEERING SMART GROWTH™

328 D STREET      918 CUYAMA ROAD  
SALIDA, CO 81201      OJAI, CA 93023  
PH: 719-539-1875      PH: 719-221-1799

**SEAL**

DATE	BY	MARK	REVISIONS	APPR.	DATE

**CITY OF SALIDA**

DESIGNED BY: WBH  
DRAWN BY: BH, CA  
CHECKED BY: BH, TV  
SCALE: 1"=60'  
DATE: AUG. 2021

APPROVED BY: \_\_\_\_\_  
AGENCY HEAD: \_\_\_\_\_ DATE: \_\_\_\_\_  
BENCHMARK: SEE PLAN AND PROFILE SHEETS FOR BENCHMARKS, ONE PER BLOCK

**UPCHURCH SUBDIVISION**  
SALIDA, CO

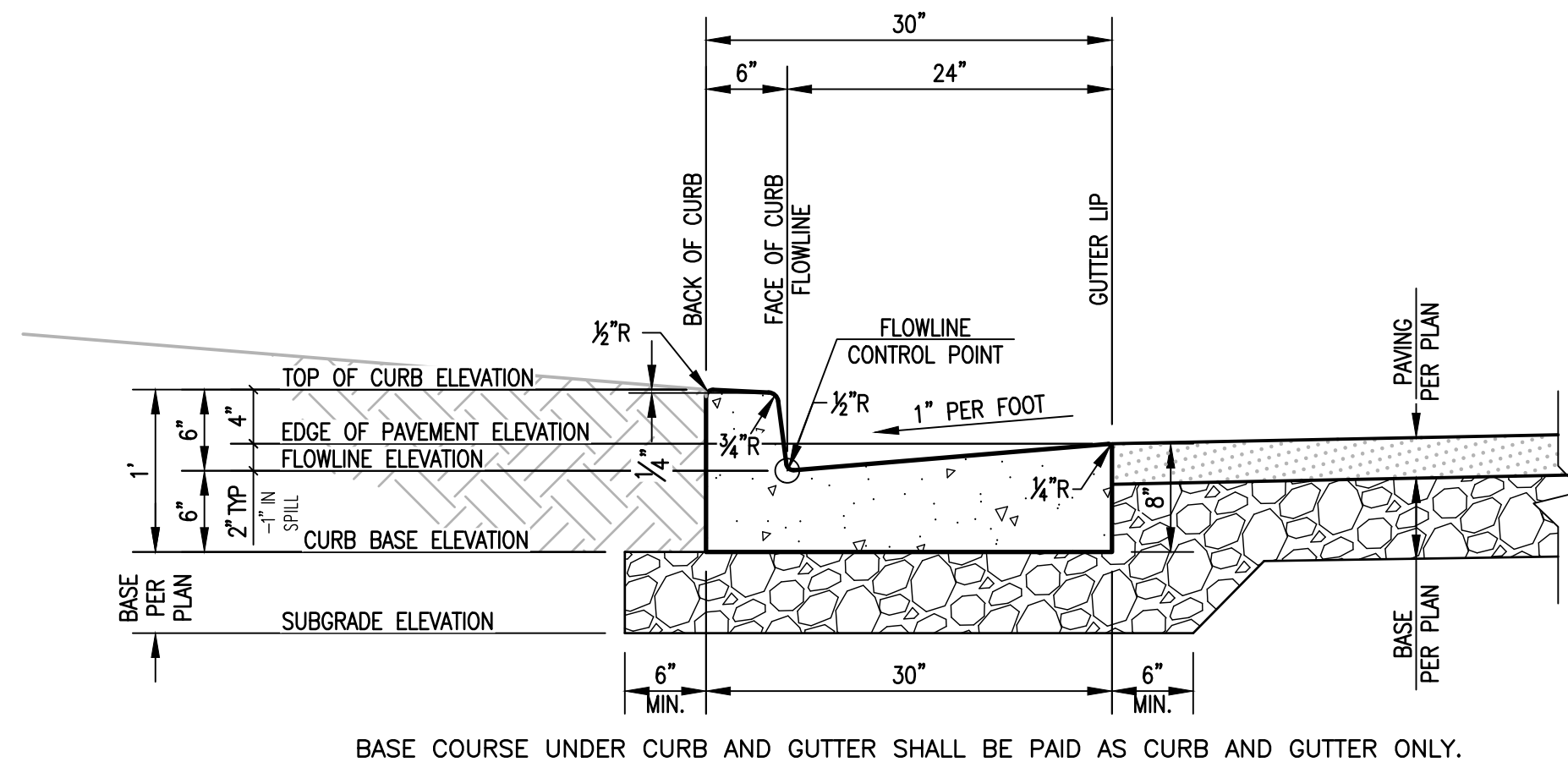
**STREET PLANS**  
**STREET COVER**

SHEET INDEX MAP, STREET NOTES

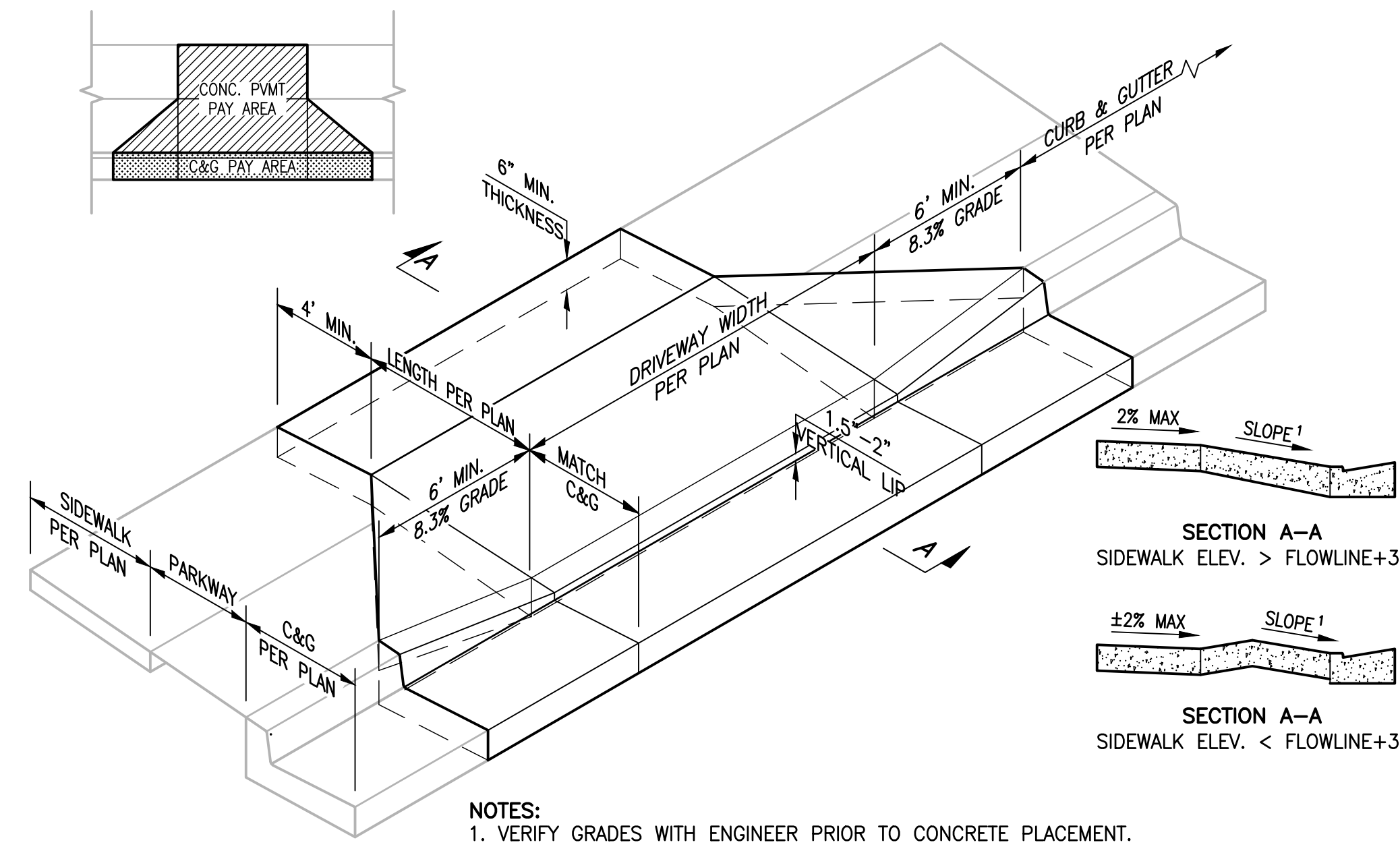
**SHEET NO.**  
**2**  
**OF 22 SHEETS.**  
**PROJECT NO.**  
**20036**

UPCHURCH SUBDIVISION - STREET PLANS

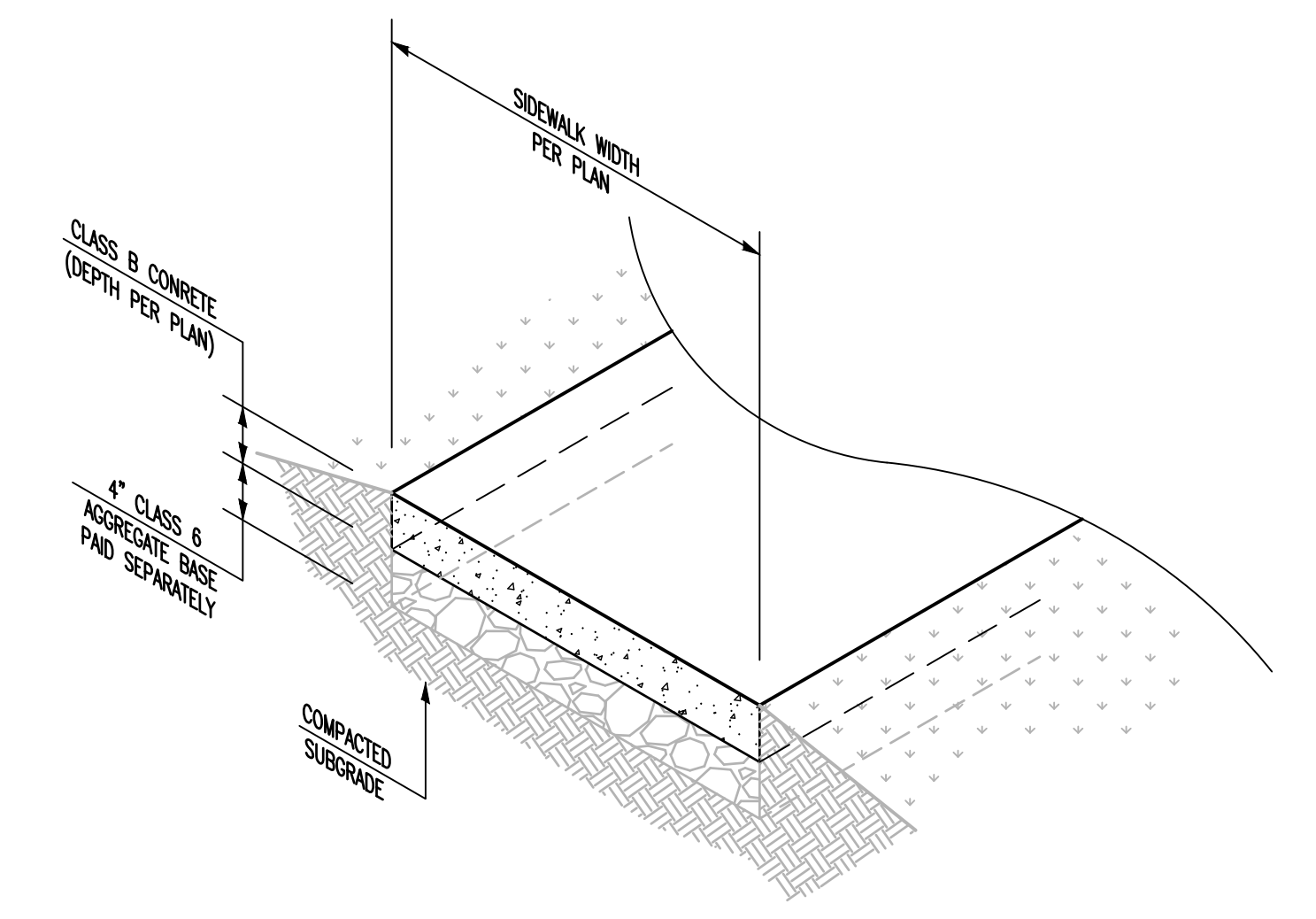




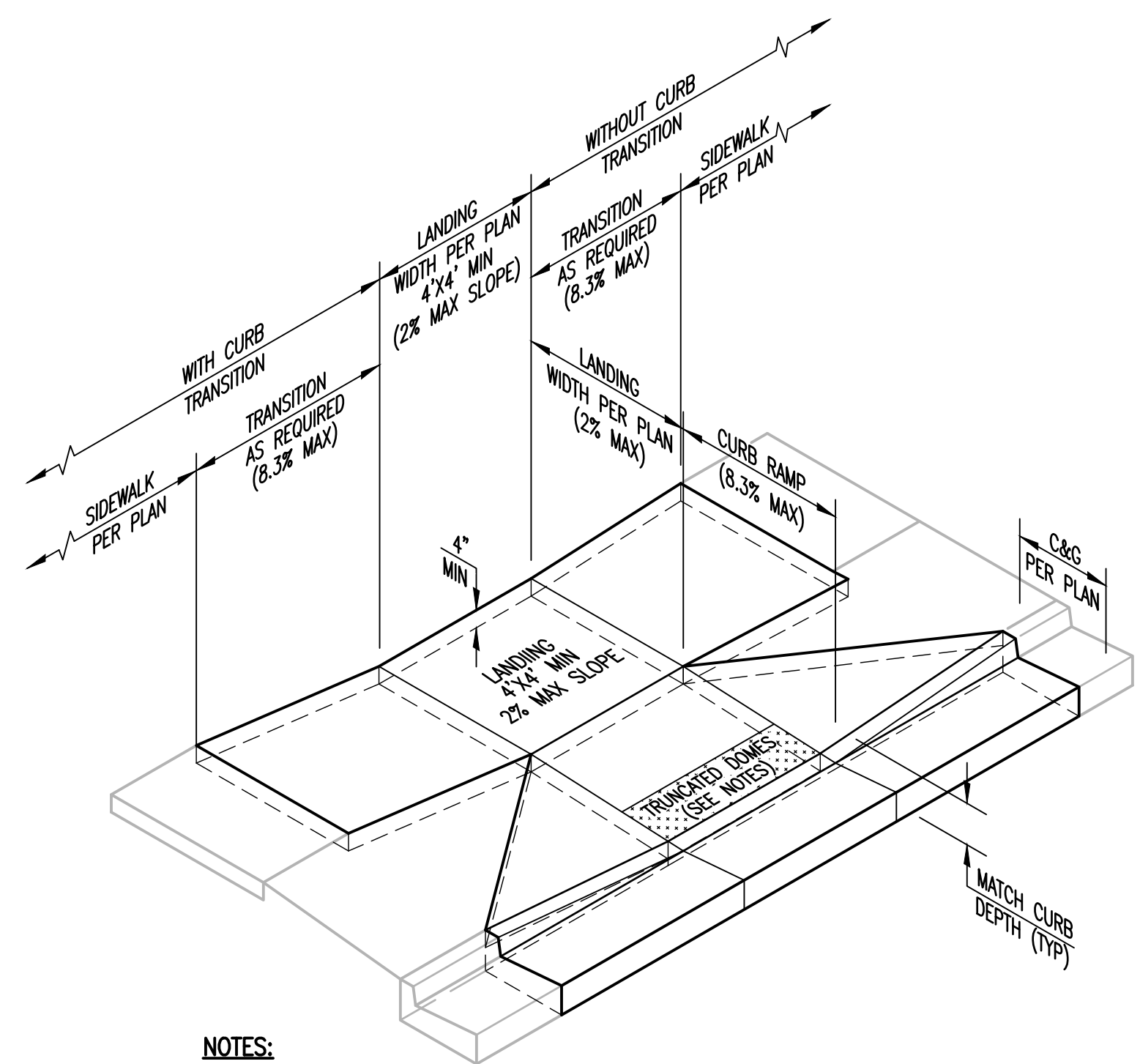
DETAIL  
**40** 30" CURB AND GUTTER, 6" CURB  
 (NO SCALE)



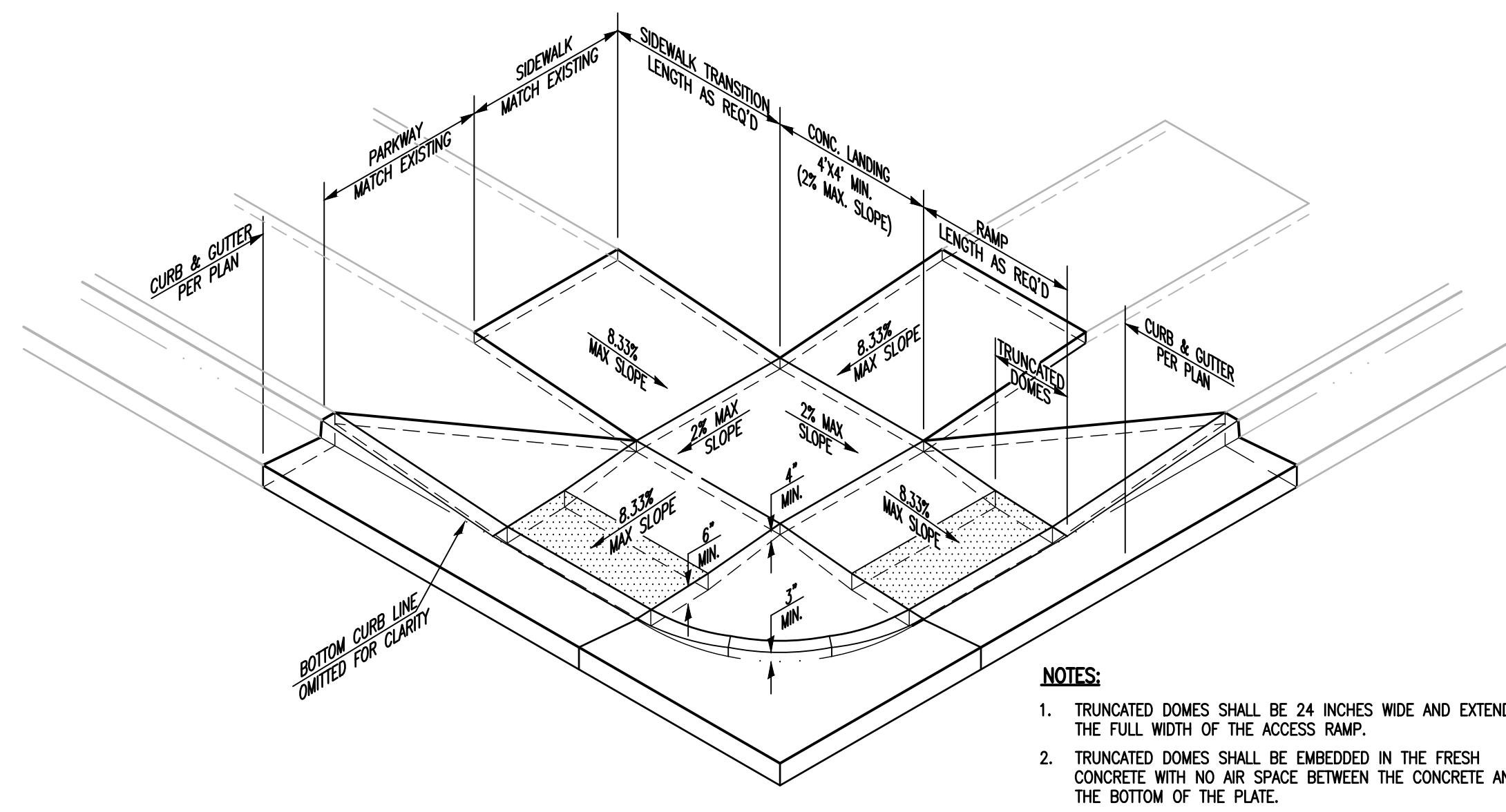
DETAIL  
**43** TYPE 1 DRIVEWAY  
 (NO SCALE)



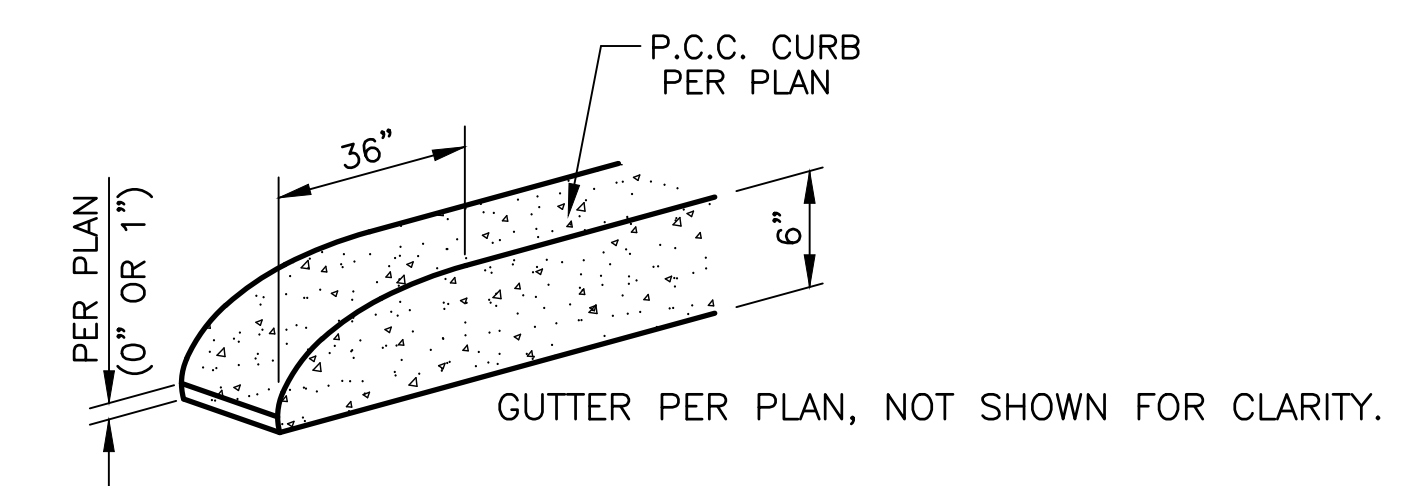
DETAIL  
**45** CONCRETE SIDEWALK  
 (NO SCALE)



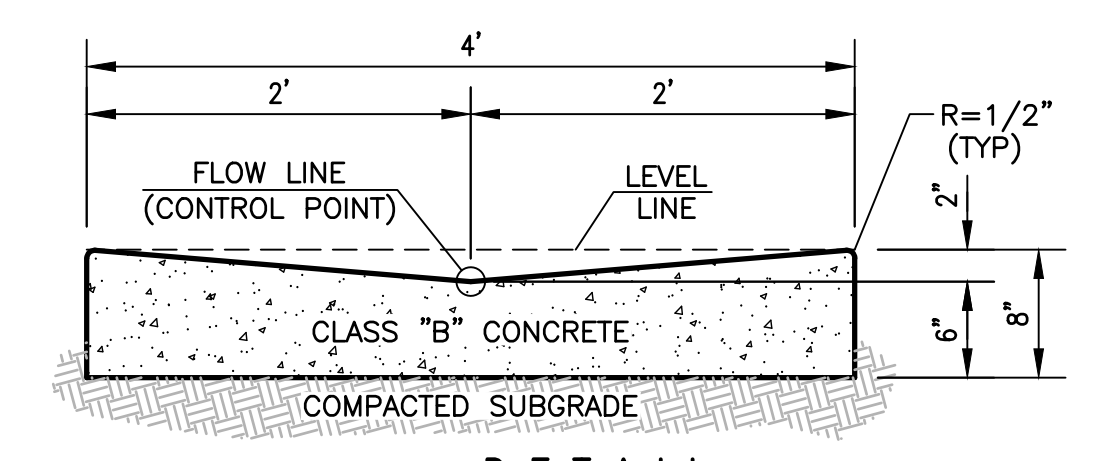
DETAIL  
**46** TYPE 1 ADA CURB RAMP  
 (NO SCALE)



DETAIL  
**47** ADA CURB RAMP - TYPE 2  
 (NO SCALE)



DETAIL  
**10** CURB TAPER  
 (NO SCALE)



DETAIL  
**62** 4' CROSSSPAN  
 (NO SCALE)

PROGRESS SET 8/4/21

PRIVATE ENGINEER'S NOTES TO CONTRACTOR  
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PREPARED FOR:  
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 2112 ANN ARBOR AVE  
 AUSTIN, TX 78704  
 PHONE: 512-826-6152  
 PREPARED UNDER THE DIRECTION OF:  
 DATE \_\_\_\_\_  
 WILLIAM BERNARD HUSSEY CRABTREE GROUP, INC  
 L.C.E. NO. 56989 EXP. DATE 10/31/21

PREPARED BY:  
  
**CRABTREE GROUP INC.**  
 ENGINEERING SMART GROWTH™  
 328 D STREET SALIDA, CO 81201 PH: 719-539-1875  
 918 CUYAMA ROAD OJAI, CA 93023 PH: 719-221-1799

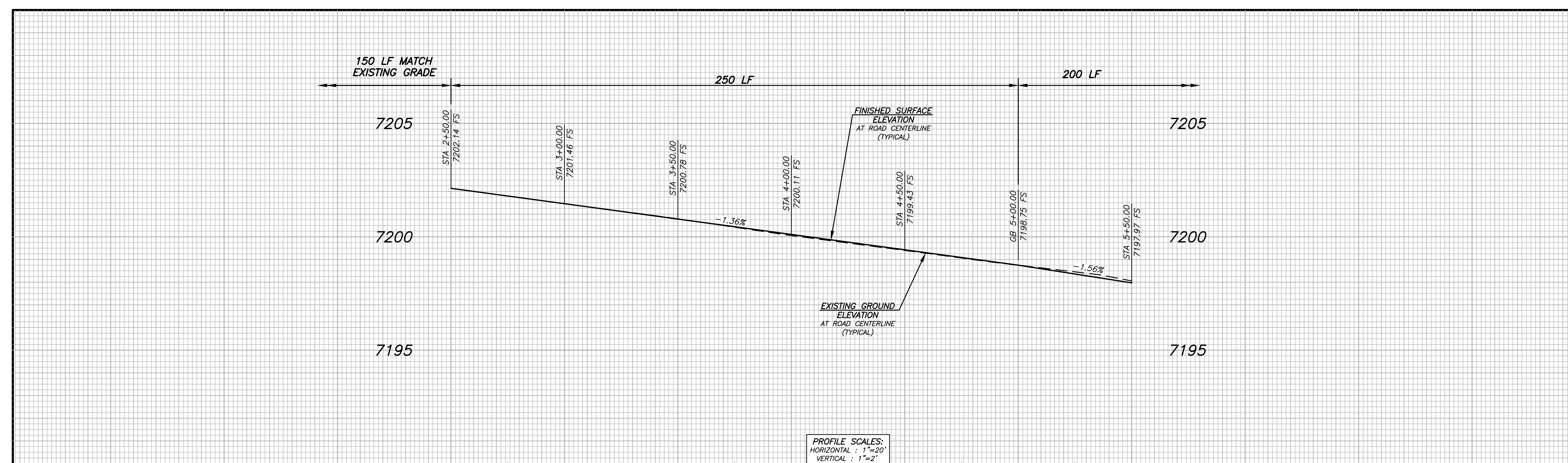
SEAL

DATE	BY	MARK	REVISIONS	APPR.	DATE

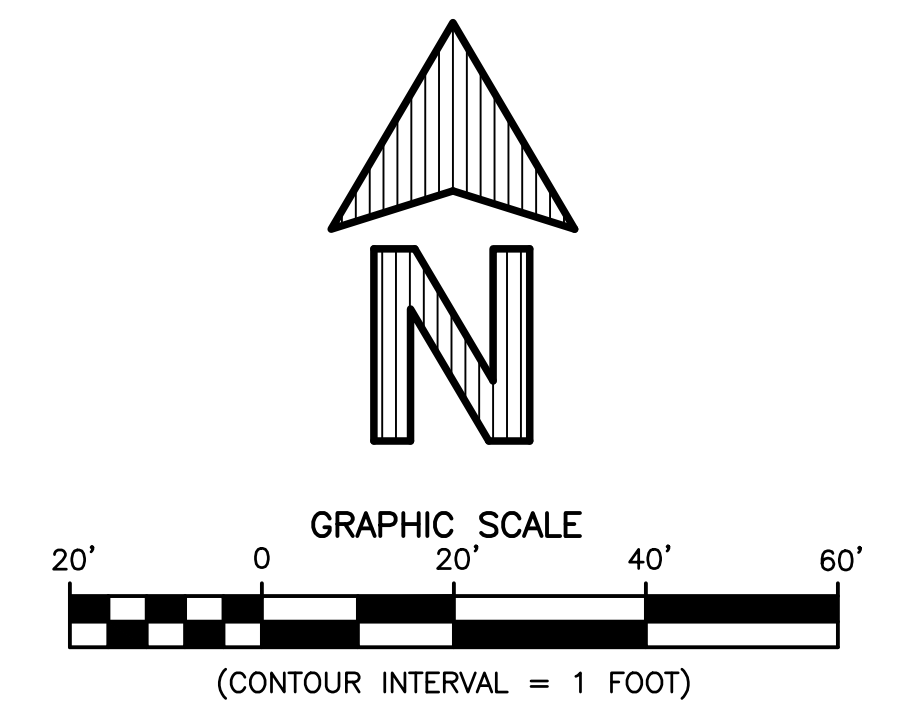
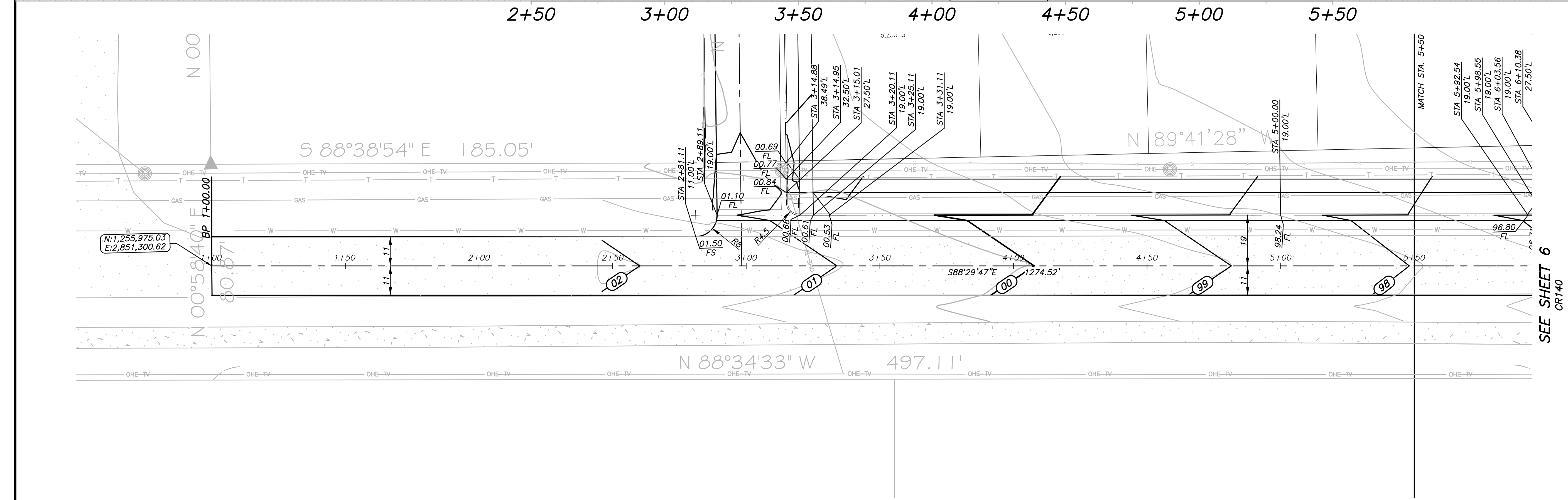
CITY OF SALIDA  
 DESIGNED BY WBH APPROVED BY:  
 DRAWN BY BH, CA  
 CHECKED BY BH, TV AGENCY HEAD DATE  
 SCALE (NO SCALE) BENCHMARK: SEE PLAN AND PROFILE SHEETS FOR BENCHMARKS, ONE PER BLOCK  
 DATE AUG. 2021 REVISION AGENCY

UPCHURCH SUBDIVISION  
 SALIDA, CO  
 STREET PLANS  
 DETAILS  
 NOTES AND DETAILS

SHEET NO.  
**4**  
 OF 22 SHETS.  
 PROJECT NO.  
 20036



PROFILE SCALES:  
HORIZONTAL : 1"=20'  
VERTICAL : 1"=2'



CONSTRUCTION NOTES:

**CR140**  
STA 1+00.00 TO STA 5+50.00

PROGRESS SET 8/4/21

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DATE

**WILLIAM BERNARD HUSSEY** CRABTREE GROUP, INC.  
L.C.E. NO. 56989 EXP. DATE 10/31/21

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**CRABTREE GROUP INC.**  
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328 D STREET  
SALIDA, CO 81201  
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918 CUYAMA ROAD  
OJAJI, CA 95029  
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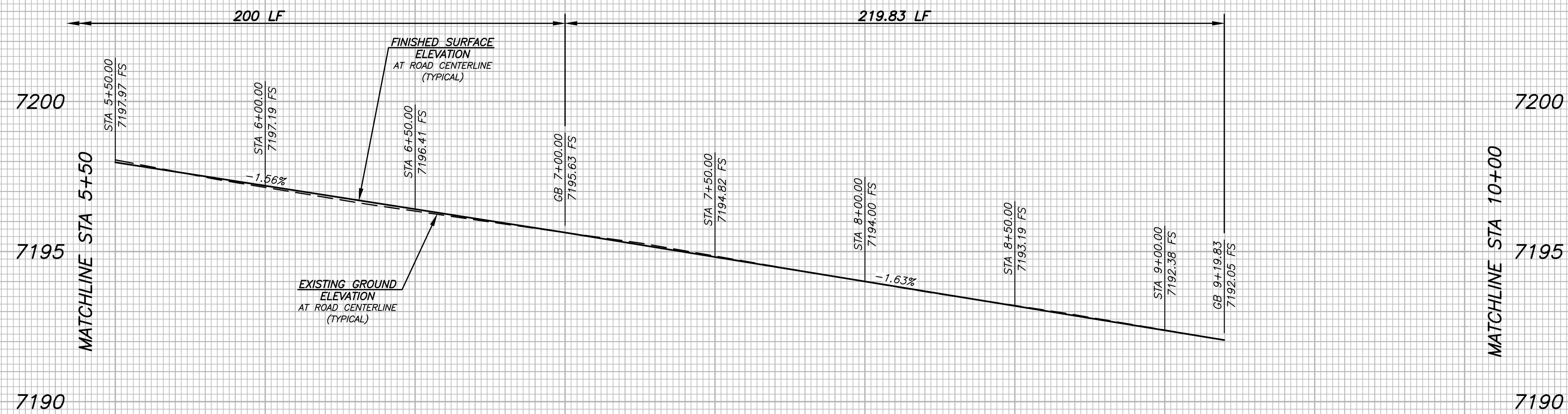
**SEAL**

DATE	BY	MARK	ENGINEER

CITY OF SALIDA			
DESIGNED BY	WBH	APPROVED BY:	
DRAWN BY	BH, CA	AGENCY HEAD	DATE
CHECKED BY	BH, TV	BENCHMARK:	SEE PLAN AND PROFILE SHEETS FOR BENCHMARKS, ONE PER BLOCK
SCALE	1"=20'	DATE	AUG. 2021
REVISION AGENCY			

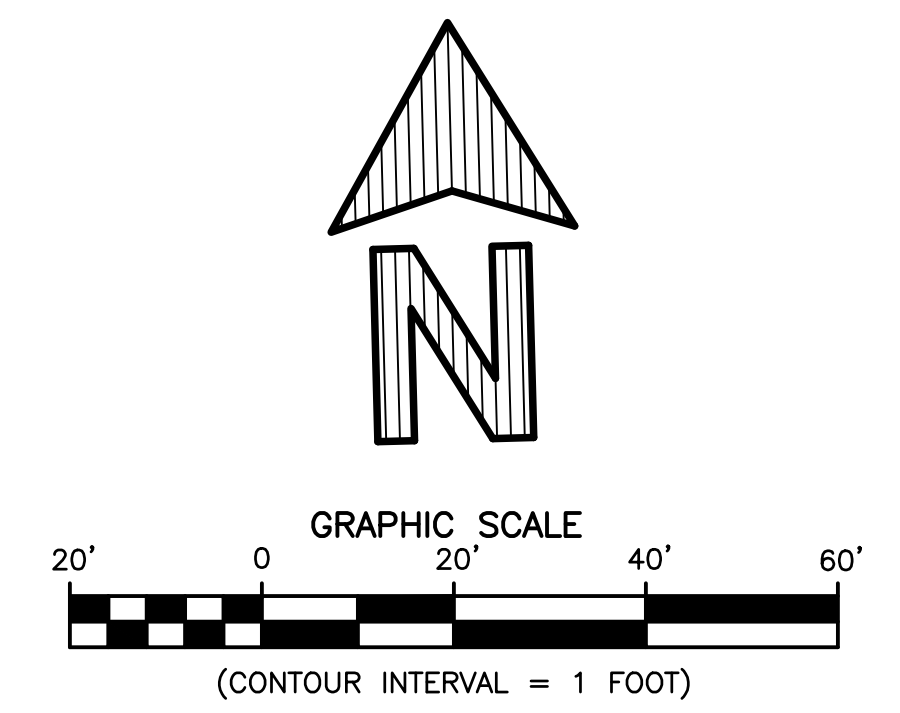
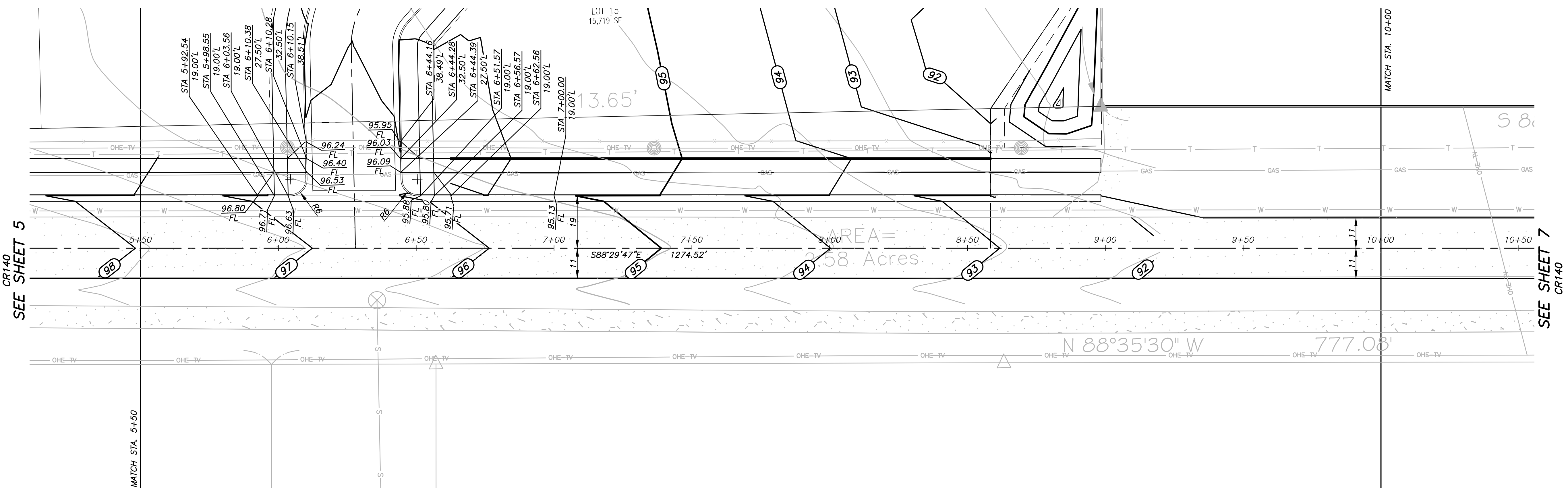
**UPCHURCH SUBDIVISION**  
SALIDA, CO  
**STREET PLAN AND PROFILE**  
**CR140**  
STA 1+00.00 TO STA 5+50.00

**SHEET NO.**  
5  
OF 22 SHTS.  
**PROJECT NO.**  
20036



PROFILE SCALES:  
HORIZONTAL : 1"=20'  
VERTICAL : 1"=2'

5+50 6+00 6+50 7+00 7+50 8+00 8+50 9+00 9+50 10+00



CONSTRUCTION NOTES:

**CR140**  
STA 5+50.00 TO STA 10+00.00

PROGRESS SET 8/4/21

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L.C.E. NO. 56989 EXP. DATE 10/31/21

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ENGINEERING SMART GROWTH™

328 D STREET SALIDA, CO 81201 PH: 719-539-1875

918 CUYAMA ROAD OJAI, CA 93023 PH: 719-221-1799

**SEAL**

DATE	BY	MARK	REVISIONS	APPR.	DATE

**CITY OF SALIDA**

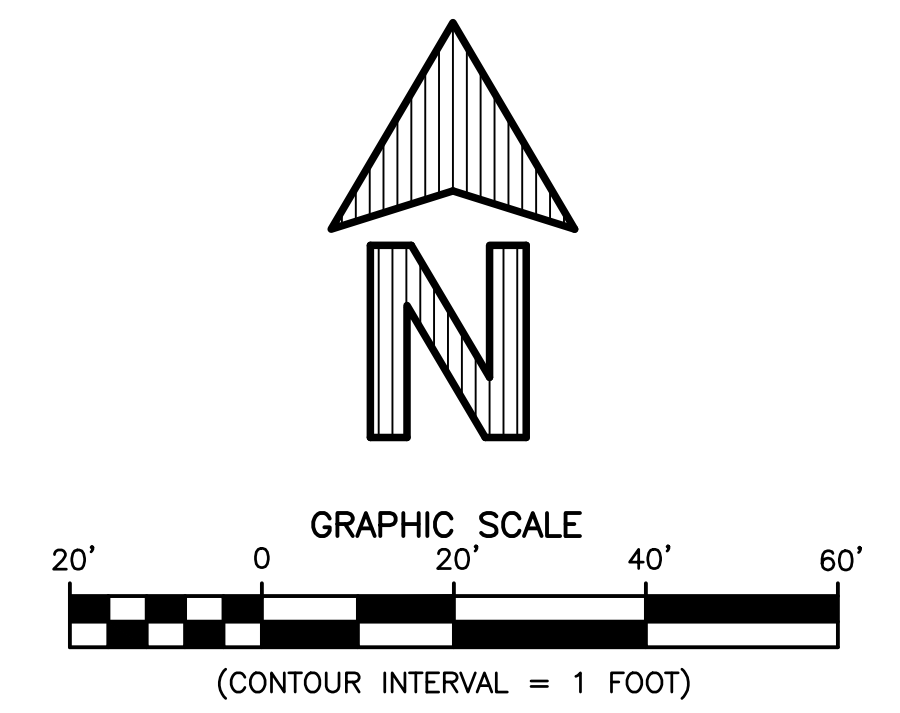
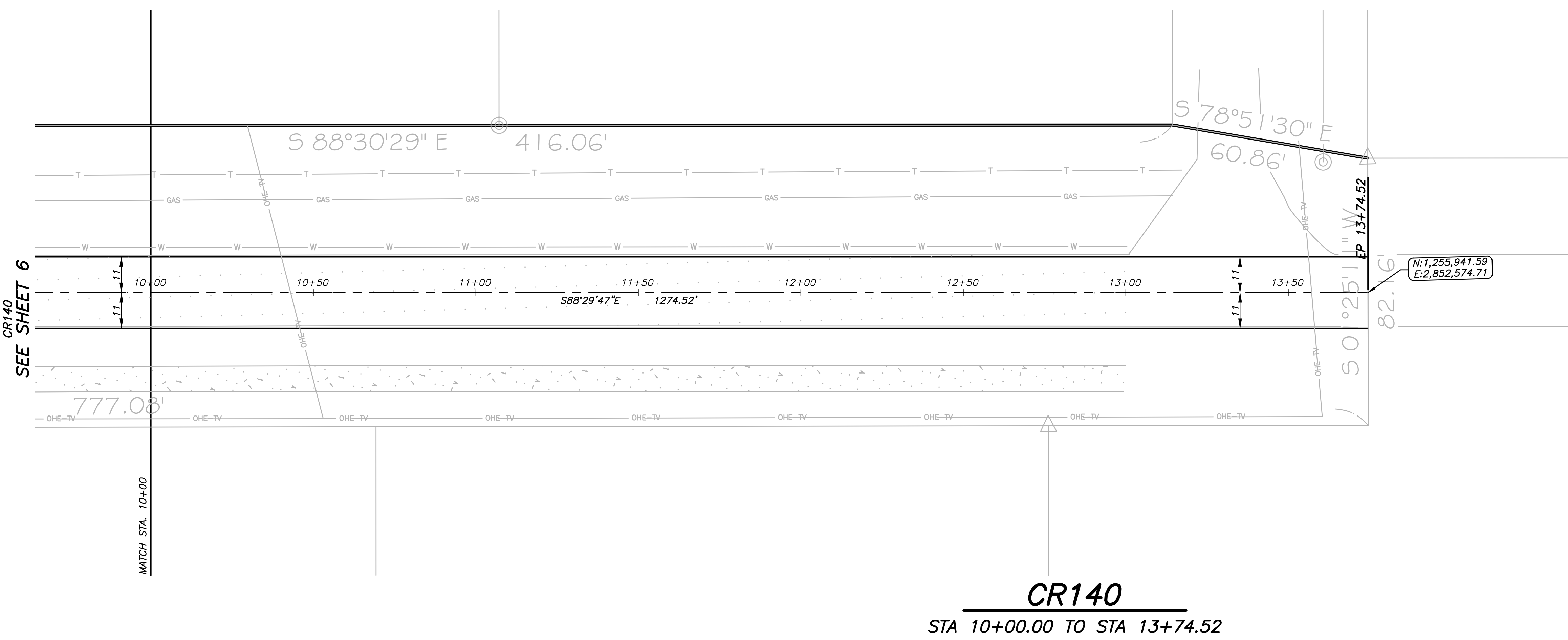
DESIGNED BY WBH APPROVED BY: \_\_\_\_\_  
DRAWN BY BH, CA  
CHECKED BY BH, TV AGENCY HEAD DATE \_\_\_\_\_

