Planning and Zoning Commission

Monday, March 27, 2023 at 6:00 pm

PLEASE SILENCE ALL CELL PHONES AND ELECTRONIC DEVICES. THANK YOU

1. **Meeting Information**
   207 Muegge Way, Bennett, CO 80102
   For a live stream of the meeting use the information below:

   https://us02web.zoom.us/j/84050099723?pwd=d2FqempxM3ZlN2lzTWwrYXpUVVNLdz09

   Meeting ID: 840 5009 9723
   Passcode: 879046

2. **Call to Order**
   Chair
   a. **Roll Call**
3. **Approval of Agenda**
   Chair
4. **Consent Agenda**
   Chair
   a. **February 27, 2023 - Regular Meeting Minutes**

      Attachments:

      - **February 27, 2023 - Regular Meeting Minutes** (planning-and-zoning-commission_minutes_2023-02-27_205251.pdf)

Public Comments on Items Not on the Agenda

The Planning and Zoning Commission welcomes you. Thank you for joining us for our Town of Bennett Planning and Zoning Meeting. If you are not speaking, we ask that you please mute your microphone. For public comment please sign up on the provided sheet or in the chat box. If you are on the phone, once we get through the sign-up sheet and chat box we will call for any other comments for items not on the agenda.

Your comments will be limited to three (3) minutes. The Commission may not respond to your comments this evening, rather they may take your comments and suggestions under advisement and provide direction to the appropriate member of Town staff for follow-up. Thank you.

Regular Business

5. **Public Hearing**

   a. **Case No. 21.08 - Bennett Ranch C to R-3 Rezoning**

   Resolution No. 2023-01 - A Resolution of the Bennett Planning and Zoning Commission Recommending Approval of a Rezoning for 6.84 Acres in the Bennett Ranch Filing No. 1 Subdivision

   Steve Hebert, Planning Manager

   Attachments:

   - **Public Hearing Script** (0_-_Public_Hearing_Script.PC.pdf)
   - **Staff Report - Case No. 21.08 - Bennett Ranch C to R-3 Rezoning** (Bennett_Ranch_C-1_to_R-3_Rezone__P_Z_StaffRpt_FINAL.pdf)
   - **Staff PowerPoint Presentation** (1_BennettRanch_C_to_R-3_Rezone_P_Z_Presentation_03_27_23.pdf)
   - **Letter of Intent** (2_Bennett_Ranch_-_Letter_of_Intent.pdf)
   - **Rezoning Amendment Map** (3_Rezoning_BRanchC_to_R-3_Map.pdf)
   - **Bennett Ranch C District and R-3 District Concept Plan** (4_Bennett_Ranch_-_Commercial_Rezone_-_Conceptual_Exhibit_09_20_22.pdf)
   - **Original 2018 Bennett Ranch Traffic Impact Analysis** (5_2018_BRanch_Traffic_Impact_Analysis.pdf)
   - **August 2022 Bennett Ranch Traffic Impact Analysis** (6_Aug_2022_Bennett_Traffic_Conformance_Letter.pdf)
   - **Combined Staff and Referral Agency Comments** (7_BennettRanch_C-1_R-3_Rezone_CombinedReferrals.pdf)
   - **Proposed Resolution No. 2023-01** (8_BennettRanch_C_to_R-3_Rezone.PC_resoNo2023-01.pdf)
   - **Suggested Motion** (Suggested_Motion.pdf)

   b. **Case No. PZ2022-0016 - Muegge Farms Filing No. 7 Final Plat**

   Resolution No. 2023-02 - A Resolution Recommending Approval of the Final Plat for Muegge Farms Filing No. 7 Subdivision

   Steve Hebert, Planning Manager

   Attachments:

   - **Public Hearing Script** (0_-_Public_Hearing_Script.PC.pdf)
   - **Staff Report - Case No. PZ2022-0016 - Muegge Farms Filing No. 7 Final Plat** (MueggeFarms_F7_FP_P_Z_Staff_Report_FINAL.pdf)
   - **Staff PowerPoint Presentation** (1_PowerPoint_MueggeFarmsNo7_FinalPlat_P_Z__03_27_23_FINAL.pdf)
   - **Letter of Intent/Narrative** (2_Letter_of_Intent.pdf)
   - **Muegge Farms Filing No. 7 Final Plat** (3_Plat__3rd_Sub__Muegge_Farms_Filing_7_FINAL_PLAT__UPDT_.pdf)
   - **Muegge Farms Outline Development Plan** (4_MueggeFarms_ODP_AmendNo.3_Recorded_Reduced.pdf)
   - **Combined Staff and Referral Agency Comments** (5_MF_PA-1_F-7_Final_Plat_Combined_Referrals.pdf)

- **Muegge Farms Filing No. 7 (PA-1) Traffic Impact Compliance Letter** (6_Final_Plat_-_03.01_Traffic_Impact_Analysis.pdf)
- **Proposed Resolution No. 2023-02** (7_Resolution_2023-02_MFarms_F7_FP.PCReso_FINAL.pdf)
- **Suggested Motion** (Suggested_Motion.pdf)

c. **Updates to Chapter 16, Article III of the Bennett Municipal Code Re: Sign Regulations - To be continued**
Steve Hebert, Planning Manager

Attachments:

- **Public Hearing Script** (0_-_Public_Hearing_Script.PC.pdf)
- **Staff Report - Updates to Chapter 16, Article III of the Bennett Municipal Code Re: Sign Regulations** (SignCode_StaffReport_P_Z_02_27_23_FINAL.pdf)
- **Staff PowerPoint Presentation** (1-SignCodeUpdate_P_Z_02_27_23_FINAL.pdf)
- **Chapter 16, Article III, Sign Regulations Redlined Working Draft Update** (2-Article_III_Sign_Regulations_-_Proposed_Updates_Redlined_02_19_23.pdf)
- **Public Hearing Continuation Script** (P_Z_Continue_Script_-_Sign_Code_Amend_03_27_23.pdf)

6. **Town Development Updates**
https://townofbennett.maps.arcgis.com/apps/MapSeries/index.html?appid=9e22f218b02b49a9aba89ff24f7d2ca0

7. **Commissioner Comments/Reports**
8. **Adjournment**

Contact: Savannah Vickery (svickery@bennett.co.us 1 303 644 3249 x1032) | Agenda published on 03/23/2023 at 2:34 PM

Planning and Zoning Commission

Minutes

Monday, February 27, 2023 at 6:30 pm

PLEASE SILENCE ALL CELL PHONES AND ELECTRONIC DEVICES. THANK YOU

1. **Meeting Information**
   207 Muegge Way, Bennett, CO 80102
2. **Call to Order**
   Chair
   a. **Roll Call**

Minutes:

Present:

Martin Metsker

Gino Childs

Grider Lee

James Delaney - Excused

Wayne Clark

Rachel Connor

Scott Smith - Unexcused

Staff Present:

Steve Hebert, Planning Manager

Chad Bunger, Community and Economic Development Director

Dan Giroux, Town Engineer

Savannah Vickery, Secretary

Mike Heugh, Traffic Engineer

Public Present:

Nirav Patel

Kevin Barney

3. **Approval of Agenda**
   Chair

Minutes:

COMMISSIONER CLARK MOTIONED, COMMISSIONER CHILDS SECONDED to approve the

agenda as amended by adding the public hearing script for Updates to Chapter 16, Article III of the Bennett Municipal Code Re: Sign Regulations:
Ayes: Connor, Lee, Metsker, Clark, Childs
Nays: None
Absent: Smith, Delaney
Martin Metsker, Chairman, declared the motion carried by unanimous vote.