SCALE 1"=20' BENCHMARK: SEE PLAN AND PROFILE SHEETS FOR BENCHMARKS, ONE PER BLOCK  
DATE AUG. 2021

**UPCHURCH SUBDIVISION**  
SALIDA, CO  
**STREET PLAN AND PROFILE**  
**CR140**  
STA 5+50.00 TO STA 10+00.00

SHEET NO. **6**  
OF **22** SHTS.  
PROJECT NO. **20036**

MATCH EXISTING GRADES



CONSTRUCTION NOTES:

**CR140**  
STA 10+00.00 TO STA 13+74.52

PROGRESS SET 8/4/21

**PRIVATE ENGINEER'S NOTES TO CONTRACTOR**  
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 TORY UPCHURCH  
 2112 ANN ARBOR AVE  
 AUSTIN, TX 78704  
 PHONE: 512-826-6152

**PREPARED UNDER THE DIRECTION OF:** \_\_\_\_\_ DATE \_\_\_\_\_

WILLIAM BERNARD HUSSEY CRABTREE GROUP, INC  
 L.C.E. NO. 56989 EXP. DATE 10/31/21

**PREPARED BY:**

**CRABTREE GROUP INC.**  
 ENGINEERING SMART GROWTH™

328 D STREET SALIDA, CO 81201 PH: 719-539-1875  
 918 CUYAMA ROAD OJAI, CA 93025 PH: 719-221-1799

SEAL

DATE	BY	MARK	REVISIONS	APPR.	DATE

**CITY OF SALIDA**

DESIGNED BY WBH APPROVED BY: \_\_\_\_\_  
 DRAWN BY BH, CA  
 CHECKED BY BH, TV AGENCY HEAD DATE \_\_\_\_\_  
 SCALE 1"=20'  
 DATE AUG. 2021

**UPCHURCH SUBDIVISION**  
 SALIDA, CO  
**STREET PLAN AND PROFILE**  
**CR140**  
 STA 10+00.00 TO STA 13+74.52

SHEET NO. 7  
 OF 22 SHTS.  
 PROJECT NO. 20036

7210

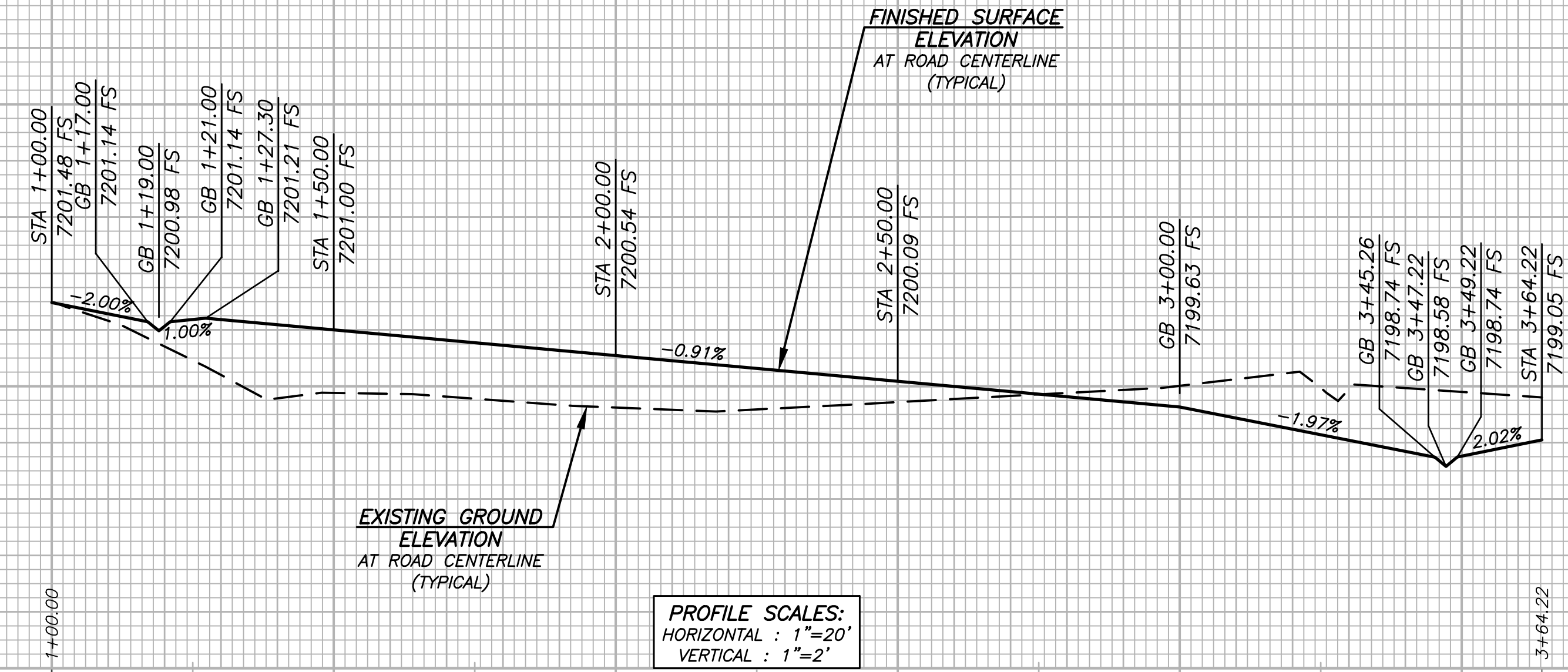
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7205

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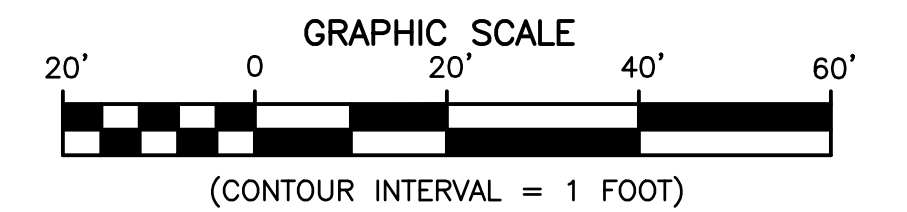
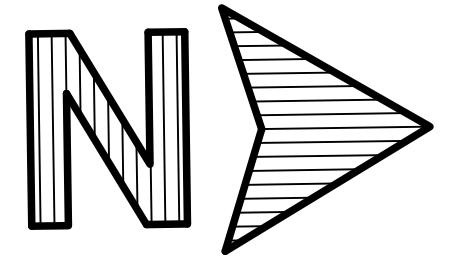
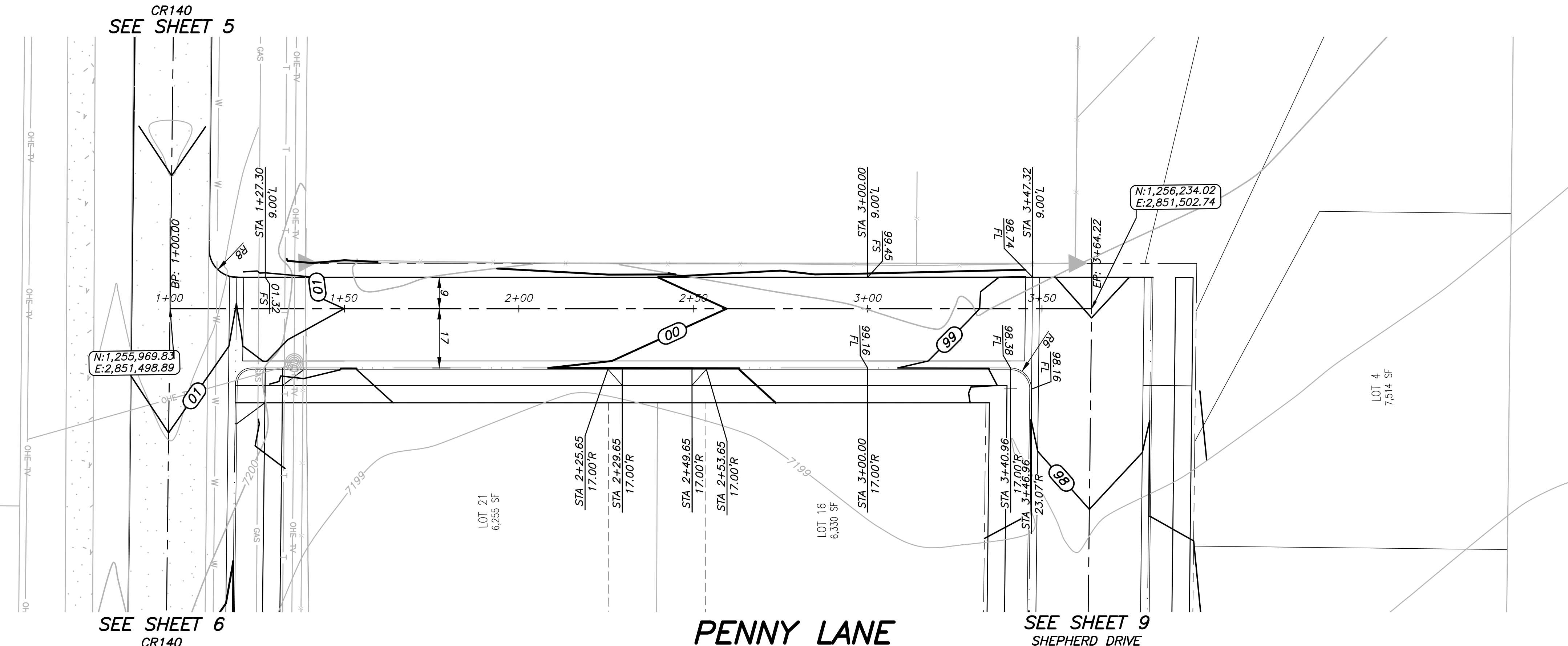
7200

7200



PROFILE SCALES:  
 HORIZONTAL : 1"=20'  
 VERTICAL : 1"=2'

0+50      1+00      1+50      2+00      2+50      3+00      3+50      4+00



CONSTRUCTION NOTES:

**PENNY LANE**  
 STA 1+00.00 TO STA 3+64.22

PROGRESS SET 8/4/21

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WILLIAM BERNARD HUSSEY      CRABTREE GROUP, INC  
 L.C.E. NO. 56989      EXP. DATE 10/31/21

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 ENGINEERING SMART GROWTH™

328 D STREET      918 CUYAMA ROAD  
 SALIDA, CO 81201      OJAI, CA 93023  
 PH: 719-539-1875      PH: 719-221-1799

SEAL

DATE	BY	MARK	REVISIONS	APPR.	DATE

**CITY OF SALIDA**

DESIGNED BY WBH      APPROVED BY: \_\_\_\_\_  
 DRAWN BY BH, CA      AGENCY HEAD      DATE  
 CHECKED BY BH, TV  
 SCALE 1"=20'      BENCHMARK: SEE PLAN AND PROFILE SHEETS FOR BENCHMARKS, ONE PER BLOCK  
 DATE AUG. 2021

**UPCHURCH SUBDIVISION**  
 SALIDA, CO  
**STREET PLAN AND PROFILE**  
**PENNY LANE**  
 STA 1+00.00 TO STA 3+64.22

SHEET NO. **8**  
 OF 22 SHETS.  
 PROJECT NO. 20036

7200

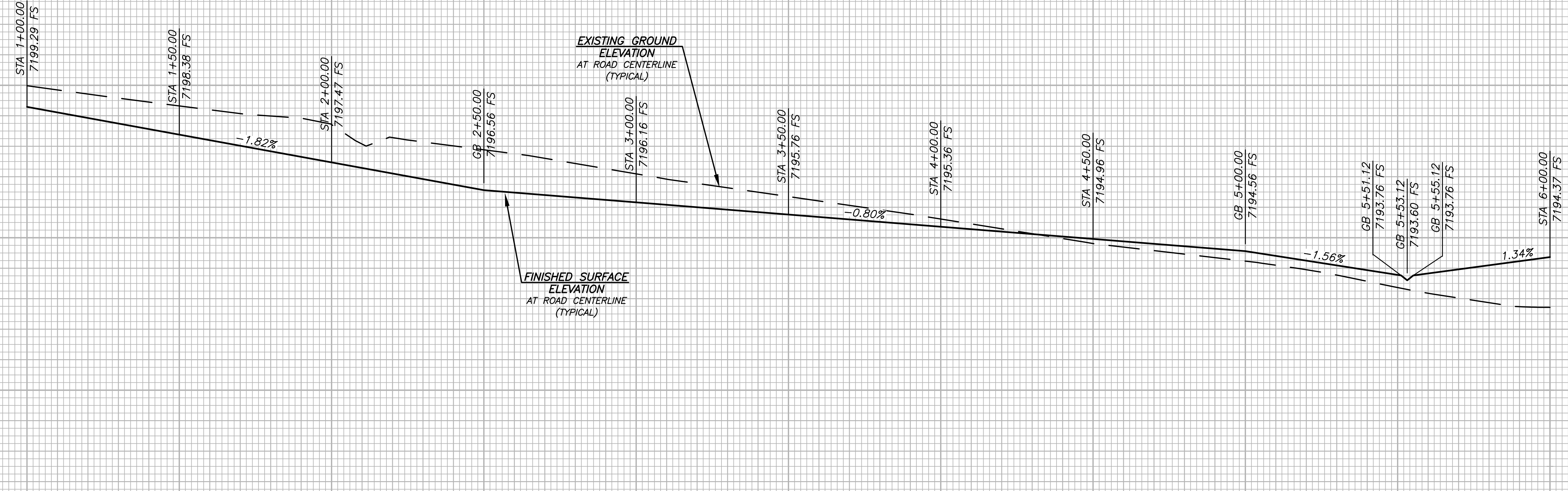
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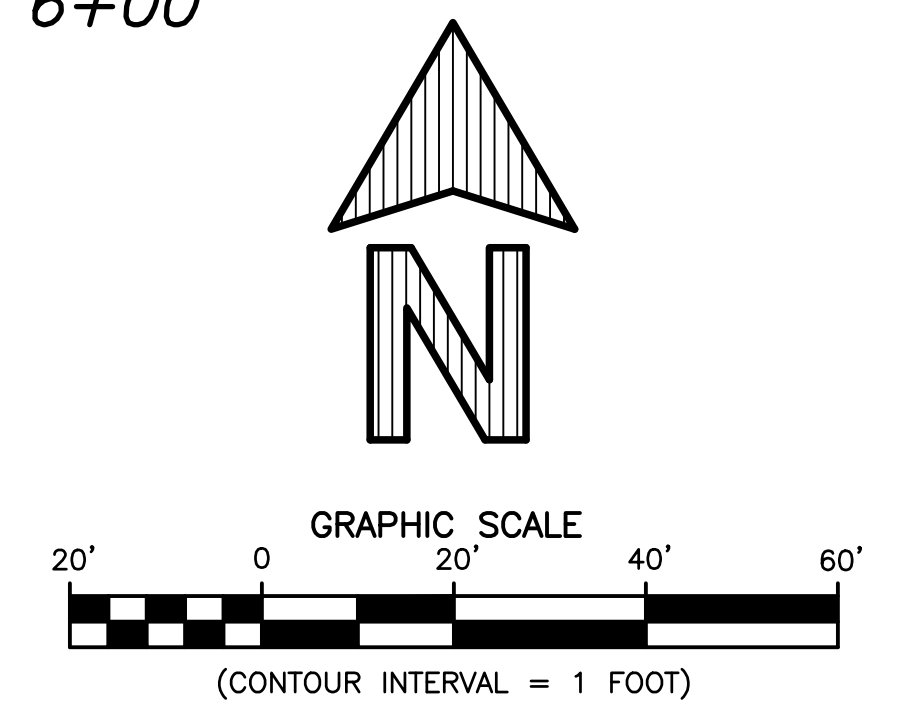
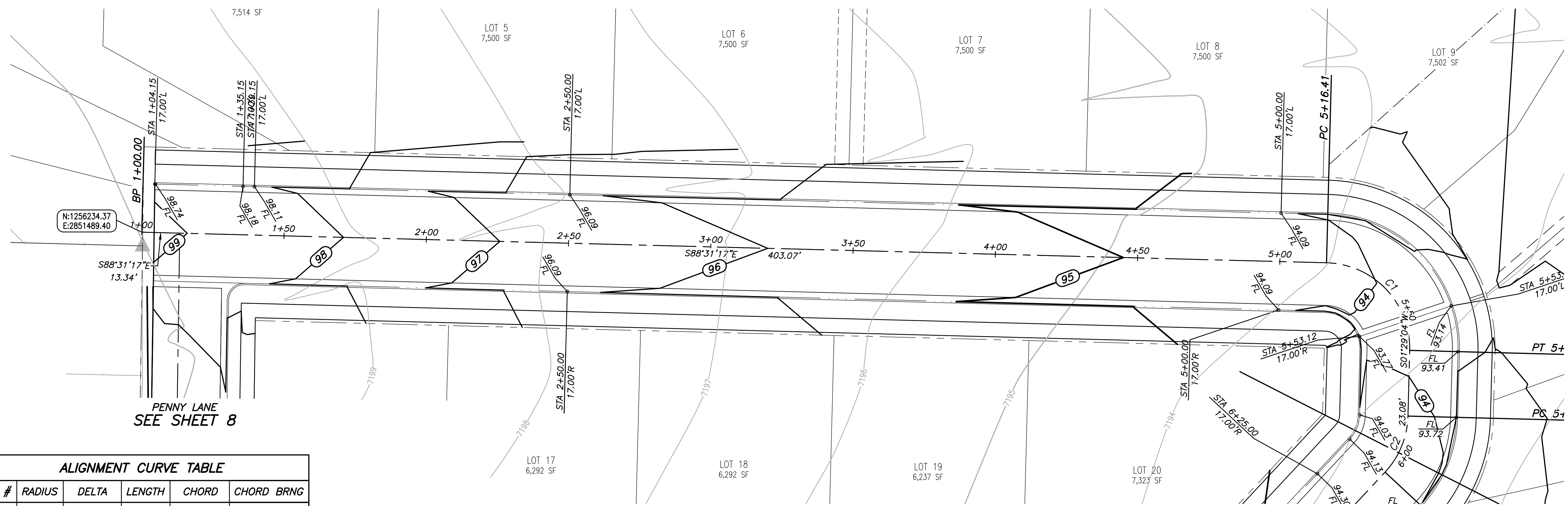
7190

7190



PROFILE SCALES:  
 HORIZONTAL : 1"=20'  
 VERTICAL : 1"=2'

0+50 1+00 1+50 2+00 2+50 3+00 3+50 4+00 4+50 5+00 5+50 6+00



CONSTRUCTION NOTES:

ALIGNMENT CURVE TABLE					
CURVE #	RADIUS	DELTA	LENGTH	CHORD	CHORD BRNG
C1	30.00	090°00'21"	47.13	42.43'	S43°31'06"E
C2	30.00	041°31'12"	21.74	21.27'	S22°14'40"W
C3	30.00	042°41'44"	22.36	21.84'	S21°39'24"W

**SHEPHERD DRIVE**  
 STA 1+00.00 TO STA 6+00.00

SEE SHEET 10  
 SHEPHERD DRIVE

PROGRESS SET 8/4/21

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 ENGINEERING SMART GROWTH™

328 D STREET SALIDA, CO 81201 PH: 719-539-1875

918 CUYAMA ROAD OJAI, CA 93023 PH: 719-221-1799

SEAL

DATE	BY	MARK	REVISIONS

CITY OF SALIDA

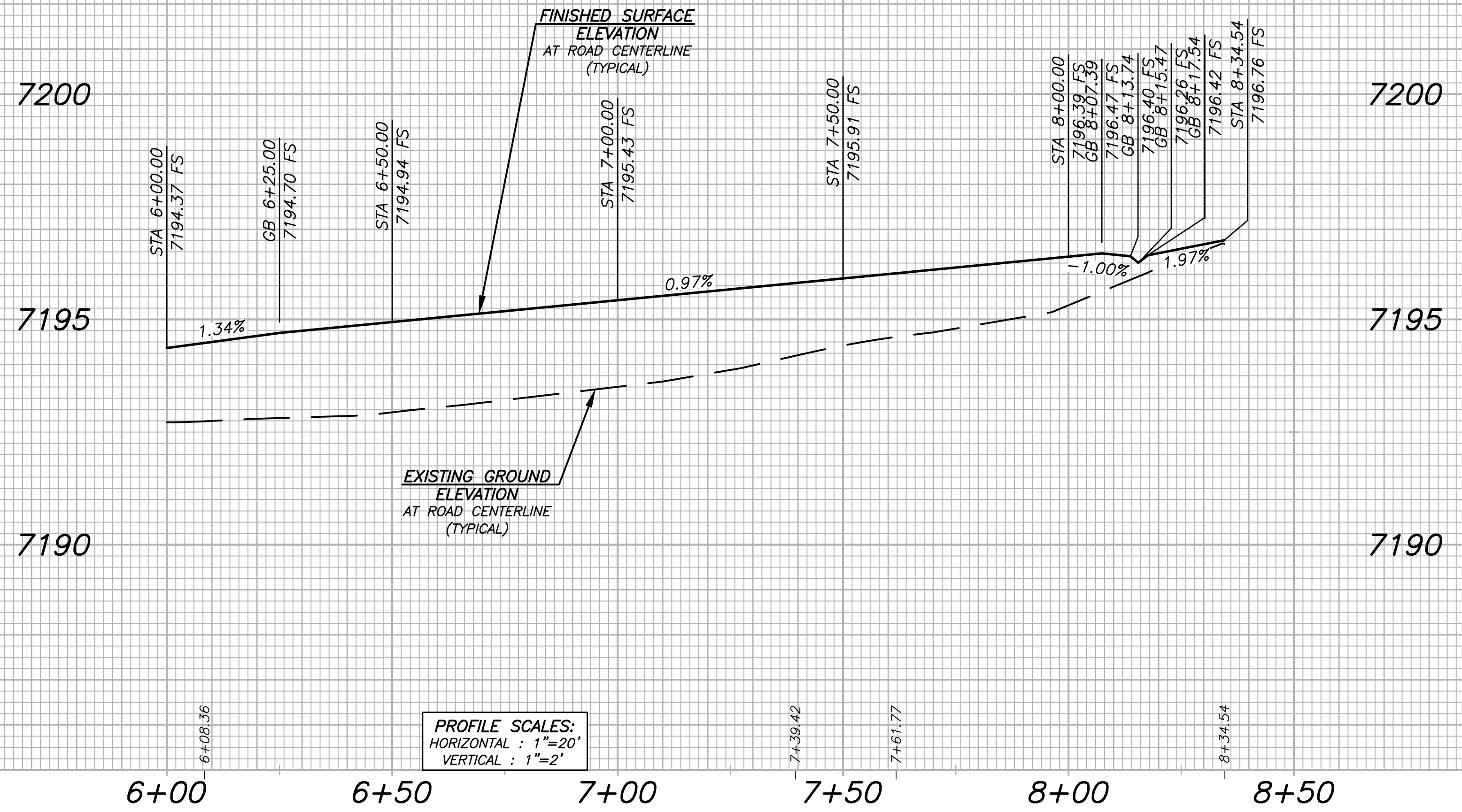
DESIGNED BY **WBH** APPROVED BY: \_\_\_\_\_  
 DRAWN BY **BH, CA**  
 CHECKED BY **BH, TV** AGENCY HEAD DATE \_\_\_\_\_

SCALE 1"=20'  
 DATE **AUG. 2021**

BENCHMARK: SEE PLAN AND PROFILE SHEETS FOR BENCHMARKS, ONE PER BLOCK

**UPCHURCH SUBDIVISION**  
 SALIDA, CO  
**STREET PLAN AND PROFILE**  
**SHEPHERD DRIVE**  
 STA 1+00.00 TO STA 6+00.00

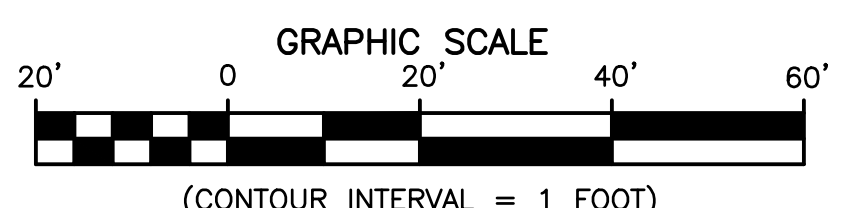
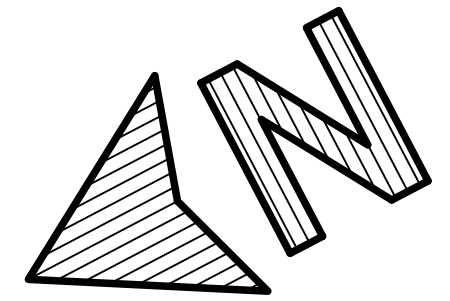
SHEET NO. **9**  
 OF **22** SHTS.  
 PROJECT NO. **20036**



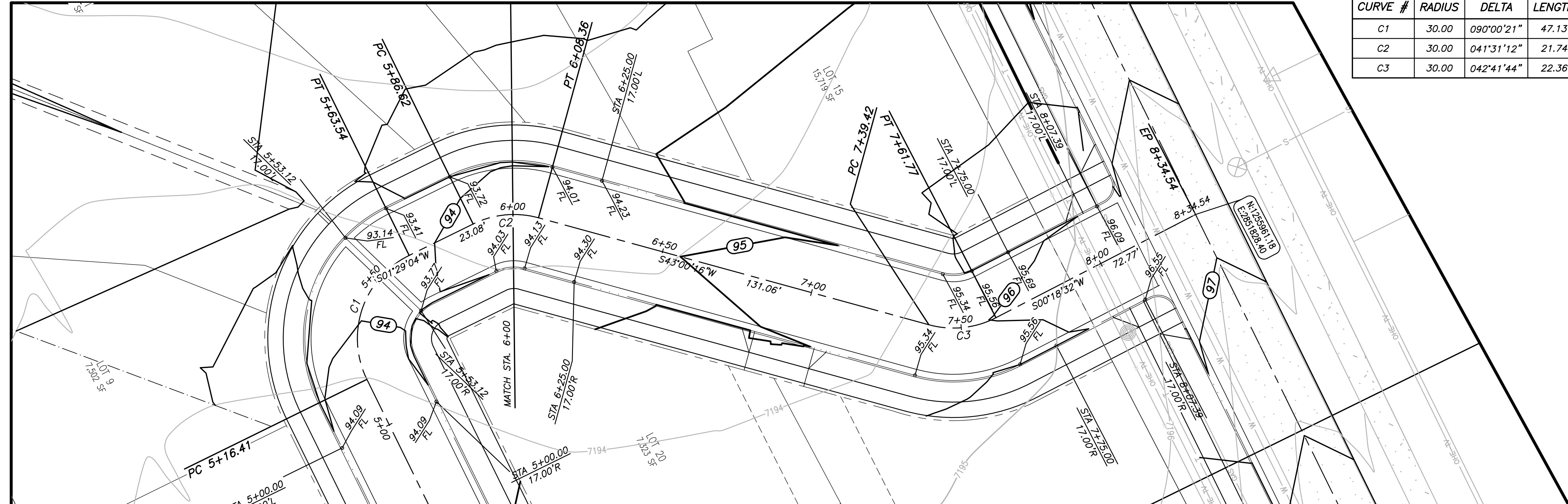
PROFILE SCALES:  
HORIZONTAL : 1"=20'  
VERTICAL : 1"=2'

CR140  
SEE SHEET 7

ALIGNMENT CURVE TABLE					
CURVE #	RADIUS	DELTA	LENGTH	CHORD	CHORD BRNG
C1	30.00	090°00'21"	47.13	42.43'	S43°31'06"E
C2	30.00	041°31'12"	21.74	21.27'	S22°14'40"W
C3	30.00	042°41'44"	22.36	21.84'	S21°39'24"W



CONSTRUCTION NOTES:



SEE SHEET 5  
SHEPHERD DRIVE

**SHEPHERD DRIVE**  
STA 6+00.00 TO STA 8+34.54

SEE SHEET 6  
CR140

PROGRESS SET 8/4/21

**PRIVATE ENGINEER'S NOTES TO CONTRACTOR**  
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PREPARED FOR:  
**TORY UPCHURCH**  
2112 ANN ARBOR AVE  
AUSTIN, TX 78704  
PHONE: 512-826-6152

PREPARED UNDER THE DIRECTION OF: \_\_\_\_\_ DATE \_\_\_\_\_

WILLIAM BERNARD HUSSEY  
L.C.E. NO. 56989

CRABTREE GROUP, INC  
EXP. DATE 10/31/21

PREPARED BY:  
**CRABTREE GROUP INC.**  
ENGINEERING SMART GROWTH™

328 D STREET  
SALIDA, CO 81201  
PH: 719-539-1875

918 CUYAMA ROAD  
OJAI, CA 93023  
PH: 719-221-1799

SEAL

DATE	BY	MARK	REVISIONS

CITY OF SALIDA

DESIGNED BY **WBH** APPROVED BY: \_\_\_\_\_

DRAWN BY **BH, CA**

CHECKED BY **BH, TV** AGENCY HEAD DATE \_\_\_\_\_

SCALE **1"=20'** BENCHMARK: SEE PLAN AND PROFILE SHEETS FOR BENCHMARKS, ONE PER BLOCK

DATE **AUG. 2021**

**UPCHURCH SUBDIVISION**  
SALIDA, CO

**STREET PLAN AND PROFILE**  
**SHEPHERD DRIVE**  
STA 6+00.00 TO STA 8+34.54

SHEET NO. **10**  
OF **22** SHTS.  
PROJECT NO. **20036**

7200

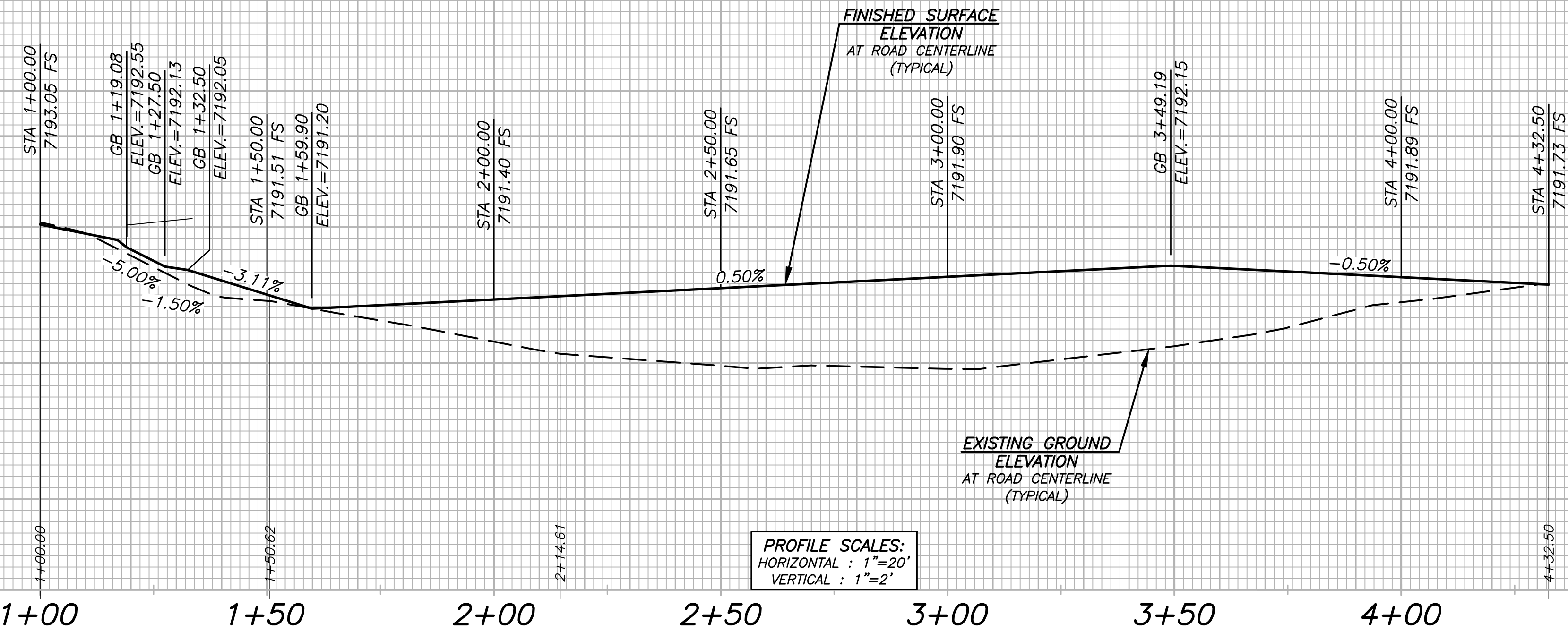
7200

7195

7195

7190

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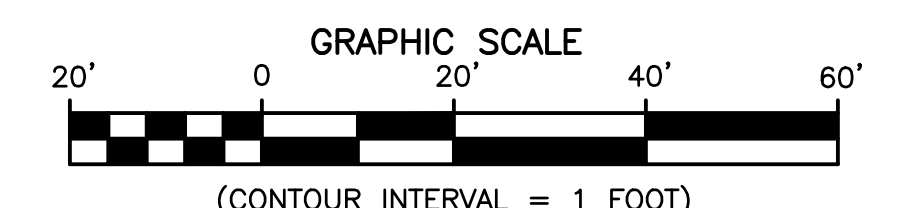
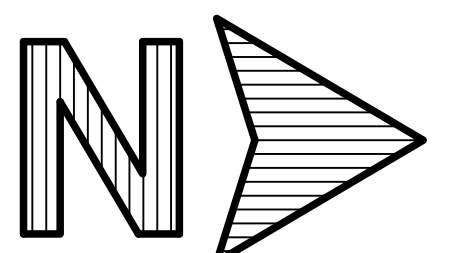


PROFILE SCALES:  
 HORIZONTAL : 1"=20'  
 VERTICAL : 1"=2'

0+50 1+00 1+50 2+00 2+50 3+00 3+50 4+00 4+50

CR140  
SEE SHEET 7

SHEPHERD DRIVE  
SEE SHEET 10



CONSTRUCTION NOTES:

**EAST SIDE**  
 STA 1+00.00 TO STA 4+32.50

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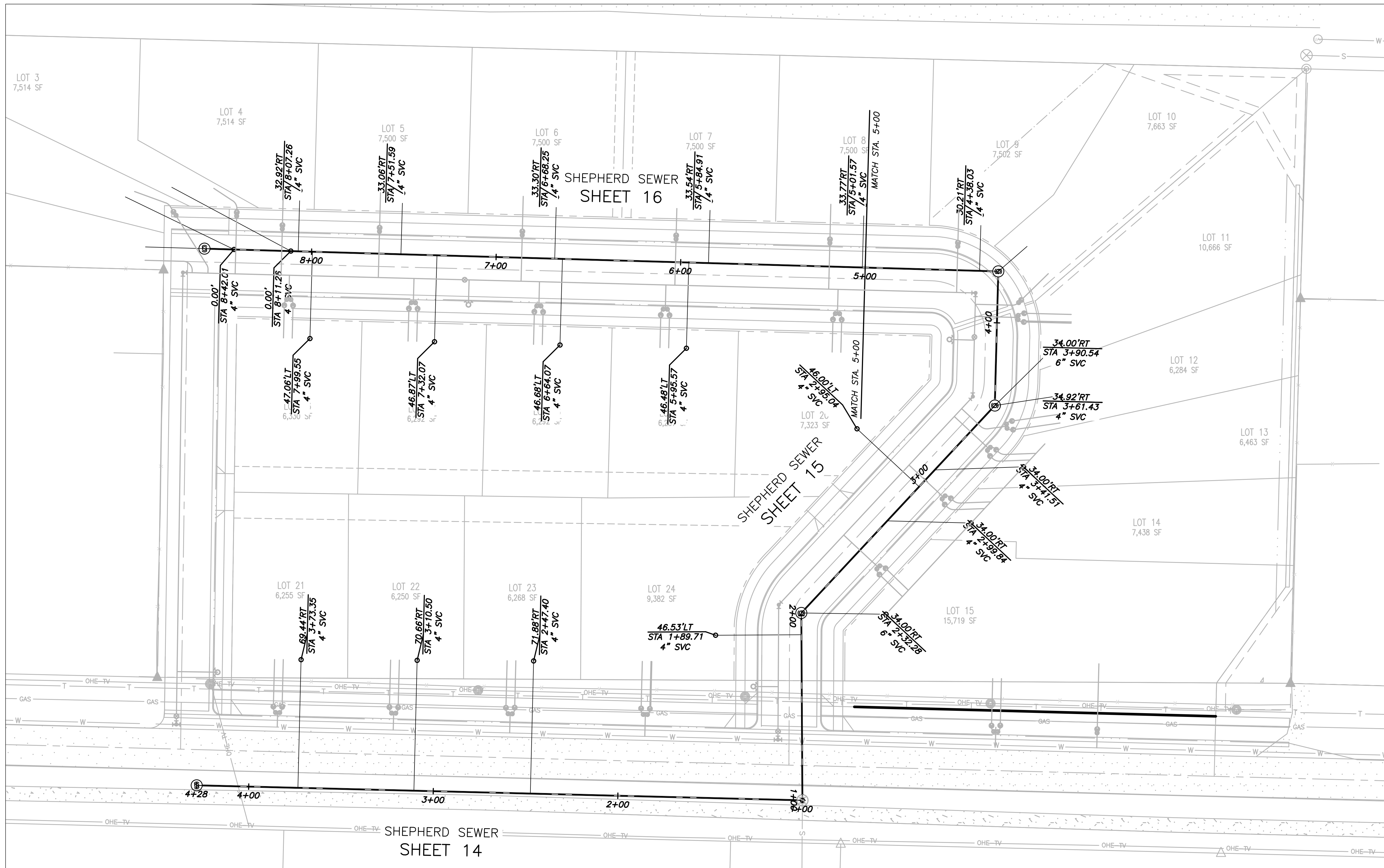
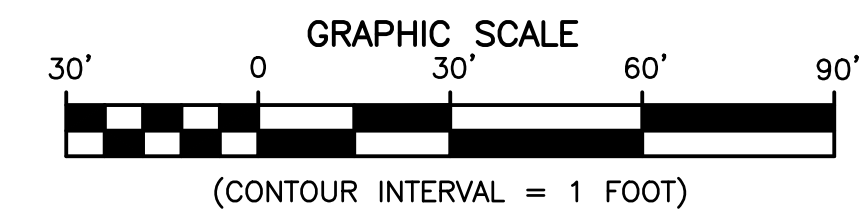
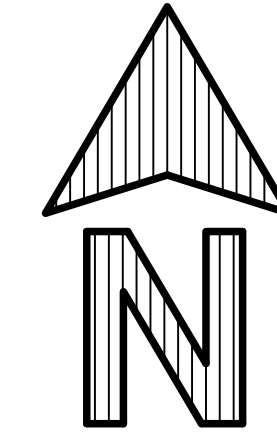
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UPCHURCH SUBDIVISION  
 SALIDA, CO  
 STREET PLAN AND PROFILE  
**EAST SIDE**  
 STA 1+00.00 TO STA 4+32.50

SHEET NO. **11**  
 OF 22 SHTS.  
 PROJECT NO. **20036**

# UPCHURCH SUBDIVISION SEWER PLANS

SALIDA, CO  
AUGUST, 2021



## INDEX MAP

SCALE: 1"=30' AT 24X36"

### SEWER NOTES:

1. THE FOLLOWING SUBMITTALS ARE REQUIRED AND MUST BE RECEIVED AND APPROVED BY THE PROJECT ENGINEER PRIOR TO COMMENCEMENT OF THE WORK:
  - A. MANUFACTURER'S DOCUMENTATION FOR ALL MANHOLES, PIPE MATERIAL, FITTINGS, AND OTHER APPURTENANCES.
  - B. GRADATION AND PROCTORS FOR BEDDING AND STRUCTURAL FILL MATERIAL.
2. SEWER MAIN PIPE MATERIAL SHALL BE SDR 35 POLYVINYL CHLORIDE (PVC), SIZED AS SHOWN ON THE PLAN, AND MANUFACTURED IN CONFORMANCE WITH ASTM-3034.
3. ALL MATERIALS STORED ON-SITE SHALL BE PROTECTED FROM CONTAMINATION AND STORED PER THE MANUFACTURER'S RECOMMENDATIONS.
4. ALL SEWER MAINS SHALL BE CONSTRUCTED WITH A MINIMUM COVER OF 3.5 FEET BELOW FINISHED GRADE. IF MAINTAINING MINIMUM COVER IS IMPRACTICAL; THE PROJECT ENGINEER, AT THEIR SOLE DISCRETION, MAY ALLOW REDUCED COVER WITH POLYSTYRENE INSULATION PLACED OVER THE MAIN.
5. STRUCTURAL FILL, AS SHOWN IN THE TYPICAL TRENCH SECTION, SHALL MEET CDOT CLASS 1 SPECIFICATIONS.
6. PIPE BEDDING (AS DEFINED IN THE TYPICAL TRENCH SECTION) IN DRY TRENCH CONDITIONS SHALL MEET CDOT CLASS 6 SPECIFICATIONS. IN HIGH GROUNDWATER CONDITIONS, PIPE BEDDING SHALL BE 3/4" MINUS CRUSHED ROCK.
7. ALL SERVICE TAPS SHALL BE INSTALLED UTILIZING PREDCO HUB TAP SADDLES LOCATED 45° FROM THE VERTICAL CENTERLINE, UNLESS NOTED OTHERWISE. CONTRACTOR SHALL CONTACT THE CITY OF SALIDA FOR INSPECTION PRIOR TO INSTALLING TAPS.
8. SERVICE LINES FOR INDIVIDUAL RESIDENCES SHALL BE PRESSURE RATED PVC SCHEDULE 40 UNLESS NOTED OTHERWISE.
9. PIPE DEFLECTIONS SHALL NOT EXCEED ONE-HALF OF THE PIPE MANUFACTURER'S RECOMMENDED MAXIMUM DEFLECTION.
10. SEWER LINES SHALL HAVE A MINIMUM CLEARANCE FROM WATER LINES OF 10 FEET IN THE HORIZONTAL DIRECTION AND 1.5 FEET VERTICALLY. IF MINIMUM CLEARANCES ARE IMPRACTICAL; THE PROJECT ENGINEER, AT THEIR SOLE DISCRETION, MAY ALLOW FOR REDUCED CLEARANCES WITH CONCRETE ENCASUREMENT PER CITY OF SALIDA STANDARD DRAWING WS-01.
11. CONTRACTOR SHALL PROVIDE USERS A MINIMUM OF 48 HOURS NOTICE PRIOR TO ANY DISRUPTION OF SERVICE.
12. THE FOLLOWING ARE CONSIDERED MANDATORY INSPECTION POINTS FOR SEWER MAIN CONSTRUCTION:
  - A. TRENCH CONSTRUCTION PRIOR TO LAYING PIPE
  - B. PIPE BEDDING PRIOR TO COVERING PIPE
  - C. COMPACTION OF STRUCTURAL FILL
  - D. CONCRETE ENCASUREMENT FORMING PRIOR TO POURING CONCRETE
  - E. CONCRETE ENCASUREMENT PRIOR TO BACKFILL
13. NO OTHER UTILITIES TO BE PLACED IN SEWER LATERAL TRENCH.
14. TRACER WIRE SHALL BE INSTALLED ON ALL SEWER LINES. TRACER WIRE SHALL BE AWG 12 GAUGE WITH A SINGLE COPPER CONDUCTOR AND GREEN COLORED SHEATH.