4. **Consent Agenda**

Chair

Minutes:
COMMISSIONER CLARK MOVED, COMMISSIONER CHILDS SECONDED to approve the consent agenda. The voting was as follows:
Ayes: Lee, Metsker, Clark, Childs, Connor
Nays: None
Absent: Smith, Delaney
Martin Metsker, Chairman, declared the motion carried by unanimous vote. **A. Action:** Approval of November 21, 2022, Regular Meeting Minutes

   a. **November 21, 2022 - Regular Meeting Minutes**

Public Comments on Items Not on the Agenda

The Planning and Zoning Commission welcomes you. Thank you for joining us for our Town of Bennett Planning and Zoning Meeting. If you are not speaking, we ask that you please mute your microphone. For public comment please sign up on the provided sheet or in the chat box. If you are on the phone, once we get through the sign-up sheet and chat box we will call for any other comments for items not on the agenda.

Your comments will be limited to three (3) minutes. The Commission may not respond to your comments this evening, rather they may take your comments and suggestions under advisement and provide direction to the appropriate member of Town staff for follow-up. Thank you.

Regular Business

5. **Action/Discussion Item**
   a. **Election of Chair and Vice-Chair**

Minutes:
COMMISSIONER CHILDS MOVED, COMMISSIONER LEE SECONDED to approve Martin Metsker as the Chair for the Planning and Zoning Commission:
Ayes: Lee, Metsker, Clark, Childs, Connor
Nays: None
Absent: Smith, Delaney
Martin Metsker, Chairman, declared the motion carried by unanimous vote. **A. Action:** Election of Martin Metsker to Chairperson of the Planning and Zoning Commission.

COMMISSIONER CHILDS MOVED, COMMISSIONER CLARK SECONDED to approve Grider Lee as the Vice Chair for the Planning and Zoning Commission:
Ayes: Lee, Metsker, Clark, Childs, Connor
Nays: None
Absent: Smith, Delaney
Martin Metsker, Chairman, declared the motion carried by unanimous vote. **A. Action:** Election of Grider Lee to Vice Chairperson of the Planning and Zoning Commission.

b. Antelope Hills Filing No. 3 Sketch Plan

Minutes:
Steve Hebert, Planning Manager, presented the Antelope Hills Filing No. 3 Sketch Plan.
No action was needed.

6. Public Hearing

a. Updates to Chapter 16, Article III of the Bennett Municipal Code Re: Sign Regulations

Minutes:
Martin Metsker, Chairman, called the matter of Updates to Chapeter 16, Article III of the Bennett Municipal Code Re: Sign Regulations to order.

The public hearing was opened at 7:04 p.m.

Savannah Vickery, stated in accordance with the Colorado state statute, it was duly posted and published in the Eastern Colorado News on February 10, 2023. Legal #2783.

Steve Hebert, Planning Manager, presented the proposed sign code updates to the Commission.

COMMISSIONER CLARK MOTIONED, COMMISSIONER CHIDLS SECONDED to continue the public hearing on the proposed amendments to Chapter 16 of the Bennett Municipal Code concerning sign regulations until March 27, 2023 at 6:00 PM at Bennett Town Hall.
Ayes: Lee, Metsker, Clark, Childs, Connor,
Nays: None
Absent: Smith, Delaney
Martin Metsker, Chairman, declared the motion passed unanimously.

7. Town Development Updates

Minutes:
Steve Hebert, Planning Manager, presented an update on Development occurring around Town.
No action was needed.

8. Commissioner Comments/Reports

9. Adjournment

Minutes:

COMMISIONER CLARK MOTIONED, COMISSIONER CHILDS SECONDED to adjourn the meeting. The meeting was adjourned at 7:35 p.m. Voting was as follows:

Ayes: Metsker, Childs, Connor, Lee, Clark

Nays: None

Absent: Smith, Delaney

Martin Metsker, Chairman, declared the motion carried by unanimous vote.

Minutes Approved:

Martin Metsker, Chair

Savannah Vickery, Secretary

Contact: Savannah Vickery (svickery@bennett.co.us 1 303 644 3249 x1032)

QUASI-JUDICIAL PUBLIC HEARING SCRIPT
(PLANNING COMMISSION)

CHAIR: I will now open the public hearing on the following application: Case 21.08 - Bennett Ranch C to R-3 Rezoning

The purpose of the hearing is to provide a public forum for all interested parties who wish to comment on an application before the Commission. If you wish to speak please write your name and address on the sign-up sheet or in the chat box and you will be called on.

The Procedure for the public hearing will be as follows:

FIRST, there will be a presentation by the Town staff.

NEXT, we will have a presentation by the applicant.

After these two presentations we will allow people who signed up to speak for up to 3 minutes each. Please DO NOT REPEAT points made by others. It is fine to say, "I agree with the previous speaker's comments". Please direct your comments to the Commission, not the applicant or Town staff.

After receiving public comments, we will allow the applicant an opportunity to respond.

NEXT, the Planning Commission members may ask questions of anyone who testified.

I will then close the public hearing and no further testimony or other evidence will be received. The Planning Commission will discuss the matter and may take some kind of action.

Public hearings are recorded for the public record. All testimony must be presented, after you give your full name and address.

CHAIR: Do we have proper notification?

[Secretary to confirm on record notice has been provided]

Do any Commission members have any disclosures?

[Commissioners to disclose conflicts of interests, ex parte contacts, etc]

Town staff, please introduce the applicant and provide your staff report.

[Staff presentation]

Will the applicant or the applicant's representative present the application?

[Applicant presentation]

Do any of the Commissioners have questions of the applicant or Town staff?
[Question and Answer]

CHAIR: I will now open the public comment portion of the public hearing. For those wishing to speak, please clearly state your name and address for the record.

Has anyone signed up to speak at this public hearing?

[If more than one person has signed in, call them in order.]

Is there any interested party in the audience that has not signed up but who wishes to speak regarding the application?

[Additional public comment]

If there is no more public comment, I will now close the public comment portion of the public hearing.

CHAIR: Does the applicant wish to respond to any of the comments?

[Opportunity for applicant to provide any rebuttal evidence]

CHAIR: Before we turn to Commissioner questions and deliberation, I want to state that the documents included within the record for this public hearing include all application materials submitted by the applicant; all materials included in the Planning Commission packets; any PowerPoint or other presentations given tonight; all written referral and public comments received regarding the application; the public comment sign-up sheet; the public posting log and photographs of the notice, and the Town's subdivision and zoning ordinances and other applicable regulations. Does anyone have any objection to inclusion of these items in the record?

CHAIR: I will now close the public hearing and the Planning Commission members will deliberate on the evidence presented. During deliberations, Commission members may ask questions of Town staff, but no further public comment or other testimony or evidence will be received.

Who would like to begin?
Who is next?
Any other questions or comments

[If anyone believes the applicable criteria have not been met, then please explain why so we have those reasons for the record.]

CHAIR: We have a draft Resolution in front of us and I would entertain a motion.

We have a motion on the floor by Commissioner _____ and a second by Commissioner _____ to approve Planning and Zoning Commission Resolution No. 2023-01.

May we have a Roll-Call vote?

Motion carries/fails.