PROGRESS SET 8/4/21


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L.C.E. NO. 56989              EXP. DATE 10/31/21

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ENGINEERING SMART GROWTH™

328 D STREET      918 CUYAMA ROAD  
SALIDA, CO 81201      OJAI, CA 91028  
PH: 719-539-1875      PH: 719-221-1799

**SEAL**

DATE	BY	MARK	REVISIONS

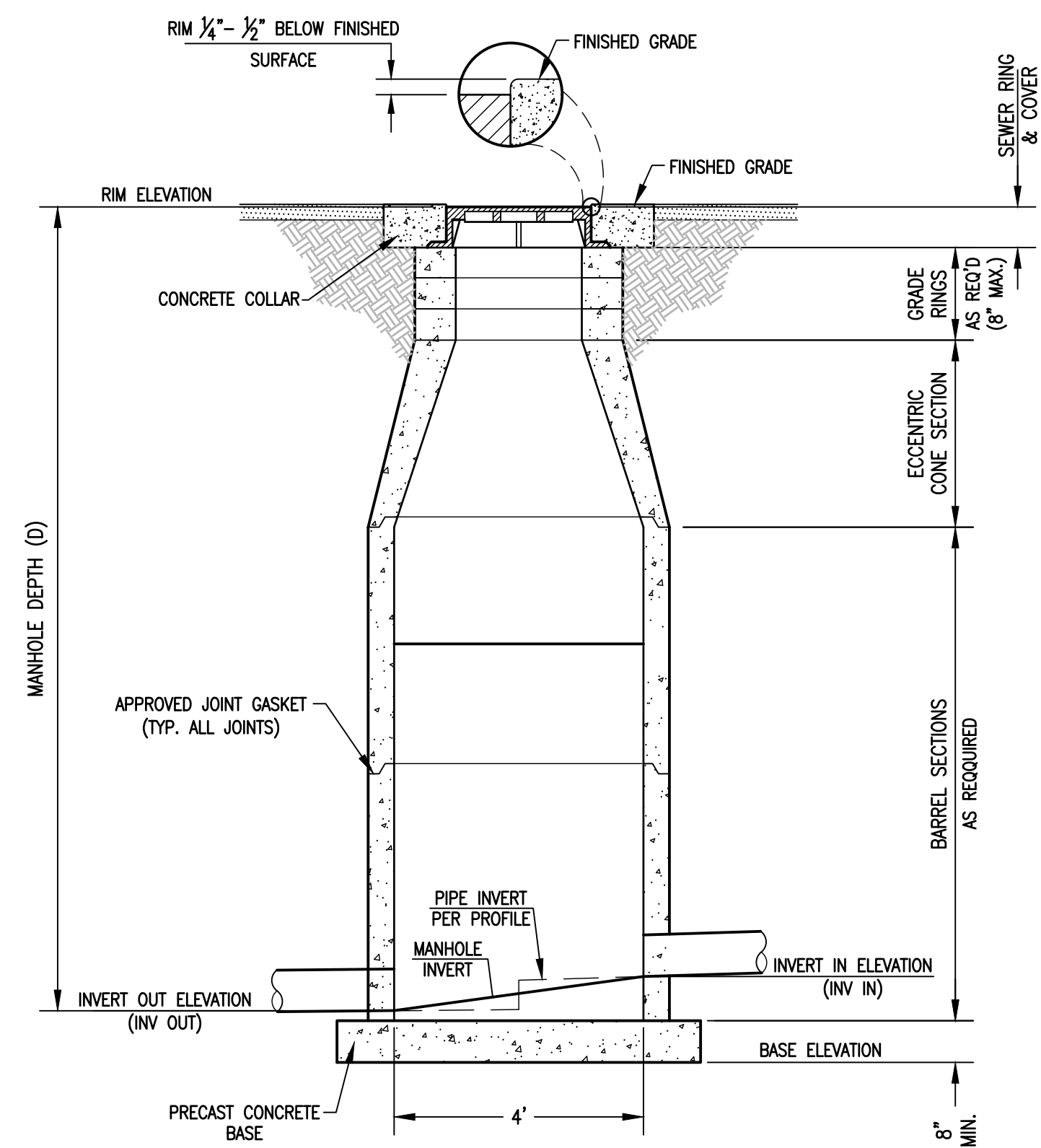
**CITY OF SALIDA**

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DRAWN BY: BH, CA  
CHECKED BY: BH, TV  
SCALE: 1"=30'  
DATE: AUG. 2021

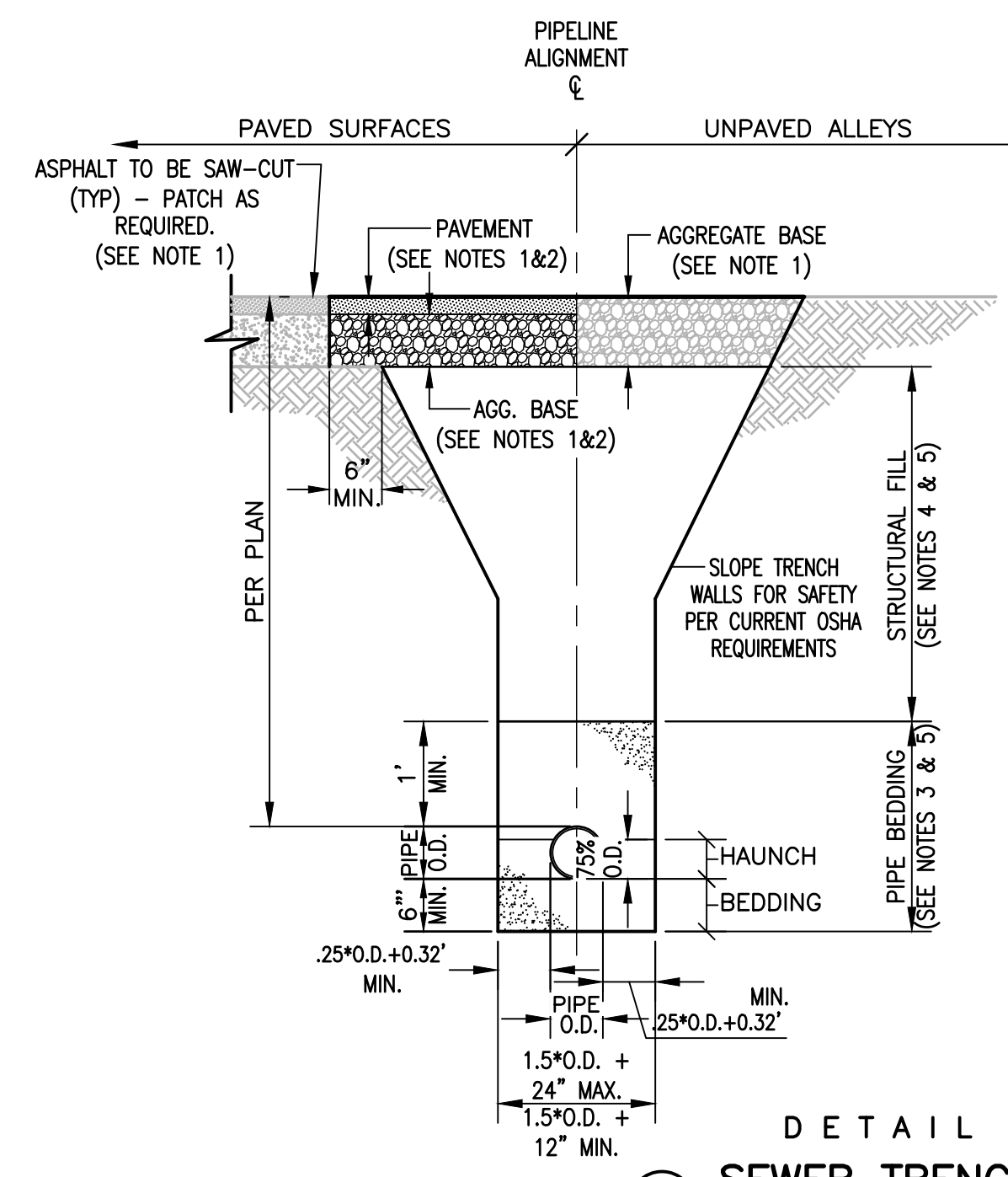
APPROVED BY: \_\_\_\_\_  
AGENCY HEAD: \_\_\_\_\_ DATE: \_\_\_\_\_  
BENCHMARK: SEE PLAN AND PROFILE SHEETS FOR BENCHMARKS, ONE PER BLOCK

**UPCHURCH SUBDIVISION**  
SALIDA, CO  
**SEWER PLANS**  
**SEWER COVER SHEET**  
NOTES AND INDEX MAP

**SHEET NO.**  
**12**  
OF 22 SHEETS.  
**PROJECT NO.**  
20036



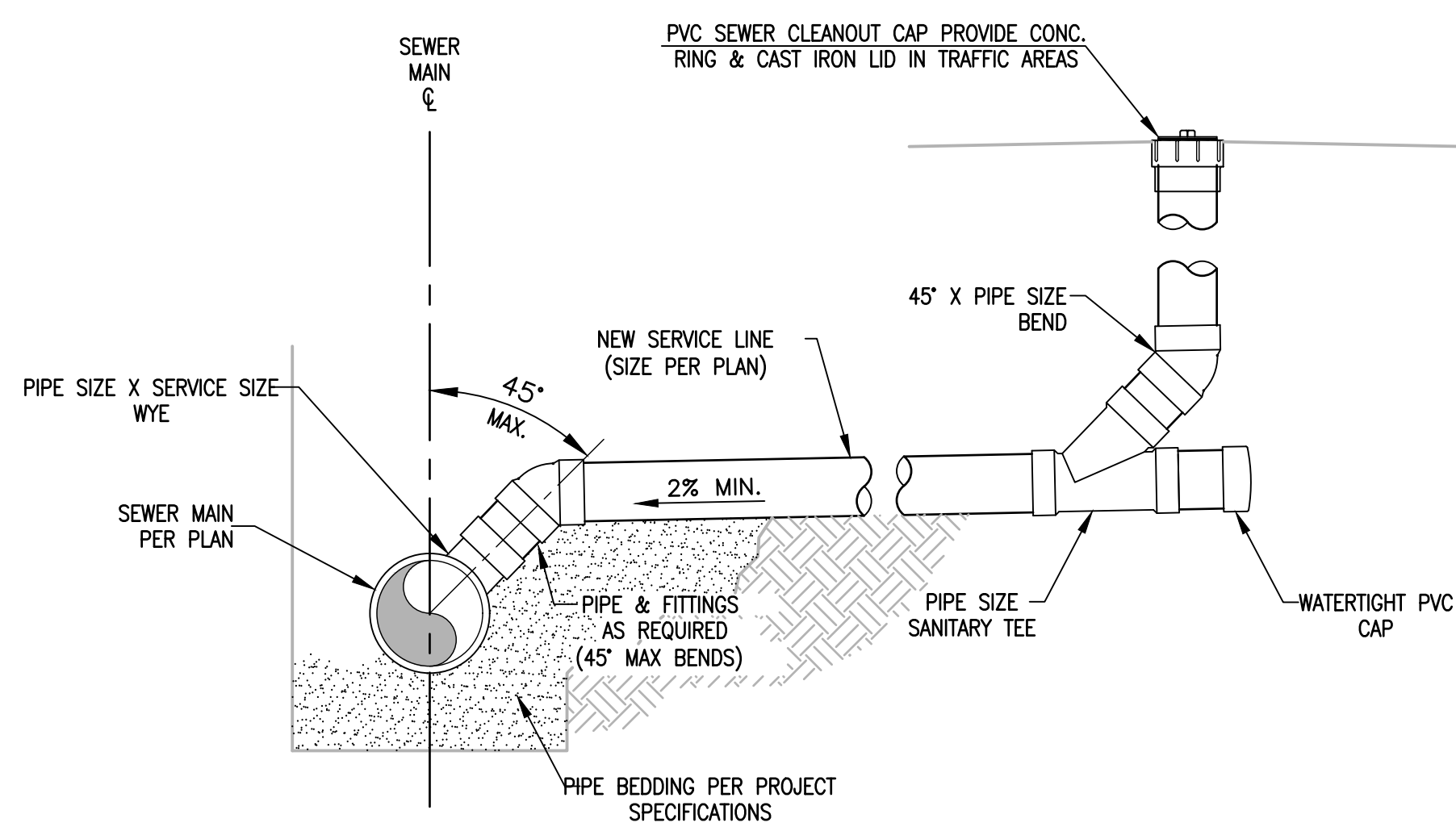
DETAIL  
**51 SEWER MANHOLE**  
 (NO SCALE)



**TRENCH SECTION NOTES**

- STREET AND ALLEY PATCHING SHALL COMPLY WITH THE APPROPRIATE CITY OF SALIDA PATCHING STANDARDS.
- NEW ASPHALT OR ASPHALT OVERLAYS SHALL COMPLY WITH THE PROJECT SPECIFIC STANDARDS PROVIDED IN THE STREET AND/OR ASPHALT PATCHING NOTES.
- PIPE BEDDING SHALL BE 3/4" CLEAN CRUSHED ROCK.
- STRUCTURAL FILL SHALL MEET CDOT CLASS 1 AGGREGATE BASE SPECIFICATIONS.
- FILL AND BEDDING MATERIAL TO BE PLACED IN 8-INCH MAXIMUM LIFTS (COMPACTED DEPTH) TO THE FOLLOWING MINIMUM PERCENTAGES UNLESS NOTED OTHERWISE:
  - A. STREETS, PARKING LOTS & ALLEYS: 95% MODIFIED PROCTOR (ASTM D1557)
  - B. UTILITY EASEMENTS OUTSIDE THE STREET SECTION: 90% MODIFIED PROCTOR (ASTM 1557) MA
  - C. UNDEVELOPED LAND: 80% MODIFIED PROCTOR (ASTM 1557).
- EXCAVATED MATERIAL CONTAINING RUBBISH, FROZEN MATERIAL, ORGANIC DEBRIS, ASPHALT, CONCRETE OR OTHER DELETERIOUS MATERIALS NOT SUITABLE FOR STRUCTURAL FILL SHALL BECOME THE PROPERTY OF THE CONTRACTOR. THE CONTRACTOR SHALL REMOVE AND DISPOSE OF MATERIAL IN A FASHION THAT COMPLIES WITH ALL LOCAL, STATE, AND FEDERAL REGULATIONS. THE OWNER MAY REQUIRE DOCUMENTATION OF PROPER DISPOSAL AS A CONDITION OF FINAL PAYMENT.
- SEE WATER AND/OR SEWER GENERAL NOTES FOR PIPE SPECIFICATIONS.
- INSTALL INSULATED GAUGE 12 TRACER WIRE, TAPED TO THE TOP OF PIPE, (FOR SEWER SERVICE LINES) AND BROUGHT TO THE TOP OF EACH CLEANOUT.

DETAIL  
**53 SEWER TRENCH**  
 (NO SCALE)



DETAIL  
**54 SEWER SERVICE TAP**  
 (NO SCALE)

PROGRESS SET 8/4/21

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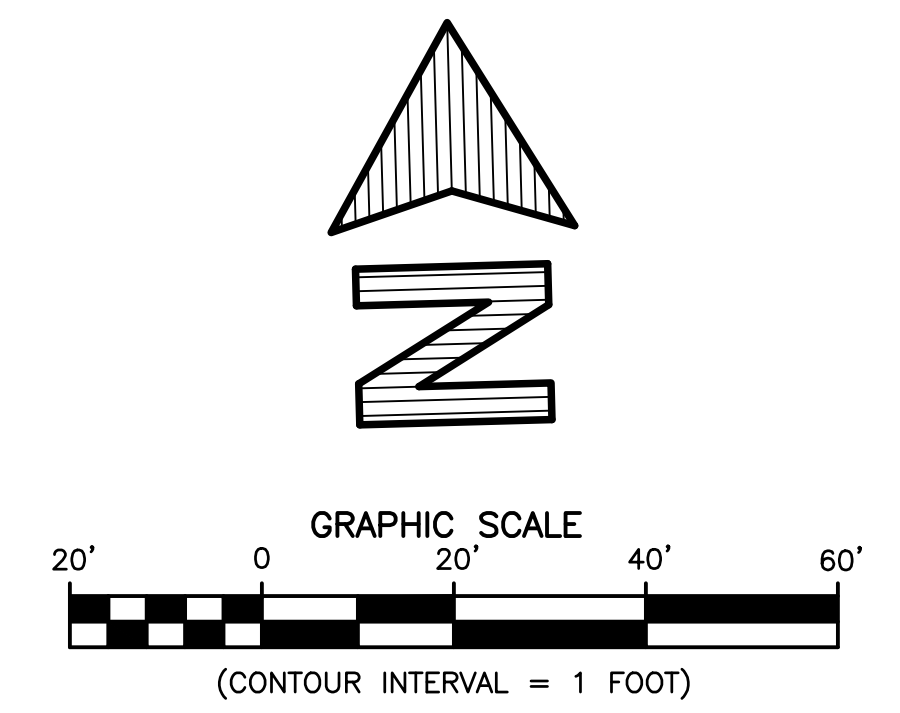
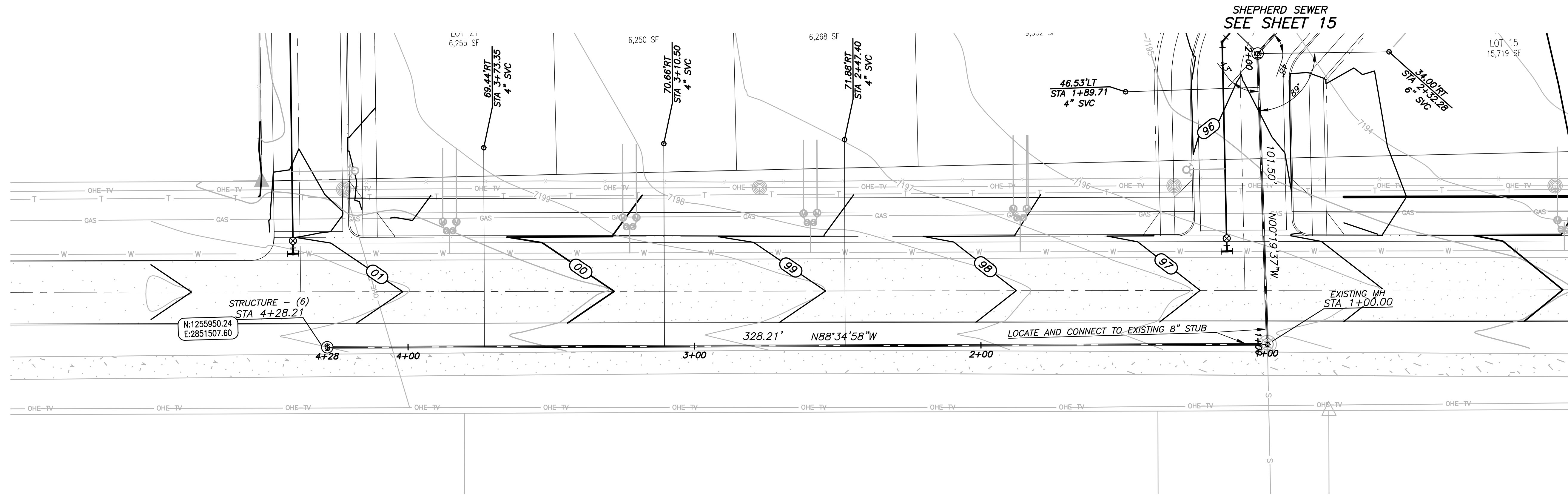
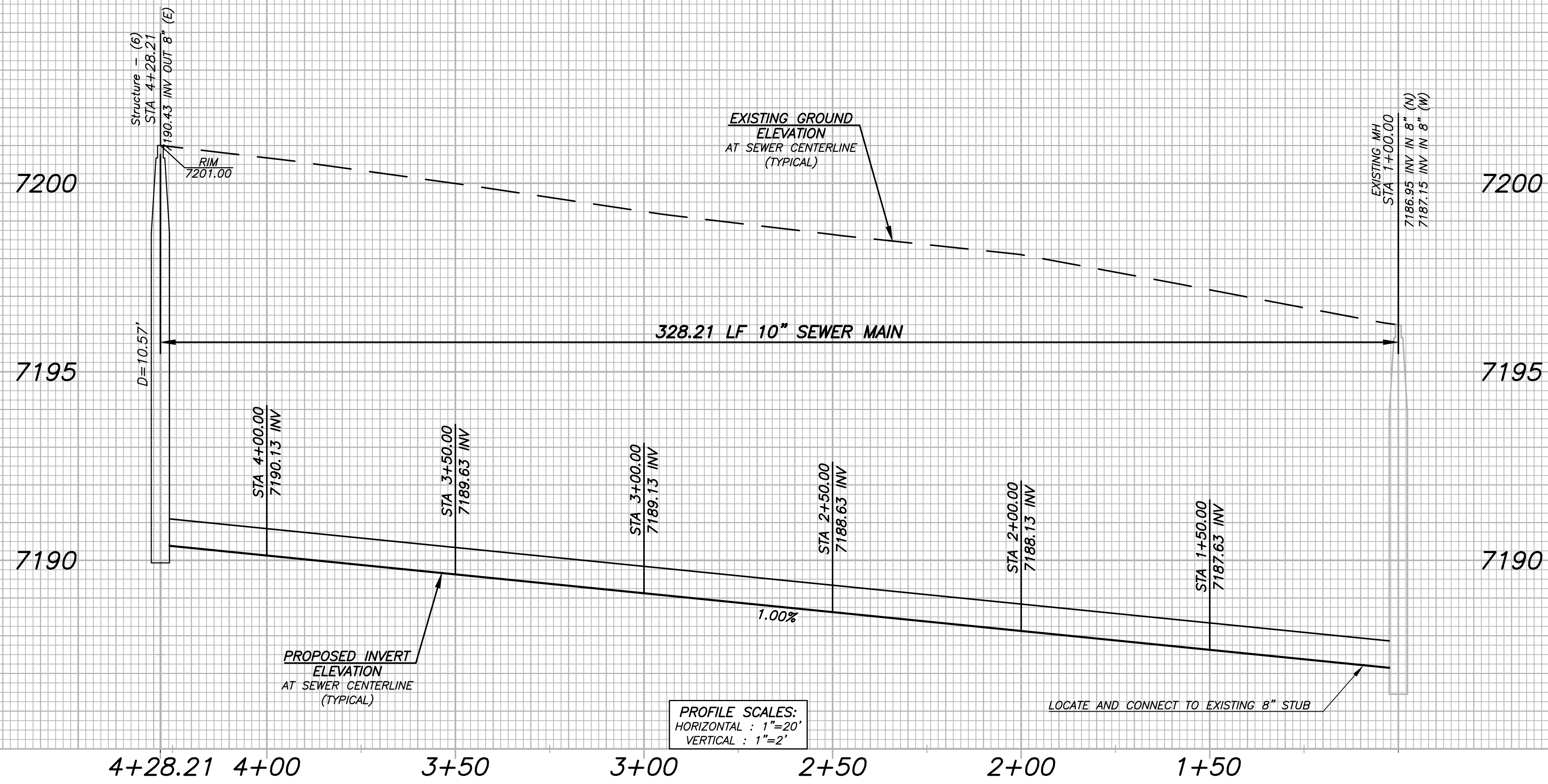
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**UPCHURCH SUBDIVISION**  
 SALIDA, CO

**SEWER PLANS**

**SEWER DETAILS**  
 NOTES AND DETAILS

**SHEET NO.**  
 13  
**OF 22 SHTS.**  
**PROJECT NO.**  
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**CONSTRUCTION NOTES:**

**CR140 SEWER**  
STA 1+00.00 TO STA 4+28.21

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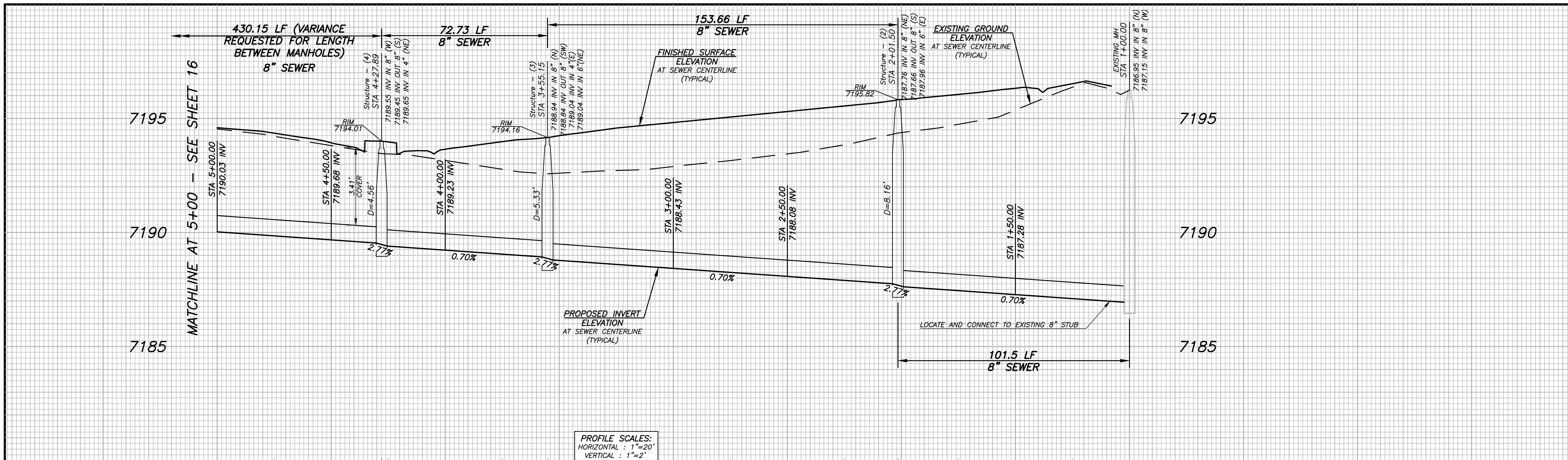
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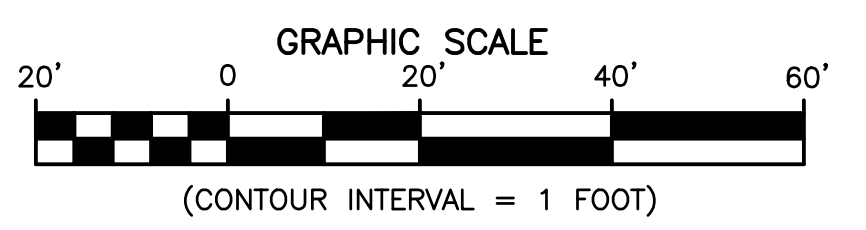
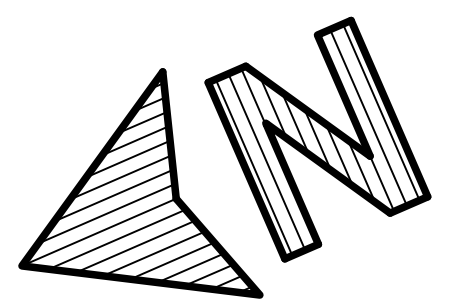
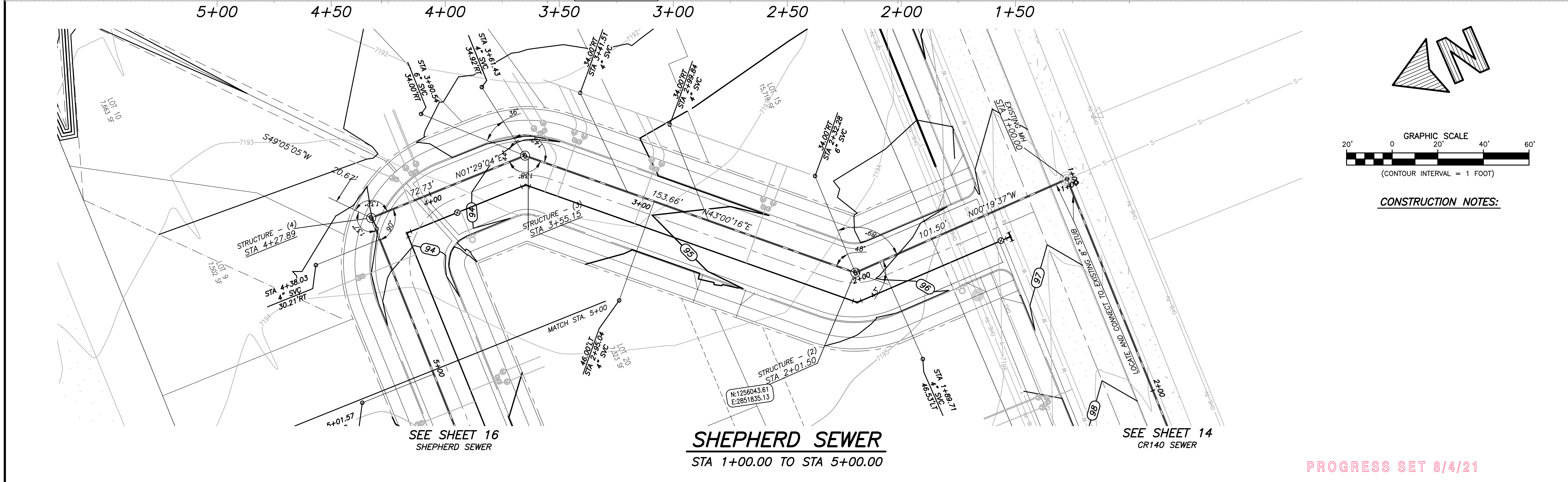
**SHEET NO.**  
14

**OF 22 SHEETS.**

**PROJECT NO.**  
20036



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PREPARED FOR:  
**TORY UPCHURCH**  
 2112 ANN ARBOR AVE  
 AUSTIN, TX 78704  
 PHONE: 512-826-6152

PREPARED UNDER THE DIRECTION OF: \_\_\_\_\_ DATE \_\_\_\_\_

WILLIAM BERNARD HUSSEY CRABTREE GROUP, INC  
 L.C.E. NO. 56989 EXP. DATE 10/31/21

PREPARED BY:  
  
**CRABTREE GROUP INC.**  
 ENGINEERING SMART GROWTH™

328 D STREET SALIDA, CO 81201 PH: 719-539-1875  
 918 CUYAMA ROAD OJAI, CA 93029 PH: 719-221-1799

SEAL

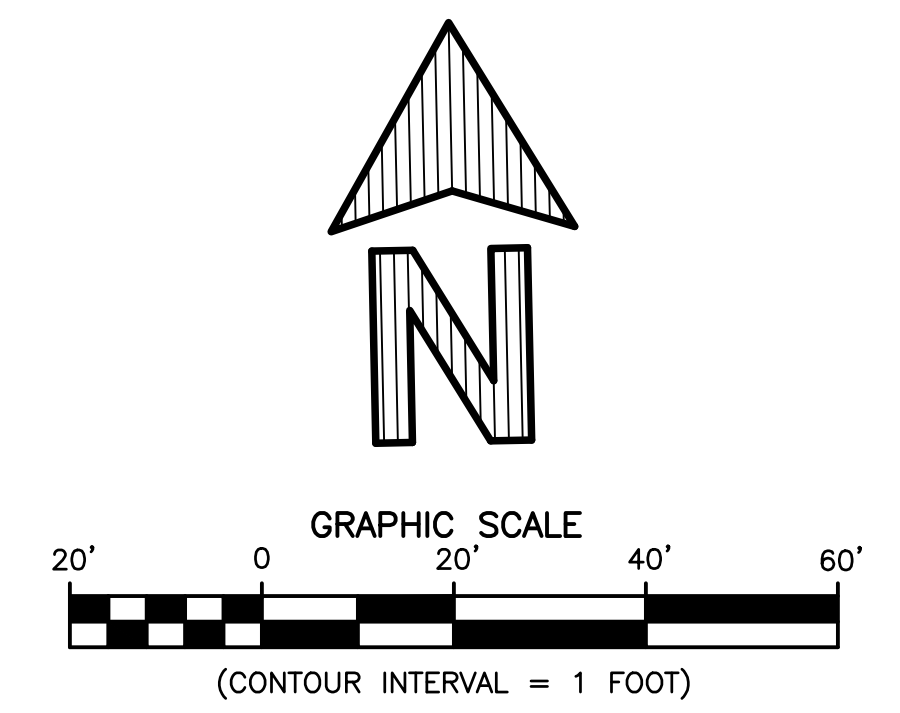
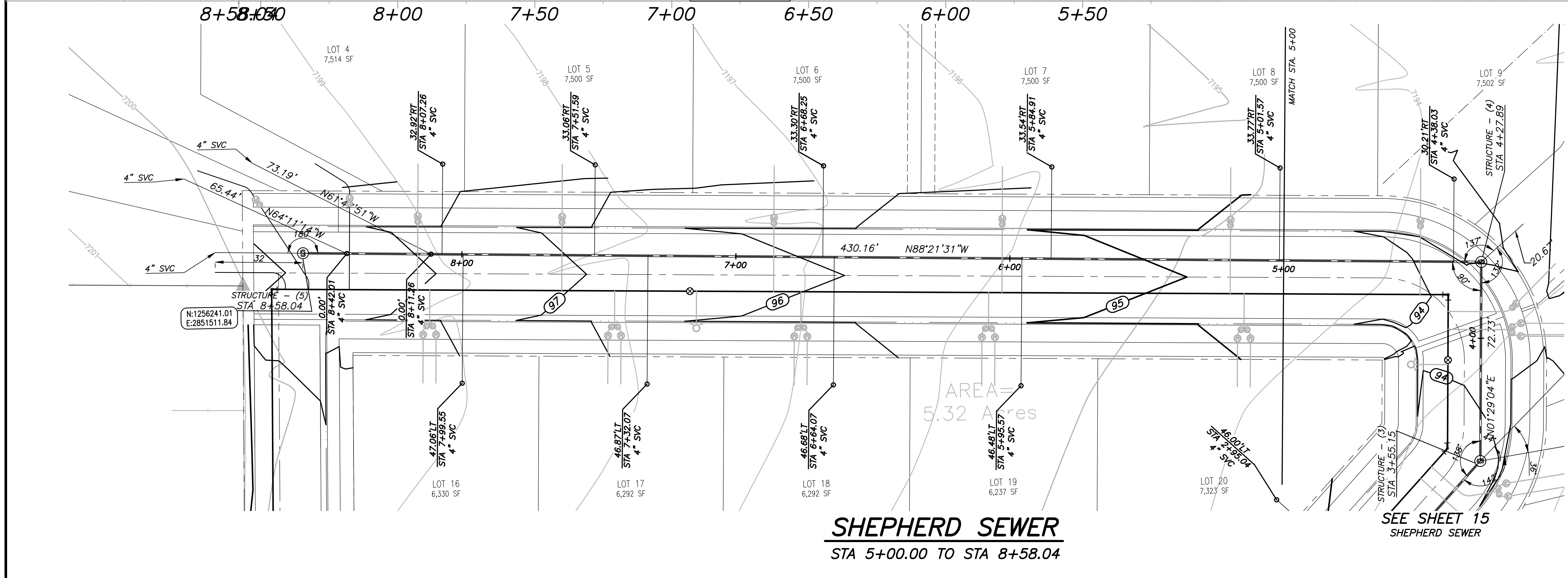
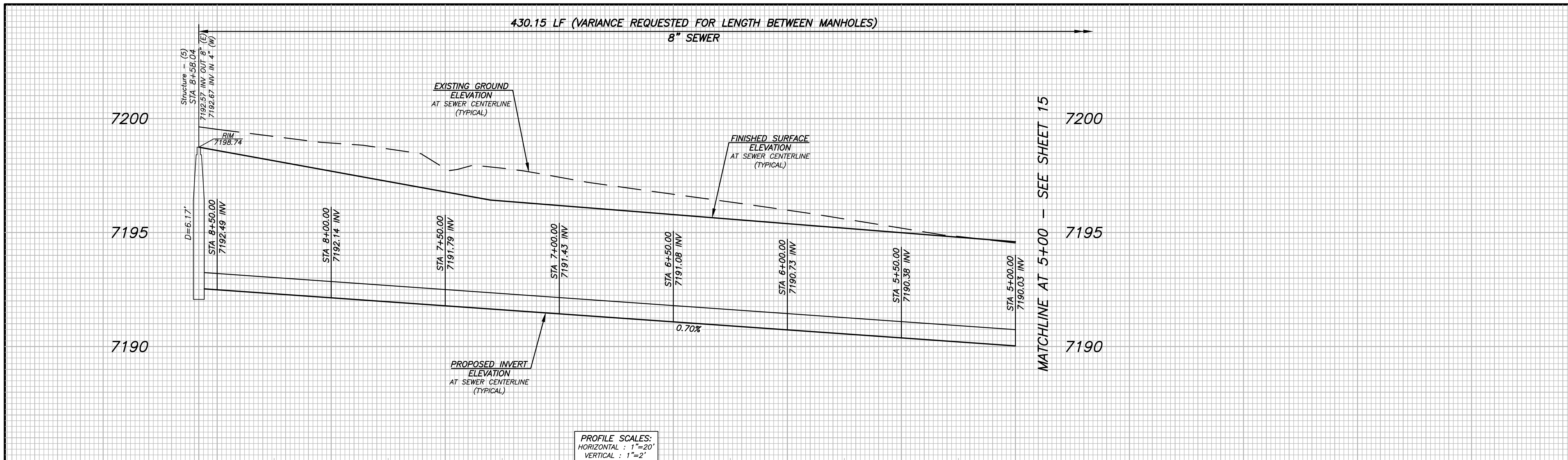
DATE	BY	MARK	ENGINEER

CITY OF SALIDA	
DESIGNED BY <b>WBH</b>	APPROVED BY: _____
DRAWN BY <b>BH, CA</b>	
CHECKED BY <b>BH, TV</b>	AGENCY HEAD _____ DATE _____
SCALE <b>1"=20'</b>	BENCHMARK: SEE PLAN AND PROFILE SHEETS FOR BENCHMARKS, ONE PER BLOCK
DATE <b>AUG. 2021</b>	

**UPCHURCH SUBDIVISION**  
 SALIDA, CO  
**SEWER PLAN AND PROFILE**  
**SHEPHERD SEWER**  
 STA 1+00.00 TO STA 5+00.00

SHEET NO. **15**  
 OF **22** SHTS.  
 PROJECT NO. **20036**

PROGRESS SET 8/4/21



**CONSTRUCTION NOTES:**

**SHEPHERD SEWER**  
STA 5+00.00 TO STA 8+58.04

PROGRESS SET 8/4/21

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CRABTREE GROUP, INC.  
EXP. DATE 10/31/21

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**SEAL**

DATE	BY	MARK	REVISIONS

**CITY OF SALIDA**

DESIGNED BY: WBH  
DRAWN BY: BH, CA  
CHECKED BY: BH, TV  
SCALE: 1"=20'  
DATE: AUG. 2021

APPROVED BY: \_\_\_\_\_  
AGENCY HEAD: \_\_\_\_\_ DATE: \_\_\_\_\_  
BENCHMARK: SEE PLAN AND PROFILE SHEETS FOR BENCHMARKS, ONE PER BLOCK

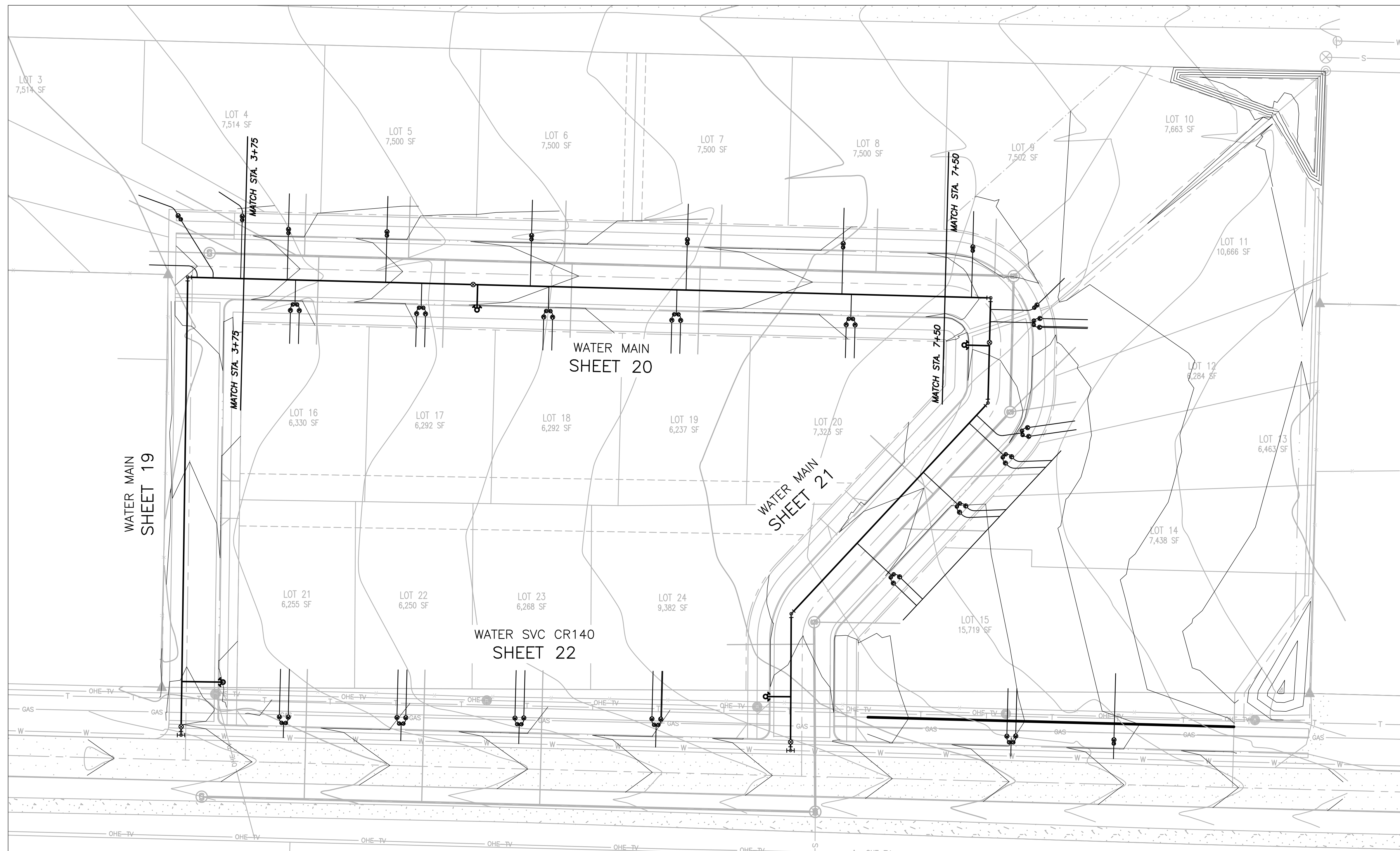
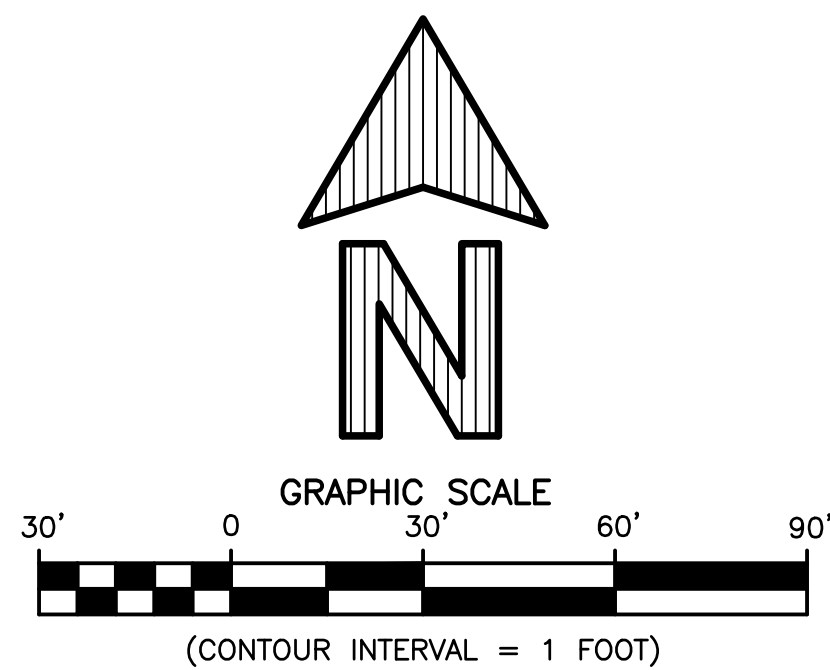
**UPCHURCH SUBDIVISION**  
SALIDA, CO

**SEWER PLAN AND PROFILE**  
**SHEPHERD SEWER**  
STA 5+00.00 TO STA 8+58.04

**SHEET NO.**  
16  
OF 22 SHEETS  
**PROJECT NO.**  
20036

# UPCHURCH SUBDIVISION WATER PLANS

SALIDA, CO  
AUGUST, 2021



## INDEX MAP

SCALE: 1"=30' AT 24X36"

### WATER NOTES:

- THE FOLLOWING SUBMITTALS ARE REQUIRED AND MUST BE RECEIVED AND APPROVED BY THE PROJECT ENGINEER PRIOR TO COMMENCEMENT OF THE WORK:
  - MANUFACTURER'S DOCUMENTATION FOR ALL FITTINGS, VALVES, FIRE HYDRANTS, PIPE MATERIAL AND OTHER APPURTENANCES.
  - GRADATION AND PROCTORS FOR BEDDING AND STRUCTURAL FILL MATERIAL.
- WATER MAIN SIZE AND TYPE SHALL BE AS SHOWN ON THE PLAN AND COMPLY WITH THE FOLLOWING STANDARD SPECIFICATIONS:
  - DUCTILE IRON PIPE (DIP) AWWA C151 AND C104 PRESSURE CLASS 350
  - POLYVINYL CHLORIDE (PVC) AWWA C900 DR18
- WATER SERVICE LINES SHALL BE DR9 CROSSLINKED HIGH DENSITY POLYETHYLENE (PEX) CONFORMING WITH AWWA C904, OR APPROVED EQUAL.
- DUCTILE IRON PIPE SHALL HAVE A CEMENT MORTAR LINING CONFORMING WITH AWWA C104.
- ALL FITTINGS SHALL BE DUCTILE IRON CONFORMING TO AWWA C110 AND C111, OR AWWA C153, AND SHALL BE CEMENT MORTAR LINED CONFORMING TO AWWA C104.
- VALVES SHALL BE RESILIENT SEATED GATE WITH CAST OR DUCTILE IRON BODIES, MANUFACTURED IN ACCORDANCE WITH AWWA C509. ALL VALVES SHALL BE EPOXY COATED INTERNALLY AND EXTERNALLY.
- ALL MATERIALS STORED ON-SITE SHALL BE PROTECTED FROM CONTAMINATION AND STORED PER THE MANUFACTURER'S RECOMMENDATIONS.
- ALL WATER MAINS SHALL BE CONSTRUCTED WITH A MINIMUM COVER OF 4.5 FEET BELOW FINISHED GRADE. IF MAINTAINING MINIMUM COVER IS IMPRACTICAL; THE PROJECT ENGINEER, AT THEIR SOLE DISCRETION, MAY ALLOW REDUCED COVER WITH POLYSTYRENE INSULATION PLACED OVER THE WATER MAIN.
- STRUCTURAL FILL, AS SHOWN IN THE TYPICAL TRENCH SECTION, SHALL MEET CDOT CLASS 1 SPECIFICATIONS.
- PIPE BEDDING, AS DEFINED IN THE TYPICAL TRENCH SECTION, SHALL MEET CDOT CLASS 6 SPECIFICATIONS.
- FIRE HYDRANTS SHALL BE WATEROUS PACER W-67 WITH STORZ ADAPTER, SET TO FACE THE STREET AND/OR FIRE ACCESS. FIRE HYDRANT SUPPLY LINES SHALL BE A MINIMUM OF 6" DIAMETER.
- CORPORATION STOPS SHALL BE FORD AWWA/CC TAPER THREAD WITH PACK JOINT ADAPTERS, SIZED PER PLAN, AND TAPPED UTILIZING THE FOLLOWING METHODS:
  - DUCTILE IRON PIPE - DIRECT TAP INTO THE MAIN.
  - PVC PIPE - TAPPING SADDLES WITH AWWA/CC TAPER THREAD TO MATCH CORPORATION STOP.
- CURB STOPS SHALL BE FORD BALL VALVES WITH PACK JOINT ADAPTERS, SIZED PER PLAN.
- CURB BOXES SHALL BE TYLER DOMESTIC HD OR APPROVED EQUAL.
- VALVE BOXES LOCATED IN AREAS SUBJECT TO VEHICULAR TRAFFIC SHALL BE H-20 RATED AND BE SURROUNDED BY A CONCRETE COLLAR.
- TEMPORARY SERVICES SHALL BE PROVIDED WHENEVER SERVICE OUTAGES EXCEED 4 HOURS. ALL MATERIALS AND LABOR REQUIRED TO PROVIDE TEMPORARY SERVICE SHALL BE CONSIDERED INCIDENTAL TO THE WORK AND SHALL NOT BE PAID FOR SEPARATELY.
- NEW METER PITS SHALL BE "THERMA-COIL" (OR APPROVED EQUAL) PLACED WITH 5 FEET OF COVER UNLESS NOTED OTHERWISE.
- METER PITS LOCATED IN AREAS SUBJECT TO VEHICULAR TRAFFIC SHALL HAVE AN H-20 RATED LID.
- PIPE DEFLECTIONS SHALL NOT EXCEED ONE-HALF OF THE PIPE MANUFACTURER'S RECOMMENDED MAXIMUM DEFLECTION.
- ALL WATER MAINS SHALL BE PRESSURE TESTED AND DISINFECTED IN ACCORDANCE WITH THE MOST RECENT CONSTRUCTION STANDARDS AND SPECIFICATIONS OF THE UTILITY OWNER. PRESSURE TESTS MUST BE OBSERVED BY THE PROJECT ENGINEER, OR WATER SYSTEM OWNER STAFF.
- NO CONNECTION TO EXISTING WATER MAINS PRIOR TO DISINFECTION OF THE NEW MAINS AND WRITTEN APPROVAL OF THE WATER SYSTEM OWNER.
- WATER LINES SHALL HAVE A MINIMUM CLEARANCE FROM SEWER LINES OF 10 FEET IN THE HORIZONTAL DIRECTION AND 1.5 FEET VERTICALLY. IF MINIMUM CLEARANCES ARE IMPRACTICAL; THE PROJECT ENGINEER, AT THEIR SOLE DISCRETION, MAY ALLOW FOR REDUCED CLEARANCES WITH CONCRETE ENCASEMENT.
- CONTRACTOR SHALL PROVIDE WATER USERS A MINIMUM OF 48 HOURS NOTICE PRIOR TO ANY DISRUPTION OF SERVICE.
- TRACER WIRE SHALL BE INSTALLED ON ALL NON-METALLIC WATER MAINS. TRACER WIRE SHALL BE AWG 12 GAUGE WITH A SINGLE COPPER CONDUCTOR AND BLUE COLORED SHEATH.
- SERVICE CONNECTIONS SHALL BE COMPLETED FOLLOWING THE PIPE MANUFACTURER'S RECOMMENDATIONS.
- ALL BENDS, TEES, FIRE HYDRANTS AND PLUGS SHALL BE PROTECTED FROM THRUST WITH MECHANICAL RESTRAINTS AND CONCRETE THRUST BLOCKS.
- ALL PIPE JOINTS WITHIN ONE PIPE LENGTH OF BENDS, TEES, PLUGS, ETC. SHALL HAVE MECHANICAL JOINT RESTRAINTS.
- ALL VALVES AND METER PITS ARE TO BE INSTALLED WITHIN THE PUBLIC RIGHT-OF-WAY AND PERPENDICULAR TO THE STREET CENTERLINE.
- METER PITS AND VAULTS MUST BE SET FLUSH WITH THE FINAL GRADE OF THE LANDSCAPE AND/OR STREET.
- THE FOLLOWING ARE CONSIDERED MANDATORY INSPECTION POINTS FOR WATER MAIN CONSTRUCTION:
  - TRENCH CONSTRUCTION PRIOR TO LAYING PIPE
  - PIPE BEDDING PRIOR TO COVERING PIPE
  - LEAK TESTING OF SERVICE CONNECTIONS
  - PRESSURE TESTING OF PIPE
  - LEAK TESTING OF SERVICE CONNECTIONS
  - LOCATE CONDUCTIVITY TEST (PVC MAINS ONLY)
  - COMPACTION OF STRUCTURAL FILL
  - DISINFECTION

PROGRESS SET 8/4/21

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328 D STREET      918 CUYAMA ROAD  
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PH: 719-539-1875      PH: 719-221-1799

**SEAL**

DATE	BY	MARK	REVISIONS	APPR.	DATE	REVISION AGENCY

**CITY OF SALIDA**

DESIGNED BY WBH      APPROVED BY: \_\_\_\_\_

DRAWN BY BH, CA

CHECKED BY BH, TV      AGENCY HEAD      DATE

SCALE 1"=30'

DATE AUG. 2021

BENCHMARK: SEE PLAN AND PROFILE SHEETS FOR BENCHMARKS, ONE PER BLOCK

**UPCHURCH SUBDIVISION**  
SALIDA, CO

**WATER PLANS**

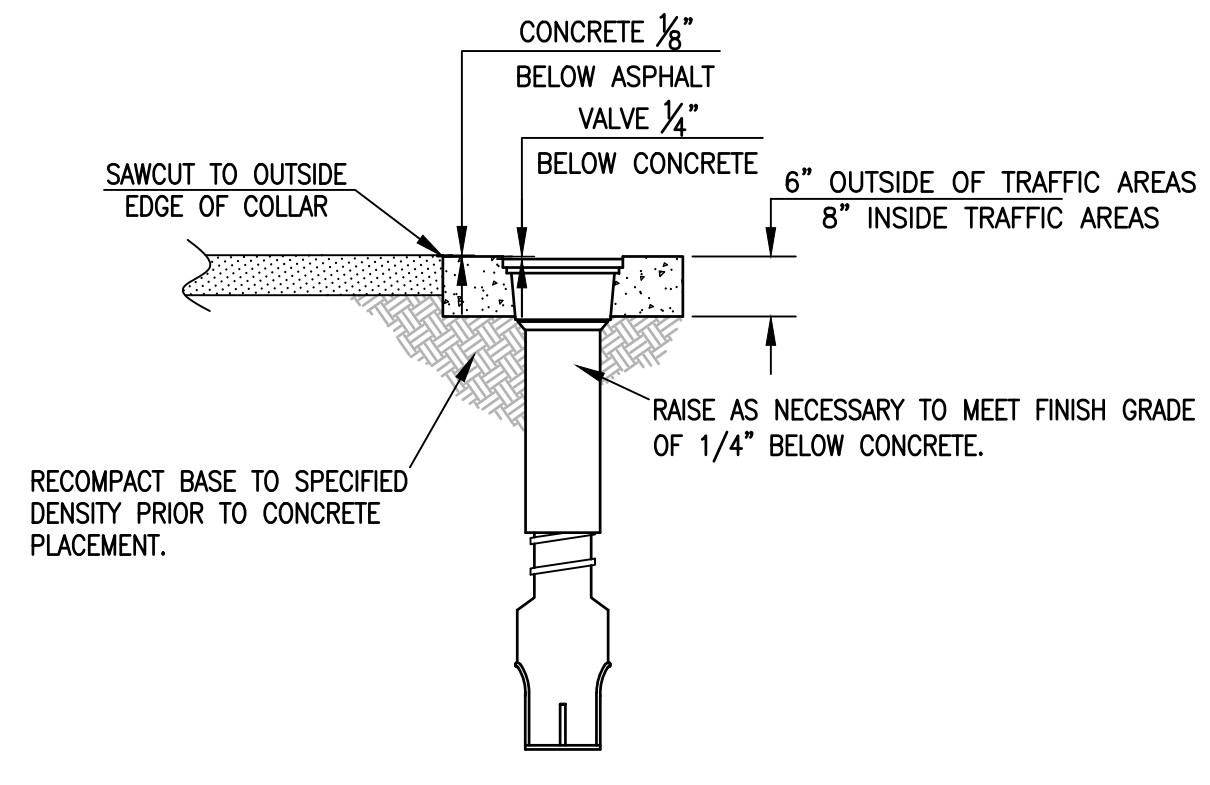
**WATER COVER SHEET**  
NOTES AND INDEX MAP

**SHEET NO.**  
17

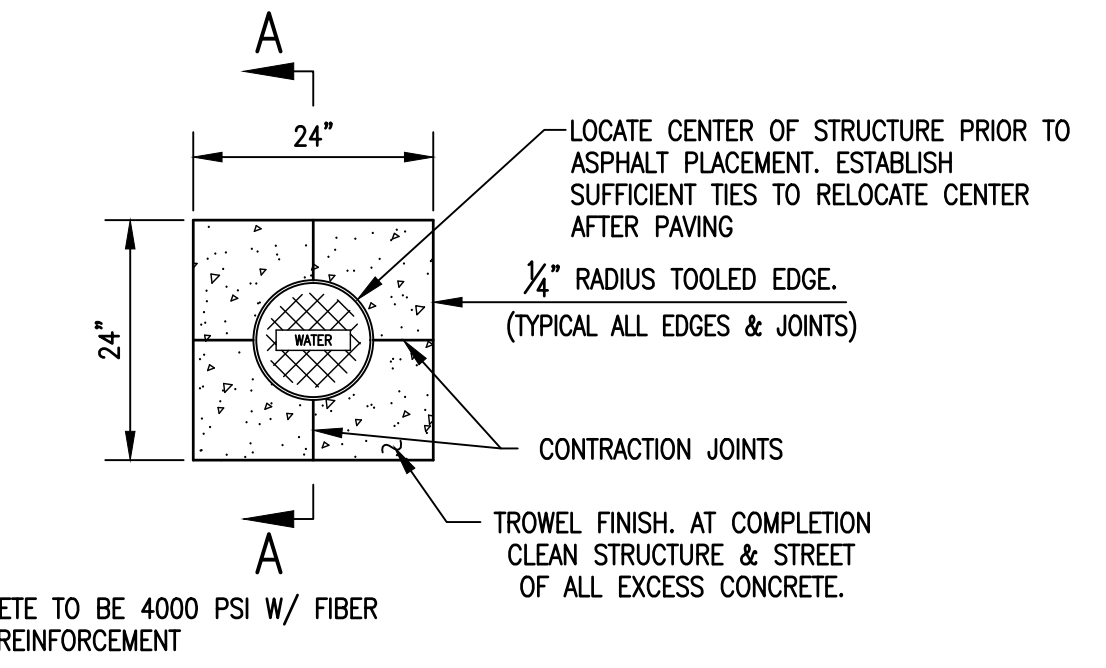
OF 22 SHEETS

**PROJECT NO.**  
20036

UPCHURCH SUBDIVISION - WATER PLANS

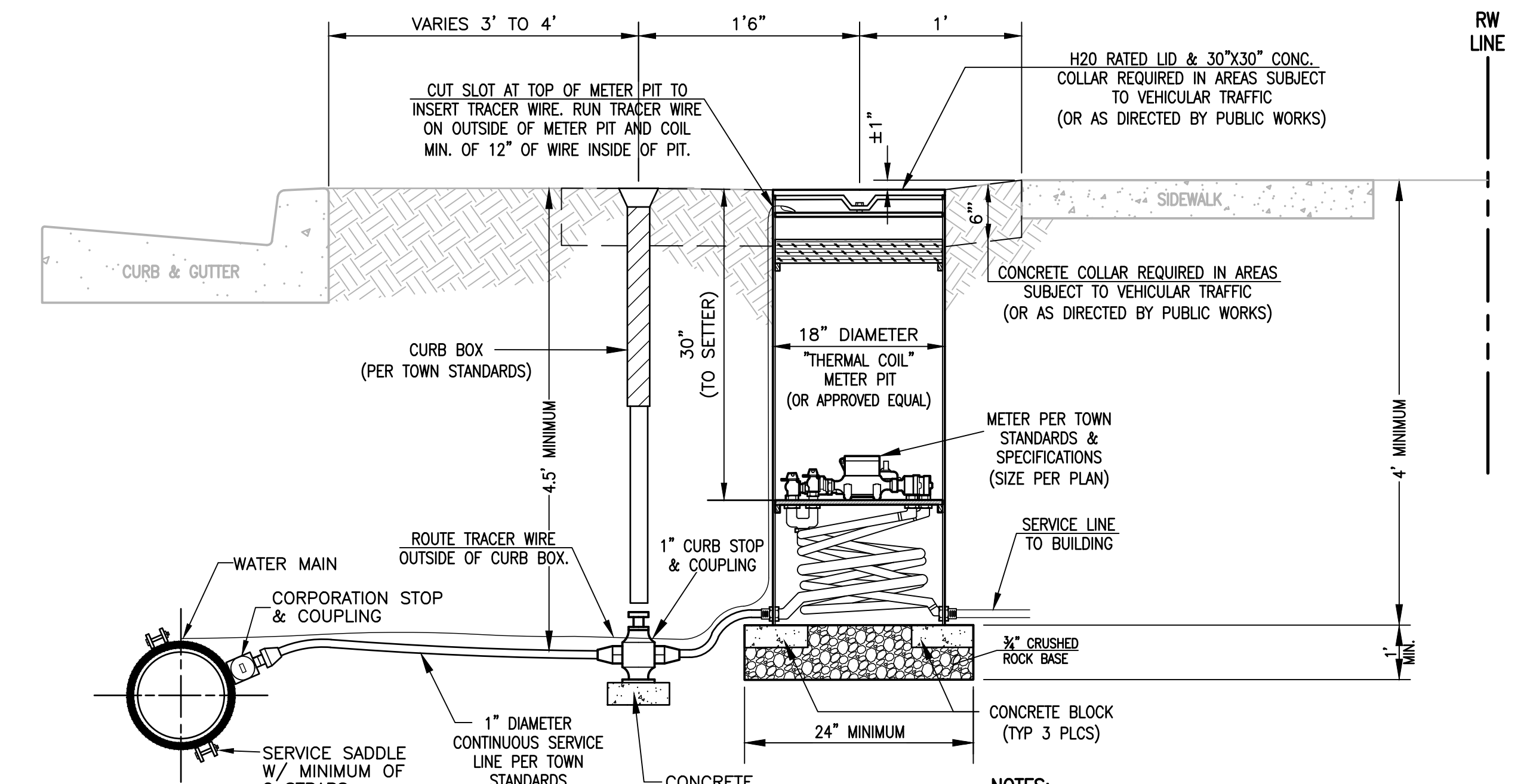


SECTION A-A



PLAN VIEW

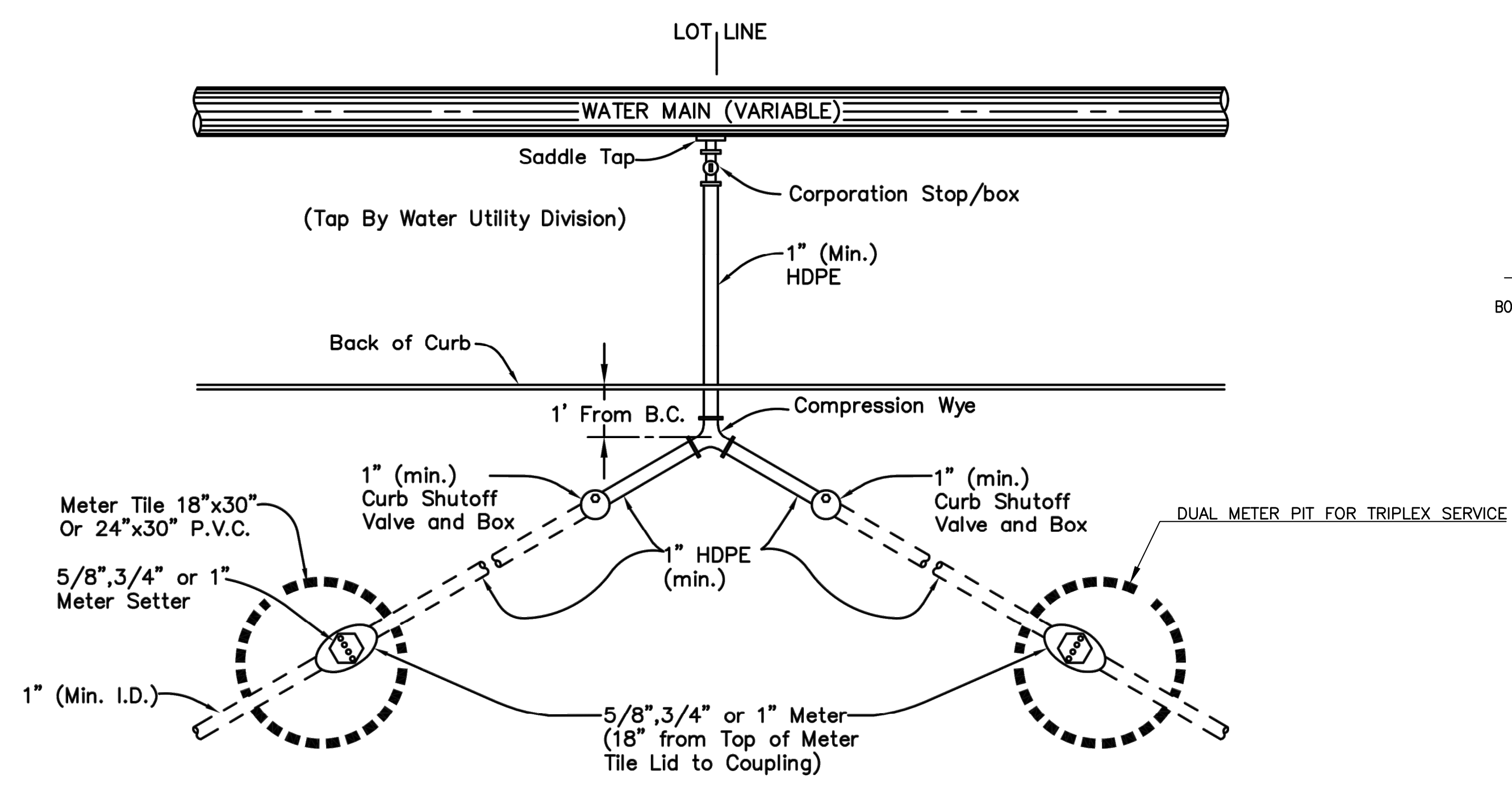
65/77 WATER VALVE CONCRETE COLLAR (NO SCALE)



DETAIL

70A SINGLE WATER SERVICE TAP ASSEMBLY (NO SCALE)

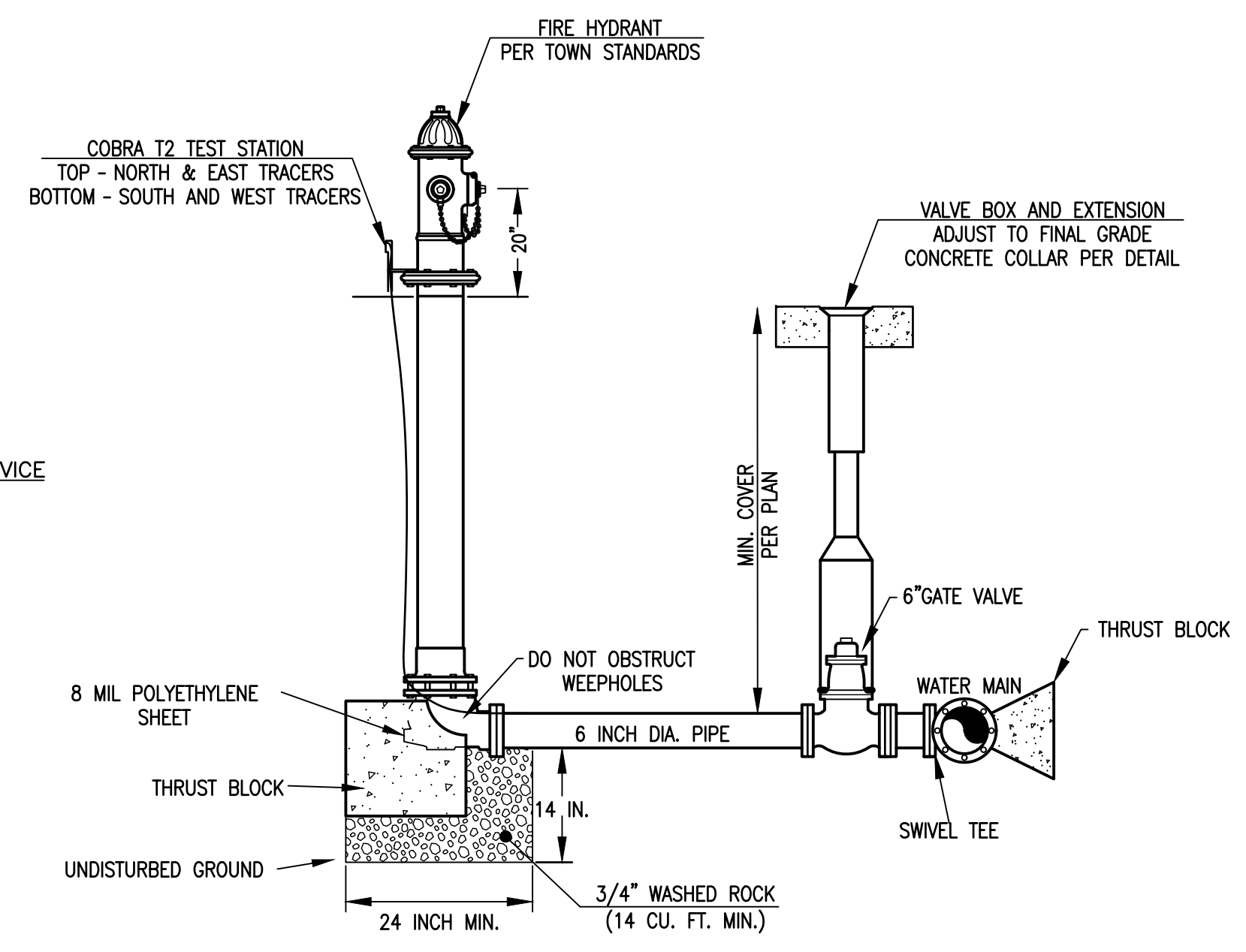
- NOTES:  
1. 3/4" TAP SHALL HAVE REDUCER ON CORP STOP, 1-INCH HDPE DR9 CTS PIPE TO 3/4"x1" MIP TO COMPRESSION FITTING ON METER PIT.  
2. CURB STOP SHALL HAVE 1-INCH BODY.



NOTE: CONTRACTOR SHALL INSTALL 3' RADIUS (OR PIPE MANUFACTURER'S MINIMUM RECOMMENDED, WHICHEVER IS GREATER) BETWEEN CURB BOX AND METER PIT, AND RUN SERVICES PERPENDICULAR TO THE FRONT LOT LINE ACROSS THE FRONT LOT PUBLIC UTILITY EASEMENT TO TERMINATION POINTS SHOWN ON PLANS.

DETAIL

71 MID LOT DUPLEX WATER SERVICE TAP ASSEMBLY (NO SCALE)



DETAIL

79 FIRE HYDRANT ASSEMBLY (NO SCALE)

PROGRESS SET 8/4/21

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SEAL

DATE	BY	MARK	ENGINEER

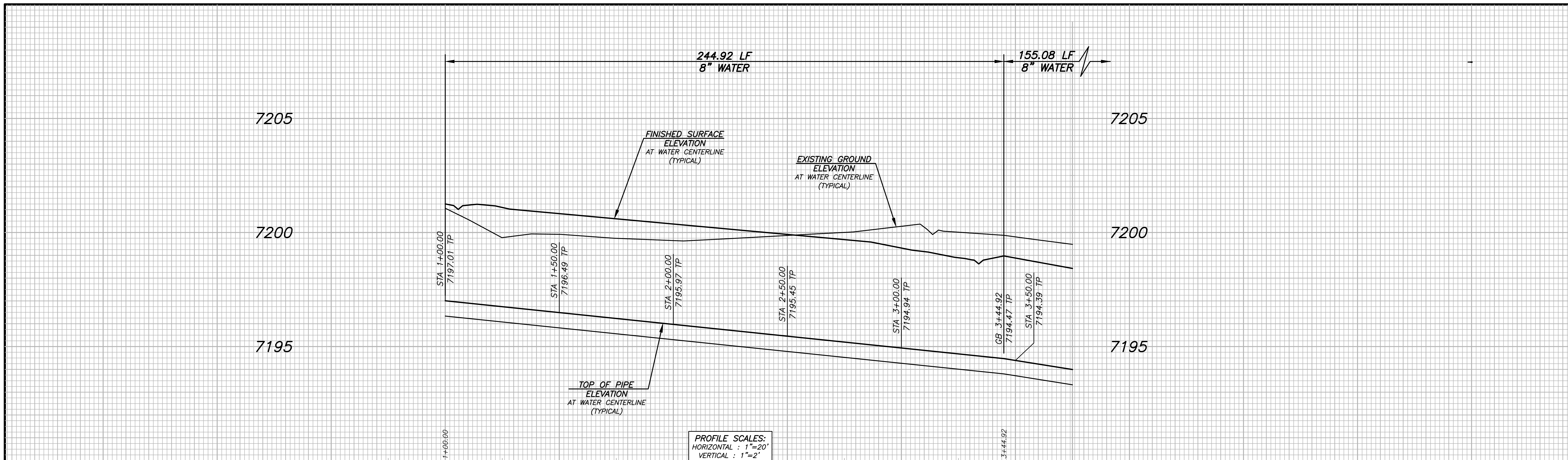
REVISIONS

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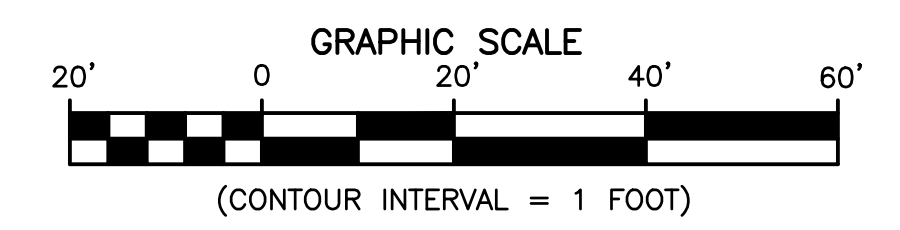
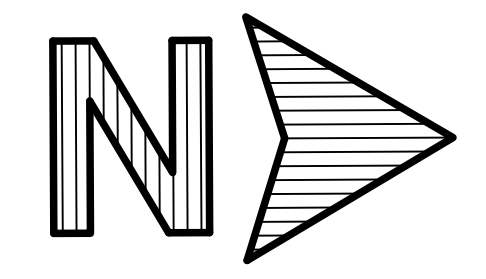
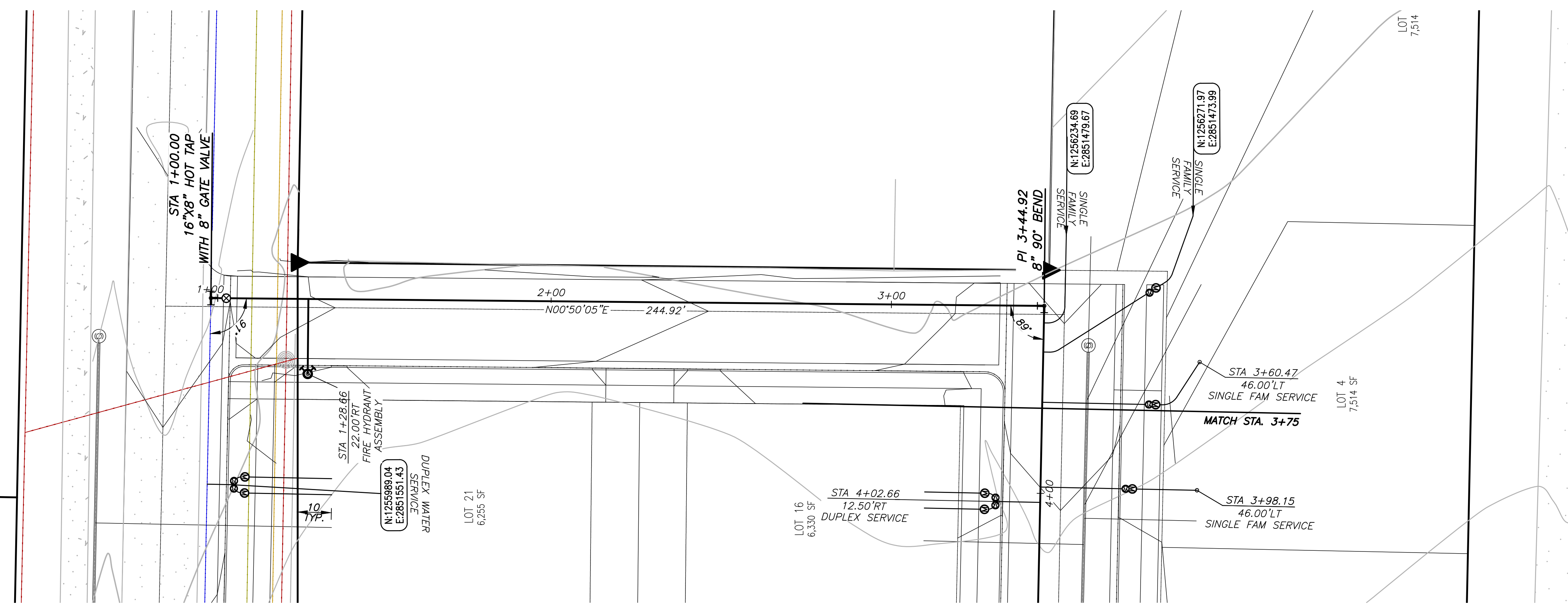
UPCHURCH SUBDIVISION  
SALIDA, CO  
WATER PLANS  
WATER DETAILS  
NOTES AND DETAILS

SHEET NO.  
**18**  
OF 22 SHTS.  
PROJECT NO.  
20036



0+50 1+00 1+50 2+00 2+50 3+00 3+50 3+75

PROFILE SCALES:  
HORIZONTAL : 1"=20'  
VERTICAL : 1"=2'



CONSTRUCTION NOTES:

SEE SHEET 22  
22 - WATER SVC CR140

**WATER MAIN**  
STA 1+00.00 TO STA 3+75.00

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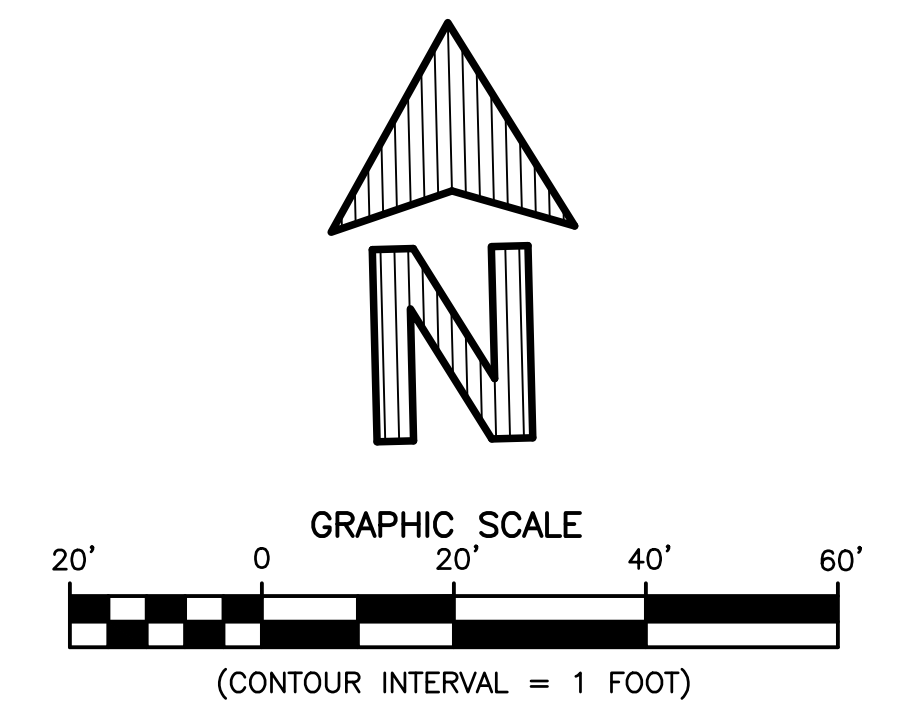
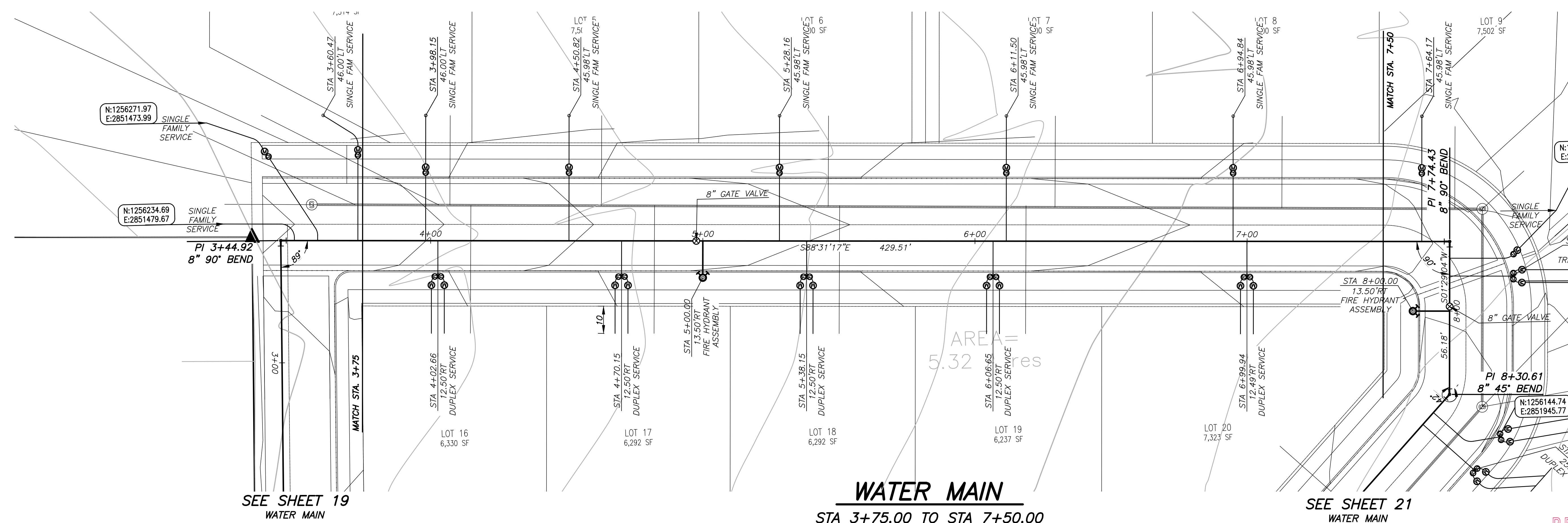
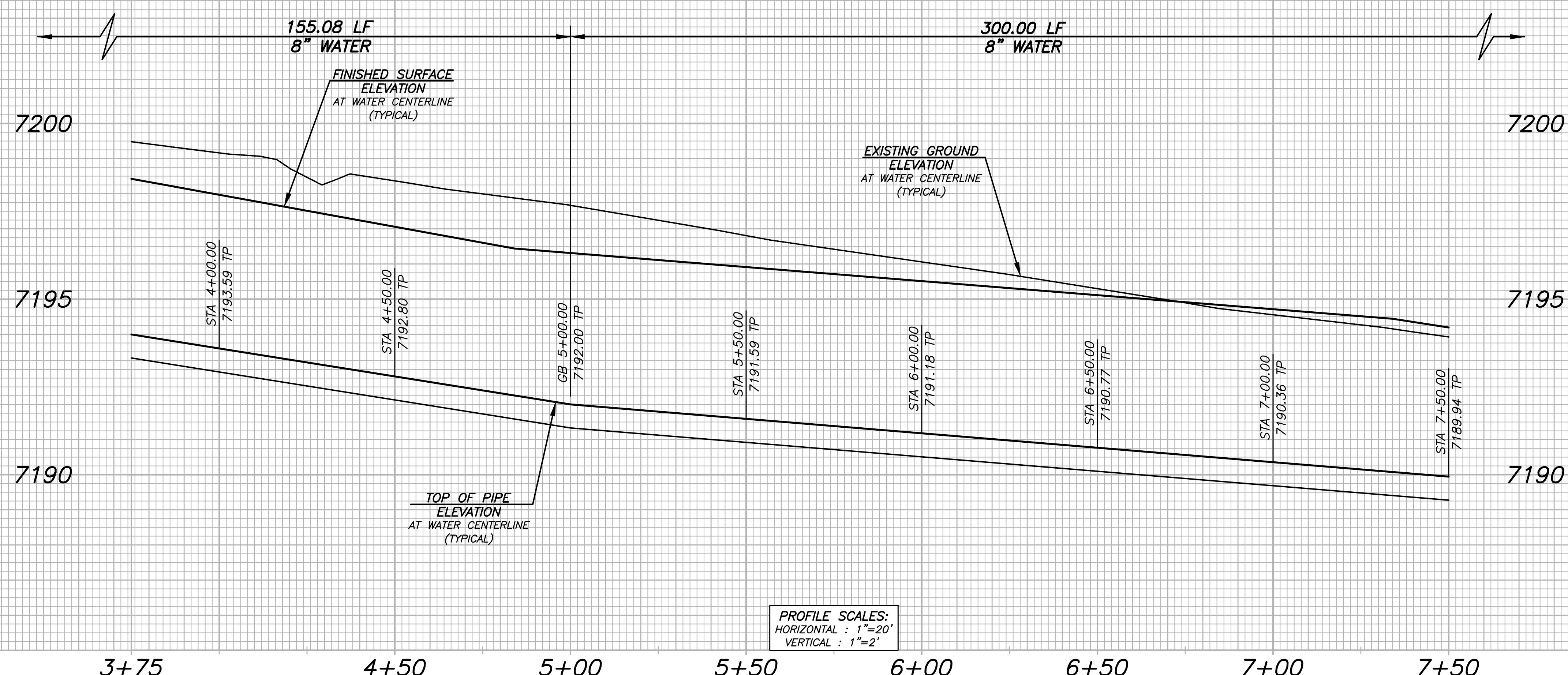
BENCHMARK: SEE PLAN AND PROFILE SHEETS FOR BENCHMARKS, ONE PER BLOCK

**UPCHURCH SUBDIVISION**  
SALIDA, CO

**WATER PLAN AND PROFILE**

**WATER MAIN**  
STA 1+00.00 TO STA 3+75.00

SHEET NO. **19**  
OF **22** SHTS.  
PROJECT NO. **20036**



**CONSTRUCTION NOTES:**

**WATER MAIN**  
STA 3+75.00 TO STA 7+50.00

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**PREPARED BY:**



**CRABTREE GROUP INC.**  
ENGINEERING SMART GROWTH™

328 D STREET  
SALIDA, CO 81201  
PH: 719-539-1875

918 CUYAMA ROAD  
OJAI, CA 91328  
PH: 719-221-1799

**SEAL**

DATE	BY	MARK	ENGINEER

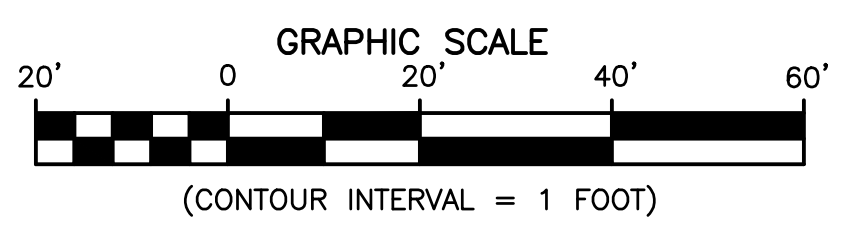
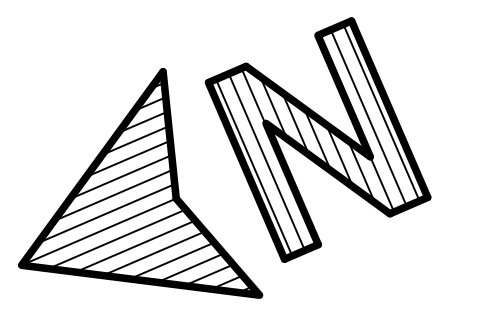
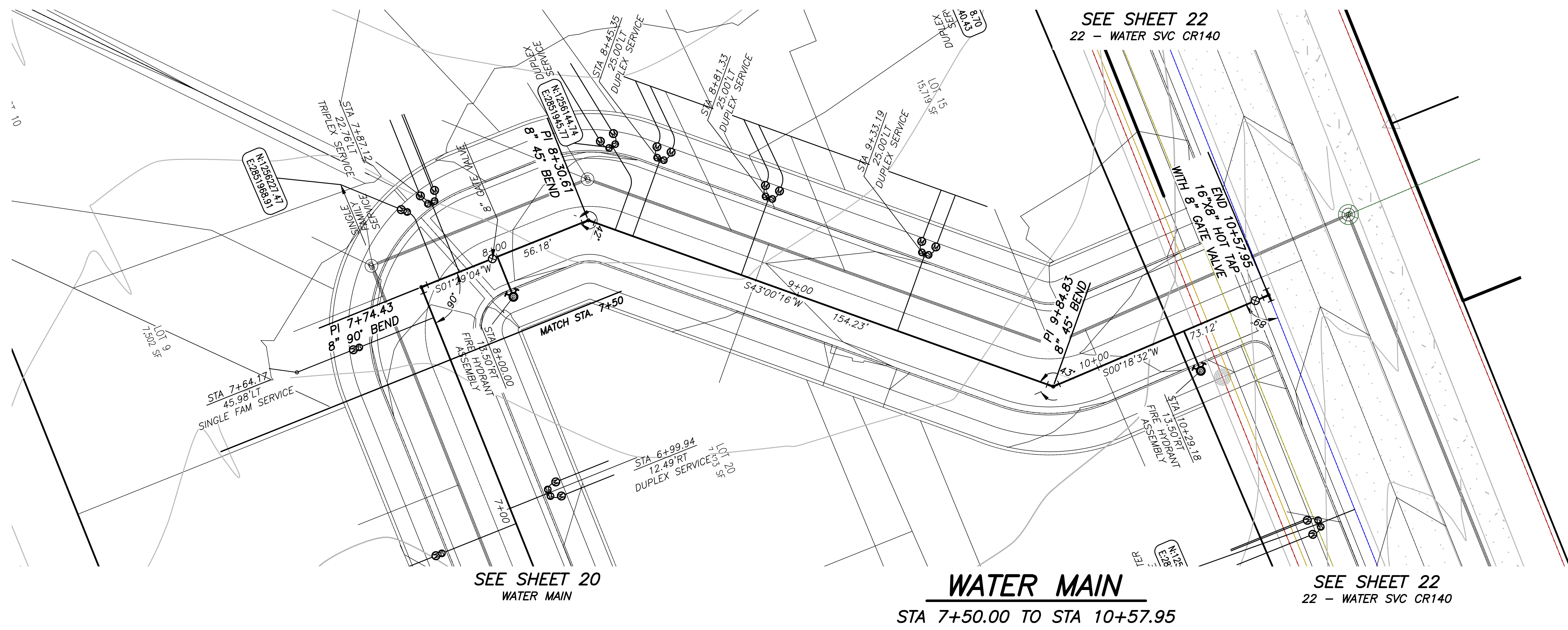
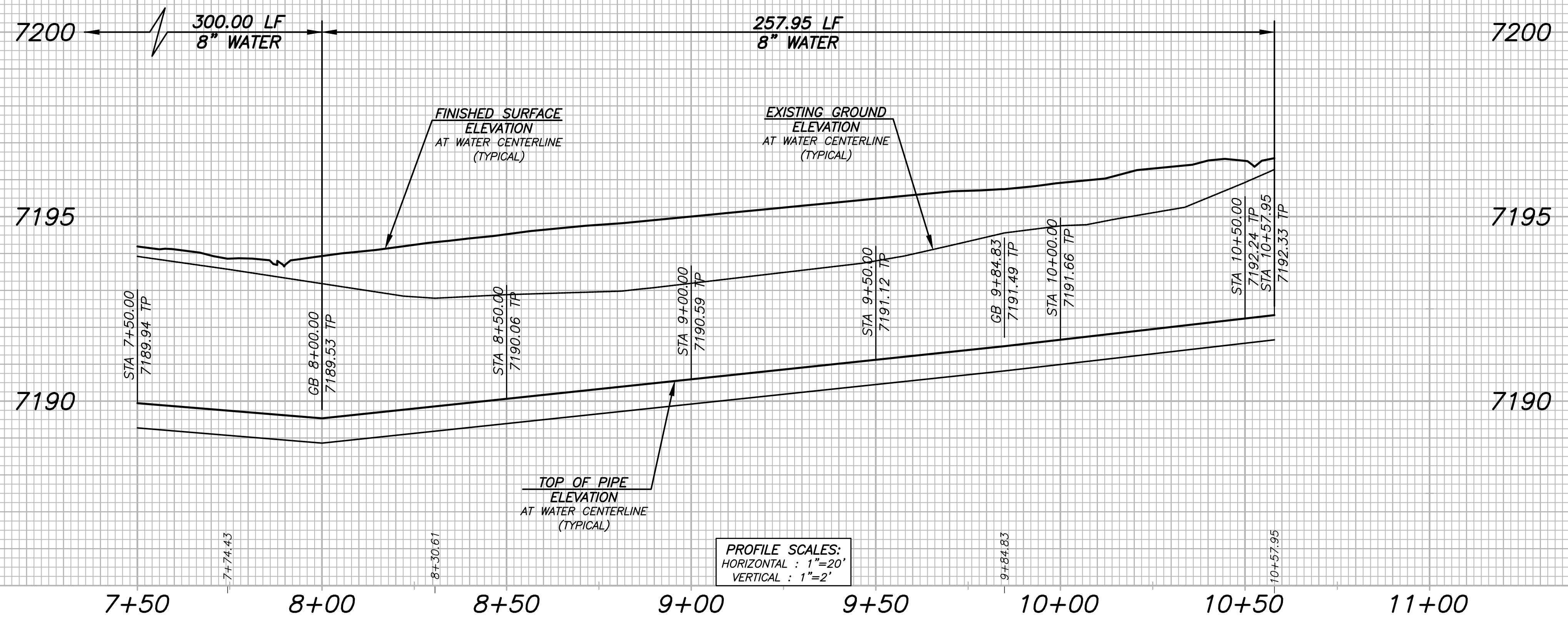
CITY OF SALIDA	
DESIGNED BY WBH	APPROVED BY:
DRAWN BY BH, CA	AGENCY HEAD
CHECKED BY BH, TV	DATE
SCALE 1"=20'	BENCHMARK: SEE PLAN AND PROFILE SHEETS FOR BENCHMARKS, ONE PER BLOCK
DATE AUG. 2021	REVISION AGENCY

**UPCHURCH SUBDIVISION**  
SALIDA, CO

**WATER PLAN AND PROFILE**

**WATER MAIN**  
STA 3+75.00 TO STA 7+50.00

**SHEET NO.**  
20  
OF 22 SHEETS  
**PROJECT NO.**  
20036



CONSTRUCTION NOTES:

**WATER MAIN**  
STA 7+50.00 TO STA 10+57.95

PROGRESS SET 8/4/21

**PRIVATE ENGINEER'S NOTES TO CONTRACTOR**  
THE EXISTENCE AND LOCATION OF ANY UNDERGROUND UTILITY PIPES, CONDUITS OR STRUCTURES SHOWN ON THESE PLANS ARE OBTAINED BY A SEARCH OF THE AVAILABLE RECORDS TO THE BEST OF OUR KNOWLEDGE THERE ARE NO EXISTING UTILITIES EXCEPT AS SHOWN ON THESE PLANS. THE CONTRACTOR IS REQUIRED TO TAKE DUE PRECAUTIONARY MEASURES TO PROTECT THE UTILITY LINES SHOWN ON THESE DRAWINGS. THE CONTRACTOR FURTHER ASSUMES ALL LIABILITY AND RESPONSIBILITY FOR THE UTILITY PIPES, CONDUITS, OR STRUCTURES SHOWN OR NOT SHOWN ON THESE DRAWINGS.  
CONTRACTOR AGREES THAT HE SHALL ASSUME SOLE COMPLETE RESPONSIBILITY FOR THE JOB SITE CONDITIONS DURING THE COURSE OF CONSTRUCTION OF THE PROJECT, INCLUDING SAFETY OF ALL PERSONS AND PROPERTY; THAT THIS REQUIREMENT SHALL APPLY CONTINUOUSLY AND NOT BE LIMITED TO NORMAL WORKING HOURS; AND THAT THE CONTRACTOR SHALL DEFEND, INDEMNIFY AND HOLD THE COUNTY, THE CITY, THE OWNER AND THE ENGINEER HARMLESS FROM ANY AND ALL LIABILITY, REAL OR ALLEGED, IN CONNECTION WITH THE PERFORMANCE OF WORK ON THIS PROJECT, EXCEPTING FOR LIABILITY ARISING FROM THE SOLE NEGLIGENCE OF THE OWNER OR THE ENGINEER.