STAFF REPORT

TO: Members of the Planning and Zoning Commission

FROM: Steve Hebert, Planning Manager

DATE: March 27, 2023

SUBJECT: Case No. 21.08 – Bennett Ranch C to R-3 Rezoning

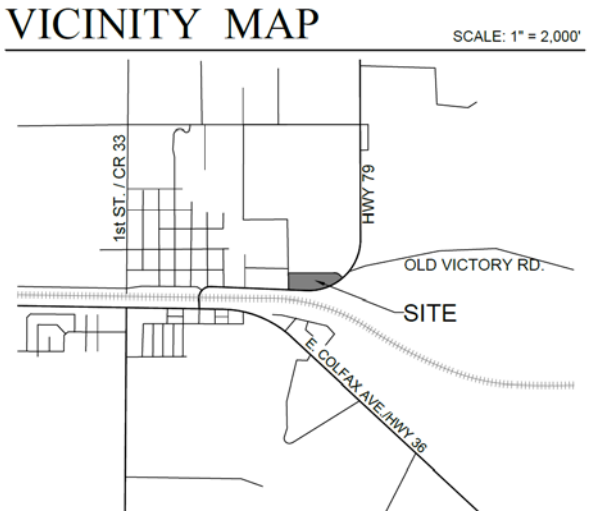
Applicant/Representative(s): Bennett Ranch LLC, | Michael Blumenthal, Harvey Deutsch

Location: Near the Northeast Corner of Palmer Avenue and Gregs Place/Morgan Way

Purpose: Rezone 6.84 Acres from C- General Commercial District to R-3 High Density Residential District

Background

The applicant proposes to rezone 6.84 acres of land from C-General Commercial District to R-3 High Density Residential District. The property is located near the northeast corner of East Palmer Avenue/Hwy 79 and Gregs Place/Morgan Way. The property is southeast of the Bennett 29J School District campus and immediately east of Bennett Welding. See the vicinity map below:

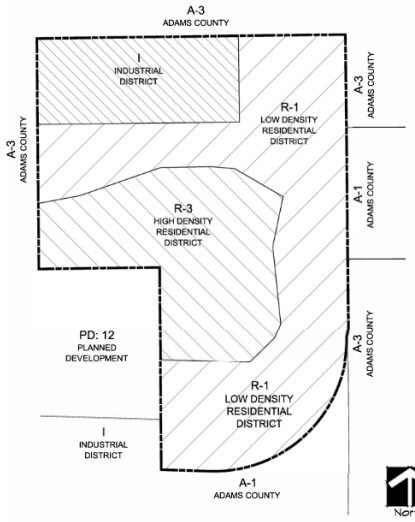


Previous Bennett Ranch Rezoning

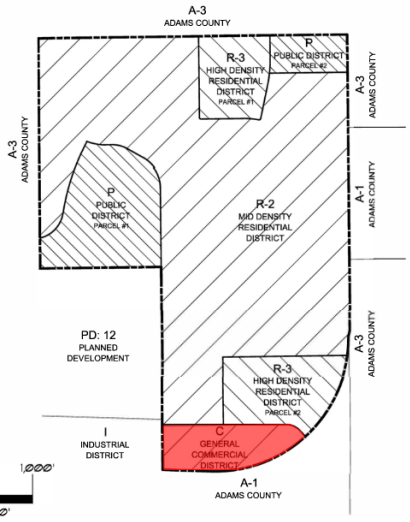
The 173.36-acre Bennett Ranch property was rezoned in June 2019 from a mix of residential and industrial zoning to R-2-Mid Density Residential District, R-3-High Density Residential District, C-General Commercial District and P-Public District.

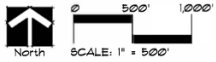
The maps below show the zoning prior to June 2019 and the rezoning that was approved by the Board of Trustees in 2019. The 9.034-acres zoned in 2019 as C-General Commercial is highlighted in red.

PREVIOUS ZONING IN 2019



REZONING APPROVED IN 2019



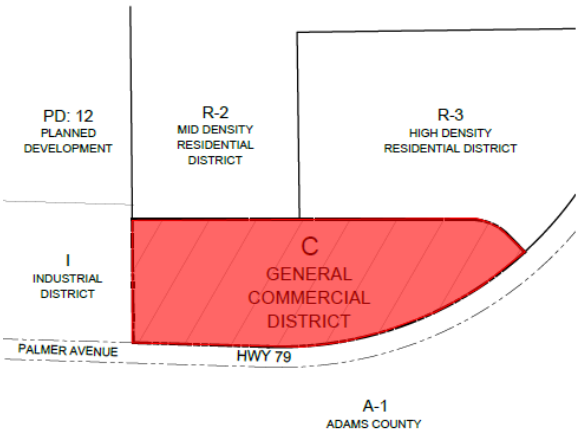


LGI Homes has been installing streets, water, sanitary sewer and stormwater improvements over the last several months. New home construction is expected to begin later this year in the Bennett Ranch Filing No. 1 Subdivision, which is in the R-2 zone district north of the subject property.

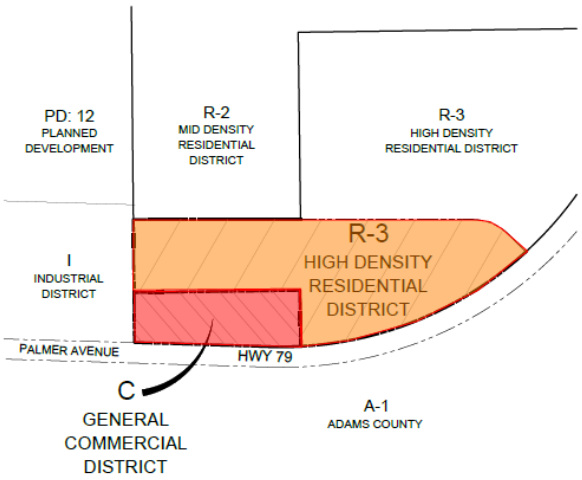
Proposed Zoning and Concept Plan

The applicant, Bennett Ranch, LLC, proposes to rezone 6.84 acres of commercially zoned property to R-3 High Density Residential District to accommodate future development of townhomes by LGI. The existing and proposed zone districts are shown below:

EXISTING ZONING 2023



PROPOSED ZONING 2023



Applicant's Development Concept and Intent

Below is an excerpt from the applicant's letter of intent:

"The proposed amended rezoning application is for the existing 9.03 Acre Bennett Ranch Commercial area. The R-3 amendment area is intended to allow for additional housing diversity which will contribute to the residential community of Bennett. The 1.48-acre commercial parcel will accommodate the convenient provision of goods and services to the immediate neighborhood of Bennett Ranch as envisioned by the Town. The reduction in the Bennett Ranch commercial area, which is on the eastern edge of Town, will hopefully drive new commercial users to the Town core. Additionally, the opportunity exists for significant commercial development to be focused along the potential realignment of Highway 79, Interstate-70 and within the larger mixed-use neighborhoods west and south of Town where neighborhood centers can be established."

The illustration below is a concept plan showing how the eventual property might be developed. All future development will require subdivision platting to be reviewed by the Planning and Zoning Commission and the Board of Trustees in future public hearings. **Neither the Commission nor the Board are being asked to approve the concept plan at this time.**

R-3 Zoning Standards

The following are the R-3 zoning standards from the Bennett Municipal Code:

Sec. 16-2-435. R-3 - High Density Residential District.

(a) The R-3 District is intended to provide for higher density multi-family residential development.

(b) Land uses are permitted as shown in the Land Use Table in Section 16-2-470.

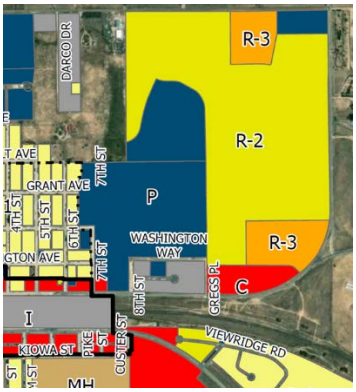
(c) Lot and building requirements shall be as shown in Table 2-6.

Table 2.6
High Density Residential District Standards

Standard	R-3 - High Density Residential District
Minimum Lot Area/Dwelling Unit	2,400 square feet
Minimum Lot Width	50 feet; 25 feet for townhome dwellings
Maximum Lot Coverage	75%
Minimum Floor Area/Dwelling Unit	600 square feet
Minimum Front Yard Setback (Principal Structure)	25 feet; except in MS overlay, 5 feet
Minimum Front Yard Setback (Accessory Structure)	25 feet
Minimum Side Yard Setback (Principal Structure)	25 feet; except in MS overlay, 0 feet; 5 feet for townhome dwellings
Minimum Side Yard Setback (Accessory Structure)	5 feet
Minimum Rear Yard Setback (Principal Structure)	20 feet; except in MS overlay, 5 feet
Minimum Rear Yard Setback (Accessory Structure)	5 feet
Maximum Height (Principal Structure)	40 feet
Maximum Height (Accessory Structure)	12 feet, except detached garages, 18 feet

Surrounding Zoning and Land Use

Below is a subsection of the Town of Bennett Zoning Map.



The table below summarizes the surrounding zoning and land use.

Direction	Zone District	Land Use
North	R-2 and R-3 Residential	Bennett Ranch Subdivision (LGI Homes)
East	A-3, Unincorporated Adams Co.	Agricultural, Vacant
South	A-3, Unincorporated Adams Co.	Agricultural, Vacant
West	I - Industrial	Industrial (Bennett Welding and Blue Sky Storage

Availability of Public Services and Utilities

Water, Wastewater and Stormwater Management

Water Supply

- Major water supply components such as groundwater wells and water storage tanks for the overall Bennett Ranch development are sufficient for the proposed revised rezoned land use.

Water Distribution Systems

- The water distribution system being developed at the overall Bennett Ranch development is sufficient to accommodate the proposed revised rezoned land use.
- This includes both potable and non-potable water distribution systems.

Sanitary Sewer and Wastewater Treatment Systems

- The sanitary sewer collection system being developed at the overall Bennett Ranch development is sufficient to accommodate the proposed revised rezoned land use.
- The Town's wastewater treatment system is sufficient to accommodate the proposed revised rezoned land use.

Stormwater Management

- Major stormwater improvements such as storm sewer, channels, management ponds, and outfall systems will need to be reviewed and adjusted as needed for the proposed land use.
- Typically, commercial land uses can incorporate private on-site/on-lot stormwater management ponds, while residential would be associated with more regional improvements, maintained by an owners association or management group.
- It's anticipated these stormwater management system differences and changes can be accommodated and addressed for the proposed revised rezoned land use.

Access and Traffic Impacts

The C-General Commercial zoned property and the proposed R-3 High Density Residential zoned property will be served by Morgan Way, which is under construction to the west, and a proposed new street, Ardennais Lane, that will intersect with East Palmer Avenue to the south. The R-3 property will also have access to an extension of Washington Way along its north boundary.

The original traffic impact analysis (TIA) for Bennett Ranch was conducted in 2018 by LSC Transportation Consultants, Inc. See attached. That TIA assumed the commercial zoning at the corner of Morgan Way and East Palmer Avenue would accommodate approximately 100,000 sq. ft. of shopping center uses. LCS updated the TIA in August 2022 to analyze the effect of this current rezoning proposal. The updated analysis is also attached. The proposed land use includes about 20,000 square feet of shopping center and about 44 townhome dwelling units. The following are conclusions of the updated TIA:

> *The 2018 TIA assumed two full movement accesses and one right-in/right-out access in the planning area. The currently proposed plan assumes one full movement and one right-in/right-out access in the planning area. This reduction is supported by the large decrease in trip generation potential. The proposed plan has 60 percent of the access assumed in the 2018 TIA but the daily trip generation potential is about 37 percent of*

that assumed in the 2018 TIA. The morning peak-hour trip generation potential is 68 percent of that assumed in the 2018 TIA. The afternoon peak-hour trip generation potential is 41 percent of that assumed in the 2018 TIA and will be the permitted volume for any future access permit applications. The reduction in access is appropriate considering the decrease in trip generation potential. The proposed Bennett Ranch planning area trip generation potential is well below the previously approved trip generation potential and is appropriate for the modified access plan.

The previous Town Traffic Engineer concluded in May 2021 that there would be "a significant reduction in generated development traffic and there would be no adverse impacts of the proposed rezoning" and "there are no traffic related concerns with the proposed rezoning." The current Town Traffic Engineer has reviewed all previous studies and concurs. The applicant and any future developers should be aware that the proposed Ardennais Lane intersection with East Palmer Avenue has not been formally approved by the Colorado Department of Transportation (CDOT) and will require an access permit from CDOT.

The Town Engineer adds the following comments:

- Pedestrian access & circulation, supported by the Palmer/79 sidewalk/Trail will continue to be important for residential as it was for commercial.
- The Palmer/79 noise issues and noise mitigation will be a greater factor with the residential than for the previously proposed commercial areas.
- This is the same noise & noise mitigation issue the Town is confronting and working through in several areas of Town with new development and roadway expansions, however.

Fire and Rescue

The property lies within the Bennett-Watkins Fire Rescue (BWFR) Authority District. BWFR has no specific objections to the rezoning activities proposed in the application. The following comments are standing comments from previous rounds of referral that still apply to the overall development regardless of the rezoning proposed.

- The developer shall confer with Bennett Fire Protection District and ensure that the proposed development conforms to adopted (IFC) fire code standards.
- The developer shall ensure the proposed municipal water systems pertaining to hydrant distribution fire suppression is adequate to protect the proposed development as well as meet design expectations of both the Town of Bennett as well as Bennett-Watkins Fire Rescue. Considerations for design requirement shall include adopted codes and standards as well as ISO distribution and fire flow requirements.
- It is recommended that the developer work directly with Bennett-Watkins Fire Rescue, ISO, and Town of Bennett Staff to provide and review information pertaining to the needed fire flows for the proposed development. This information should be vetted against International Fire Code Requirements as well as ISO requirements. It is also likely that this information will also be required by the Town to include for hydraulic system modeling.
- BWFR's referral comments also referenced the fire hydrant painting and color coding system, wildland-urban interface provisions, development access and future impact fees.

Gas, Electric and Telecommunications

Gas will be available from Colorado Natural Gas. Electric power will be available from CORE Electric Cooperative and telecommunications will be available from Eastern Slope and Comcast.

School District

The property is within the Bennett 29-J School District. The District indicated it will discuss land dedication requirements with the developer as the project moves forward anticipating that cash-in-lieu of land will be required due to the project size and location with the District. This matter will be addressed at the time of any future residential subdivision plat application.