**PREPARED FOR:**  
TORY UPCHURCH  
2112 ANN ARBOR AVE  
AUSTIN, TX 78704  
PHONE: 512-826-6152

**PREPARED UNDER THE DIRECTION OF:** \_\_\_\_\_ DATE \_\_\_\_\_

WILLIAM BERNARD HUSSEY CRABTREE GROUP, INC.  
L.C.E. NO. 56989 EXP. DATE 10/31/21

**PREPARED BY:**

**CRABTREE GROUP INC.**  
ENGINEERING SMART GROWTH™

328 D STREET SALIDA, CO 81201 PH: 719-539-1875  
918 CUYAMA ROAD OJAI, CA 93025 PH: 719-221-1799

**SEAL**

DATE	BY	MARK	REVISIONS	APPR.	DATE

**CITY OF SALIDA**

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DRAWN BY BH, CA  
CHECKED BY BH, TV AGENCY HEAD DATE \_\_\_\_\_  
SCALE 1"=20'  
DATE AUG. 2021

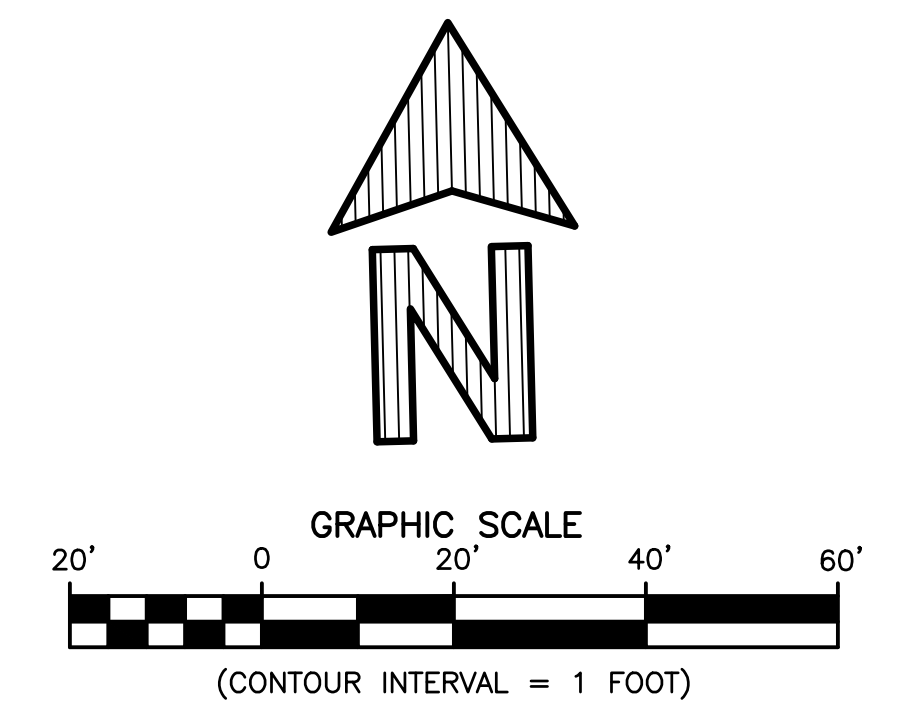
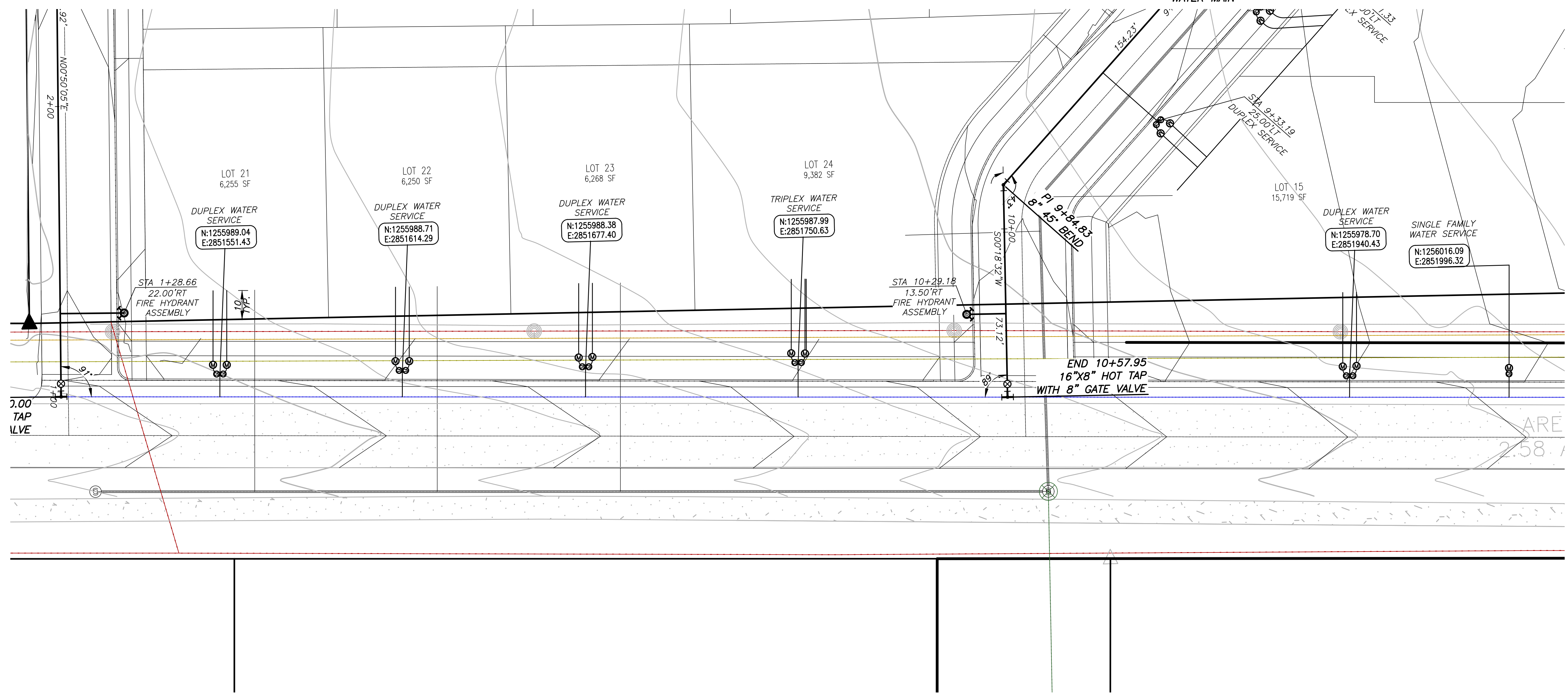
BENCHMARK: SEE PLAN AND PROFILE SHEETS FOR BENCHMARKS, ONE PER BLOCK

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SALIDA, CO  
**WATER PLAN AND PROFILE**  
**WATER MAIN**  
STA 7+50.00 TO STA 10+57.95

SHEET NO. **21**  
OF 22 SHEETS  
PROJECT NO. 20036

SEE SHEET 19  
WATER MAIN

SEE SHEET 21  
WATER MAIN



CONSTRUCTION NOTES:

### WATER PLANS

WATER SVC CR140

PROGRESS SET 8/4/21

**PRIVATE ENGINEER'S NOTES TO CONTRACTOR**  
THE EXISTENCE AND LOCATION OF ANY UNDERGROUND UTILITY PIPES, CONDUITS OR STRUCTURES SHOWN ON THESE PLANS ARE OBTAINED BY A SEARCH OF THE AVAILABLE RECORDS TO THE BEST OF OUR KNOWLEDGE THERE ARE NO EXISTING UTILITIES EXCEPT AS SHOWN ON THESE PLANS. THE CONTRACTOR IS REQUIRED TO TAKE DUE PRECAUTIONARY MEASURES TO PROTECT THE UTILITY LINES SHOWN ON THESE DRAWINGS. THE CONTRACTOR FURTHER ASSUMES ALL LIABILITY AND RESPONSIBILITY FOR THE UTILITY PIPES, CONDUITS, OR STRUCTURES SHOWN OR NOT SHOWN ON THESE DRAWINGS.  
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**PREPARED FOR:**  
TORY UPCHURCH  
2112 ANN ARBOR AVE  
AUSTIN, TX 78704  
PHONE: 512-826-6152

**PREPARED UNDER THE DIRECTION OF:** \_\_\_\_\_ DATE \_\_\_\_\_

WILLIAM BERNARD HUSSEY  
L.C.E. NO. 56989

CRABTREE GROUP, INC  
EXP. DATE 10/31/21

**PREPARED BY:**

**CRABTREE GROUP INC.**  
ENGINEERING SMART GROWTH™

328 D STREET  
SALIDA, CO 81201  
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PH: 719-221-1799

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DATE	BY	MARK	REVISIONS	APPR.	DATE

**CITY OF SALIDA**

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SCALE 1"=20'  
DATE AUG. 2021

APPROVED BY: \_\_\_\_\_  
AGENCY HEAD DATE \_\_\_\_\_  
BENCHMARK: SEE PLAN AND PROFILE SHEETS FOR BENCHMARKS, ONE PER BLOCK

**UPCHURCH SUBDIVISION**  
SALIDA, CO

**WATER SERVICE PLAN**

**WATER PLANS**  
WATER SVC CR140

SHEET NO. 22  
OF 22 SHTS.  
PROJECT NO. 20036

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JULY 13, 2021

# Upchurch Subdivision

## Drainage Report

BILL HUSSEY  
Crabtree Group Inc.  
Salida, Colorado  
Project No. #20036

Contents

1 Introduction..... 1

2 Existing Conditions..... 1

3 Soils..... 1

4 Precipitation ..... 2

5 Runoff Analysis ..... 2

6 Conclusion ..... 2

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# 1 INTRODUCTION

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Upchurch subdivision is a development of 24 lots on 5.3 acres of former agricultural land. At final buildout, the development will contain streets, single family homes, duplexes, and multiplexes possibly up to five units.

# 2 EXISTING CONDITIONS

---

The subject site slopes from west to east at approximately 2%. There are several abandoned irrigation ditches and no natural channels. Existing flow patterns on site consist of sheet flow from west to east. The parcel is surrounded by existing paved roads. Low-density development to the west of the subject property does not generate significant stormwater runoff. Therefore, the analysis area for this drainage study will extend only to the crowns of the surrounding roads.



FIGURE 1 - VICINITY MAP (SITE OUTLINED IN YELLOW)

The subject property currently discharges sheet flow onto the residential properties to the east.

# 3 SOILS

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Information for the on-site soils was obtained from the USDA Web Soil Survey (U.S. Department of Agriculture, n.d.). The drainage analysis area soils are St. Elmo gravelly sandy loam. The St. Elmo series of

soils are assigned to hydraulic Soils Group A. The site Soils information is summarized in Table 1 below, and included in Appendix A.

## 4 PRECIPITATION

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Precipitation amounts for the Design Storms was obtained from the NOAA precipitation frequency estimates for the subject area. NOAA precipitation data for the site is included in Appendix B.

## 5 RUNOFF ANALYSIS

---

The runoff Analysis was performed utilizing the methods described in the Natural Resources Conservation Service (NRCS) Technical Release #55 (TR-55), with a Type II storm distribution. Impervious areas and existing ground cover of the site was estimated from site survey. Impervious area and ground cover for the proposed conditions were estimated from the site plan. Runoff Calculations are summarized in Table 3 below and included in Appendix C.

TABLE 3

	Runoff (cfs)				
	2-yr	10-yr	25-yr	50-yr	100-yr
Pre-Developed	.177	.927	1.996	3.073	4.360
Post-Developed	.709	2.709	4.255	5.698	7.276
Difference	.532	1.782	2.259	2.625	2.916

The analysis shows that the proposed addition use will have an impact to the stormwater flows in the vicinity of the project. Calculations were performed to determine the amount of storm water storage that is required to mitigate the calculated increase in stormwater. These calculations indicate that 4,990 cubic feet of on-site detention would be required to mitigate the increase in peak runoff for the 25-year, 24-hour design storm event, in compliance with the City of Salida Land Use Code.

## 6 CONCLUSION

---

Modeling results indicate the proposed improvements will increase runoff from the site during from the site during the design storm event. To mitigate the increase in runoff, calculations show that a detention volume 4,990 cubic feet would be required to maintain the historic flow rates for the 25-year design storm. Improvements to the site include 5,000 cubic feet of detention.

# Appendix A



**NOAA Atlas 14, Volume 8, Version 2**  
**Location name: Salida, Colorado, USA\***  
**Latitude: 38.5355°, Longitude: -106.0172°**  
**Elevation: 7190.52 ft\*\***  
\* source: ESRI Maps  
\*\* source: USGS



**POINT PRECIPITATION FREQUENCY ESTIMATES**

Sanja Perica, Deborah Martin, Sandra Pavlovic, Ishani Roy, Michael St. Laurent, Carl Trypaluk, Dale Unruh, Michael Yekta, Geoffery Bonnin  
 NOAA, National Weather Service, Silver Spring, Maryland

[PF\\_tabular](#) | [PF\\_graphical](#) | [Maps\\_&\\_aerials](#)

**PF tabular**

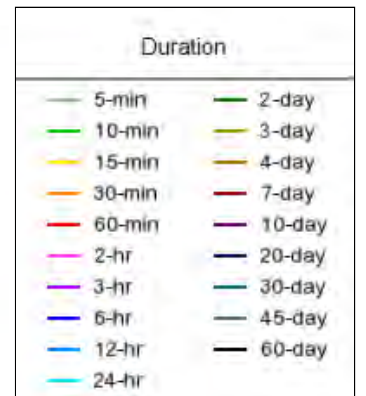
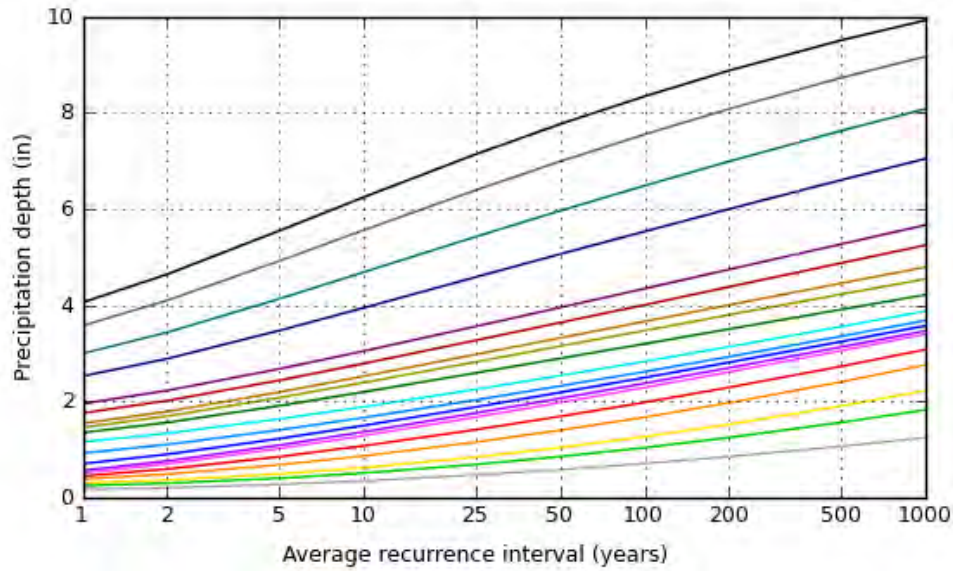
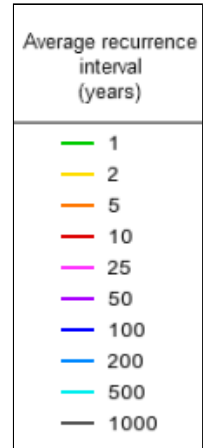
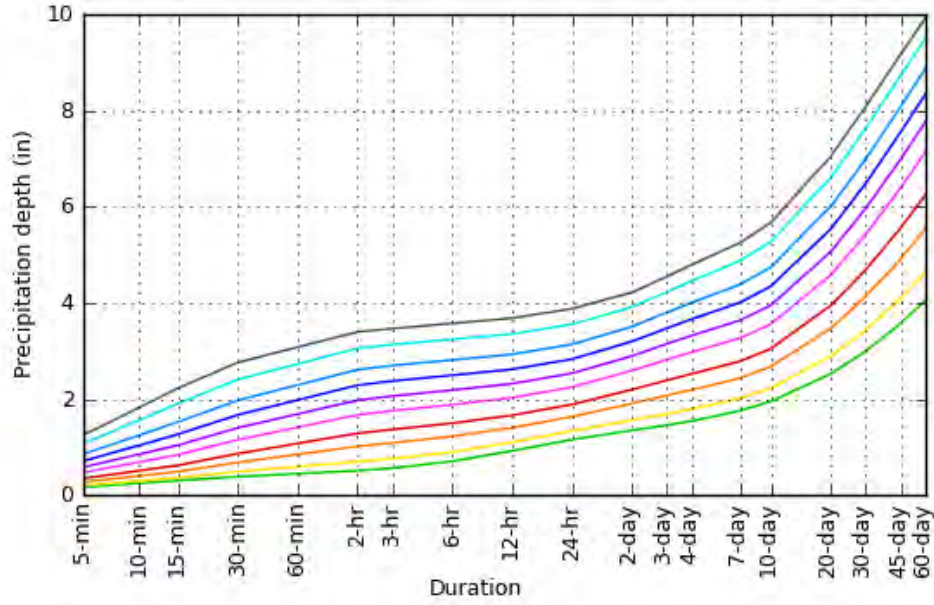
<b>PDS-based point precipitation frequency estimates with 90% confidence intervals (in inches)<sup>1</sup></b>										
<b>Duration</b>	<b>Average recurrence interval (years)</b>									
	<b>1</b>	<b>2</b>	<b>5</b>	<b>10</b>	<b>25</b>	<b>50</b>	<b>100</b>	<b>200</b>	<b>500</b>	<b>1000</b>
<b>5-min</b>	<b>0.172</b> (0.135-0.224)	<b>0.206</b> (0.161-0.268)	<b>0.276</b> (0.216-0.361)	<b>0.349</b> (0.271-0.459)	<b>0.472</b> (0.364-0.673)	<b>0.583</b> (0.435-0.836)	<b>0.710</b> (0.509-1.04)	<b>0.854</b> (0.585-1.29)	<b>1.07</b> (0.701-1.66)	<b>1.25</b> (0.789-1.93)
<b>10-min</b>	<b>0.252</b> (0.198-0.328)	<b>0.301</b> (0.236-0.392)	<b>0.404</b> (0.316-0.528)	<b>0.512</b> (0.397-0.671)	<b>0.691</b> (0.533-0.986)	<b>0.854</b> (0.636-1.22)	<b>1.04</b> (0.745-1.53)	<b>1.25</b> (0.857-1.89)	<b>1.56</b> (1.03-2.42)	<b>1.83</b> (1.16-2.83)
<b>15-min</b>	<b>0.308</b> (0.242-0.400)	<b>0.368</b> (0.288-0.478)	<b>0.493</b> (0.385-0.644)	<b>0.624</b> (0.485-0.819)	<b>0.842</b> (0.650-1.20)	<b>1.04</b> (0.776-1.49)	<b>1.27</b> (0.909-1.86)	<b>1.52</b> (1.05-2.30)	<b>1.91</b> (1.25-2.96)	<b>2.23</b> (1.41-3.45)
<b>30-min</b>	<b>0.387</b> (0.304-0.503)	<b>0.490</b> (0.384-0.638)	<b>0.683</b> (0.534-0.892)	<b>0.867</b> (0.673-1.14)	<b>1.15</b> (0.880-1.62)	<b>1.40</b> (1.04-1.99)	<b>1.67</b> (1.19-2.44)	<b>1.97</b> (1.35-2.96)	<b>2.41</b> (1.58-3.71)	<b>2.76</b> (1.75-4.28)
<b>60-min</b>	<b>0.450</b> (0.353-0.585)	<b>0.596</b> (0.467-0.776)	<b>0.851</b> (0.665-1.11)	<b>1.08</b> (0.837-1.42)	<b>1.41</b> (1.07-1.96)	<b>1.69</b> (1.24-2.37)	<b>1.98</b> (1.41-2.86)	<b>2.29</b> (1.56-3.41)	<b>2.73</b> (1.78-4.19)	<b>3.08</b> (1.95-4.78)
<b>2-hr</b>	<b>0.512</b> (0.407-0.657)	<b>0.702</b> (0.557-0.901)	<b>1.02</b> (0.806-1.31)	<b>1.29</b> (1.01-1.67)	<b>1.67</b> (1.27-2.27)	<b>1.98</b> (1.47-2.72)	<b>2.29</b> (1.64-3.24)	<b>2.61</b> (1.79-3.81)	<b>3.06</b> (2.01-4.59)	<b>3.40</b> (2.18-5.19)
<b>3-hr</b>	<b>0.564</b> (0.452-0.718)	<b>0.762</b> (0.610-0.970)	<b>1.09</b> (0.870-1.39)	<b>1.37</b> (1.09-1.76)	<b>1.76</b> (1.34-2.36)	<b>2.07</b> (1.54-2.81)	<b>2.38</b> (1.71-3.32)	<b>2.70</b> (1.86-3.89)	<b>3.13</b> (2.08-4.66)	<b>3.47</b> (2.24-5.25)
<b>6-hr</b>	<b>0.707</b> (0.574-0.887)	<b>0.902</b> (0.731-1.13)	<b>1.23</b> (0.990-1.54)	<b>1.50</b> (1.20-1.90)	<b>1.88</b> (1.46-2.49)	<b>2.19</b> (1.65-2.93)	<b>2.50</b> (1.82-3.44)	<b>2.81</b> (1.97-3.99)	<b>3.24</b> (2.18-4.75)	<b>3.57</b> (2.34-5.32)
<b>12-hr</b>	<b>0.925</b> (0.760-1.14)	<b>1.10</b> (0.907-1.37)	<b>1.41</b> (1.15-1.75)	<b>1.66</b> (1.35-2.08)	<b>2.03</b> (1.60-2.64)	<b>2.32</b> (1.78-3.06)	<b>2.62</b> (1.94-3.55)	<b>2.93</b> (2.08-4.10)	<b>3.36</b> (2.28-4.84)	<b>3.69</b> (2.44-5.40)
<b>24-hr</b>	<b>1.16</b> (0.966-1.41)	<b>1.34</b> (1.11-1.63)	<b>1.64</b> (1.36-2.00)	<b>1.89</b> (1.56-2.32)	<b>2.25</b> (1.80-2.87)	<b>2.54</b> (1.97-3.29)	<b>2.83</b> (2.13-3.78)	<b>3.14</b> (2.25-4.31)	<b>3.56</b> (2.45-5.04)	<b>3.88</b> (2.60-5.59)
<b>2-day</b>	<b>1.35</b> (1.14-1.62)	<b>1.56</b> (1.32-1.88)	<b>1.91</b> (1.61-2.30)	<b>2.20</b> (1.84-2.66)	<b>2.59</b> (2.09-3.24)	<b>2.90</b> (2.28-3.68)	<b>3.20</b> (2.43-4.18)	<b>3.51</b> (2.55-4.72)	<b>3.91</b> (2.73-5.43)	<b>4.22</b> (2.87-5.97)
<b>3-day</b>	<b>1.46</b> (1.24-1.74)	<b>1.70</b> (1.44-2.02)	<b>2.08</b> (1.76-2.48)	<b>2.39</b> (2.02-2.87)	<b>2.82</b> (2.29-3.50)	<b>3.15</b> (2.50-3.97)	<b>3.47</b> (2.66-4.49)	<b>3.80</b> (2.78-5.07)	<b>4.23</b> (2.97-5.81)	<b>4.55</b> (3.11-6.38)
<b>4-day</b>	<b>1.54</b> (1.32-1.83)	<b>1.79</b> (1.53-2.12)	<b>2.19</b> (1.87-2.61)	<b>2.53</b> (2.14-3.01)	<b>2.98</b> (2.43-3.66)	<b>3.32</b> (2.65-4.15)	<b>3.66</b> (2.82-4.71)	<b>4.01</b> (2.95-5.30)	<b>4.46</b> (3.15-6.08)	<b>4.79</b> (3.30-6.67)
<b>7-day</b>	<b>1.76</b> (1.52-2.06)	<b>2.02</b> (1.74-2.36)	<b>2.44</b> (2.10-2.86)	<b>2.79</b> (2.39-3.29)	<b>3.27</b> (2.70-3.98)	<b>3.64</b> (2.93-4.50)	<b>4.01</b> (3.12-5.09)	<b>4.38</b> (3.26-5.73)	<b>4.88</b> (3.49-6.57)	<b>5.25</b> (3.65-7.21)
<b>10-day</b>	<b>1.95</b> (1.70-2.27)	<b>2.23</b> (1.94-2.59)	<b>2.68</b> (2.32-3.12)	<b>3.05</b> (2.63-3.56)	<b>3.56</b> (2.96-4.29)	<b>3.95</b> (3.21-4.84)	<b>4.35</b> (3.41-5.47)	<b>4.75</b> (3.56-6.15)	<b>5.27</b> (3.79-7.04)	<b>5.67</b> (3.97-7.71)
<b>20-day</b>	<b>2.53</b> (2.23-2.88)	<b>2.89</b> (2.55-3.30)	<b>3.47</b> (3.06-3.98)	<b>3.95</b> (3.45-4.54)	<b>4.58</b> (3.86-5.42)	<b>5.06</b> (4.17-6.09)	<b>5.53</b> (4.39-6.83)	<b>6.00</b> (4.56-7.63)	<b>6.60</b> (4.81-8.64)	<b>7.05</b> (5.01-9.41)
<b>30-day</b>	<b>3.00</b> (2.67-3.39)	<b>3.44</b> (3.06-3.89)	<b>4.13</b> (3.67-4.69)	<b>4.69</b> (4.14-5.35)	<b>5.42</b> (4.60-6.34)	<b>5.97</b> (4.94-7.09)	<b>6.49</b> (5.18-7.91)	<b>6.99</b> (5.35-8.77)	<b>7.63</b> (5.60-9.86)	<b>8.08</b> (5.79-10.7)
<b>45-day</b>	<b>3.58</b> (3.22-4.01)	<b>4.10</b> (3.68-4.60)	<b>4.92</b> (4.40-5.53)	<b>5.56</b> (4.95-6.29)	<b>6.39</b> (5.45-7.38)	<b>6.99</b> (5.83-8.21)	<b>7.55</b> (6.08-9.10)	<b>8.08</b> (6.22-10.0)	<b>8.73</b> (6.45-11.1)	<b>9.17</b> (6.62-12.0)
<b>60-day</b>	<b>4.06</b> (3.67-4.52)	<b>4.64</b> (4.20-5.18)	<b>5.55</b> (5.00-6.20)	<b>6.25</b> (5.59-7.01)	<b>7.14</b> (6.12-8.17)	<b>7.77</b> (6.51-9.04)	<b>8.34</b> (6.75-9.96)	<b>8.88</b> (6.87-10.9)	<b>9.51</b> (7.06-12.0)	<b>9.93</b> (7.21-12.9)

<sup>1</sup> Precipitation frequency (PF) estimates in this table are based on frequency analysis of partial duration series (PDS). Numbers in parenthesis are PF estimates at lower and upper bounds of the 90% confidence interval. The probability that precipitation frequency estimates (for a given duration and average recurrence interval) will be greater than the upper bound (or less than the lower bound) is 5%. Estimates at upper bounds are not checked against probable maximum precipitation (PMP) estimates and may be higher than currently valid PMP values. Please refer to NOAA Atlas 14 document for more information.

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**PF graphical**

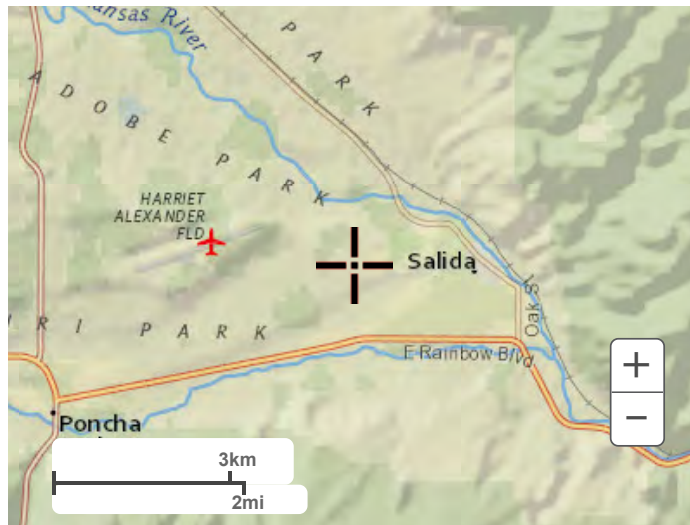
PDS-based depth-duration-frequency (DDF) curves  
Latitude: 38.5355°, Longitude: -106.0172°



[Back to Top](#)

**Maps & aerials**

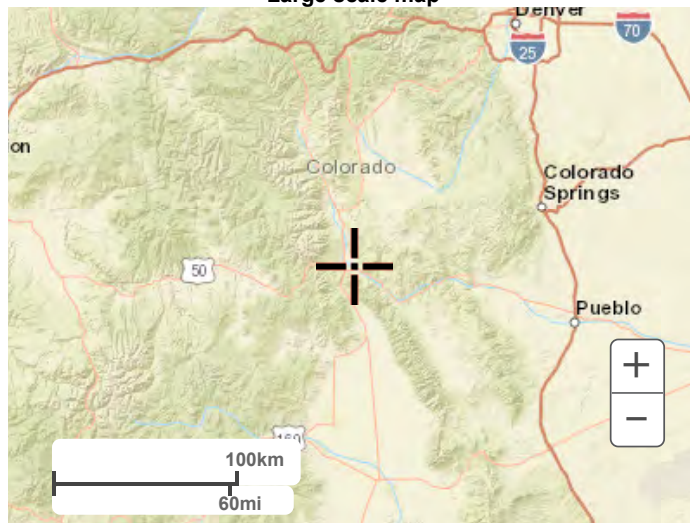
**Small scale terrain**



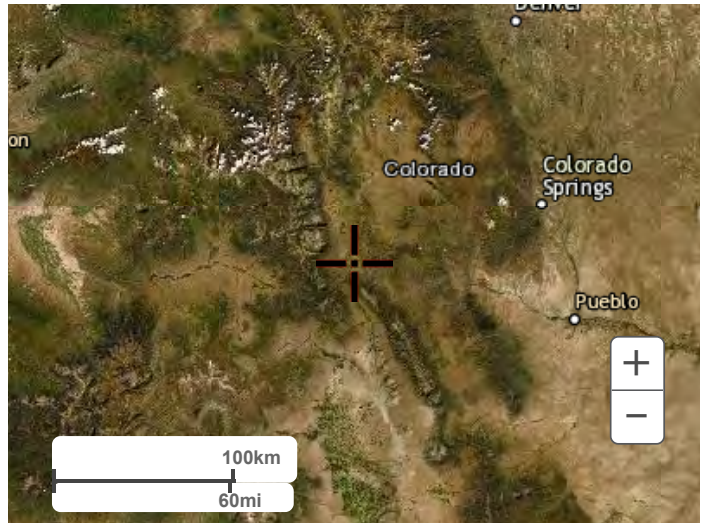
Large scale terrain



Large scale map



Large scale aerial



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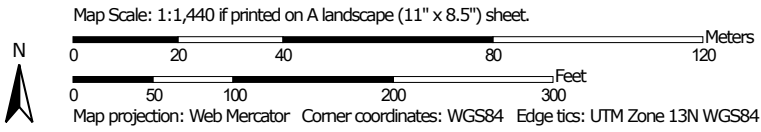
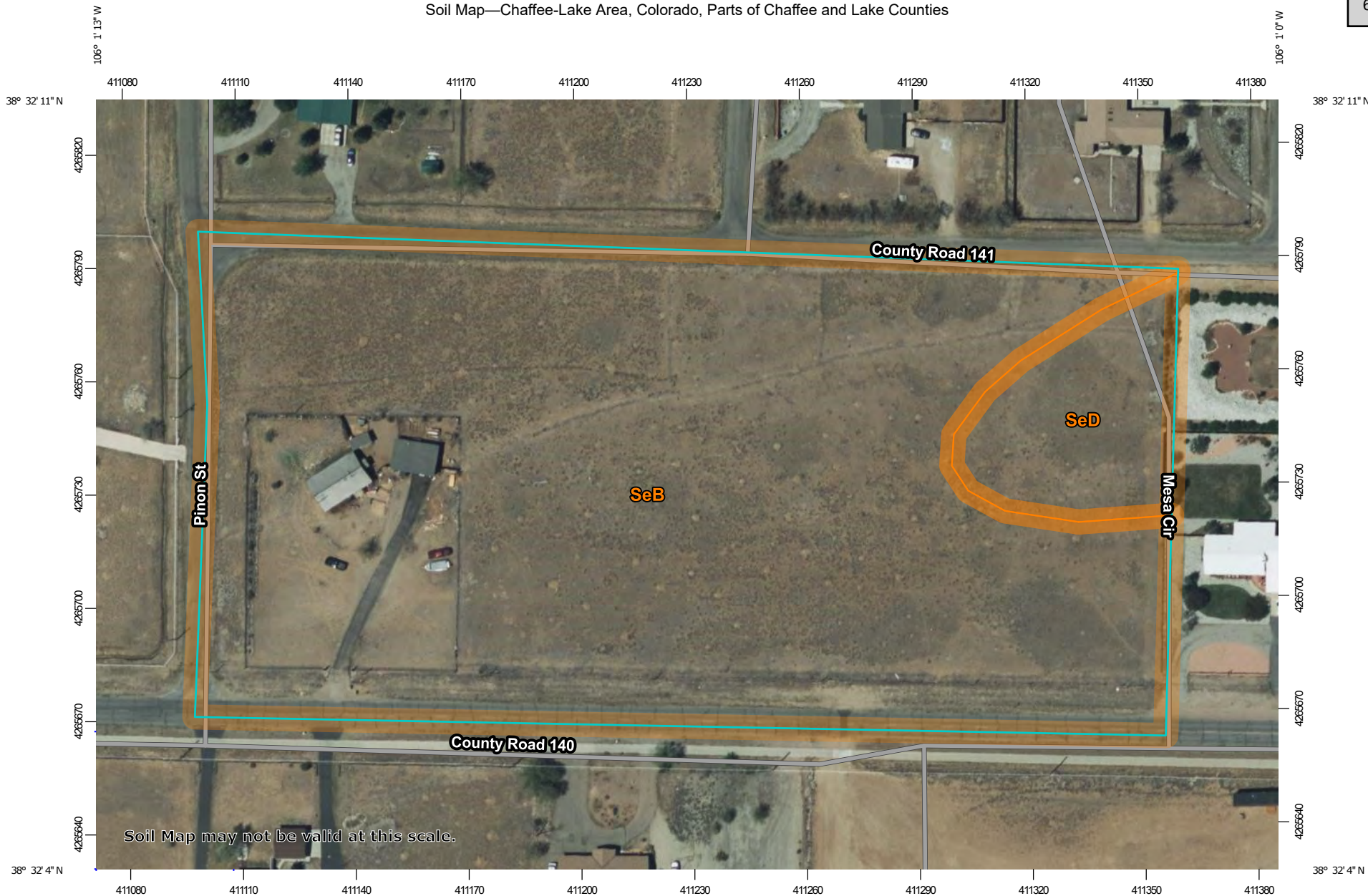
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[US Department of Commerce](#)  
[National Oceanic and Atmospheric Administration](#)  
[National Weather Service](#)  
[National Water Center](#)  
1325 East West Highway  
Silver Spring, MD 20910  
Questions?: [HDSC.Questions@noaa.gov](mailto:HDSC.Questions@noaa.gov)

[Disclaimer](#)


# Appendix B

Soil Map—Chaffee-Lake Area, Colorado, Parts of Chaffee and Lake Counties



### 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 1:20,000.

**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: Chaffee-Lake Area, Colorado, Parts of Chaffee and Lake Counties  
 Survey Area Data: Version 13, Jun 5, 2020

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

Date(s) aerial images were photographed: May 18, 2020—May 21, 2020

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
SeB	St. Elmo gravelly sandy loam, 1 to 3 percent slopes	7.4	91.7%
SeD	St. Elmo gravelly sandy loam, 3 to 9 percent slopes	0.7	8.3%
<b>Totals for Area of Interest</b>		<b>8.1</b>	<b>100.0%</b>

## Chaffee-Lake Area, Colorado, Parts of Chaffee and Lake Counties

### SeB—St. Elmo gravelly sandy loam, 1 to 3 percent slopes

#### Map Unit Setting

*National map unit symbol:* jq9c  
*Elevation:* 7,000 to 9,000 feet  
*Mean annual precipitation:* 11 to 15 inches  
*Frost-free period:* 60 to 100 days  
*Farmland classification:* Not prime farmland

#### Map Unit Composition

*St. elmo and similar soils:* 100 percent  
*Estimates are based on observations, descriptions, and transects of the mapunit.*

#### Description of St. Elmo

##### Setting

*Landform:* Fan terraces  
*Down-slope shape:* Linear  
*Across-slope shape:* Linear  
*Parent material:* Calcareous, coarse-textured gravelly alluvium and/or calcareous, coarse-textured gravelly outwash

##### Typical profile

*H1 - 0 to 10 inches:* gravelly sandy loam  
*H2 - 10 to 20 inches:* gravelly loamy sand, cobbly loamy sand  
*H2 - 10 to 20 inches:* very gravelly sand, very cobbly sand  
*H3 - 20 to 60 inches:*  
*H3 - 20 to 60 inches:*

##### Properties and qualities

*Slope:* 1 to 3 percent  
*Depth to restrictive feature:* More than 80 inches  
*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 content:* 40 percent  
*Available water capacity:* Low (about 5.1 inches)

##### Interpretive groups

*Land capability classification (irrigated):* 6s  
*Land capability classification (nonirrigated):* 6s  
*Hydrologic Soil Group:* A  
*Ecological site:* R048AY316CO

*Hydric soil rating:* No

## Data Source Information

Soil Survey Area: Chaffee-Lake Area, Colorado, Parts of Chaffee and Lake Counties

Survey Area Data: Version 13, Jun 5, 2020

# Appendix C

---

## DRAINAGE CALCULATIONS

**Project Name:** Upchurch Subdivision

**Project #:** 20036

**Location:** Salida, CO

**Client Name:** Tory Upchurch

**Client Address:** \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_

**Client Phone #:** \_\_\_\_\_

**Prepared By:** WBH

**Date:** 7/13/2021

**Checked by:** WBH

**Date:** 7/13/2021

**Area Name:** \_\_\_\_\_  
 \_\_\_\_\_

Storm Return Period (yr)	24-hour Rainfall Amount (in.)
2	1.34
5	1.64
10	1.89
25	2.25
50	2.54
100	2.83

Source:   NOAA ATLAS 14

**Rainfall Distribution:** II



## POST-DEVELOPMENT RUNOFF CALCULATIONS

### Post-Developed Curve Number

Land Use Description	HSG	Curve No.	Area (acres)	Area (%)
Residential (1/8 ac lot)	A	77	8.08	100%
<b>Totals</b>			<b>8.08</b>	<b>100%</b>

**Weighted Curve Number      77**

### Time to Concentration

#### Sheet Flow

Surface Cover	Length (ft)	Slope ( <sup>ft</sup> / <sub>ft</sub> )	Manning's n	T <sub>t</sub> (hrs)
Range (natural)	100	0.020	0.130	0.225

#### Shallow Flow

Surface Cover	Length (ft)	Slope ( <sup>ft</sup> / <sub>ft</sub> )	Velocity Coefficient	T <sub>t</sub> (hrs)
Paved	710	0.015	20.328	0.079

#### Channel Flow

Length (ft.)	Slope ( <sup>ft</sup> / <sub>ft</sub> )	n-Value	Flow Area (ft <sup>2</sup> )	Wetted Perimeter (ft)	Tt (hrs)

**Total Travel Time (hrs)      0.304**

### Peak Discharge

Storm	2-yr	10-yr	25-yr	50-yr	100-yr
24-hr Precipitation (P)	1.34	1.89	2.25	2.54	2.83
Initial Abstraction (I <sub>a</sub> )	0.597	0.597	0.597	0.597	0.597
I <sub>a</sub> /P	0.446	0.316	0.265	0.235	0.211
Unit Peak Discharge (q <sub>u</sub> )	380	550	573	590	603
Runoff (Q)	0.15	0.39	0.59	0.77	0.95
<b>Peak Discharge (q<sub>p</sub>)</b>	<b>0.709</b>	<b>2.709</b>	<b>4.255</b>	<b>5.698</b>	<b>7.276</b>

## MINIMUM DETENTION CALCULATIONS

### 1. Data:

Drainage area  $A_m = 0.0126$  mi.<sup>2</sup>

Rainfall distribution II

1st Stage	2nd Stage
-----------	-----------

2. Frequency  $\text{yr}$ 

25	100
----	-----

### 3. Peak Inflow

discharge  $q_i$   $\text{cfs}$ 

4.255	7.276
-------	-------

  
(from Post-Developed worksheet)

### 4. Peak outflow

discharge  $q_p$   $\text{cfs}$ 

1.996	4.360
-------	-------

  
(from Pre-Developed worksheet)

5. Compute  $q_p/q_i$ 

0.47	0.60
------	------

6.  $V_s/V_r$ 

0.29	0.24
------	------

$$(V_s/V_r = C_0 + C_1(q_p/q_i) + C_2(q_p/q_i)^2 + C_3(q_p/q_i)^3)$$

7. Runoff,  $Q$ 

0.59	0.95
------	------

(from Post-Developed worksheet)

8. Runoff Vol.  $V_r$   $\text{cu-ft}$ 

17,264	28,007
--------	--------

$$(V_r = QA_m 53.33)$$

9. Storage vol,  $V_s$   $\text{cu-ft}$ 

4,990	6,750
-------	-------

10. Maximum storage  $E_{\max}$ 

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(from plot)

# Upchurch Subdivision

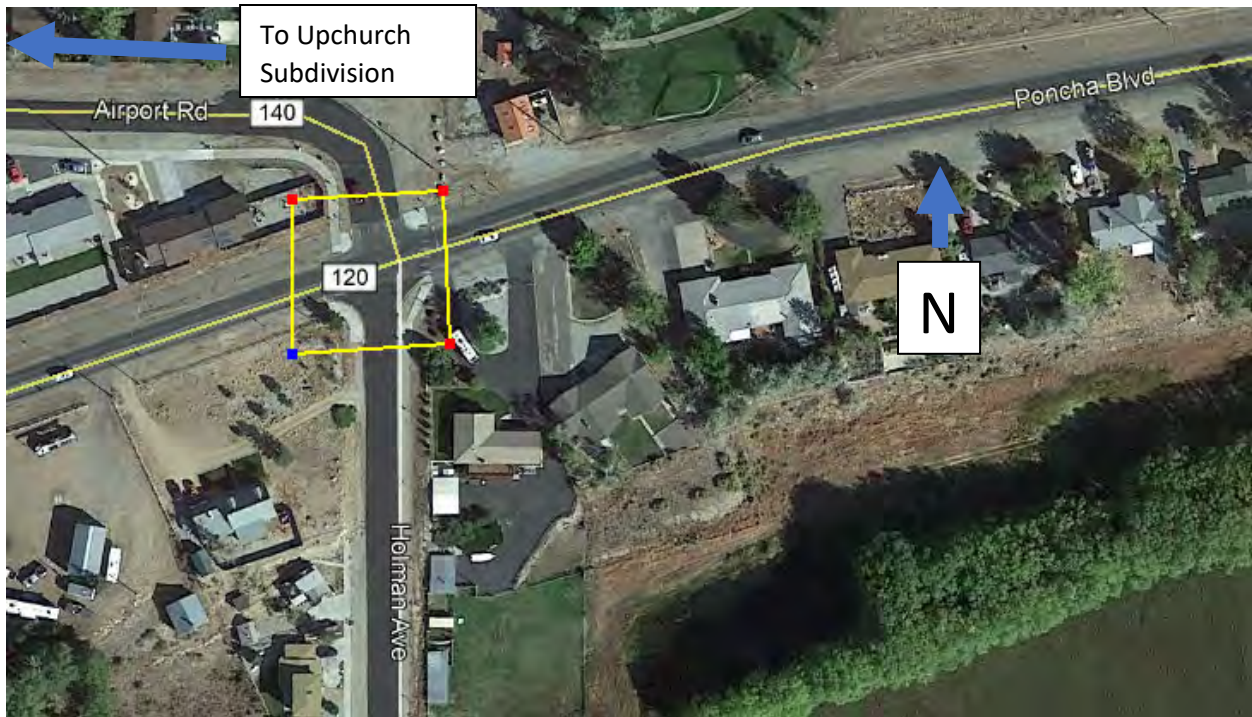
## Traffic Study

BILL HUSSEY  
Crabtree Group, Inc.  
Salida, CO  
Project No. #20036



### Introduction

During the annexation process, planning commission requested that a traffic study be required prior to any subdivision of the 5.36 acres owned by Tory Upchurch. Planning commission wanted to ensure that service times remain at acceptable levels at the four way stop intersection of County Road 120 and County Road 140 (“Subject Intersection”). Intersection is outlined in yellow in the image below (Image courtesy Google Earth).