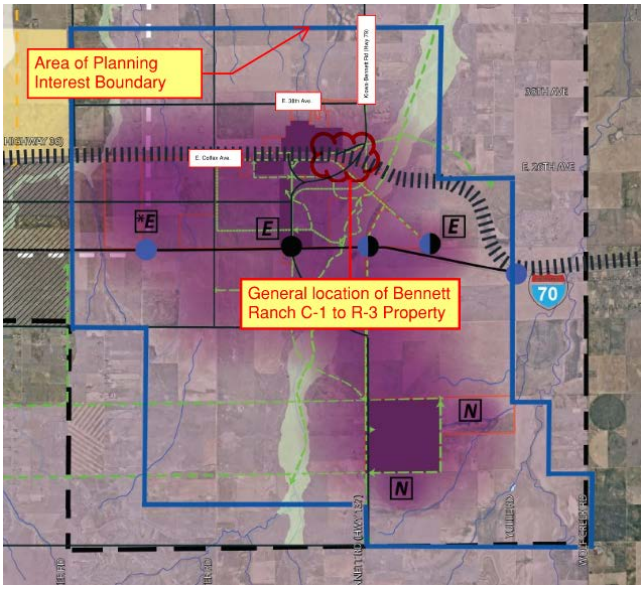
Public Land Dedication for Parks and Other Public Facilities

Per Sec. 16-5-510 of the Bennett Municipal Code, at the time of subdivision, the subdivider shall dedicate to the Town and improve to the Town's specifications usable tracts of land that are free from liens or encumbrances, for park land and public facilities. Previous land dedications conveyed at the time of the Bennett Ranch Filing 1 subdivision will be considered. A credit may be applied to future subdivision of the subject property.

Staff Analysis and Findings

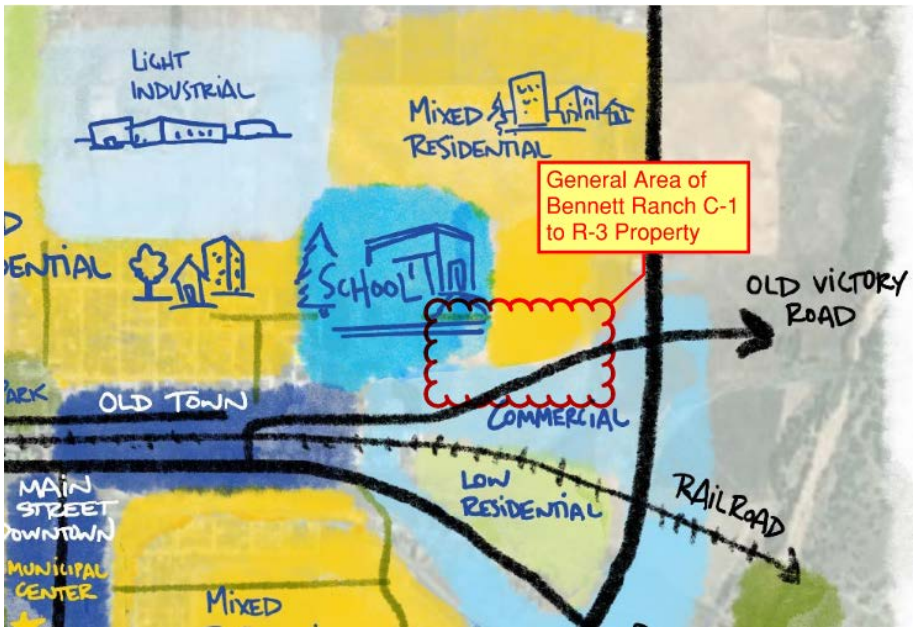
Consistency with the Comprehensive Plan

1. **The subject property is within the Area of Planning Interest in the 2021 Comprehensive Plan.**
   The Area of Planning Interest includes infill properties within Bennett, contiguous properties and properties within a logical service area. See the subsection of the comprehensive plan map below.



2. **The proposed zoning is consistent with the Town Centre Land Use Concept Plan.**
The subject property is in an area of the Town Center Land Use Concept Plan that recommends a mix of commercial and mixed residential land uses. Staff considers both the existing zoning configuration and the proposed rezoning to be consistent with the intent of the Concept Plan. Since the current Bennett Ranch commercial property was zoned in 2019, additional commercial zoning was approved east of the subject property as part of the Kiowa Creek Preserve Outline Development Plan. Because of access, that commercial property may be better suited to meet the retail and service needs of the immediate area.

See a subsection of the Town Centre Land Use Concept Plan below.



Comprehensive Plan Principles

The Comprehensive Plan includes twelve principles that provide guidance to elected and appointed officials, residents, business and land owners, project applicants, community partners and stakeholders concerning growth and future land uses. They are outlined below.

Comprehensive Plan Principle	Complies? Yes, No, NA or Neutral	Staff Comment
1. A comprehensive, safe and efficient transportation system that provides for all forms of travel, including vehicular, bicycle, pedestrian and public transit.	Yes	Both the proposed R-3 zoned property and the C zoned property will be subject to future subdivision platting. Specific vehicular, bicycle and pedestrian access will be determined at that time.
2. Develop neighborhoods that have a mix of land uses and densities with easy access to parks and open space, schools, cultural facilities, places of worship, shopping and employment.	Yes	By retaining some of the commercially zoned property, the Bennett Ranch neighborhood will still have access to convenience level commercial at the Palmer Ave./Morgan way intersection.
3. Development of a Town Center in the heart of Bennett that will serve as our "downtown" offering easy access to	NA	The subject property is not within the area designated as the future Town Center, which is south of the Bennett Town Hall and Civic Center.

Comprehensive Plan Principle	Complies? Yes, No, NA or Neutral	Staff Comment
shopping, dining, entertainment and employment.		
4. Encourage a high-quality and diverse mix of housing, available to people of different backgrounds, income, age, abilities and all phases of life.	Yes	If the R-3 zoned property develops as a townhome project as anticipated, housing types available in the Bennett community will become more diverse.
5. Commit to being good partners with other community agencies and organizations through collaboration, leveraging funding and planning for future growth. Emphasize local relationships with the School, Library, Recreation, and Fire Districts.	Yes	Future subdivision platting will require collaboration with many partners, including the school district, fire district and the Colorado Department of Transportation.
6. Foster an attractive community that retains residents in all stages of life through attainable housing, continuing education and a robust job market.	Yes	The future R-3 development will be subject to the Town's subdivision process and the Town's Development Design Guidelines and offer housing at a different price point.
7. Preserve and protect natural open space and other areas that have environmental significance, with an emphasis on flood hazard; water value; natural mineral wealth; or are prime open space locations.	NA	The property does not have any significant open space or areas of environmental concern, including flood hazards or natural minerals.
8. Value the development of a healthy community with access to healthy foods, physical activity, recreation, healthcare and safe neighborhoods.	Yes	The Bennett Ranch neighborhood will be a part of a growing community that will offer healthy foods, opportunities for physical activity, access to recreation and healthcare.
9. The Town strives to be resilient by providing a framework to understand and measure its capacity to endure, adapt and transform through economic, social, and physical stresses.	Yes	The future subdivision and final development plan procedures will allow the Town to consider policies and programs relative to building a resilient community.
10. Design new developments in a manner to blend with the rural setting and preserve natural features and areas designated for agricultural production.	Neutral	There are no significant natural features to preserve.
11. Contiguous land development pattern that promotes connected infrastructure and services in line with the capital asset inventory master planning documents.	Yes	The property is contiguous to the existing Town boundaries and infrastructure.
12. Both land and infrastructure development decisions will be predictable and provide equitable cost-sharing in line with the Town's master plans.	Yes	Future subdivision plats and agreements will ensure infrastructure development decisions will be predictable and equitable regarding cost sharing.