Each of the four legs of the subject intersection has two way traffic, with one lane entering the intersection and one lane exiting the intersection. Legs of the intersection are referred to by the direction of traffic entering the intersection; for example, Holman Avenue is the “Northbound Approach.”

### Trip Generation

Per the Upchurch subdivision plat, 10 single-family residences and 33 multiplex (duplex through fiveplex) units are proposed. Per the Institute of Transportation Engineers Trip Generation Manual, 8<sup>th</sup> Edition, trip generation for the Upchurch Subdivision was estimated in the table below.

**PROJECT: LIPCHURCH SUBDIVISION**



**Summary of Trip Generation**

Land Use	ITE Code	Intensity		Rate	Daily Trip Ends	AM Peak-Hour Trip Ends						PM Peak-Hour Trip Ends					
						In			Out			In			Out		
						Rate	Total	%	Trips	%	Trips	Rate	Total	%	Trips	%	Trips
Single Family Detached Housing	210	10	DU	9.57	96	0.75	8	25%	2	75%	6	1.01	10	63%	6	37%	4
Condominiums/Townhouses	230	33	DU	5.81	192	0.44	15	17%	2	83%	12	0.52	17	67%	11	33%	6
<b>Sub-Totals</b>					<b>287</b>		<b>22</b>		<b>4</b>		<b>18</b>		<b>27</b>		<b>18</b>		<b>9</b>
<b>Total</b>					<b>287</b>		<b>22</b>		<b>4</b>		<b>18</b>		<b>27</b>		<b>18</b>		<b>9</b>

GLA = gross leasable area in KSF

DU = dwelling unit

RM = number of room

Source: ITE Trip Generation, 8th Edition

**Existing Traffic**

AM peak hour traffic was counted from 7:30 am until 8:30 am on Tuesday, July 13, 2021. Traffic counts are summarized below, and raw count data is attached to this report.

am, existing																		
		<b>Southbound Approach Total</b>																
		<b>78</b>																
		1			41			36										
		SBR			SBS			SBL										
		4 EBL									WBR			18				
<b>Eastbound Approach Total</b>	<b>69</b>	49 EBS									WBS			34			<b>128</b>	<b>Westbound Approach Total</b>
		16 EBR									WBL			76				
		NBL			NBS			NBR										
		10			20			67										
		<b>97</b>																
		<b>Northbound Approach Total</b>																

PM peak hour traffic was counted from 4:30 pm until 5:30 pm on Monday, July 12, 2021. Traffic counts are summarized below, and raw count data is attached to this report.

pm, existing																		
		<b>Southbound Approach Total</b>																
		<b>72</b>																
		2			34			36										
		SBR			SBS			SBL										
		1 EBL									WBR			36				
<b>Eastbound Approach Total</b>	<b>68</b>	50 EBS									WBS			55			<b>205</b>	<b>Westbound Approach Total</b>
		17 EBR									WBL			114				
		NBL			NBS			NBR										
		3			41			111										
		<b>155</b>																
		<b>Northbound Approach Total</b>																

**Trip Distribution**

This analysis conservatively assumes that all trips in and out of the Upchurch Subdivision pass through the subject intersection. Trips into the Upchurch Subdivision are distributed at ratios matching the existing traffic on the northbound, westbound, and eastbound approaches. All trips out of the Upchurch Subdivision are added to the southbound approach. Intersection peak hour traffic with added trips in and out of the Upchurch Subdivision is summarized below.

		SB			
		96			
EB	70		130	WB	
		98			
		NB			

		SB			
		81			
EB	71		214	WB	
		162			
		NB			

**Intersection Analysis**

Methodology from Chapter 17 of the 2000 Highway Capacity Manual (HCM) was used to approximate average service times for existing and post-development traffic during the morning and evening peak hours. A system of 4 equations in the form of HCM equation (17-46) was solved iteratively to obtain the following values. Values for service time with conflict and service time without conflict were set to 4 seconds and 8 seconds, respectively, per J. Hebert. A Study of Four-Way Stop Intersection Capacities. In *Highway Research Record 27*, HRB, National Research Council, Washington, D.C., 1963.

	Average Intersection Service Time (seconds/vehicle)			
	AM Peak Hour (Existing)	AM Peak Hour (Postdevelopment)	PM Peak Hour (Existing)	PM Peak Hour (Postdevelopment)
Northbound Approach	5.0	5.0	5.5	5.6
Eastbound Approach	4.9	5.0	5.3	5.4
Southbound Approach	5.0	5.0	5.5	5.6
Westbound Approach	4.9	5.0	5.3	5.4

Level of Service references intersection delay. Exhibit 17-22 from the HCM shows levels of service for all way stop controlled (AWSC) intersections.

**EXHIBIT 17-22. LEVEL-OF-SERVICE CRITERIA FOR AWSC INTERSECTIONS**

Level of Service	Control Delay (s/veh)
A	0–10
B	> 10–15
C	> 15–25
D	> 25–35
E	> 35–50
F	> 50

The subject intersection is well within Level of Service A for existing and post-development conditions.

A study by Kyte and Marek estimates that the lowest typical capacity for a single approach is 434 vehicles per hour, and the lowest typical capacity for an AWSC 4-way intersection is 1412 vehicles per hour (Kyte and Marek. Estimating Capacity and Delay at a Single-Lane Approach, All-Way Stop-Controlled Intersection. In *Transportation Research Record 1225*, University of Idaho, Moscow, ID, 1989.)

In addition, Kyte and Marek’s analysis of 25 hours of footage of 8 intersections suggests that average delay remains constant at approximately 5 seconds per vehicle up to a flow rate of 300 vehicles per hour on a single approach. This agrees with the analysis performed here per the HCM.

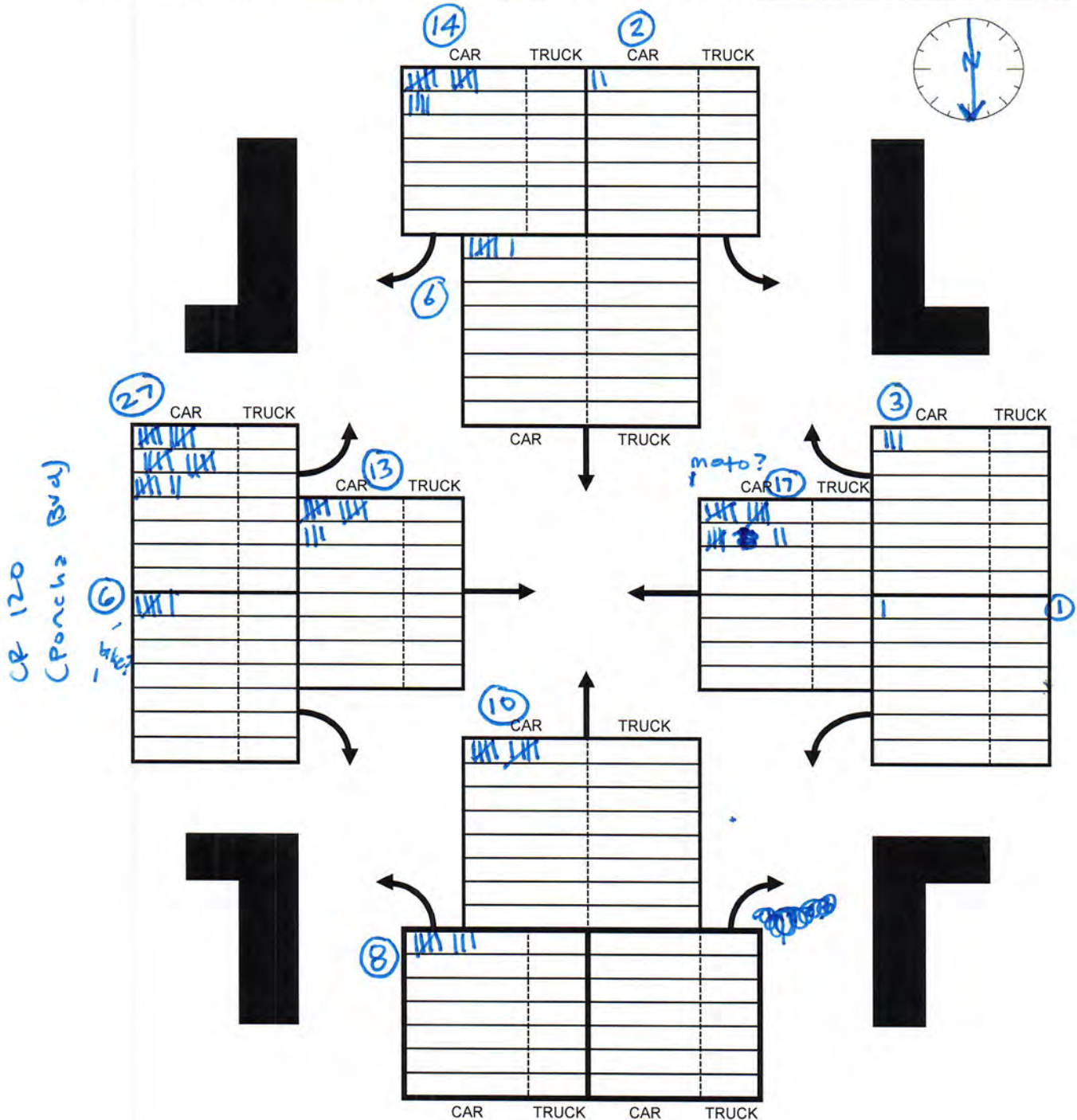
**Conclusion**

Additional traffic generated by the Upchurch Subdivision will have negligible impact on service times at the intersection of County Road 140, County Road 120, Holman Avenue, and Poncha Boulevard.

**AM VEHICLE TURNING MOVEMENT COUNTS (15 min. intervals)**

JOB NUMBER : 20036 INTERSECTION : CR 120/CR 140  
 JOB TITLE : UPCHURCH TIME : 8:00 ~~8:15~~ TO : ~~8:30~~ 8:15  
 OBSERVER : CECILY ANDERSON DAY : TUESDAY  
 OBSERVER PHONE # : (719) 539-1675 DATE : 7/13/2021  
 OBSERVER LOCATION : N.E. Corner WEATHER : cool, cloudy, 64°

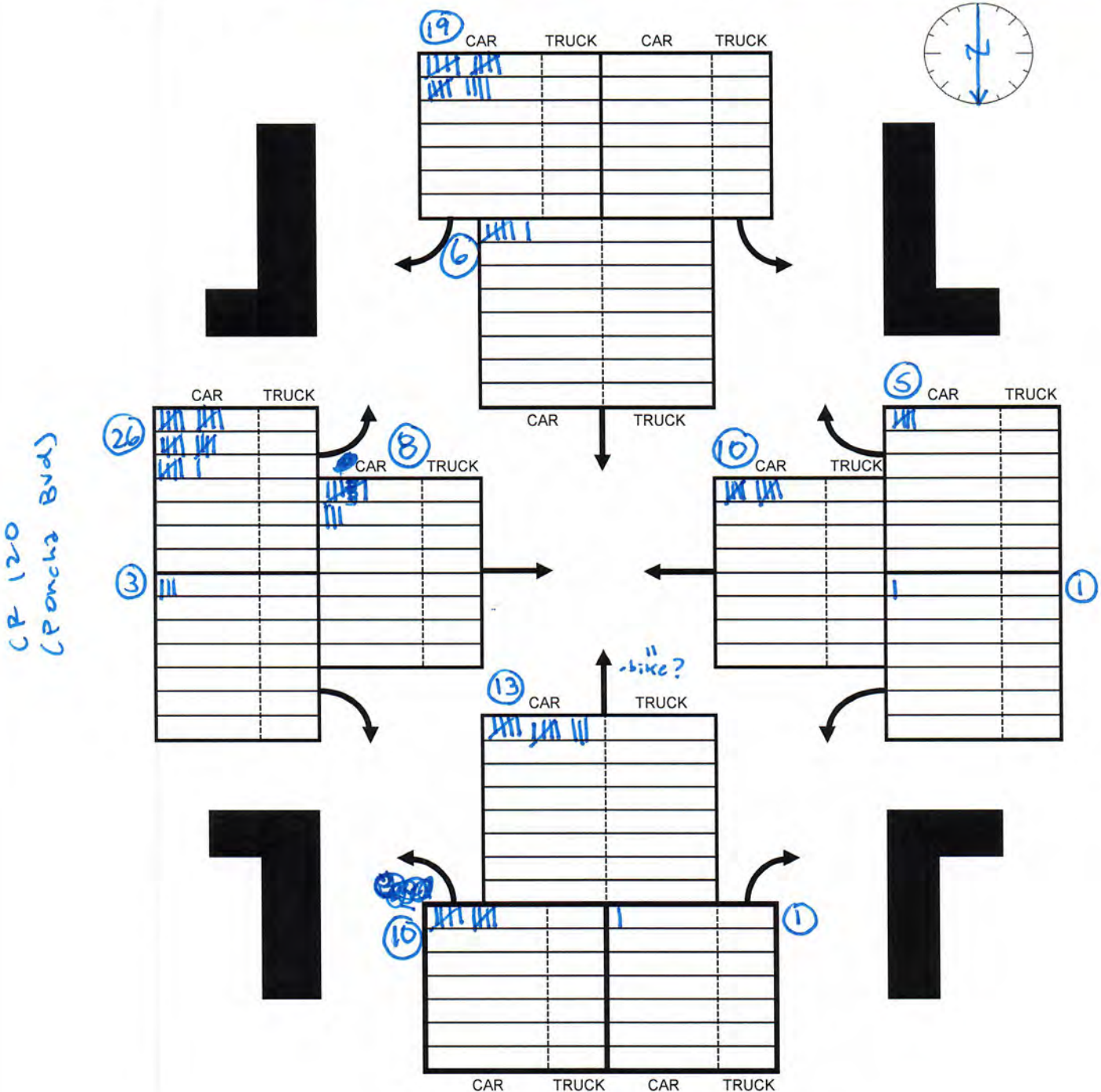
STREET NAME (E-W) : CHAFFEE COUNTY ROAD 120 STREET NAME (N-S) : CHAFFEE COUNTY ROAD 140



**AM VEHICLE TURNING MOVEMENT COUNTS (15 min. intervals)**

JOB NUMBER : 20036 INTERSECTION : CR 120/CR 140  
 JOB TITLE : UPCHURCH TIME : 7:45 TO : 8:00  
 OBSERVER : CECILY ANDERSON DAY : TUESDAY  
 OBSERVER PHONE # : (719) 539-1675 DATE : 7/13/2021  
 OBSERVER LOCATION : N.E. corner WEATHER : Cool, cloudy, 64°

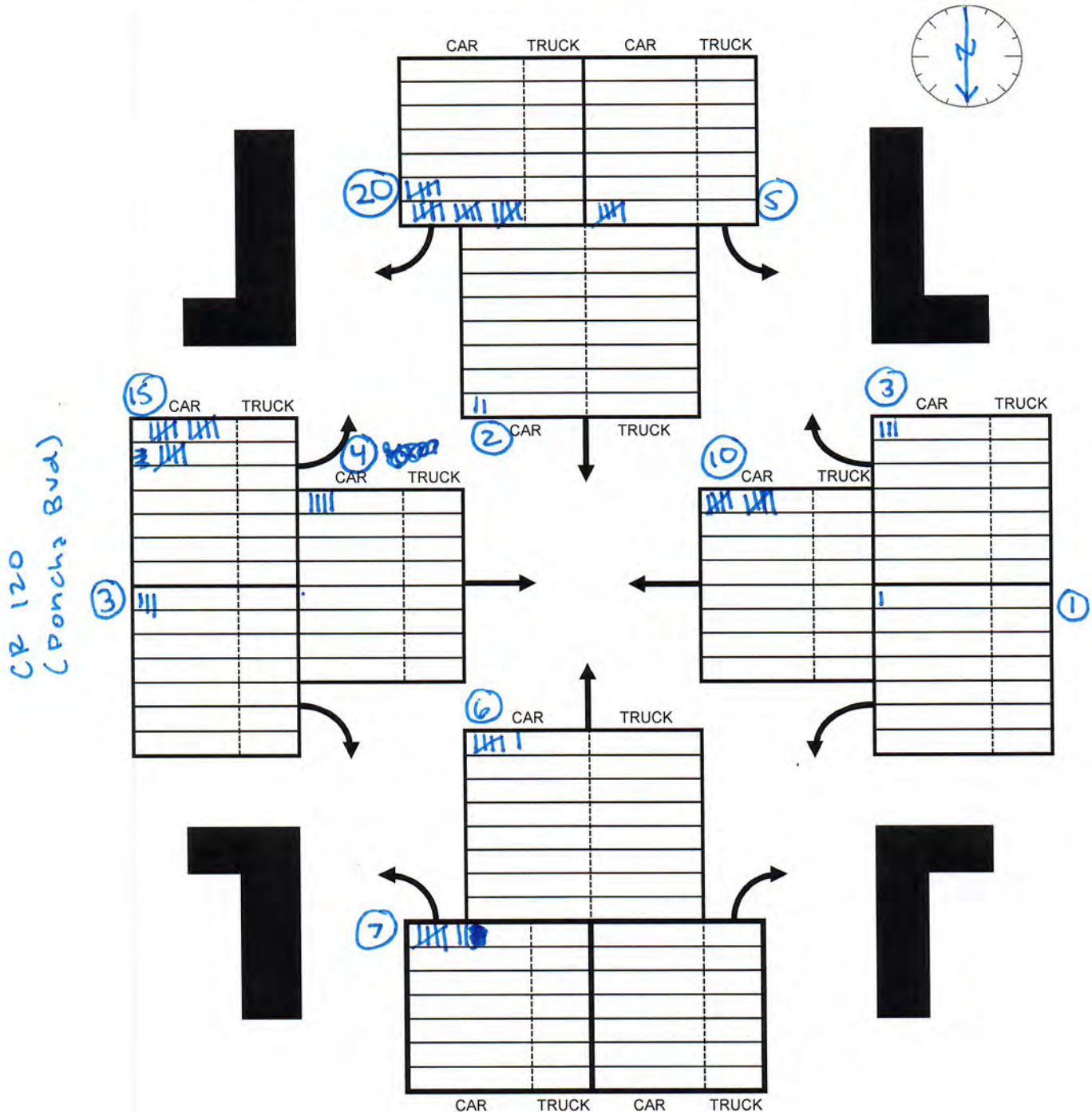
STREET NAME (E-W) : CHAFFEE COUNTY ROAD 120 STREET NAME (N-S) : CHAFFEE COUNTY ROAD 140



**AM VEHICLE TURNING MOVEMENT COUNTS (15 min. intervals)**

JOB NUMBER : 20036 INTERSECTION : CR 120/CR 140  
 JOB TITLE : UPCHURCH TIME : 7:30 TO : 7:45  
 OBSERVER : CECILY ANDERSON DAY : TUESDAY  
 OBSERVER PHONE # : (719) 539-1675 DATE : 7/13/2021  
 OBSERVER LOCATION : N.E. Corner WEATHER : COOL, cloudy, 63°

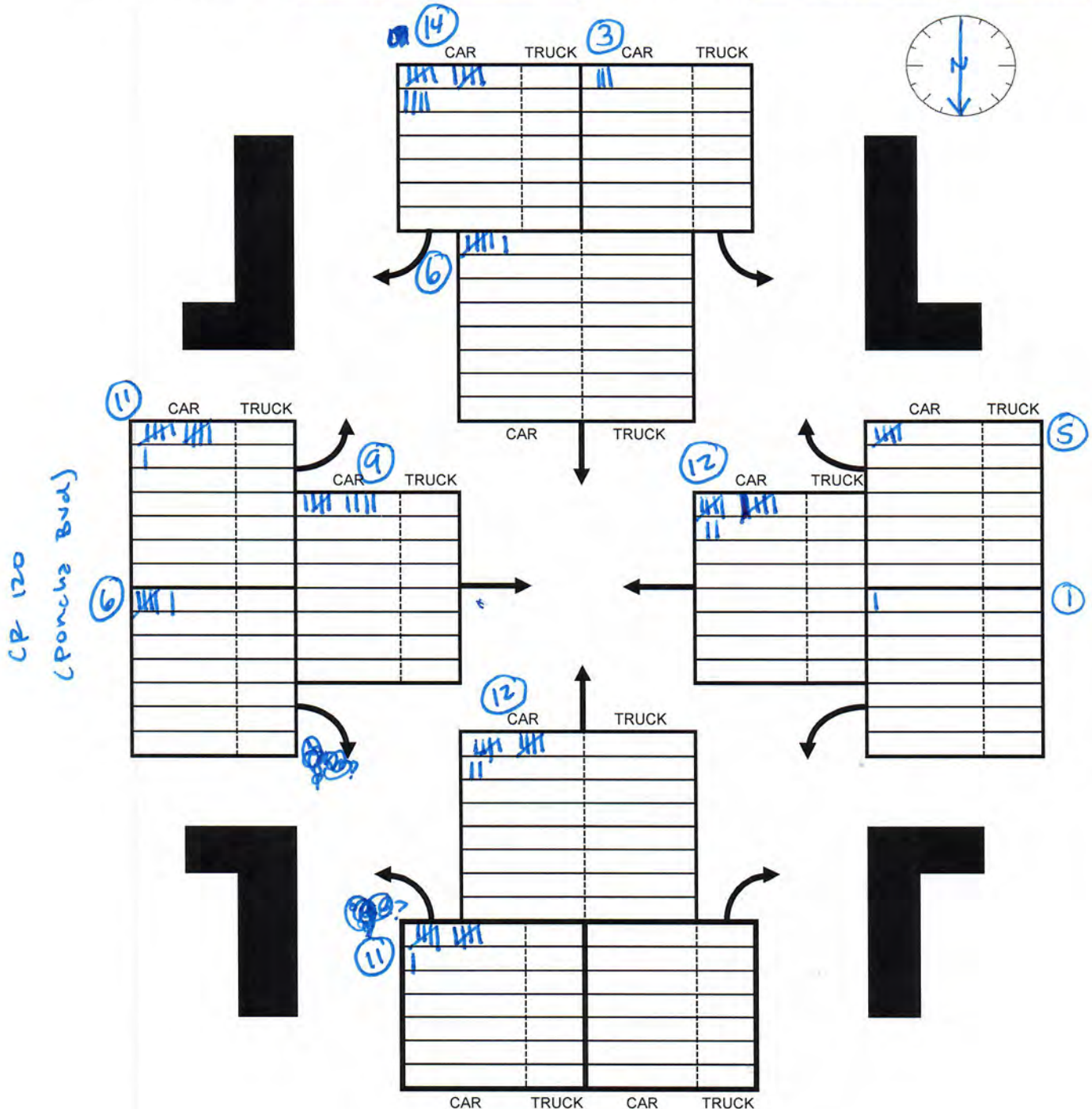
STREET NAME (E-W) : CHAFFEE COUNTY ROAD 120 STREET NAME (N-S) : CHAFFEE COUNTY ROAD 140



**AM VEHICLE TURNING MOVEMENT COUNTS (15 min. intervals)**

JOB NUMBER : 20036 INTERSECTION : CR 120/CR 140  
 JOB TITLE : UPCHURCH TIME : 8:15 ~~8:00~~ TO : ~~8:00~~ 8:30  
 OBSERVER : CECILY ANDERSON DAY : TUESDAY  
 OBSERVER PHONE # : (719) 539-1675 DATE : 7/13/2021  
 OBSERVER LOCATION : N.E. Corner WEATHER : Cool, cloudy, 64°

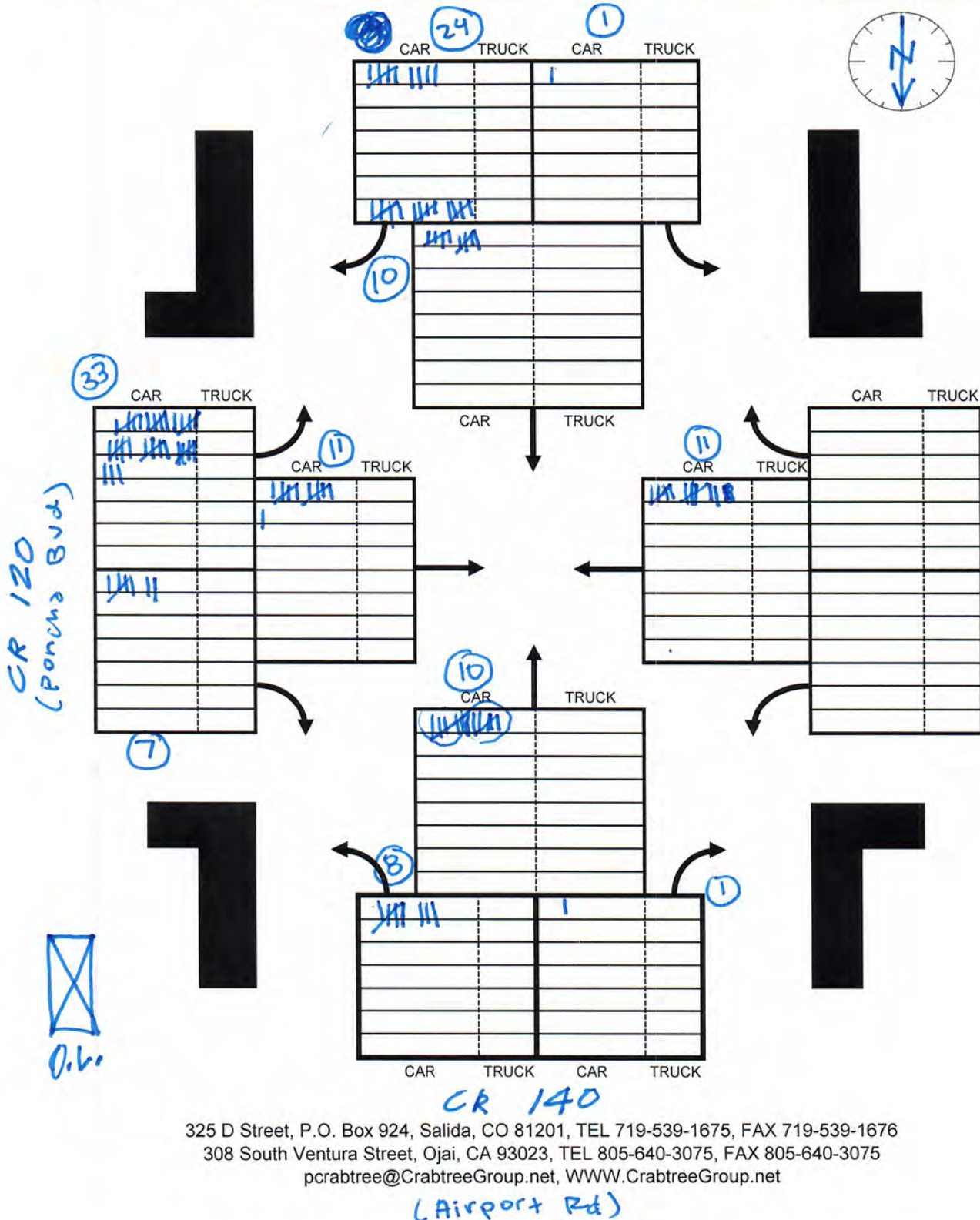
STREET NAME (E-W) : CHAFFEE COUNTY ROAD 120 STREET NAME (N-S) : CHAFFEE COUNTY ROAD 140



**PM VEHICLE TURNING MOVEMENT COUNTS (15 min. intervals)**

JOB NUMBER : 20036 INTERSECTION : CR 120/CR 140  
 JOB TITLE : UPCHURCH TIME : 4:30 TO : 4:45  
 OBSERVER : CECILY ANDERSON DAY : MONDAY  
 OBSERVER PHONE # : (719) 539-1675 DATE : 7/12/2021  
 OBSERVER LOCATION : N.E. CORNER WEATHER : HOT, PARTLY CLOUDY, 88°

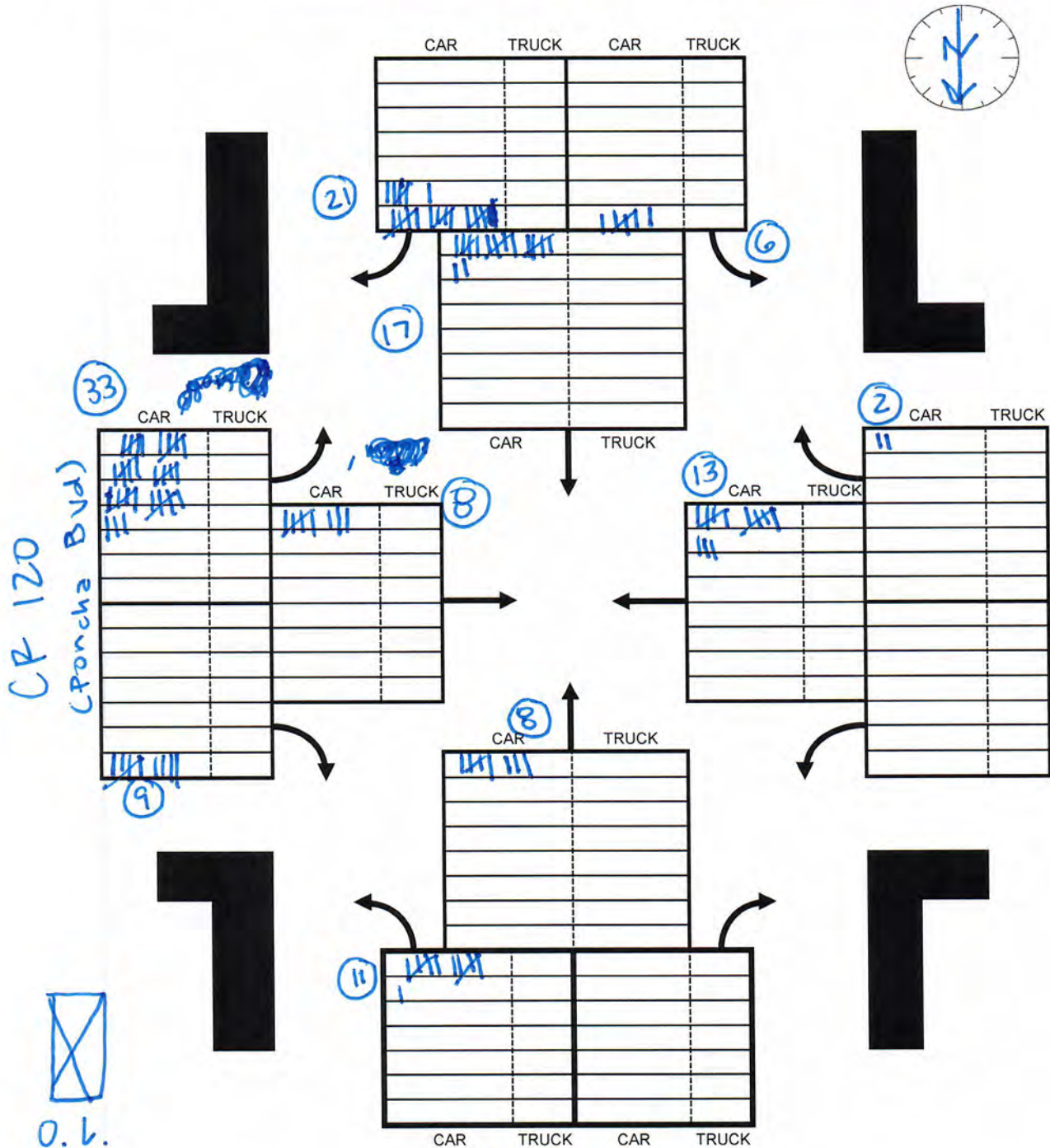
STREET NAME (E-W) : CHAFFEE COUNTY ROAD 120 STREET NAME (N-S) : CHAFFEE COUNTY ROAD 140



**PM VEHICLE TURNING MOVEMENT COUNTS (15 min. intervals)**

JOB NUMBER : 20036 INTERSECTION : CR 120/CR 140  
 JOB TITLE : UPCHURCH TIME : 4:45 pm TO : 5:00 pm  
 OBSERVER : CECILY ANDERSON DAY : MONDAY  
 OBSERVER PHONE # : (719) 539-1675 DATE : 7/12/2021  
 OBSERVER LOCATION : NE corner WEATHER : hot, partly cloudy, 88°

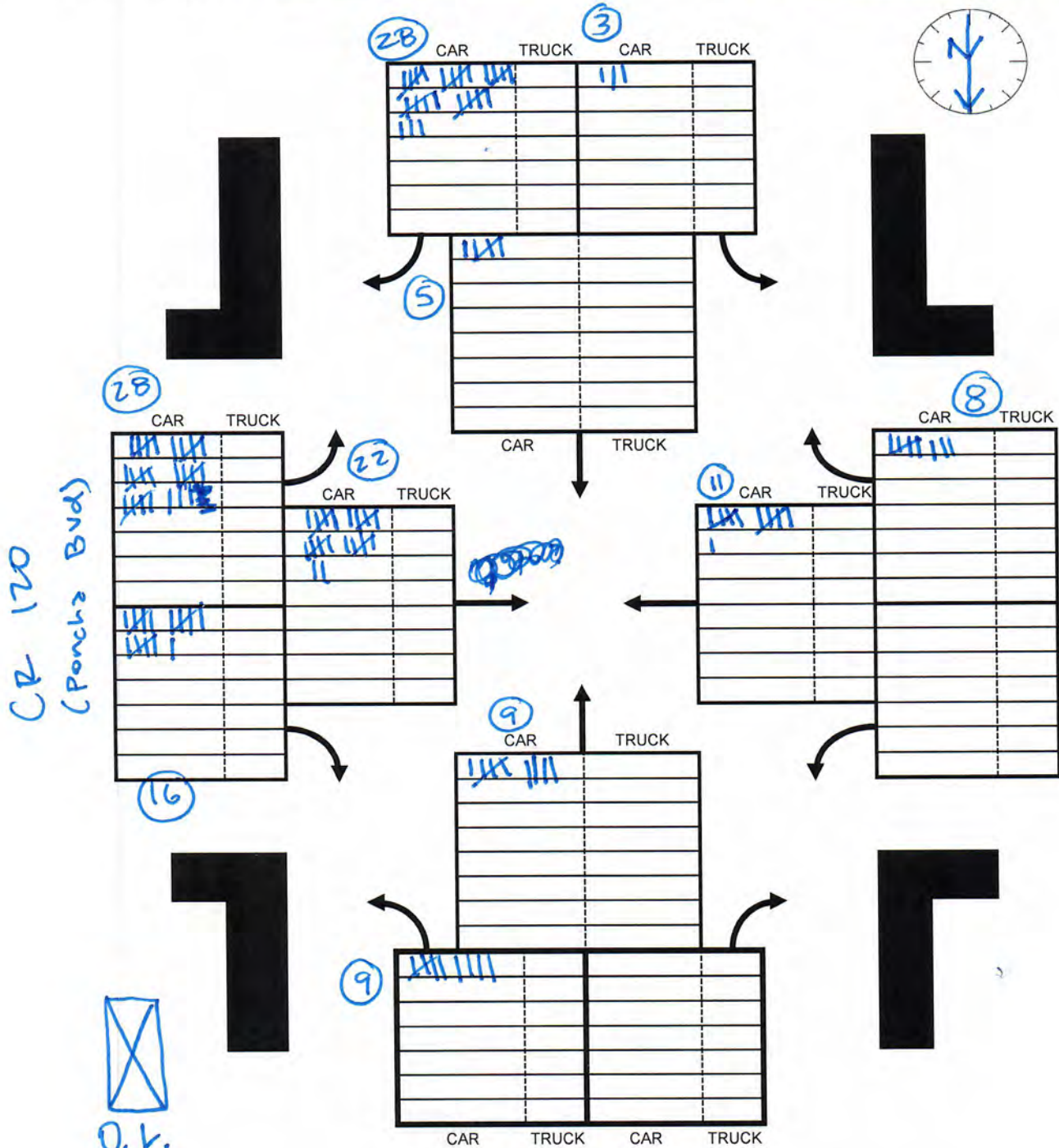
STREET NAME (E-W) : CHAFFEE COUNTY ROAD 120 STREET NAME (N-S) : CHAFFEE COUNTY ROAD 140



**PM VEHICLE TURNING MOVEMENT COUNTS (15 min. intervals)**

JOB NUMBER : 20036 INTERSECTION : CR 120/CR 140  
 JOB TITLE : UPCHURCH TIME : 5:00 pm TO : 5:15 pm  
 OBSERVER : CECILY ANDERSON DAY : MONDAY  
 OBSERVER PHONE # : (719) 539-1675 DATE : 7/12/2021  
 OBSERVER LOCATION : NE corner WEATHER : hot, partly cloudy, 88°

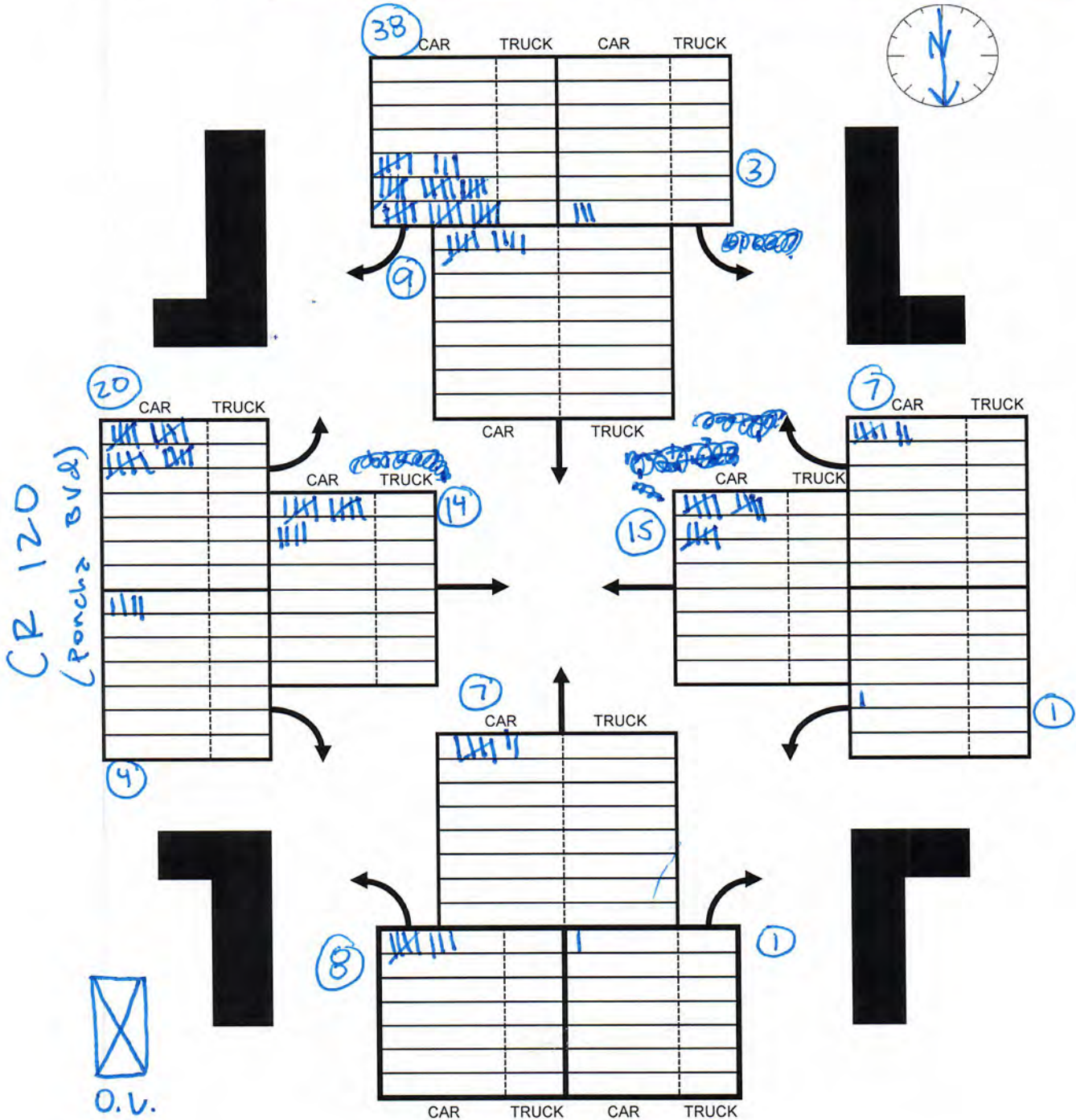
STREET NAME (E-W) : CHAFFEE COUNTY ROAD 120 STREET NAME (N-S) : CHAFFEE COUNTY ROAD 140



**PM VEHICLE TURNING MOVEMENT COUNTS (15 min. intervals)**

JOB NUMBER : 20036 INTERSECTION : CR 120/CR 140  
 JOB TITLE : UPCHURCH TIME : 5:15 TO : 5:30  
 OBSERVER : CECILY ANDERSON DAY : MONDAY  
 OBSERVER PHONE # : (719) 539-1675 DATE : 7/12/2021  
 OBSERVER LOCATION : NE corner WEATHER : hot, partly cloudy, 88°

STREET NAME (E-W) : CHAFFEE COUNTY ROAD 120 STREET NAME (N-S) : CHAFFEE COUNTY ROAD 140



**UPCHURCH ANNEXATION  
AGREEMENT**

THIS ANNEXATION AGREEMENT ("Agreement") is made and entered into this 26th day of April, 2021, by and between the CITY OF SALIDA, COLORADO, a Colorado statutory city ("City"), and Tory and Clee Upchurch ("Annexor"), City and Annexor each a "Party," and together referred to as the "Parties."

**Section 1 - Recitals**

- 1.1 This agreement relates to certain lands known as the "Upchurch Annexation," and more particularly described on attached **Exhibit A**, which is incorporated herein by this reference (the "Property"). The Annexor is 100% fee title owner of this area, exclusive of the public streets and alleys.
- 1.2 The Property is contiguous to the current municipal boundaries of the City and contains approximately 5.32 acres, more or less, in unincorporated Chaffee County, Colorado.
- 1.3 The Annexor desires to have the Property annexed to the City, and the City desires to annex the Property on the terms and conditions set forth herein.
- 1.4 Under Colorado law, the City may not annex the Property without the consent of the Annexor.
- 1.5 On December 14, 2020, the Annexor filed with the City Clerk a petition for annexation of the Property ("Annexation Petition").
- 1.6 The City has determined that the Annexation Petition complies with the Colorado Municipal Annexation Act of 1965, as amended, Colorado Revised Statutes sections 31-12-101 through 123 (the "Annexation Act"), and Chapter 16, Article IX of the City of Salida Municipal Code.
- 1.7 The City has accepted the Annexation Petition, has given all notices and conducted all hearings required by the Annexation Act, has determined that the Property is eligible for annexation to the City, and has made all necessary findings in support of the annexation of the Property.
- 1.8 On March 22, 2021, the Salida Planning Commission held a public hearing and reviewed the annexation map and all required supportive information and has submitted a written recommendation to the City Council to approve the proposed annexation.
- 1.9 On April 20, 2021, the City Council adopted Ordinance No. 2021-05 annexing the Property to the City.
- 1.10 The City and the Annexor desire to enter into this Agreement to set forth their agreements concerning the terms and conditions of the annexation of the Property to the City and the zoning and development of the Property.

1.11 The City and the Annexor acknowledge that the terms and conditions hereinafter set forth are reasonable; within the authority of each to perform; necessary to protect, promote, and enhance the health, safety, and general welfare of the residents and property owners of the City; and mutually advantageous.

NOW, THEREFORE, for and in consideration of the mutual promises and covenants contained herein, and other good and valuable consideration, the receipt and sufficiency of which is hereby acknowledged, the City and the Annexor agree as follows:

**Section 2 – Definitions**

As used in this Agreement, the following terms have the following meanings:

- 2.1 “Agreement” means this Annexation Agreement. The Recitals in Section 1 above are fully incorporated into this Agreement and made a part hereof by this reference.
- 2.2 “Annexation Act” means sections 31-12-101 through 123, Colorado Revised Statutes.
- 2.3 “Annexation Petition” means the Petition for Annexation of the Property filed of record with the City Clerk on December 14, 2020.
- 2.4 “Annexor” means Tory and Clee Upchurch, and the successor(s), assigns and agent(s).
- 2.5 “City” means the City of Salida, a Colorado statutory City.
- 2.6 “City Code” means the City of Salida Municipal Code (SMC).
- 2.7 “City Council” means the City Council of the City of Salida, Colorado.
- 2.8 “CR” means County Road.
- 2.9 “Effective Date” means the date on which City Council adopted a resolution approving the execution of this Agreement. On the Effective Date, this Agreement will become binding upon and enforceable by the City and the Annexor.
- 2.10 “Final Annexation Approval” means that all of the following have occurred:
  - 2.10.1 City Council has adopted a resolution approving the execution of this agreement;
  - 2.10.2 The effective date of Ordinance No. 2021-05, annexing the Property to the City, has occurred; and
  - 2.10.3 The effective date of Ordinance No. 2021-06, zoning the Property has occurred.
- 2.11 “Property” means the land that is described as the Upchurch Annexation in the Annexation

Petition and that is legally described in attached **Exhibit A**, exclusive of any existing public streets and alleys.

- 2.12 **“Reimbursable Costs and Fees”** means all fees and costs incurred by the City in connection with the City’s processing and review of the proposed annexation, including without limitation processing and review of the Annexation Petition, zoning applications, and development proposals; and the City’s drafting, review, and execution of this Agreement.