Consistency with the Intent of the Zoning Code

Staff Finding: Staff finds the proposed zoning is consistent with the purpose of the Bennett Land Use Code, including the following items outlined in Section 16-1-50:

(1) Implement the Town's goals, policies, plans, and programs to preserve and enhance the quality of life of its citizens and to promote economic vitality of its businesses;
(2) Promote superior land use, design and design flexibility;
(3) Support the development of Bennett as a model healthy community of interconnected employment and neighborhood centers;
(4) Maintain and enhance a quality residential environment in the Town;
(5) Provide a diversity of housing types at various densities;
(6) Provide adequate services and facilities to support existing and projected areas of population and growth;
(7) Promote logical extensions of and efficient use of the Town's infrastructure;
(8) Ensure that the fiscal impact of subdivision and development is borne by those parties who receive the benefits therefrom; and
(9) Support programs and help provide facilities that meet the recreational, cultural, public safety and educational needs of the community.

Referral Agency Review and Comments

The proposed Bennett Ranch C-1 to R-3 rezoning application was sent to several referral agencies for comment, including:

1. Town Planning
2. Town Engineer
3. Town Traffic Engineer
4. Bennett-Watkins Fire Rescue
5. CORE Electric Cooperative
6. Colorado Natural Gas
7. Bennett School District 29J
8. Adams County Sheriff
9. Colorado Department of Transportation (CDOT)

None of the agencies that responded have any objections to the proposed zoning. However, many of them, including the Town Engineer, Town Traffic Engineer, Bennett-Watkins Fire, Bennett School District 29J, CORE Electric Cooperative and CDOT, will require more analysis at the time of subdivision platting and final development plans.

Public Comment

Notice of the March 27, 2023 Planning and Zoning Commission hearing and the April 11, 2023 Board of Trustees hearings was published in the Eastern Colorado News, posted on the subject property and sent to all property owners within 300 feet of the property. No formal comments have been submitted to date.

Summary of Staff Findings and Recommendation

Staff finds the proposed zoning is consistent with:

- the goals and policies of the Comprehensive Plan;
- the purpose of the Bennett Land Use Code outlined in Section 16-1-50; and
- the Planned Development approval criteria outlined in Section 16-2-350

Staff recommends the Planning and Zoning Commission approve Resolution No. 2023-01 recommending approval of the proposed rezoning of the 6.84 acres from C – General Commercial to R-3 – High Density Residential.

Attachments

1. Staff PowerPoint Presentation (PDF)
2. Letter of Intent
3. Rezoning Amendment Map
4. Bennett Ranch C District and R-3 District Concept Plan
5. Original 2018 Bennett Ranch Traffic Impact Analysis
6. August 2022 Bennett Ranch Traffic Impact Analysis
7. Combined Staff and Referral Agency Comments
8. Proposed Resolution No. 2023-01

Case No. 22.08
Bennett Ranch C to R-3
Rezoning Application

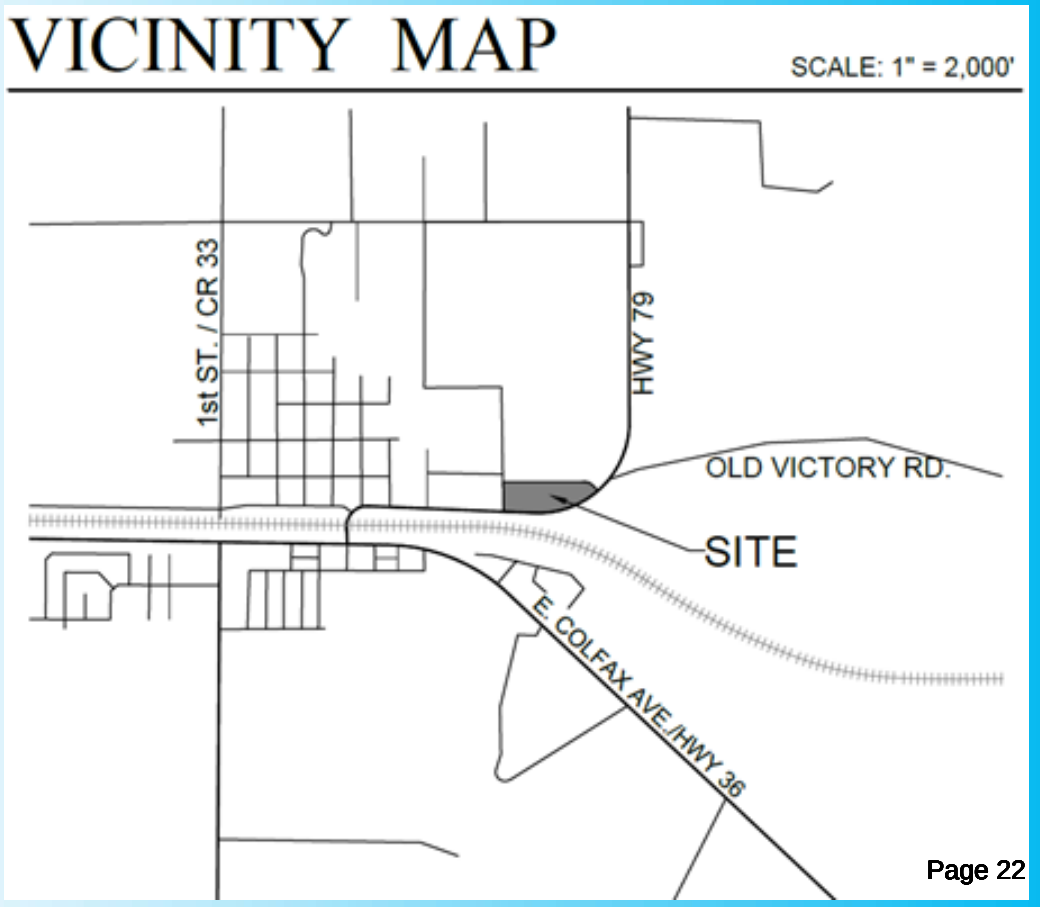
Planning and Zoning Commission

March 27, 2023

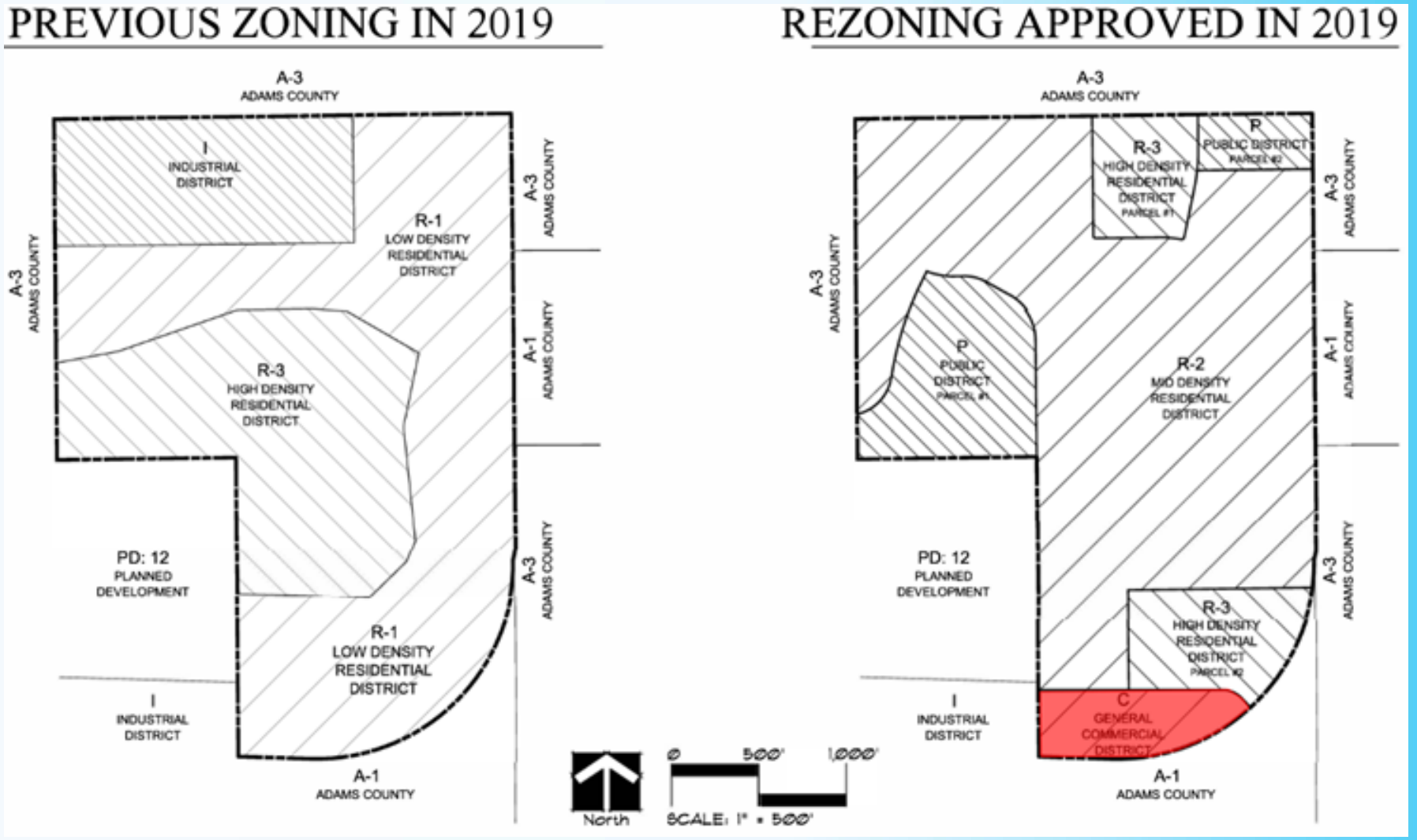
Steve Hebert, Planning Manager

Proposed Rezoning from C – General Commercial to R-3 High Density Residential in Bennett Ranch

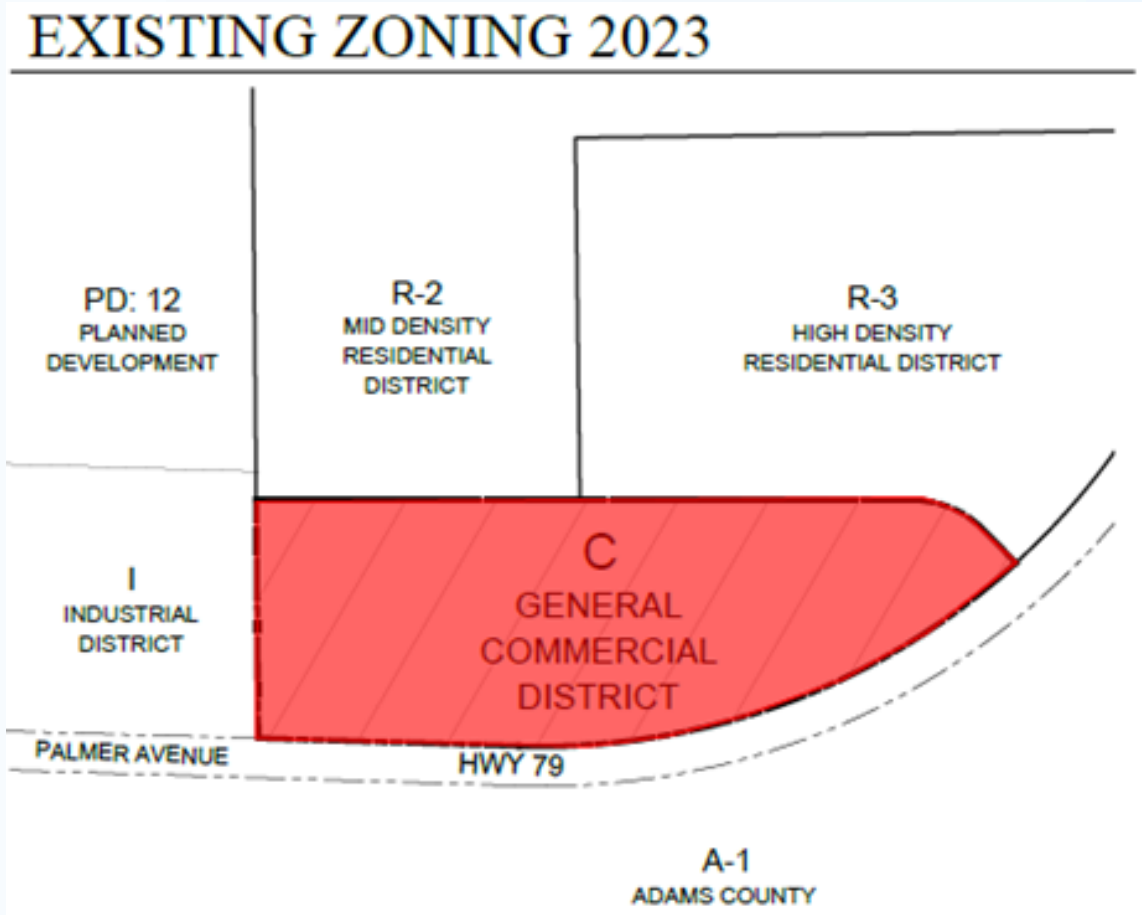
- Proposal to rezone 6.84 acres from C – General Commercial to R-3 - High Density Residential
- Prior to 2019 the property was zoned R-1 – Low Density Residential
- Rezoned to C – General Commercial in 2019