**Section 3 – Purpose of Agreement and Binding Effect**

- 3.1 The purpose of this Agreement is to establish a contractual relationship between the City and the Annexor with respect to the annexation of the Property, and to establish the terms and conditions upon which the Property will be annexed, zoned, and developed. The terms, conditions, and obligations described herein, including without limitation restrictions upon the zoning and development of the Property, are contractual obligations of the Parties, and the Parties waive any objection to the enforcement of the terms of this Agreement as contractual obligations.
- 3.2 This Agreement benefits and is binding upon the City, the Annexor, and the Annexor’s successor(s). Unless otherwise specified herein, the Annexor’s obligations under this Agreement constitute a covenant running with the Property. As described in Section 9.13 below, the Annexor shall record this Agreement with the Clerk and Recorder of Chaffee County, Colorado.

**Section 4 – Annexation of Property**

- 4.1 The Annexor agrees to the Annexation of the Property, and the City agrees that it will annex the Property, only in accordance with the terms and conditions of this Agreement.

**Section 5 – Terms and Conditions for Annexation of Property**

- 5.1 All terms and conditions imposed by this Agreement are in addition to and not in place of any and all requirements of the City Code, the Annexation Act, and all other applicable laws and regulations.
- 5.2 Annexation of the Property to the City will not be effective until both of the following conditions have been met:
  - 5.2.1 The Annexor and the City have mutually executed and delivered this Agreement; and
  - 5.2.2 Final Annexation Approval has occurred.
- 5.3 **Zoning of Property.**

- 5.3.1 At its April 20, 2021 meeting, the City Council approved zoning the Property as Medium Density Residential (R-2).
- 5.3.2 Nothing in this Agreement limits, restricts, or abrogates in any way, and this Agreement is not to be construed to limit, restrict, or abrogate in any way, the power or authority of the City to rezone the Property or any portion thereof at any time after annexation, either on the City’s own motion or in response to a zoning petition.
- 5.4 Future Subdivision and Development of Property.
  - 5.4.1 The Annexor’s intent is to develop the property into approximately twenty-four (24) lots, some of which may be subsequently subdivided into additional lots and developed in accordance with the R-2 zoning standards pursuant to other limitations/conditions listed below. The Annexor has indicated a desire to build approximately forty-three (43) units including a variety of single-family, duplexes, triplexes, and multi-family units which will generally increase the density of the site as it goes from the north and west to the south and east. The Annexor will be required to go through the relevant land use review process in order to receive approvals for such a proposed development. This Agreement must be amended and approved by City Council if the Annexor proposes to develop the property at a significantly higher density and impact than described herein.
  - 5.4.2 Annexor agrees that any lots created on property immediately adjacent to CR 141 shall be developed with detached single-family primary dwellings, shall have a minimum lot size of 7,500 square feet (“SF”), and shall have no less than 50 feet of rear lot line frontage onto CR 141. If accessory dwelling units (“ADUs”) are developed on lots immediately adjacent to CR 141, said ADUs shall be subject to the same frontage restrictions of the primary dwellings.
  - 5.4.3 Up to three (3) lots at or around the northwest corner may have less than the required minimum lot frontage facing onto the proposed internal street, but such frontage shall be no less than 20 feet, and proposed development upon said lots shall follow the applicable approval processes set forth in the City Code.
  - 5.4.4 Annexor agrees that no vehicle access to or from CR 141 shall be allowed in any future development on the Property without either the approval of Chaffee County, or annexation of relevant portions of CR 141 into the City of Salida through the applicable City review and approval process.
  - 5.4.5 Annexor agrees that no primary or accessory dwelling units within any future development on the Property shall have frontage on CR 141 without either the approval of Chaffee County, or annexation of relevant portions of CR 141 into the City of Salida through the applicable City review and approval process.
  - 5.4.6 Annexor agrees to provide pedestrian access between CR 140 and the northern stretch of CR 141 within any future development on the Property. Annexor shall

enter into a subdivision improvement agreement or development agreement, which shall determine the details of the improvements to such access.

- 5.4.7 A cash in-lieu fee for Parks, Trails and Open Space shall be required at the time of issuance of a building permit for each unit within the development on the Property, pursuant to the requirements of the City Code.
- 5.4.8 Annexor agrees to give a preference to current Chaffee County residents and/or workforce for a minimum of six (6) non-inclusionary housing units within any future development on the Property, to the extent permitted by law. Such local marketing and vetting shall be the Annexor’s responsibility, with guidance provided by City staff and the Chaffee County Housing Authority. Annexor further agrees to keep these housing units off the market, and off public listing services, for at least six (6) months in order to market such units towards, and sell such units to, Chaffee County residents and/or workforce. Annexor further agrees to give quarterly updates to the City, through the Community Development Director, regarding such Chaffee County preference program.
- 5.4.9 Annexor agrees that a Traffic Impact Analysis, prepared by a qualified expert, which shall include projections of traffic volumes to be generated by the development and traffic flow patterns, to determine the impacts of the proposed development on surrounding streets and to evaluate the need for future road improvements, is and shall be required before any development on the Property. Annexor further agrees and acknowledges, that Annexor shall be responsible for any and all street and road improvements deemed necessary by said Traffic Impact Analysis, as provided for in Section 5.6.6.5 of this Agreement.
- 5.4.10 Annexor shall enter into either a subdivision improvement agreement, or development agreement, that includes guarantees for the construction of the public street improvements described in paragraphs 5.8.1 and 5.8.2; and the extension of public water and sewer mains described in paragraphs 5.8.1 and 5.9; and guarantees the construction of which per paragraph 5.10, prior to recordation of the subdivision or development.
- 5.4.11 Annexor shall resolve the “area of overlap” and/or property ownership discrepancy on the southern portion of the property, as shown on the draft annexation plat, prior to obtaining any building permits on the Property, and Annexor shall provide proof to City Community Development Staff of filing the necessary paperwork and proof of beginning the necessary process to resolve same prior to recordation of this Annexation Agreement and the Annexation Plat.

5.5 Inclusionary Housing. The Annexor volunteers and agrees to meet the inclusionary housing requirements of Article XIII of Chapter 16 of the City Code, pursuant to the following conditions:

5.5.1 The inclusionary housing requirement shall be met through the construction of actual physical housing units, and the fee-in-lieu per unit referenced in Chapter 16, Article XIII of the City Code shall only be permitted to satisfy such requirements for any partial unit remaining beyond the 12.5% requirement. The first of such built inclusionary housing units shall receive certificate of occupancy (“CO”) prior to the eighth (8<sup>th</sup>) unit on the Property receiving CO or, if provided via multi-family housing, the first of such required inclusionary housing units shall receive CO prior to the twelfth (12<sup>th</sup>) unit on the Property receiving CO, and the last of such required units shall receive CO prior to the 24<sup>th</sup> unit on the Property receiving CO. The number of units required to be physically built will be specified within the subdivision improvement agreement or development agreement, based upon the 12.5% City Code requirement.

5.5.2 For any affordable inclusionary housing unit(s) required to be built within the development on the Property, the Annexor shall be required to deposit the applicable Inclusionary Housing fee-in-lieu for each required unit at the time of issuance of a building permit. Once the required affordable unit(s) has received certificate of occupancy, such fees-in-lieu deposit shall be returned to the Annexor.

5.6 Utilities and Municipal Services. The City shall provide the Property the usual and customary municipal services provided by the City within its municipal limits generally, in accordance with the City Code and City policies. Limitations upon the availability of City utility service may exist from time to time. The Property is and will remain subject to all policies, ordinances, rules, regulations, platting restrictions, and permitting procedures currently in effect or enacted in the future to allocate or regulate the use of the City’s utility resources generally throughout the City.

5.6.1 Water and Wastewater Service. The City shall provide water and wastewater treatment services to the Property upon the same basis as such services are provided to other properties within the City, subject to the rules and regulations given in Section 13 of the City Code, as it exists now and as it may be amended. Water and wastewater treatment service are available on a “first come, first served” basis, and the availability of such services is determined at the time application therefore is made. The City’s obligation to provide water and wastewater treatment service to the Property is contingent upon the City’s certification that all water and wastewater facilities and all water- and wastewater-related improvements on the Property conform to approved plans and specifications and all applicable City standards for those facilities and improvements. Connection to the City’s treated water and wastewater treatment facilities will be at the then-prevailing fees and rates for such connection and service. Additionally, the following provision shall apply:

5.6.1.1 Provided that water mains within the development will be looped, will front each parcel, and will extend to the west end of the property along CR 140, as required by City Code and City of Salida Design Standards and anticipated by the Annexor’s conceptual design, future subdivision and development of the Property shall not require the Annexor to provide

water and sewer main extensions within either CR 141 nor CR 140, other than as needed to serve future development of the Property. However, significant changes to the development design may require re-evaluation of this determination which shall be approved at the Public Works Director's sole discretion.

[REDACTED]

5.6.2 Fire Protection Services. The City shall provide fire protection services to the Property upon the same basis as such services are provided to other properties within the City.

[REDACTED]

5.6.4 Police Services. The City shall provide police services to the Property upon the same basis as such services are provided to other property within the City.

5.6.5 Electric, Natural Gas, Telephone, Cable TV, and Other Utility Services. The City does not provide electric, natural gas, telephone, or cable TV facilities or services. Such services are available within the City from private entities. The extension of such services to the Property is not the obligation or responsibility of the City.

5.6.6 Streets and Roads. Within its municipal boundaries, the City shall maintain any duly dedicated and accepted public streets and roads that serve the Property, both on- and off-site, upon the same basis as such services are provided to other properties within the City, and provided that the following provisions shall also apply, as set forth below:

5.6.6.1 The Annexor shall, at time of development of the Property, improve the annexed portion of CR 140 fronting the Property site, pursuant to City Code and all City Design Standards, including and relating, but not limited to, curb, gutter, sidewalk, street trees and parking on the north side; provide a crosswalk across CR 140 to the shared path on the south side in a location approved by City staff; and provide a minimum 2-inch overlay over both drive lanes of CR 140 along the frontage of the annexed property and extended to the west intersection with CR 141, or reconstruct said road if it is for grade, at the direction of the Public Works Director.

5.6.6.2 Annexor agrees that any future development or subdivision on the Property shall include the requirement that a public street and applicable utilities be

stubbed to the south property line in alignment with Shepherd Road, before development occurs.

5.6.6.3 Roads shall be designed in accordance with the City Design Standards, including, but not limited to, applicable requirements related to sidewalk construction and of right-of-way dedication, unless otherwise permitted by the Public Works Director. It is noted that a 40 ft ROW on the west end of such a subdivision, in addition to other access requirements, would be sufficient and a sidewalk would only be required on the east side of said ROW. A 20 ft dedication of ROW will be required of the adjacent property to the west at time of annexation for that parcel.

5.6.6.4 Any future development on the Property shall meet the City's fire turnaround and street connectivity requirements for roads, streets and rights-of-way.

5.6.6.5 Annexor shall also be responsible for any and all additional street and road improvements deemed necessary by the Traffic Impact Analysis required in Section 5.4.9 of this Agreement.

5.7 Fees. The Annexor shall pay to the City the fees described below at the time set forth below:



5.7.1 Annexor's Reimbursement of Processing Fees. The Annexor shall reimburse the City for all fees and actual costs incurred by the City in connection with the City's processing and review of the proposed annexation, including without limitation processing and review of the Annexation Petition, zoning applications, and development proposals, and the City's drafting, review, and execution of this Agreement ("Reimbursable Costs and Fees").

5.7.1.1 The Reimbursable Costs and Fees include but are not limited to the City's costs incurred for engineering, surveying, and legal services, including the services of outside City consultants and/or counsel; recording fees; printing and publication costs; and any and all other reasonable costs incurred by the City. Interest will be imposed at rate of 1.5% per month on all balances not paid to the City within thirty (30) days of the effective date of the City's invoicing of the Annexor for the Reimbursable Costs and Fees, with that effective date determined in accordance with Section 9.7 below. In addition to any and all remedies available to the City and in the event the City is forced to pursue collection of any amounts due and unpaid under this provision or under this Agreement, the City shall be entitled to collect attorney's fees and costs incurred in said collection efforts in addition to the amount due and unpaid.

5.7.1.2 The City shall provide Annexor, at a minimum quarterly initiating from the Effective Date, with itemized billing for all Reimbursable Costs and Fees incurred by the City in relation to the project, pursuant to the terms of the "City of Salida Special Fee and Cost Reimbursement Agreement," executed by both the City and Annexor upon the of submission of Annexor's Annexation Petition.

5.7.2 Payment of Currently Existing Fees as a Condition of Annexation. The Annexor shall pay to the City any fees required to be paid under this Agreement or the currently existing City Code, regardless of whether the relevant provisions of the City Code are later amended, repealed, or declared to be invalid. Payment of such fees pursuant to this Agreement is agreed to by and between the Parties as a condition of the annexation, and as a pre-condition to any development review. The Annexor further agrees not to contest any ordinance imposing such fees as they pertain to the Property, provided City Staff make themselves available for any inquiries or questions, should Annexor ask questions regarding same.

5.7.3 Open Space Fee. Annexor agrees to a payment in lieu of Parks, Trails and Open Space, at the time of a building permit for each lot within the subdivision and or development on the Property, as required by the City Code.

5.7.4 Fair Contributions for Public School Sites. Per Section 16-6-140(c)(1) Annexor agrees to a payment in lieu of public school site dedication or conveyance in the amount then in effect, currently \$444.66 per residential dwelling unit, at the time of issuance of a building permit.

5.8 Dedications, Easements and Road Improvements. At no cost to the City, the Annexor shall dedicate or convey to the City all rights-of-way, easements, and public land reasonably required by the City, as set forth below, and within this Agreement. The City may require dedication of rights-of-way, easements, or public land at any time construction thereof or thereon is deemed necessary in the public interest, and reasonably related to the development of the Property, provided such dedications are required in this Agreement or a subsequent subdivision agreement or development agreement.

5.8.1 Annexor shall dedicate public utility easements for all City water and sewer mains constructed and installed on the Property.

5.8.2 Additionally, Annexor shall construct any and all right-of-way, sidewalk and other improvements as required by the City Design Standards and City Code.

5.9 Water and Sewer Mains. The Annexor shall extend sewer and water mains within the Property as approved by the City Public Works Director, or his/her designee.

5.10 Subdivision/Development Agreement and Performance Guarantee. Annexor shall enter into a subdivision agreement or a development agreement that includes the requirement that with respect to public improvements under this Section 5 and under the City Code, the Annexor shall deliver to the City a reasonable performance guarantee in the form of cash, a letter of credit, a cash bond, a performance bond, or another security instrument acceptable

to and approved in writing by the City Attorney to secure the performance of such public and other required improvements, in an amount equal to one hundred twenty-five (125%) of the estimated cost of said improvements.

- 5.11 Drainage. Prior to any future development of the Property, the Annexor shall obtain the City's approval of a master drainage plan that complies with all applicable laws, regulations, and ordinances. The Annexor's activities, operations, and development on the Property must comply with the master drainage plan and with all applicable laws, ordinances, and regulations pertaining to drainage.
- 5.12 Short-Term Rental License. City agrees to permit one short-term rental ("STR") license within the development at the Property, in a location to be determined by the Annexor. Such license shall not be counted towards, or subject to, the City's overall cap on STRs in residential areas but shall count towards the one license per block face maximum. Such license shall not be transferred or transcrable.

**Section 6 – Zoning**

- 6.1 The Annexor requests and consents to Medium Density Residential District (R-2). Upon Final Annexation Approval, the Property will be subject to and must adhere to all applicable zoning regulations of the City, as those regulations may be amended. The Annexor shall cease and desist from any non-conforming uses on the Property within one (1) year from the date of Final Annexation Approval. In that one (1) year period, there must be no expansion of any non-conforming use.

**Section 7 – Breach by Annexor and City's Remedies**

- 7.1 In the event of a breach of any of the terms and conditions of this Agreement by the Annexor, the City may take any action necessary or appropriate to enforce its rights, including without limitation any or all of the following:
  - 7.1.1 The refusal to issue any building permit or Certificate of Occupancy to the Annexor; provided, however, that this remedy will be unavailable to the City until after the affidavit described in Section 7.1.2 below has been recorded; and provided further that this remedy will not be available against a bona fide third party.
  - 7.1.2 The recording with the Chaffee County Clerk and Recorder of a first affidavit approved in writing by the City Attorney and signed by the City Administrator or the City Administrator's designee, declaring that the terms and conditions of this Agreement have been breached by the Annexor. At the next regularly scheduled City Council meeting following recording of such first affidavit, the City Council shall either approve the filing of said first affidavit or direct the City Administrator to file a second affidavit declaring that the default has been cured and nullifying the first affidavit. Upon the recording of a first affidavit, no parcels or portions thereof on the Property may be sold until the default has been cured. An affidavit signed by the City Administrator or the City Administrator's designee and approved by the City Council declaring that the default has been cured will remove this restriction and be

sufficient evidence when recorded that the default has been cured.

- 7.1.3 A demand that any performance guarantee given for completion of any public improvement be paid or honored.
- 7.1.4 The refusal to allow further development review for the Property.
- 7.1.5 Any other remedy available in equity or at law.
- 7.2 Unless immediate action is necessary to protect the health, safety, or welfare of the City's residents, the City shall give the Annexor thirty (30) days' written notice of the City's intent to take any action under this Section 7, during which 30-day period the Annexor may cure the breach described in said notice and prevent further remedial action by the City. In the event the breach is not cured within the 30-day period, the City will consider whether the Annexor has undertaken reasonable steps to timely complete the cure if additional time is required.
- 7.3 The District Court of the County of Chaffee, State of Colorado, will have exclusive jurisdiction to resolve any dispute over this Agreement.
- 7.4 Any waiver by the City of one or more terms of this Agreement will not constitute, and is not to be construed as constituting, a waiver of other terms. A waiver of any provision of this Agreement in any one instance will constitute, and is not to be construed as constituting, a waiver of such provision in other instances.

**Section 8 – Indemnification and Release**

- 8.1 Release of Liability. The Annexor acknowledges that the City cannot be legally bound by the representations of any of its officers or agents or their designees except in accordance with the City Code, City ordinances, and the laws of the State of Colorado, unless such representations are specifically approved in writing by the City Administrator's office or the City Council. The Annexor further acknowledges that it acts at its own risk with respect to relying or acting upon any representation or undertaking by the City or its officers or agents or their designees, which representation or undertaking subsequently is held unlawful by a court of competent jurisdiction.
- 8.2 Indemnification.
  - 8.2.1 The Annexor shall indemnify and hold harmless the City, and the City's officers, agents, employees, and their designees, from and against any and all claims, damages, losses, and expenses, including but not limited to attorneys' fees and costs, arising from or in connection with the following: (a) the City's approval of the proposed annexation, (b) the City's approval of the proposed zoning, (c) any approval given during development review of the Property; (d) except to the extent of any actual negligence on the part of the City, and the City's officers, agents, employees, and their designees, any road or sidewalk enlargement, extension, realignment, improvement, or maintenance, or approval thereof; or (e) any other

item contained in this Agreement.

8.2.2 Nothing in this Agreement obligates or compels the City to proceed with any action or referendum position, other than as the City Council, in its sole discretion, directs.

**Section 9 – General Provisions**

- 9.1 **Waiver of Defects.** In executing this Agreement, the Annexor waives all objections it may have to any defects in the form or execution of this Agreement concerning the power of the City to impose conditions on the Annexor as set forth herein. The Annexor further waives all objections it may have to the procedure, substance, and form of the ordinances or resolutions adopting this Agreement.
- 9.2 **Final Agreement.** This Agreement supersedes and controls all prior written and oral agreements and representations of the Parties with respect to the subject matter hereof, and is the total integrated agreement between the Parties.
- 9.3 **Modifications.** This Agreement may be modified only by a subsequent written agreement executed by both Parties.
- 9.4 **Voluntary Agreement.** The Annexor agrees to comply with all of the terms and conditions of this Annexation Agreement on a voluntary and contractual basis, as a condition of annexation of the Property to the City.
- 9.5 **Election.** The Annexor represents and submits that to the extent an election would be required by the Annexation Act to approve the annexation or impose terms and conditions upon the Property to be annexed, the Annexor owns one hundred percent (100%) of the Property to be annexed, and would vote to approve the annexation and all terms and conditions as set forth herein. Thus, any election necessarily would result in a majority of the electors' approval to the annexation and the terms and conditions.
- 9.6 **Annexor's Representations.** All written representations of the Annexor, as set forth in the Annexation Petition and zoning application, and all documents previously or subsequently submitted with reference thereto, are to be considered incorporated into this Annexation Agreement as if set forth in full herein.
- 9.7 **Survival.** The City's and the Annexor's representations, covenants, warranties, and obligations set forth herein, except as they may be fully performed before or on the Effective Date, will survive the Effective Date and are enforceable at law or in equity.
- 9.8 **Notice.** All notices required under this Agreement must be in writing and must be hand-delivered or sent by registered or certified mail, return receipt requested, postage prepaid, to the addresses of the Parties as set forth below. All notices so given will be considered effective immediately upon hand-delivery, and seventy-two (72) hours after deposit in the United States Mail with the proper address as set forth below. Either Party by notice so given may change the address to which future notices are to be sent.

Notice to the City: City of Salida  
Attn: City Administrator and City Attorney  
448 East First Street  
Salida, CO 81201

Notice to the Annexor: Tory and Clee Upchurch  
2112 Ann Arbor Avenue  
Austin, TX 78704

- 9.9 Terms and Conditions as Consideration for Annexation. The Annexor acknowledges that the City's decision to annex the Property is at the City's sole discretion. In consideration for the City's agreement to annex, the Annexor agrees to be bound by all of the terms and conditions of such annexation contained herein, and further acknowledges that such terms and conditions are requisite to the City's decision to annex the Property. The Annexor further agrees and acknowledges that its decision to proceed with annexation is a voluntary act of the Annexor, and that the Annexor has the sole and absolute discretion to withdraw its petition for annexation in lieu of such voluntary act.
- 9.10 Applicable Laws, Ordinances, and Regulations. The Annexor understands and agrees that the Property, upon annexation, and all subsequent development of the Property, will be subject to and bound by the applicable provisions of laws, ordinances, resolutions, regulations, and policies of the City or the State as they exist at the time of annexation and as they may from time to time be amended or adopted. Nothing in this Agreement constitutes or is to be construed as constituting a repeal of existing ordinances or regulations, or as a waiver or abnegation of the City's legislative, governmental, or police powers to protect the health, safety, and general welfare of the City and its inhabitants.
- 9.11 Termination. In the event that the annexation of the Property is for any reason not completed, this Agreement will terminate and become null and void and of no force and effect. In such an event, the Annexor shall pay all Reimbursable Costs and Expenses incurred by the City to the time of termination, if Annexor terminates this Agreement or causes this Agreement to be terminated. Otherwise, unless and until the Property is disconnected from the City in accordance with Colorado law, including without limitation Colorado Revised Statutes sections 31-12-601 through 31-12-605, the term of this Agreement is perpetual.
- 9.12 Severability. The terms of this Agreement are severable. If a court of competent jurisdiction finds any provision hereof to be invalid or unenforceable, the remaining terms and conditions of the Agreement will remain in full force and effect.
- 9.13 Recording. The Annexor shall record this Agreement with the Clerk and Recorder of Chaffee County, Colorado.
- 9.14 No Third-Party Beneficiaries. Nothing in this Agreement, express or implied, confers or is intended to confer any rights or remedies whatsoever upon any person or entity other than the City, the Annexor, and the Annexor's successor(s).

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472070 7/7/2021 10:10 AM  
14 of 16 AGR R\$88.00 D\$0.00

Lori A Mitchell  
Chaffee County Clerk

\*472250\*

472250 7/13/2021 1:29 PM  
17 of 19 ORD R\$103.00 D\$0.00

Lori A Mitchell  
Chaffee County Clerk

WHEREFORE, the parties hereto have executed duplicate originals of this Agreement on the day and year first written above.



CITY OF SALIDA, COLORADO

By *[Signature]*  
Mayor Pro Tem, Dan Shore

ATTEST:

*[Signature: Erin Kelley]*

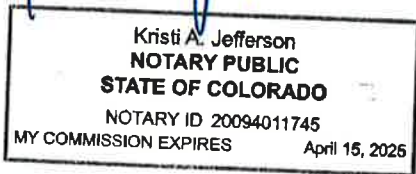
City Clerk

STATE OF COLORADO )  
  ) ss.  
COUNTY OF TARRANT )

Acknowledged, subscribed, and sworn to before me this 22<sup>nd</sup> day of April 2021 by Dan Shore Pro-tem, as Mayor, and by Erin Kelley, as Clerk, on behalf of the City of Salida, Colorado.

WITNESS my hand and official seal.  
My Commission expires: April 15, 2025.

*[Signature: Kristi A. Jefferson]*



Notary Public

TORY AND CLEE UPCHURCH

By *[Signature: Tory Upchurch]*  
Tory Upchurch

By *[Signature: Clee Upchurch]*  
Clee Upchurch

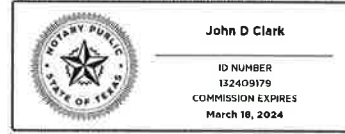
STATE OF TEXAS )  
  ) ss.  
COUNTY OF TARRANT )

Lori A Mitchell  
Chaffee County Clerk

Acknowledged, subscribed, and sworn to before me this 26th day of April, 2021 by  
Tory Upchurch, as Annexor of the Property.

WITNESS my hand and official seal.  
My Commission expires: 03/18/2024.

*[Signature]*



**Notary Public**  
Notarized online using audio-video communication

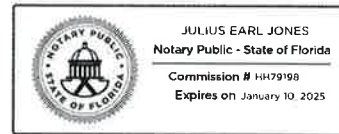
STATE OF Florida )  
 ) ss.  
COUNTY OF Escambia )

Acknowledged, subscribed, and sworn to before me this 26th day of April, 2021 by  
Clee Upchurch, as Annexor of the Property.

WITNESS my hand and official seal.  
My Commission expires: 01/10/2025.

*[Signature]*

Julius Earl Jones



**Notary Public**

Notarized online using audio-video communication

\*472250\*

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472250 18 of 19 ORD R\$103.00 D\$0.00

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Lori A Mitchell  
Chaffee County Clerk

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Lori A Mitchell  
Chaffee County Clerk

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**Exhibit A - The "Property"**

**LEGAL DESCRIPTION**

ALL THAT TRACT OF LAND LOCATED IN THE SOUTHEAST QUARTER OF THE SOUTHWEST QUARTER OF SECTION 31, TOWNSHIP 50 NORTH, RANGE 9 EAST OF THE NEW MEXICO PRINCIPAL MERIDIAN, CHAFFEE COUNTY, COLORADO, BEING MORE PARTICULARLY DESCRIBES AS FOLLOWS:

BEGINNING AT THE SOUTHWEST CORNER OF DUPLEX 4-A, BOUNDARY LINE ADJUSTMENT AND REPLAT OF COCHETOPA ESTATES, AS RECORDED AT RECEPTION NO. 309631 IN THE OFFICE OF THE CHAFFEE COUNTY CLERK & RECORDER, MARKED BY A 1 1/2" ALUMINUM CAP STAMPED LS 16117, FROM WHENCE A 2 1/2" ALUMINUM CAP STAMPED "RM", LS 16117 BEARS SOUTH 86°38'21" WEST, A DISTANCE OF 13.80 FEET;  
THENCE SOUTH 01°25'11" WEST, A DISTANCE OF 82.16 FEET TO THE SOUTHERLY RIGHT-OF-WAY OF CHAFFEE COUNTY ROAD NO. 140;  
THENCE NORTH 88°35'30" WEST ALONG SAID CHAFFEE COUNTY ROAD NO. 140, A DISTANCE OF 777.08 FEET;  
THENCE CONTINUING ALONG SAID SOUTHERLY RIGHT-OF-WAY OF CHAFFEE COUNTY ROAD NO. 140 NORTH 88°34'33" WEST, A DISTANCE OF 497.11 FEET;  
THENCE NORTH 00°58'40" EAST, A DISTANCE OF 80.87 FEET TO THE SOUTHWEST CORNER OF THE PROPERTY DESCRIBED IN BOOK 379 AT PAGE 269 IN THE OFFICE OF THE CHAFFEE COUNTY CLERK & RECORDER AND THE NORTHERLY RIGHT-OF-WAY OF SAID CHAFFEE COUNTY ROAD NO. 140, MARKED BY A 1" ALUMINUM CAP STAMPED LS 1776;  
THENCE SOUTH 88°38'54" EAST ALONG SAID NORTHERLY RIGHT-OF-WAY OF CHAFFEE COUNTY ROAD NO. 140, A DISTANCE OF 185.05 FEET TO THE SOUTHEAST CORNER OF SAID PROPERTY DESCRIBED IN BOOK 379 AT PAGE 269;  
THENCE NORTH 00°52'55" EAST, A DISTANCE OF 220.83 FEET TO THE NORTHEAST CORNER OF SAID PROPERTY DESCRIBED IN BOOK 379 AT PAGE 269;  
THENCE NORTH 88°32'00" WEST, A DISTANCE OF 184.68 FEET TO THE NORTHWEST CORNER OF SAID PROPERTY DESCRIBED IN BOOK 379 AT PAGE 269 AND ON THE EASTERN RIGHT-OF-WAY OF CHAFFEE COUNTY ROAD NO. 141;  
THENCE NORTH 00°58'40" EAST ALONG SAID EASTERN RIGHT-OF-WAY OF CHAFFEE COUNTY ROAD NO. 141, A DISTANCE OF 124.84 FEET TO THE SOUTHERLY RIGHT-OF-WAY OF SAID CHAFFEE COUNTY ROAD NO. 141;  
THENCE SOUTH 88°31'21" EAST ALONG SAID SOUTHERLY RIGHT-OF-WAY OF SAID CHAFFEE COUNTY ROAD NO. 141, A DISTANCE OF 801.81 FEET TO THE NORTHWEST CORNER OF LOT 1, 141 ANNEX MINOR SUBDIVISION AS RECORDED AT RECEPTION NO. 447958 IN THE OFFICE OF THE CHAFFEE COUNTY CLERK & RECORDER;  
THENCE SOUTH 01°29'04" WEST, A DISTANCE OF 333.01 FEET TO THE SOUTHWEST CORNER OF THE PROPERTY DESCRIBED AT RECEPTION NO. 279296 IN THE OFFICE OF THE CHAFFEE COUNTY CLERK & RECORDER AND A POINT ON SAID NORTHERLY RIGHT-OF-WAY OF CHAFFEE COUNTY ROAD NO. 140;  
THENCE SOUTH 88°30'29" EAST ALONG SAID NORTHERLY RIGHT-OF-WAY OF CHAFFEE COUNTY ROAD NO. 140, A DISTANCE OF 416.06 FEET, TO THE SOUTHEAST CORNER OF THE PROPERTY DESCRIBED AT RECEPTION NO. 389150 IN THE OFFICE OF THE CHAFFEE COUNTY CLERK & RECORDER;  
THENCE SOUTH 78°51'30" EAST, A DISTANCE OF 60.86 TO THE POINT OF BEGINNING.  
CONTAINING 7.90 ACRES, MORE OR LESS

ity and the Board of Health to short-term rental units during any creates a public health, safety, ssue.

to the appropriate regulations eas of unincorporated Chaffee rt-term rentals will have and ) have adverse impacts on residences and the community ch impacts include, but are to establishing unsustainable rce pressure for present and area wage earners, a scarcity e housing options within the ted areas of Chaffee County, i in the number of housing able to present and future age earners, and diminished ds and community character lity, all of which may damage ealth, safety, and welfare. The f short-term rentals within the ad areas of Chaffee County will ublic health, safety, and welfare hat such accommodations are a manner consistent with the Chaffee County, neighboring ses, and adopted codes and and will lessen the negative short-term rentals have on the nd surrounding areas.

ounty does not have adequate ations with respect to potential f short-term rentals and for administration of licenses n rentals within unincorporated ty.

**ADOPTED BY THE BOARD OF COMMISSIONERS OF CHAFFEE COUNTY, COLORADO**

The foregoing recitals are herein and made a part of this

1. This ordinance applies to rental units only, as that term is defined, as a "Vacation Home" (VRBO) in Article 15 of the Code (LUC) and Article 7 § 1 LUC, which requires licensing standards to apply to VRBOs. Rental and VRBO shall be interchangeably and interpreted to fit with the definition of VRBO of the LUC. This ordinance applies to hotels, motels, lodges, and breakfast establishments, rental units. This Ordinance overrides any private covenants prohibiting short-term rental units during periods when is not being used as a short-term and is instead being used for personal use by the owner of such rental unit is defined as the parties for more than thirty (30) calendar days to a single renter

**Definitions.**  
**County Resident Owner** means a management of a full-time resident who is an applicant as the responsible person for a short-term rental unit and who is physically based in the county and who is available 24) hours per day, seven (7) days a week, to respond as the initial point of contact for the short-term rental unit and to respond to emergencies at any time within one (1) hour of the receipt of notice of the emergency. The local agent may be the short-term rental unit manager and must have authority to take remedial

Chaffee County who intends to lease or lease the property or a portion thereof as a short-term rental unit.

**Renter** means the party to a written lease or rental agreement that has obtained the temporary right to use and occupy a short-term rental unit or a portion thereof.

**Short-term rental unit** has the same meaning as set forth in Article 15 of the Chaffee County Land Use Code and may be used interchangeably with VRBO.

**Section 4. Licenses Required.**  
 It is unlawful for an Owner to lease, advertise for lease, or permit the leasing of any short-term rental unit within the County without a valid license issued by the County pursuant to this ordinance and LUC.

**Section 5. Application Requirements.**  
**A. Contents of Application.** A complete application for a short-term rental license must be submitted to the County. The application shall be in writing on forms provided and approved by the County. Or submitted through any on-line application process approved by the county. In addition to any requirements in the LUC the following documents and information must be included with the application for the application to be considered complete:

1. The name, address, and contact information of the local agent for the proposed short-term rental unit;
2. Any requirements of the LUC, including but not limited to:
  - a. Sales and lodging tax license information if rented outside of any online platform;
  - b. A site plan showing the location of the buildings on the property;
  - c. A scaled floor plan noting the location of necessary egress windows, fire extinguishers, smoke alarms, and carbon monoxide detectors;
  - d. HOA approval, if applicable; and
3. If necessary for a Chaffee County Resident Owner, proof of primary residence.

**B. License Fee.** All fees as set forth by the Board by resolution.

**Section 6. Application Approval.**  
 Short-term rental license applications shall be administratively reviewed and approved by the County's designee(s), following the process outlined in this ordinance and the LUC. The County's designee(s) shall not approve an application for a short-term rental license or issue a short-term rental license unless:

1. Applicant has submitted a complete application, including payment of all applicable fees;
2. Applicant has provided proof of a current filing of a Personal Property Declaration with the Chaffee County Assessor's Office detailing all personal property in the short-term rental unit;
3. Applicant has provided proof the short-term rental unit is currently up to date on all assessed property taxes;
4. The proposed short-term rental unit does not exceed the maximum number of licenses available per year, as stated and enumerated herein; and
5. The proposed short-term rental unit is in compliance with all applicable County codes and ordinances.

**Section 7. Term of License.**

**A. Term.** All short-term rental licenses shall be effective from January 1st through December 31st each year regardless of issuance date. Applicants shall be responsible for paying the entire fee, regardless of when applicant applies or is issued a short-term rental license. County staff shall process all timely received applications by February 1st and from February 1st to the 28th, staff will process any applications received up to the annual cap as set forth herein. County staff shall not accept, process or review any short-term rental application after February 28.

**B. Renewal.** All short-term rental licenses must be renewed annually. All renewal applications must be submitted online prior to January 31st on forms provided and approved by the County, and will be reviewed and processed in the order received based on date and time stamp of submission. All short-term rental licenses and renewals shall be subject to the annual cap as set forth herein. All renewal applications meeting the requirements herein and as set forth in the LUC, and submitted by the deadline and with the applicant in good standing will be approved up to the maximum annual cap as set forth herein. Any license renewal or

short-term rental license annual cap basis. Notwithstanding the foregoing, if the short-term rental license annual cap is met for a given year, only Chaffee County Resident Owners will be placed on a waiting list on a first-come, first-served basis in the order of the applications received, which will be rolled over to the subsequent year. Those Chaffee County Resident Owners will be given priority to apply for a short-term rental license for the following license year if the following year's annual cap is not met. (As an example, if Jane Doe, a Chaffee County Resident Owner, applies for a short-term rental license in 2021 and the cap in 2021 is ten and all ten licenses have already been issued, Jane Doe will be placed on the waiting list. If in 2022 only nine of the ten prior short-term rental licenses are renewed, Jane Doe will be allowed to apply for the one available license.)

**Section 8. Limitations and Requirements.**

**A. Local Agent.** The Local Agent for a short-term rental unit shall have access to, and authority to assume management of, the short-term rental unit and take remedial measures as necessary. The Local Agent shall be available to respond to tenant or neighbor concerns regarding the property twenty-four (24) hours a day, seven (7) days a week. Local Agents must respond to complaints, regardless of the source of the complaint, involving the short-term rental unit within twenty-four (24) hours and shall respond to emergencies at the short-term rental unit within one (1) hour of the agent's receipt of notice of the emergency.

**B. Maximum Number of Licenses Per Year.** There shall be a maximum number of short-term rental licenses available per year (January 1st through December 31st), which shall equal six percent (6%) of the total number of residential housing units within unincorporated Chaffee County, also referred to herein as "annual cap." The total number of residential housing units shall be determined by the County using information from the Chaffee County Assessor as determined by August 1st each year. Notwithstanding the foregoing, the maximum number of short-term rental licenses available shall not exceed either six percent (6%) of the total number of residential housing units within unincorporated Chaffee County or three hundred and ten (310) total licenses per year, whichever is fewer.

**C. Non-Transferability.** No short-term license granted pursuant this ordinance or LUC shall be transferable to a different applicant, owner, entity, or property.

**Section 9. Denial of Application.**

The County or its Designee shall deny a short-term rental license application or renewal application for any one or more of the following reasons:

- A. The applicable provisions of this Ordinance, the Land Use Code, or Building Code have not been met;
- B. The required application fees have not been paid;
- C. The short-term rental unit has failed to file and pay for the current year for Personal Property Declaration;
- D. The short-term rental unit has any delinquent property tax assessment liability;
- E. The application is incomplete or contains false, misleading, or fraudulent statements;
- F. The owner, local agent, or other agent of the owner, the property or short-term rental unit is currently in violation or has failed to comply with this ordinance, the Land Use Code, or Building Code;
- G. The applicant is not the legal owner of the property; and
- H. If the application exceeds the short-term rental license annual cap. Upon determining that an application must be denied, the County's Designee shall send a notice of denial to the address provided by the applicant. Such notice of denial shall state the reasons for denial and inform the owner of his or her right to appeal the decision.

**Section 10. Appeal.** An owner may appeal a denial of his or her application to the Board and shall be entitled to a public hearing before the Board. An appeal must be made in writing, stating the grounds for appeal, and delivered to the County within five (5) business days of the date of the notice of denial.

**Section 11. Violation, Penalty and Enforcement.**

**A.** It is unlawful for any person to violate any provision of this ordinance.

**C.** Pursuant to C.R.S. §§ 30-11-101 and 30-15-402, any arresting law enforcement officer enforcing this ordinance is authorized to utilize the penalty assessment procedure provided in C.R.S. § 16-2-201.1

**D.** Pursuant to C.R.S. §§ 30-11-101 and 30-15-402, any person or entity that violates this ordinance shall be guilty of a Class 2 petty offense. For each separate violation, the fine for the first offense and for any subsequent offense shall be a minimum of fifty dollars (\$50.00) and a maximum of no more than one thousand dollars (\$1,000.00).

**E.** In addition to the aforementioned fines and penalties prescribed in this ordinance, any person convicted of a violation of this ordinance shall be subject to the statutory surcharges of ten dollars (\$10.00) for the Victim and Witness Assistance and Law Enforcement Fund. This surcharge shall be paid to the clerk of court by each person convicted of violating this ordinance. The clerk shall transmit the moneys to the respective funds in accordance with C.R.S. § 301-15-402(2).

**F.** This ordinance shall in no way limit application and enforcement of any statutes of the State of Colorado, but shall be in addition thereto.

**G.** This ordinance shall in no way limit application and enforcement of any ordinance, code or rules of Chaffee County, but shall be in addition thereto.

**H.** This ordinance shall be liberally construed so as to further its purpose.

**I.** If any portion of this ordinance is held to be invalid for any reason, such decision shall not affect the validity of the remaining portions of this ordinance. The Board hereby declares this ordinance to be severable and further declares that it would have passed this ordinance and each part hereof irrespective of the fact that any one part be declared invalid.

**J.** The provisions of this ordinance are intended to promote and preserve the health, safety and welfare of the general public. They are not intended to be, nor shall be, construed to create any basis for liability on the part of the County, its officers, elected officials, employees or agents for any injury or damage that an individual, class or group may claim arises from any action or inaction on the part of the County. Likewise, they are not intended to, nor shall be construed to, impose upon the County any duty that can become the basis of a legal action for injury or damage.

Published in The Mountain Mail August 6, 2021

**PUBLIC NOTICE  
 NOTICE OF PUBLIC HEARINGS BEFORE THE PLANNING COMMISSION FOR THE CITY OF SALIDA CONCERNING A MAJOR IMPACT REVIEW APPLICATION**

**TO ALL MEMBERS OF THE PUBLIC AND INTERESTED PERSONS; PLEASE TAKE NOTICE** that public hearings will be conducted by the City of Salida Planning Commission, on August 23, 2021 at or about the hour of 6:00 p.m. remotely through the GoToWebinar application via the following direct link: <https://register.gotowebinar.com/rt/1909092342220683277>. Additionally, depending on which "Tier" of its COVID-19 Action Plan the City of Salida is in on August 23, 2021, based upon Public Health Department guidance, the hearing may also take place in the City Council Chambers, 448 East 1st Street, Salida, Colorado. The hearing concerns a Major Subdivision application for the property described as a property located between County Road 140 and County Road 141, legally known as a Tract in the SE ¼ SW ¼ of Section 31 T50N R9E of the N.M.P.M., Chaffee County, Colorado (the "Upchurch Annexation" property). The application has been submitted by Tory and Cleo Upchurch. The applicants are requesting to split the above 5.32 acre property into 24 lots. Any recommendations by the Planning Commission for the Major Subdivision shall be forwarded to the City Council for review and public hearing at a later date. Interested persons are encouraged to attend the public hearing. Further information on the application may be obtained from the Community Development Department. Published in The Mountain Mail August 6, 2021

## **GEOTECHNICAL STUDY**

Upchurch Annex  
Salida, Colorado



**Report Prepared for:**

**Mr. Tory Upchurch  
2112 Ann Arbor Avenue  
Austin, TX 78704**

**Project No. 21.6099  
July 30, 2021**



**GEOTECHNICAL STUDY**

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Austin, TX 78704**

**Project No. 21.6099  
July 30, 2021**

**Report Prepared by:**



**Darin R. Duran, P.E.  
Principal, Manager Salida and Crested Butte**

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**COMMON ABBREVIATIONS**

<b>AASHTO</b>	<b>American Association of State Highway and Transportation Officials</b>
<b>ABC</b>	<b>aggregate base course</b>
<b>ACI</b>	<b>American Concrete Institute</b>
<b>ADA</b>	<b>Americans with Disabilities Act</b>
<b>ADSC</b>	<b>Association of Drilled Contractors</b>
<b>AI</b>	<b>Asphalt Institute</b>
<b>APM</b>	<b>asphalt paving material</b>
<b>ASCE</b>	<b>American Society of Civil Engineers</b>
<b>ASTM</b>	<b>American Society for Testing and Materials</b>
<b>AWWA</b>	<b>American Water Works Association</b>
<b>bgs</b>	<b>below ground surface</b>
<b>CDOT</b>	<b>Colorado Department of Transportation</b>
<b>CBR</b>	<b>California Bearing Ratio</b>
<b>CFR</b>	<b>Code of Federal Regulations</b>
<b>CGS</b>	<b>Colorado Geological Survey</b>
<b>CKD</b>	<b>cement of kiln dust stabilized subgrade</b>
<b>CMU</b>	<b>concrete masonry unit</b>
<b>CTB</b>	<b>cement treated base course</b>
<b>deg</b>	<b>degree</b>
<b>EDLA</b>	<b>equivalent daily load application</b>
$e_m$	<b>edge moisture variation distance</b>
<b>EPS</b>	<b>expanded polystyrene</b>
<b>ESAL</b>	<b>equivalent single axle loads</b>
$f'c$	<b>specified compressive strength of concrete at the age of 28 days</b>
$F_a$	<b>seismic site coefficient</b>
<b>FHWA</b>	<b>Federal Highway Administration</b>
<b>FS</b>	<b>factor of safety</b>
$F_v$	<b>seismic site coefficient</b>
<b>GSA</b>	<b>global stability analysis</b>
<b>GVW</b>	<b>gross vehicle weight</b>
<b>IBC</b>	<b>International Building Code</b>
<b>ICC-ES</b>	<b>International Code Council Evaluation Services, Inc.</b>
<b>IRC</b>	<b>International Residential Code</b>
<b>kip</b>	<b>1,000 pounds-force</b>
<b>km</b>	<b>kilometer</b>
<b>LTS</b>	<b>lime treated subgrade</b>
<b>MDD</b>	<b>maximum dry density</b>
<b>mg/L</b>	<b>milligrams per liter</b>
<b>MGPEC</b>	<b>Metropolitan Government Pavement Engineers Council</b>
<b>mm</b>	<b>millimeter</b>
$M_r$	<b>resilient modulus</b>
<b>MSE</b>	<b>mechanically stabilized earth</b>
<b>mV</b>	<b>millivolts</b>
<b>NAPA</b>	<b>National Asphalt Pavement Association</b>
$N_{DESIGN}$	<b>design gyrations</b>
<b>OMC</b>	<b>optimum moisture content</b>

**OSHA ..... Occupational Safety and Health Administration**  
**OWTS ..... onsite wastewater treatment system**  
**PCA ..... Portland Cement Association**  
**PCC ..... portland cement concrete**  
**pcf ..... pounds per cubic foot**  
**pci ..... pounds per cubic inch**  
**pH ..... power of hydrogen**  
**psf ..... pounds per square foot**  
**psi ..... pounds per square inch**  
**PT ..... post-tension**  
**S<sub>s</sub> ..... mapped spectral accelerations for short periods**  
**UBC ..... Uniform Building Code**  
**USGS ..... United States Geological Survey**

## **1. PURPOSE**

### **1.1 GENERAL**

Cesare, Inc. (Cesare) performed a geotechnical study for the proposed subdivision to be located at the northeast corner of County Roads 140 and 141 in Salida, Colorado. The study was made to characterize existing subsurface conditions at the site and assist in determining design criteria for planning, site development, pavement sections, foundation systems, interior floor systems, exterior flatwork, surface and subsurface drainage adjacent to structures, and to present other pertinent geotechnical issues. Information gathered during the field exploration and laboratory testing is summarized in Figures 1 through 3 and Appendices A through C. Cesare's opinions and recommendations presented in this report are based on data generated during this field exploration, laboratory testing, and its experience.

### **1.2 SCOPE OF SERVICES**

The scope of services performed is detailed in Cesare's Proposal Agreement No. SC210612 which was executed on June 22, 2021.

## **2. SUMMARY OF FINDINGS AND CONCLUSIONS**

This section is intended as a summary only and does not include design details. The report should be read in its entirety and utilized for design.

- ❑ Subsurface conditions consist of less than 1 foot of topsoil over sandy gravels and gravelly sands with cobbles. No bedrock or groundwater was encountered to the full depths explored of 4 to 5 feet.
- ❑ Spread or pad type footings and slabs-on-grade are appropriate for this site.
- ❑ Good surface drainage should be established and positive drainage away from the structures, pavement, and other site improvements should be provided during construction and maintained throughout the life of the proposed structures.
- ❑ Pavement sections should consist of 3 inches of APM over 6 inches of ABC.

## **3. SITE CONDITIONS**

The site is located northeast corner of County Roads 140 and 141 in Salida, Colorado. A vicinity map is shown in Figure 1. The site is about 5.6 acres and is currently undeveloped land. The site is bound by County Road 141A to the north, County Road 141 to the east, County Road 140 to the south and residential development to the east. A residence exists southwest of the property at the northeast corner of County Roads 140 and 141. The topography of the site is flat with a grade change of about 2% to the east. Vegetation onsite consists of grass and sagebrush. No bodies of water or bedrock outcrops were observed onsite.

## **4. PROPOSED CONSTRUCTION**

The site will be developed into 10 single-family lots, 11 duplex lots, 2 triplex lots, and 1 lot for the Chaffee Housing Trust. The nature of construction of the structures is unknown. The structures will be serviced by offsite wastewater services. The lots will be accessed with a paved drive. Cesare assumes the drive will be paved with APM over ABC.

## 5. GEOLOGIC CONDITIONS

### 5.1 SURFICIAL DEPOSITS

The "Geology and mineral deposits of the Poncha Springs SE quadrangle, Chaffee County, Colorado" prepared for the USGS by Van Alstine, et al, dated 1974, indicates that surficial deposits onsite consist of:

- ☐ C Terrace gravels

## 6. FIELD EXPLORATION

Cesare explored subsurface conditions on July 6, 2021 by excavating four exploratory pits at locations indicated in Figure 1. Exploratory pits were excavated 4 to 5 feet deep using a Bobcat E50 excavator. Graphical logs of the subsurface conditions observed, locations of sampling, and further explanation of the exploration are presented in Appendix A.

## 7. LABORATORY TESTING

Cesare personnel returned samples obtained during field exploration to its laboratory where professional staff visually classified them and assigned testing to selected samples to evaluate pertinent engineering properties. Laboratory tests performed are listed in Table 7.1. Further discussion of laboratory testing and the laboratory test results are presented in Appendix B.

**TABLE 7.1. Laboratory Testing Performed**

<b>Laboratory Test</b>	<b>To Evaluate</b>
Grain size analysis	Grain size distribution for classification purposes.
Atterberg limits	Soil plasticity for classification purposes.
Water soluble sulfate content	Potential corrosivity of the soil on cementitious material.

## 8. SUBSURFACE CONDITIONS

Cesare's exploratory pits encountered

- ☐ C Less than one foot of topsoil.
- ☐ C Overburden soil consisting of gravelly sands and sandy gravels with cobbles, rounded to subrounded clasts, calcareous, slightly moist to moist and light brown to brown in color.
- ☐ C No bedrock or groundwater were encountered to depths of 4 to 5 feet at the time of excavating.
- ☐ C Exploratory Pits EP-1 and EP-2 caved at depths of 2 feet at the time of excavating.

The subsurface conditions encountered in Cesare's borings are reasonably consistent with those described in Section **5. GEOLOGIC CONDITIONS**. These observations represent conditions at the time of field exploration and may not be indicative of other times or other locations. A more complete description of the subsoil conditions encountered is shown in Appendix A.



Photo 1. View of typical soils encountered in the exploratory pits.

## **9. GROUNDWATER**

Groundwater was not encountered to the maximum depth of exploration 5 feet at the time of excavation. Pits were backfilled at the completion of the observations. We do not anticipate groundwater to affect the construction or the development.

## **10. GEOLOGIC HAZARDS**

The following subsections present a cursory review of geologic hazards. A detailed geologic hazards assessment was not the focus of Cesare's scope of services.

### **10.1 RADON**

The U.S. Environmental Protection Agency map of radon zones indicates that virtually all of western Colorado, including Chaffee County, is in Zone 1 ([www.epa.gov/radon/zonemap.html](http://www.epa.gov/radon/zonemap.html)). Although there is no known safe level of radon, Zone 1 is the zone of highest risk for exposure to radon gas (i.e., greater than 4 picoCuries per Liter (pCi/L)). The CGS published a report that related geologic setting and building construction with radon levels (CGS 1991 Open-File Report 91-4). Residences with basements had higher levels of radon than residences built on grade on the same geologic material. The CGS is careful to state that radon potential can vary considerably within the same

geologic unit due to the nonuniform distribution of uranium, secondary leaching, and the accumulation of uranium and other radioactive elements into other strata.

Based on levels of radon recorded in existing residences in the region and the presence of rock types that are known to produce radon, it is reasonable to assume that radon emission into buildings is occurring in the Salida area. The EPA, the Colorado Department of Public Health and Environment (CDPHE) Radiation Management Division, and the National Association of Home Builders (NAHB) recommend that all new residences constructed in Zone 1 include radon resistant features. These organizations also recommend that after the building is constructed, radon should be measured and if the results are greater than 4 pCi/L, the system should be upgraded from passive to active (usually by installing a fan). In the EPA publication titled, Building Radon Out: A Step-by-Step Guide on How to Build Radon-Resistant Homes (USEPA Office of Air and Radiation EPA/402-K-01-002, April 2001), three practical and inexpensive alternatives for passive, sub-slab depressurization systems are presented; gravel with vents, perforated pipes, or soil gas collection mats. Recommendations for passive and active design and construction techniques for reducing radon gas can be found on the EPA radon website [www.epa.gov/radon](http://www.epa.gov/radon) or the CDPHE radon website [www.cdphe.state.co.us/hm/rad/radon](http://www.cdphe.state.co.us/hm/rad/radon).

## **11. FOUNDATION RECOMMENDATIONS**

### **11.1 SPREAD FOOTINGS**

The proposed structures may be founded on conventional spread footings or pad type footings bearing on the sandy gravel/gravelly sand or on controlled, structural fill below frost depth and below any existing manmade fill in accordance with the following design recommendations:

- a) A frost depth of 24 inches should be assumed for this area (Chaffee County Exhibit M to Ordinance 2018-2).
- b) Footings bearing on the sandy gravels/gravelly sands should be designed for a maximum allowable soil bearing pressure of 3,000 psf based on dead load plus full live load. Footings bearing on controlled structural fill should be designed for a maximum allowable soil bearing pressure of 2,500 psf based on dead load plus full live load.
- c) Continuous footings should have a minimum width of 14 inches and isolated pad type footings should have a minimum dimension of 18 inches.
- d) Using the soil pressure recommended above, Cesare estimates the maximum settlement for the structure will be on the order of 1 inch, with differential settlement potentially on the order of 0.5 inches. Footings should be proportioned as much as practicable to reduce differential settlement.
- e) Steel reinforcement for continuous concrete foundation walls should be designed to span localized settlements over a distance of 10 feet.
- f) All soft or loose soil beneath footing areas should be redensified in place, or removed and replaced with properly compacted structural fill, suitable flow fill, or concrete prior to placement of footing concrete.
- g) Particles greater than 12 inches in dimension should be removed from exposed footing subgrade.
- h) Removal of cobbles and/or boulders from the soil at the foundation elevation can result in depressions. These resulting depressions can be backfilled with compacted onsite soil,

ABC or concrete.

- i) All footing excavations should be observed by a Cesare representative prior to placement of concrete to determine if bearing conditions are consistent with those assumed to develop its recommendations.

## 12. LATERAL EARTH PRESSURES

### 12.1 FOUNDATION WALLS

Lateral pressures on walls depend on the type of wall, hydrostatic pressure behind the wall, type of backfill material, and allowable wall movements. Cesare recommends drain systems be constructed behind walls to reduce the potential for hydrostatic pressures to develop. Where anticipated/permmissible wall movements are greater than 0.5% of the wall height, lateral earth pressures can be estimated for an "active" condition. Where anticipated wall movement is less than approximately 0.5% of the wall height or wall movement is constrained, lateral earth pressures should be estimated for an "at rest" condition. Recommended lateral earth pressures for onsite material are provided in Table 12.1.

The recommended values for lateral earth pressures provided in Table 12.1 are given in terms of an equivalent unit weight. The equivalent unit weight multiplied by the depth below the top of the ground surface is the horizontal pressure against the wall at that depth. The resulting pressure distribution is a triangular shape. These soil pressures are for horizontal backfill with no surcharge loading and no hydrostatic pressures. If these criteria cannot be met, Cesare should be contacted for additional criteria.

The unfactored or ultimate coefficients of sliding resistance between concrete and bearing soil are provided in Table 12.1.

**TABLE 12.1. Lateral Earth Pressures and Coefficients of Sliding Resistance for Onsite Material**

Backfill Material Type	Equivalent Unit Weight (pcf)			Coefficient of Sliding Resistance
	Active	At Rest	Passive	
3 inch minus on site sandy gravels/gravelly sands	40	55	300	0.70

### 12.2 THRUST BLOCK LOADS

The subsurface conditions at the proposed sewer and water line locations consist of sandy gravels and gravelly sands. Thrust blocks placed within this material should be designed for a maximum allowable lateral soil bearing pressure of 200 psf/feet of depth. For example, if the thrust block is placed 8 feet deep, then  $200 \text{ (psf/feet)} \times 8 \text{ (feet)} = 1,600 \text{ psf}$ .

## 13. INTERIOR FLOORS

The natural sandy gravel/gravelly sand soil exhibited zero swell and collapse potential. Concrete slabs placed on this material or on properly placed structural fill comprised of this material do not require special considerations for accommodating movement as a result of expansive or collapsing soil.

Cobbles will be encountered at subgrade elevation. Particles greater than 6 inches in dimension should be removed prior to placing the interior floors.

### **13.1 SLAB-ON-GRADE CONSTRUCTION DETAILS**

Cracking of slabs-on-grade can occur as a result of compressing of the supporting soil but also as a result of concrete curing stresses. If slab-on-grade floors are chosen, Cesare recommends that design and construction of all interior slab-on-grade floors incorporate the following considerations and precautions. These details will not reduce the amount of movement but are intended to reduce potential damage should some settlement of the supporting subgrade take place. The ACI Committee 302, "Guide for Concrete Floor and Slab Construction (ACI 302.R-96)" should be consulted regarding methods/techniques to reduce the occurrence of concrete shrinkage cracks and other potential issues associated with concrete finishing and curing.

- a) A vapor barrier is recommended beneath concrete slabs-on-grade that will support equipment sensitive to moisture or will be covered with wood, tile, carpet, linoleum, or other moisture sensitive or impervious coverings. Location of the vapor barrier should be in accordance with recommendations provided by ACI 302.2R-06, "Guide for Concrete Slabs that Receive Moisture-Sensitive Flooring Materials." Further discussion of vapor barriers is presented in Appendix C.
- b) Plumbing beneath slabs should be thoroughly pressure tested during construction for leaks prior to slab placement.
- c) Backfill in the utility trenches beneath slabs should be compacted as specified in Section **17. STRUCTURAL FILL/BACKFILL SOIL.**
- d) Plumbing and utilities that pass through the slab should be isolated from the slabs.
- e) Provide frequent control joints in the slab. Refer to ACI 302.1R-15.
- f) Use of load-transfer devices at construction and contraction joints is recommended when positive load transfer is required (See ACI 302.1R).

### **14. EXTERIOR FLATWORK**

Flatwork supported on foundation wall backfill may settle and crack if the backfill is not properly moisture conditioned and compacted.

Exterior flatwork should be isolated from the structures. Exterior flatwork should be expected to move, although measures can be incorporated into construction to limit the movement or effects of the movement. Cesare recommends flatwork not be doweled into structure foundations, but rather supported on a haunch to limit settlement. The haunch should extend the full length of the slab.

Exterior flatwork, such as driveways and sidewalks, are normally constructed as slabs-on-grade. Porches and patios are increasingly constructed as structurally supported slabs, which in Cesare's opinion, is the most positive means of keeping slabs from moving and adversely affecting the operation of doors or means of egress. Cesare recommends that landings and slabs at egress doors, as well as porches and patios, be constructed as structurally supported elements if potential movement cannot be tolerated.

Simple decks that are not integral to the structure and can tolerate foundation movement can be constructed with less substantial foundations. A short pier or footing bottomed below frost depth can be used if movement is acceptable and if acceptable by local building requirements. Use of deeper foundation elements can reduce potential movement. Footings or short piers should not be underlain by wall backfill, due to risk of settlement. Inner edges of decks may be constructed on haunches and detailed such that movement of the deck foundations will not cause distress to the structure.

#### 14.1 OVERHANGING ROOFS

Porches, patios, or decks with overhanging roofs that are integral to the structure, such that foundation movement cannot be tolerated, should be constructed with the same foundation type as the structure.

### 15. EXCAVATIONS

Conventional earthmoving equipment should be adequate to excavate the onsite soil. The sandy gravels and gravelly sands will collapse. All excavations should be properly sloped and/or braced, and local and federal safety codes observed. Slopes and other areas void of vegetation should be protected against erosion. If temporary shoring is required, a contractor specializing in design and construction of shoring should be contacted.

It is the contractor's responsibility to provide safe working conditions and comply with the regulations in OSHA Standards-Excavations, 29 CFR Part 1926. The following guidelines are provided for planning purposes. Sloping and shoring requirements must be evaluated at the time of construction by the contractor's competent person as defined by OSHA. OSHA classifications for various material types and the steepest allowable slope configuration corresponding to those classifications are shown in Table 15.1.

**TABLE 15.1. Allowable Slope Configuration for Onsite Material**

<b>Material Type</b>	<b>OSHA Classification</b>	<b>Steepest Allowable Slope Configuration*</b>
On site sands and gravels	Type C	1-1/2:1

\* Units horizontal to units vertical. The values shown apply to excavation less than 20 feet in height. Conditions can change and evaluation is the contractor's responsibility.

The classifications and slope configurations in Table 15.1 assume that excavations are above the groundwater table, there is no standing water in the excavations, and there is no seepage from the slope into the excavations, unless otherwise specified. The above classifications and slope configurations assume that the material in the excavations is not fractured, adversely bedded, jointed, nor left open to desiccate, crack, or slough, and are protected from surface runoff. There are other considerations regarding allowable slope configurations that the contractor is responsible for, including proximity of equipment, stockpiles, and other surcharge loads to the excavation. The contractor's competent person is responsible for all decisions regarding slope configuration and safety conditions for excavations.

Excavations should not undermine existing foundation systems of structures or infrastructure, unless they are adequately protected. At a minimum, new excavations should not intersect a line drawn on

a 34 degree angle down and away from the bottom edge of the existing foundation systems or bottom edge of infrastructure. If this condition cannot be met, shoring or staged excavations may be required. If shoring is required, a condition survey of the adjacent structures is recommended before construction starts and upon completion of construction. In Cesare's experience, condition surveys include, but may not be limited to, photographs of any distress to adjacent structures.

Permanent slopes should be no steeper than 2:1 and should be revegetated or otherwise protected from erosion.

## 16. STRUCTURAL FILL/BACKFILL SOIL

Where fill/backfill soil is necessary, the suitable onsite inorganic soil may be used below, around, and above the structure. At this site, unsuitable material is defined as topsoil, organics, trash, ash, frozen material, hard lumps, and clods, and particles that are larger than 3 inches. Existing onsite fill material can be reused for structural fill/backfill, provided it is free of unsuitable material. If unsuitable material is encountered in the existing fill, it cannot be reused as fill/backfill. Recommendations for fill/backfill placement are:

- a) Clods or lumps shall be broken down to a maximum size of 3 inches. Pieces that are larger than 3 inches shall be removed from the fill/backfill.
- b) Fill/backfill material should be placed in loose lifts and compacted in accordance with Table 16.1.
- c) Maximum loose lift thickness shall be 12 inches depending on the type of equipment used to apply compactive effort and shall be reduced if the specified compaction cannot be obtained with the equipment used.
- d) Fill/backfill should not be placed if material is frozen or if the surface upon which fill/backfill is to be placed is frozen.
- e) Fill/backfill material should be placed and spread in horizontal lifts of uniform thickness in a manner that avoids segregation.
- f) Placement surface should be kept free of standing water, debris, and unsuitable material during placement and compaction of fill/backfill material.
- g) Fill/backfill maximum allowable particle size is 3 inches. Do not incorporate oversize material in the fill/backfill that is incapable of being broken down by the equipment and methods being employed to process and compact the fill/backfill. Process and compact material in the lift, as necessary, to produce the specified fill/backfill characteristics. If oversize particles remain in the lift after processing and compacting, remove oversize material to produce a fill/backfill within specified requirements.

**TABLE 16.1. Compaction Specifications**

<b>Material Type (General)</b>	<b>AASHTO Classification</b>	<b>Moisture Content (%)</b>	<b>Relative Compaction (%)</b>	<b>Compaction Standard</b>
Onsite minus 3 inch material	A-1, A-2-4, A-2-5, A-3, A-4, A-5	±3% of OMC	≥95%	Standard Proctor (ASTM D698)

\* If fill thickness greater than 20 feet is planned, additional requirements may apply.

## 16.1 IMPORT FILL

Material imported for structural fill should be tested and approved for use onsite by the project geotechnical engineer prior to hauling to the site. Proctor and classification tests should be conducted to determine if the fill meets required specifications. Fill material should meet the specifications in Table 16.2.

**TABLE 16.2. Import Fill Specifications**

Soil Parameter	Specification
Maximum particle size	3 inch
Percent finer than No. 200 sieve	20% maximum
Liquid limit	40% maximum
Plasticity index	15% maximum

## 17. SUBSURFACE DRAINAGE

Groundwater was not encountered during this study. If basements, crawlspaces, or first floors are below surrounding grade, it will be excavated into relatively impervious material. This creates a depression around the structure that is backfilled with soil. Infiltration through the backfill from precipitation and runoff can collect in this depression and create a perched water condition that can cause foundation and floor slab problems, including water in the below grade areas.

Cesare recommends that any basement, crawlspace, or portion of the first floor that will be below surrounding grade be provided with an exterior perimeter subsurface drainage system. The system shall be sloped to drain to a suitable gravity outlet or a sump. A pump shall be installed if a sump is used. The drainage system shall consist of perforated, machine slotted, or equivalent rigid plastic pipe placed around the perimeter of the basement or crawlspace foundation. Pipes with a smooth interior are recommended. Pipes that are corrugated on the interior can become obstructed more easily than pipes with smooth interiors and may be more difficult to clean. A recommended drain schematic is shown in Figure 3.

## 18. SURFACE DRAINAGE

Good drainage and surface water management is important. Performance of site improvements, such as foundations, floors, hardscape, and pavement are often adversely affected by failing to establish and/or maintain good site drainage. Grades must be adjusted to provide positive drainage away from the structure, pavement, and other site improvements during construction and maintained throughout the life of the proposed facility. The following drainage precautions are recommended:

- a) Ground surface around the perimeter foundation walls should be sloped to drain away from the structure in all directions. Current building codes require a minimum slope of 6 inches in the first 10 feet (5%) of the structure. At the completion of construction, Cesare recommends a continuous slope away from foundations of 12 inches in the first 10 feet (10%), where site constraints permit. Cesare recommends that concrete and pavement adjacent to structures slope at a rate of at least 2% away from the structure or as otherwise required by ADA criteria. Maximum grades practical should be used for paving and flatwork to prevent areas where water can pond.
- b) Joints that occur at locations where paving or flatwork abuts the structure should be properly sealed with flexible sealants and maintained.

- c) Ground surface should be sloped so water will not pond between or adjacent to structures and other site improvements. Curbs, sidewalks, paths, plants, or other improvements should not block, impede, or otherwise disrupt surface runoff. Use of chases and weep holes to promote drainage is encouraged. Landscape edging should be perforated or otherwise constructed in a manner to prevent ponding of surface water, especially in the vicinity of the backfill soil.
- d) Drainage swales should be located as far away from the foundation as practicable.
- e) If site constraints do not allow for the recommended slopes, the project civil engineer shall provide a method for drainage that is equivalent to the recommendations herein. Water should not be allowed to pond adjacent to or near foundations, flatwork, or other improvements.
- f) Roof downspouts and other water collection systems should discharge onto pavements or extend away from the structure well beyond the limits of the backfill zone using downspout extensions, appropriately sized splash blocks, or other means. Buried downspout extensions are discouraged as they can be difficult to monitor and maintain.
- g) Irrigation directly adjacent to the structure is discouraged and should be minimized. Sprinkler lines, zone control boxes, and sprinkler drains shall be located outside the limits of the foundation backfill. Sprinkler systems should be placed so that the spray from the heads, under full pressure, does not fall within 5 feet of the foundation walls.
- h) Plants, vegetation, and trees that require moderate to high water usage are discouraged and should not be located within 5 feet of foundation walls.
- i) Plantings that are desired within 5 feet of the foundation should be placed in watertight planters/containers.
- j) The project civil engineer shall perform measurements to document that positive drainage, as described in this section or as otherwise designed by the project civil engineer is achieved. Maintenance of surface drainage is imperative subsequent to construction and is the responsibility of the owner and/or tenant.

## 19. PAVEMENT RECOMMENDATIONS

### 19.1 DESIGN CRITERIA

The pavement recommendations contained in this report are based on the AASHTO 1999 and the design parameters indicated in Table 19.1.

**TABLE 19.1. Pavement Design Parameters**

Design Parameter	Value
Design period (years)	20
Initial serviceability ( $\rho_s$ )	4.5
Terminal serviceability ( $\rho_t$ )	2.0
Serviceability loss, ( $\rho_s - \rho_t$ )	2.5
Reliability, $Z_r$ (%)	80
Overall standard deviation, $S_o$ (APM)	0.44
Total 18 kip ESAL's/EDLA	
• Automobile parking	35,000
• Drive lanes and entry drives	70,000
Subgrade strength	

• R-value (gravelly sands, estimated)	67
Strength coefficients for:	
a. APM	0.44
b. ABC	0.12

Deviation from the parameters shown in Table 19.1 will require a revision to the recommended pavement section thicknesses. If the subgrade becomes saturated, the pavement is not properly maintained, and/or the actual traffic is greater than the values used in the design, the design service life will be reduced.

## 19.2 PAVEMENT THICKNESSES

The current at grade soil has an estimated R-value of 67. This soil provides good support of pavement systems. The recommended pavement sections are shown on Table 19.2.

**TABLE 19.2. Recommended Pavement Section Thicknesses**

Traffic Area	Alternate	APM (in)	ABC (in)	PCC (in)
Parking lots	APM+ABC	3.0	6.0	--
Drive lanes	APM+ABC	3.0	6.0	--
Trash dumpster	PCC	--	--	6.0

## 19.3 TRASH DUMPSTER APPROACHES

Approaches to trash dumpsters typically experience a greater frequency of distress due to higher loading conditions. To reduce the risk of increased maintenance, Cesare recommends paving these areas with concrete. CDOT Class P portland cement concrete is recommended. Cesare recommends control joints spaced at a maximum spacing of 12 feet, and at least one control joint transverse and longitudinal to each approach. The approach to the trash dumpster should be large enough to include the collection truck's runup braking distance and its front wheels should fully bear on the slab when emptying the dumpster.

## 19.4 SUBGRADE PREPARATION AND PAVEMENT CONSTRUCTION

### 19.4.1 Pavement Subgrade

The entire subgrade should be proof rolled a maximum of 24 hours prior to paving with a loaded 988 front end loader or similar heavy rubber tired vehicle (GVW of 50,000 pounds with 18 kip per axle at tire pressures of 90 psi) to detect any soft or loose areas. All areas exhibiting unstable subgrade conditions, such as rutting, pumping, or excessive movement should be overexcavated to a firm soil layer or to a maximum depth of 2 feet, whichever is shallowest, and replaced with suitable compacted fill. If unstable subgrade conditions persist, Cesare should be contacted for consultation. Soft spots should be stabilized prior to placement of pavement sections. Positive drainage off paved surfaces should be provided.

### 19.4.2 Subbase and Aggregate Base Course

Subbase and ABC should meet the following requirements:

- ❑ ABC material should be approved prior to construction and should subsequently be tested as the material is being placed.

- Ⓒ ABC should have a minimum R-value of 77.
- Ⓒ ABC material should be compacted to a minimum of 95% of the MDD as determined by the modified Proctor test, ASTM D1557.

### **19.4.3 Pavement**

Pavement construction shall be in accordance with the following recommendations and criteria:

- Ⓒ APM shall meet the requirements in the CDOT *Standard Specifications for Road and Bridge Construction*, Section 400.
- Ⓒ Asphalt binder grade shall be PG 58-28,  $N_{\text{Design}}$  of 50 or 75.
- Ⓒ Approved APM material should Grade SX and be placed in the maximum lifts of 3 inches.
- Ⓒ APM shall be compacted to 92% to 96% of the maximum theoretical density within 0.3% of the optimum asphalt content as determined by ASTM D2041.
- Ⓒ APM placement specifications should follow CDOT specifications and industry standards as recommended by the NAPA and the AI.
- Ⓒ Portland cement concrete should be obtained from an approved mixture design with minimum properties meeting a CDOT Class P mixture.
- Ⓒ Portland cement concrete placement specifications should follow industry standards as recommended by the ACI and the PCA.
- Ⓒ Positive drainage off paved surfaces should be provided.

Construction material should be approved prior to use and should subsequently be tested as this material is being placed.

## **20. SOIL CHEMICAL TESTING**

### **20.1 SULFATE EXPOSURE**

Water soluble sulfate contents of 0.00% were measured on samples collected from Exploratory Pit EP-1 from depths of 1 to 2 feet. Results are summarized in Appendix B. The PCA publication titled, *Design and Control of Concrete Mixtures*, 2002 and the ACI publication titled, *Building Code Requirements for Structural Concrete and Commentary*, consider this range negligible for water soluble sulfate exposure.

## **21. GEOTECHNICAL RISK**

The concept of risk is an important aspect of any geotechnical study. The primary reason for this is that the analytical methods used by geotechnical engineers are generally empirical and must be tempered by engineering judgment and experience, therefore, the solutions or recommendations presented in any geotechnical study should not be considered risk free, and more importantly, are not a guarantee that the interaction between the soil and the proposed construction will perform as predicted, desired, or intended. The engineering recommendations presented in the preceding sections constitute Cesare's best estimate of those measures that are necessary to help the structure/pavement perform in a satisfactory manner based on the information generated during this study, training, and experience in working with these conditions.

## **22. LIMITATIONS**

This document has been prepared as an instrument of service for the exclusive use of Mr. ory

Upchurch for the specific application to the project as discussed herein and has been prepared in accordance with geotechnical engineering practices generally accepted in the state of Colorado at the date of its preparation. No warranties, either expressed or implied, are intended or made. This document should not be assumed to contain information for other parties or other purposes.

The findings of this study are valid as of the date its preparation. Changes in the conditions of a property can occur with the passage of time, whether due to natural processes or the works of people on this or adjacent properties. Standards of practice evolve in engineering and changes in applicable or appropriate standards may occur, whether they result from legislation or the broadening of knowledge. Accordingly, the findings of this study may be invalidated wholly or partially by changes outside of Cesare's control, therefore, this study is subject to review and should not be relied upon without such review after a period of 3 years.

In the event that changes, including but not limited to, the nature, type, design, size, elevation, or location of the project or project elements as outlined in this report are made, the conclusions and recommendations contained in this report shall not be considered valid unless Cesare reviews the changes and either confirms or modifies the conclusions of this report in writing.

Cesare should be retained to review final plans and specifications that are developed for proposed construction to judge whether the recommendations presented in this report and any addenda have been appropriately interpreted and incorporated in the project plans and specifications as intended.

The exploration locations for this study were selected to obtain a reasonably accurate depiction of underground conditions for design purposes and these locations are often modified based on accessibility and the presence of underground or overhead utility conflicts. Variations from the soil conditions encountered are possible. These variations may necessitate modifications to Cesare's design recommendations, therefore, Cesare should be retained to observe subsurface conditions, once exposed, to evaluate whether they are consistent with the conditions encountered during Cesare's exploration and that the recommendations of this study remain valid. If parties other than Cesare perform these observations and judgements, they must accept responsibility to judge whether the recommendations in this report remain appropriate.

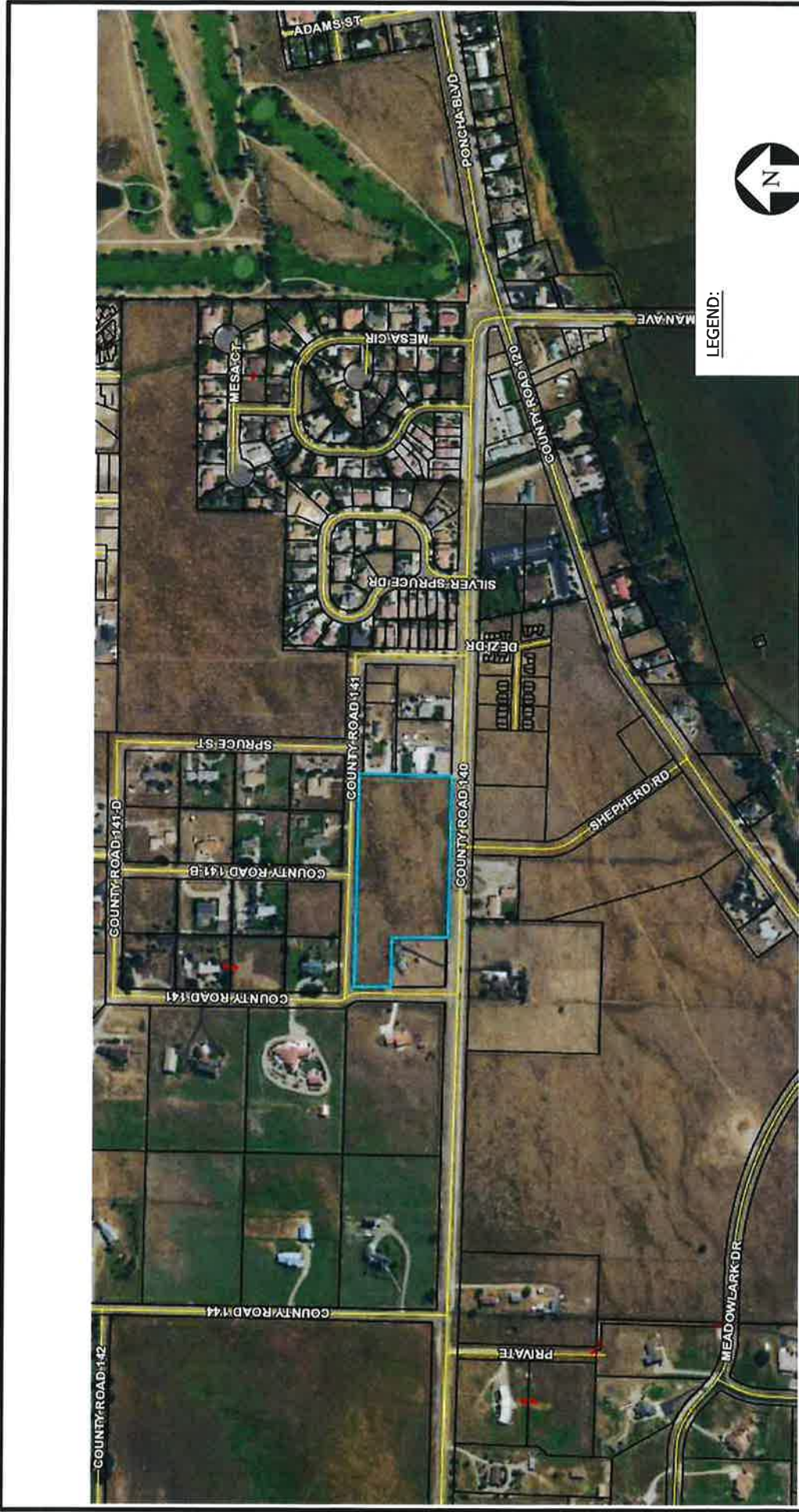
Cesare's scope of services for this report did not include either specifically, or by implication, any environmental assessment of the site or identification of contaminated or hazardous material or conditions. Additionally, none of the services performed in connection with this study were designed or conducted for the purpose of mold prevention. Proper implementation of the recommendations conveyed in this report will not, of itself, be enough to prevent mold from growing in or on the structures involved.

At a minimum, Cesare should be retained during construction to observe and/or test:

- completed excavations.
- placement and compaction of fill.
- proposed import or onsite fill material.
- placement and compaction of pavement subgrade, subbase, base course and asphalt.

Cesare offers many other construction observations, materials engineering, and testing services and can be contacted to discuss further.

W:\2021\SCBY\21.6099.A Upchurch Annex\ACAD\Boiling Location Map.dwg 7/30/2021 8:37 AM



BACKGROUND IMAGE FROM GOOGLE EARTH

PROJECT NO:	21.6099		
PROJECT NAME:	Upchurch Annex		
DRAWN BY:	ZLM	CHECKED BY:	DRD
DWG DATE:	07.30.21	REV. DATE:	--

**FIGURE 1**  
Vicinity Map



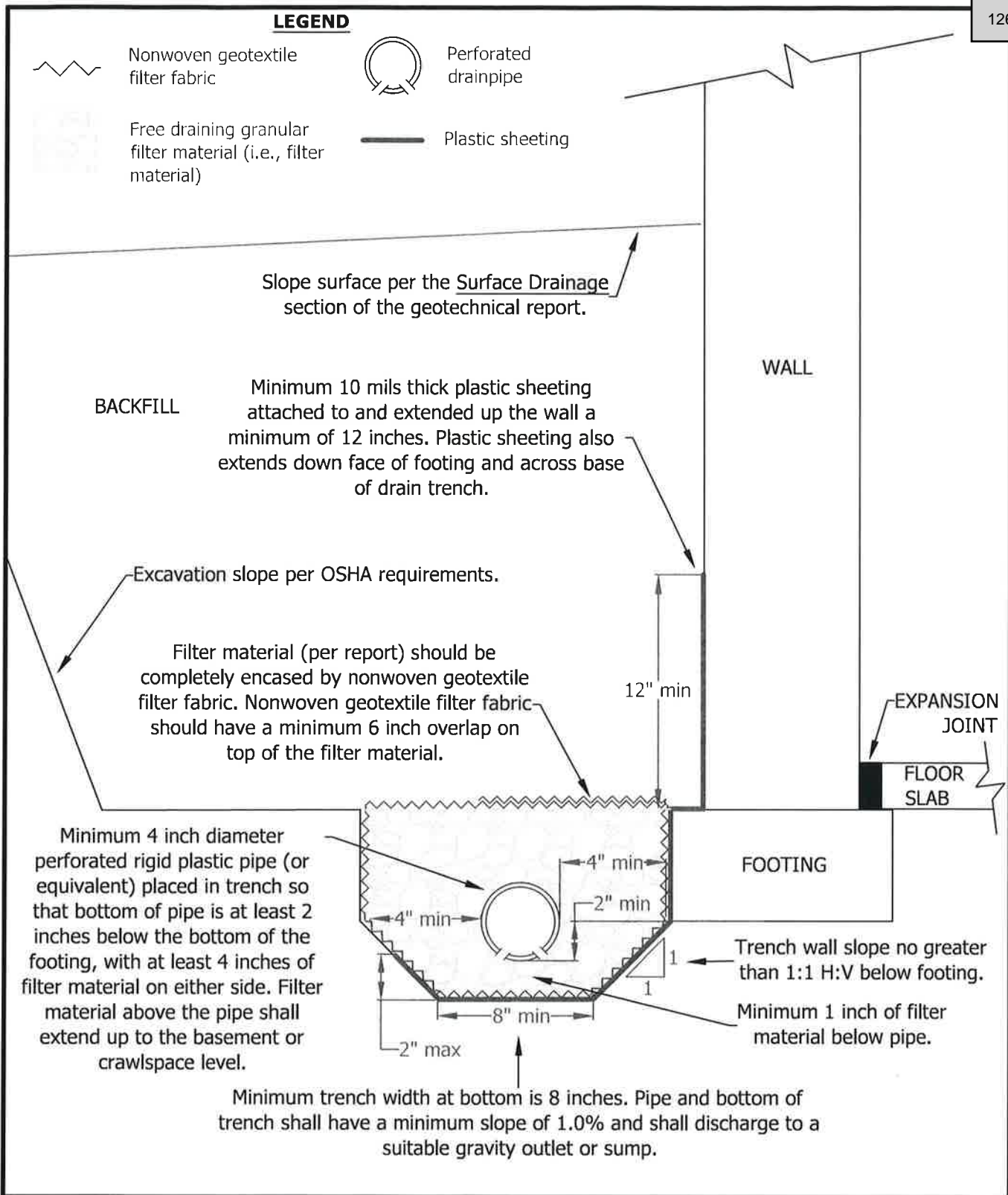


BACKGROUND IMAGE FROM GOOGLE EARTH

PROJECT NO:	21.6099		
PROJECT NAME:	Upchurch Annex		
DRAWN BY:	ZLM	CHECKED BY:	DRD
DWG DATE:	07.30.21	REV. DATE:	--

**FIGURE 2**  
 Site Plan and Location of Exploratory Pits





**FIGURE 3**  
Typical Exterior Perimeter Drain - Footing

PROJECT NO:	21.6099		
PROJECT NAME:	Upchurch Annex		
DRAWN BY:	YES	CHECKED BY:	DRD
DWG DATE:	08.08.18	REV. DATE:	07.28.21





## **APPENDIX A**

Field Exploration


PROJECT NAME	Upchurch Annex	EXPLORATORY PIT ID	EP-1	Page 1 of
PROJECT NUMBER	21.6099	PIT ELEVATION	ft.	
CESARE REP.	D.Duran	PIT LOCATION		
DATE STARTED	7/6/2021	EXCAVATOR COMPANY		
DATE COMPLETED	7/6/2021	TYPE OF EXCAVATOR	Bobcat E50	

CO STATE PLANE

WATER LEVEL & CAVE DEPTH (ft)	GRAPHIC LOG	ELEVATION (ft)	MATERIAL DESCRIPTION	DEPTH (ft)	DEPTH (ft)	SAMPLE	NATURAL MOISTURE CONTENT (%)	NATURAL DRY DENSITY (pcf)	LL-PL-PI	FINES (%)	SWELL-CONSOL VOL CHANGE/SURCHARGE PRESSURE (pcf)
	↓		Topsoil		0.0						
	↓		SAND, gravel, cobbles in a silt matrix, calcareous, slightly moist, light brown (SM; A-1-b).		0.75				28-23-5	13	
			GRAVEL, sand, cobbles with silt, poorly graded, rounded to subrounded clasts, moist, brown (GP-GM; A-1-a).		2						
					2.5						
					5						
					5.0						

Pit excavated to 5 feet

**LEGEND**

- ▼ WATER LEVEL AT TIME OF EXCAVATION
- ↑ DEPTH OF REFUSAL
-  BULK SAMPLE



PROJECT NAME Upchurch Annex EXPLORATORY PIT ID EP-2  
 PROJECT NUMBER 21.6099 PIT ELEVATION ft.  
 CESARE REP. D.Duran PIT LOCATION  
 DATE STARTED 7/6/2021 EXCAVATOR COMPANY  
 DATE COMPLETED 7/6/2021 TYPE OF EXCAVATOR Bobcat E50

CO STATE PLANE

WATER LEVEL & CAVE DEPTH (ft)	GRAPHIC LOG	ELEVATION (ft)	MATERIAL DESCRIPTION	DEPTH (ft)	DEPTH (ft)	SAMPLE	NATURAL MOISTURE CONTENT (%)	NATURAL DRY DENSITY (pcf)	LL-PL-PI	FINES (%)	SWELL-CONSOL VOL CHANGE/SURCHARGE PRESSURE (psf)
			Topsoil		0.0						
			SAND, gravel, cobbles in a silt matrix, calcareous, slightly moist, light brown (SM; A-1-b).		0.75				21-21-1	6	
			GRAVEL, sand, cobbles with silt, poorly graded, rounded to subrounded clasts, moist, brown (GP-GM; A-1-a).		2.25						
					2.5						
					5						
					5.0						

Pit excavated to 5 feet

**LEGEND**

-  WATER LEVEL AT TIME OF EXCAVATION
-  DEPTH OF REFUSAL
-  BULK SAMPLE






PROJECT NAME Upchurch Annex EXPLORATORY PIT ID EP-3  
 PROJECT NUMBER 21.6099 PIT ELEVATION ft.  
 CESARE REP. D.Duran PIT LOCATION  
 DATE STARTED 7/6/2021 EXCAVATOR COMPANY  
 DATE COMPLETED 7/6/2021 TYPE OF EXCAVATOR Bobcat E50  
 CO STATE PLANE

WATER LEVEL & CAVE DEPTH (ft)	GRAPHIC LOG	ELEVATION (ft)	MATERIAL DESCRIPTION	DEPTH (ft)	DEPTH (ft)	SAMPLE	NATURAL MOISTURE CONTENT (%)	NATURAL DRY DENSITY (pcf)	LL-PL-PI	FINES (%)	SWELL-CONSOL. VOL CHANGE/SURCHARGE PRESSURE (psf)
			Topsoil	0.0							
			GRAVEL, sandy, cobbles with silt, poorly graded, rounded to sub rounded clasts, calcareous, slightly moist to moist, light brown to brown (GP-GM; A-1-a).	0.75							
					2.5				NV-NP-NP	5	
					5.0						

Pit excavated to 5 feet

**LEGEND**

-  WATER LEVEL AT TIME OF EXCAVATION
-  DEPTH OF REFUSAL
-  BULK SAMPLE




PROJECT NAME Upchurch Annex EXPLORATORY PIT ID EP-4  
 PROJECT NUMBER 21.6099 PIT ELEVATION ft.  
 CESARE REP. D.Duran PIT LOCATION  
 DATE STARTED 7/6/2021 EXCAVATOR COMPANY  
 DATE COMPLETED 7/6/2021 TYPE OF EXCAVATOR Bobcat E50

CO STATE PLANE

WATER LEVEL & CAVE DEPTH (ft)	GRAPHIC LOG	ELEVATION (ft)	MATERIAL DESCRIPTION	DEPTH (ft)	DEPTH (ft)	SAMPLE	NATURAL MOISTURE CONTENT (%)	NATURAL DRY DENSITY (pcf)	LL-PL-PI	FINES (%)	SWELL-CONSOL VOL CHANGE/URCHARGE PRESSURE (psf)
	↓		Topsoil	0.0							
	↓		GRAVEL, sandy, cobbles with silt, poorly graded, rounded to sub rounded clasts, calcareous, slightly moist to moist, light brown to brown (GP-GM; A-1-a).	1							
	↓			2.5							
	↓			4							

Pit excavated to 4 feet

**LEGEND**

- ▼ WATER LEVEL AT TIME OF EXCAVATION
- ↑ DEPTH OF REFUSAL
-  BULK SAMPLE



**APPENDIX B**

Laboratory Testing

**SUMMARY OF LABORATORY TEST RESULTS**

Upchurch Annex  
Project No. 21.6099

Sample Location	Water Soluble Sulfates (%)	Gradation			Atterberg Limits		Material Type
		Gravel (%)	Sand (%)	Silt/Clay (%)	Liquid Limit (%)	Plasticity Index (%)	
EP-1 Pit 1 to 2	0.00	43	44	13	28	5	(SM) Silty sand with gravel; A-1-b
EP-2 1 to 5		51	43	6	22	1	(GP-GM) Poorly graded gravel with silt and sand; A-1-a
EP-3 2 to 5		50	45	5	NV	NP	(GP-GM) Poorly graded gravel with silt and sand; A-1-a

NV=No Value; NP= Non-plastic



## **APPENDIX C**

### Vapor Barriers

## VAPOR BARRIERS

If it is determined that a vapor retarder/barrier is warranted, Cesare recommends that the vapor barrier comply with ASTM E1745, and if moisture sensitive flooring will be utilized, have a permeance below 0.01 perms before and after mandatory conditioning testing. The vapor retarder/barrier should be installed per ASTM E1643 and the design professional should consider project specific requirements in specification verbiage. See the ACI Committee 302, "Guide for Concrete Floor and Slab Construction (ACI 302.R-96)" for additional discussion and guidance regarding the use of vapor retarders/barriers beneath floor slabs.

The 2018 IBC, Section 1805.2 Dampproofing states that where hydrostatic pressure will not occur, as determined by Section 18-03.5.4, floors shall be dampproofed in accordance with this section.

Section 1805.2 Floors, states,

*"Dampproofing materials for floors shall be installed between the floor and the base course required by Section 1805.4.1, except where a separate floor is provided above a concrete slab. Where installed beneath the slab, dampproofing shall consist of not less than 6-mil (0.006 inch; 0.152 mm) polyethylene with joints lapped not less than 6 inches (152 mm), or other approved methods or materials. Where permitted to be installed on top of the slab, damp proofing shall consist of mopped-on bitumen, not less than 4-mil; (0.004 inch; 0.102 mm) polyethylene, or other approved methods or materials. Joints in the membrane shall be lapped and sealed in accordance with the manufacturer's installation instructions".*

Section 1805.4.1 Floor Base Course, states,

*"Floors of basements, except as provided for in Section 1805.1.1 shall be placed over a floor base course not less than 4 inches (102 mm) in thickness that consists of gravel or crushed stone containing no more than 10 percent of material that passes through a No. 4 (4.75mm ) sieve."*

Cesare recommends that the architect be consulted regarding the need for a vapor retarder or vapor barrier. Decision to include a vapor retarder/barrier beneath the slab is dependent on the sensitivity of floor coverings and building use to moisture.