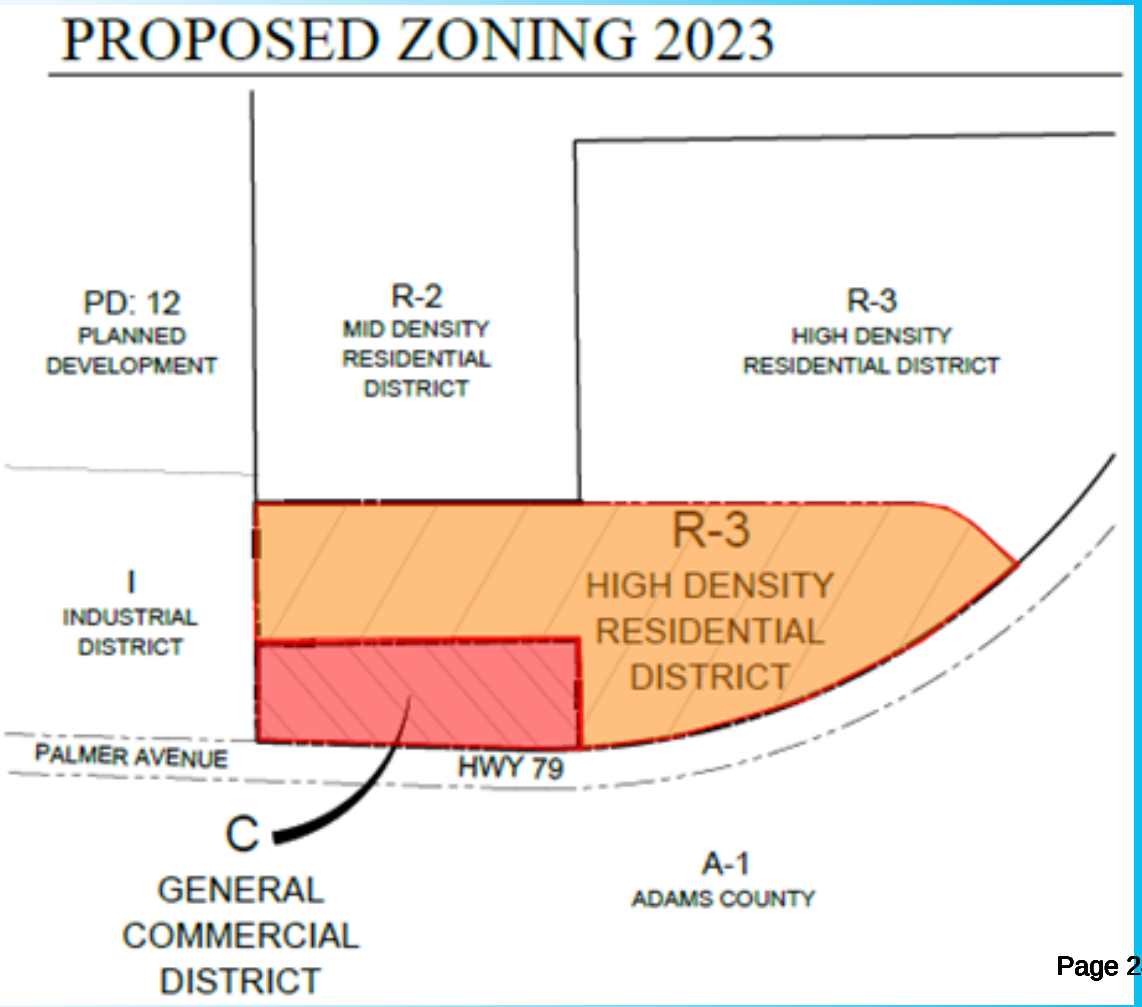


Previous Bennett Ranch Rezoning in 2019

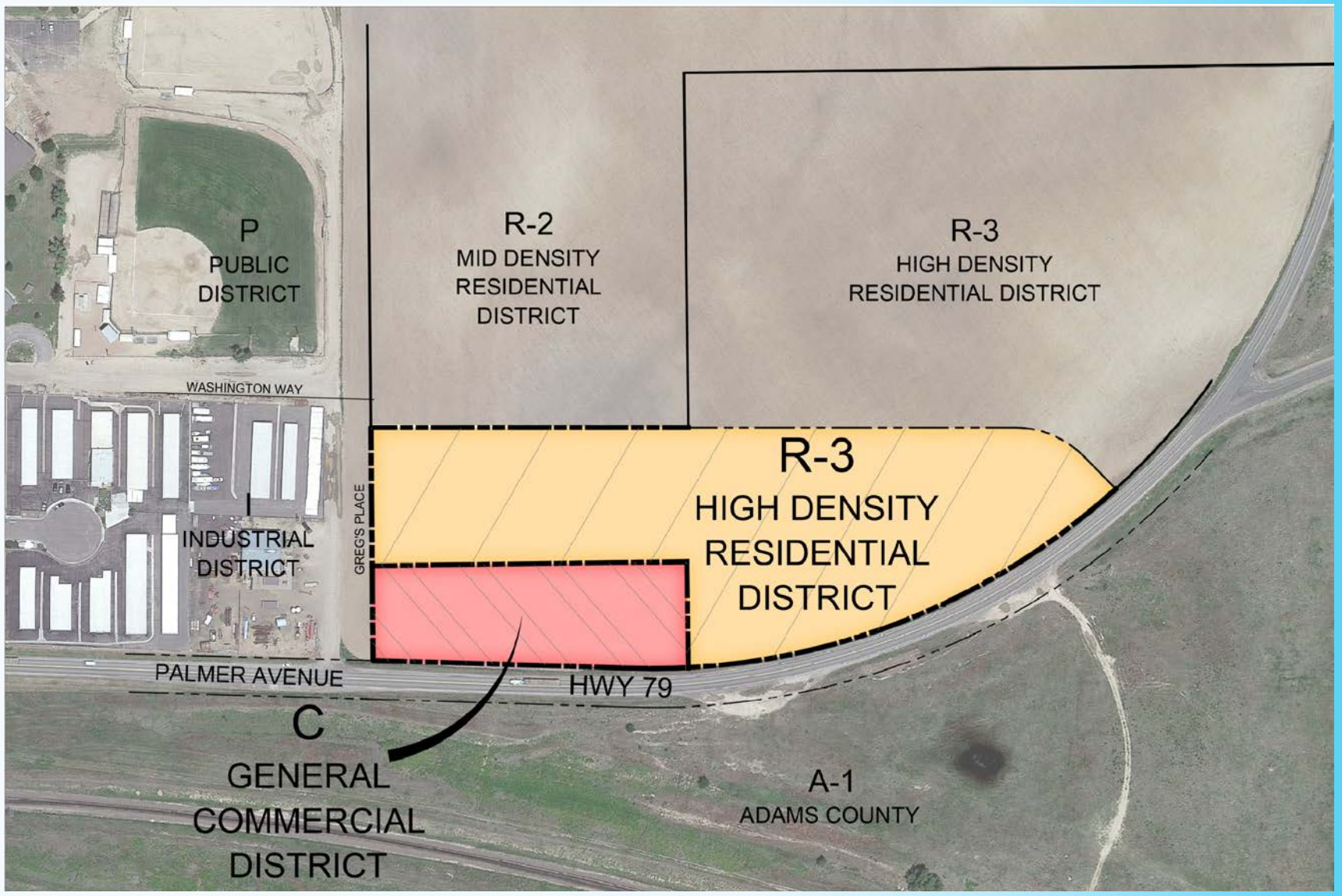


Proposed Rezoning in 2023





Proposed Rezoning in 2023



Applicant's Development Concept

(Neither the Commission nor the Board are being asked to approve the concept plan at this time.)

R-3 Zoning Standards

Standard	R-3 - High Density Residential District
Minimum Lot Area/Dwelling Unit	2,400 square feet
Minimum Lot Width	50 feet; 25 feet for townhome dwellings
Maximum Lot Coverage	75%
Minimum Floor Area/Dwelling Unit	600 square feet
Minimum Front Yard Setback (Principal Structure)	25 feet; except in MS overlay, 5 feet
Minimum Front Yard Setback (Accessory Structure)	25 feet
Minimum Side Yard Setback (Principal Structure)	25 feet; except in MS overlay, 0 feet; 5 feet for townhome dwellings
Minimum Side Yard Setback (Accessory Structure)	5 feet
Minimum Rear Yard Setback (Principal Structure)	20 feet; except in MS overlay, 5 feet
Minimum Rear Yard Setback (Accessory Structure)	5 feet
Maximum Height (Principal Structure)	40 feet
Maximum Height (Accessory Structure)	12 feet, except detached garages, 18 feet

Surrounding Zoning and Land Use

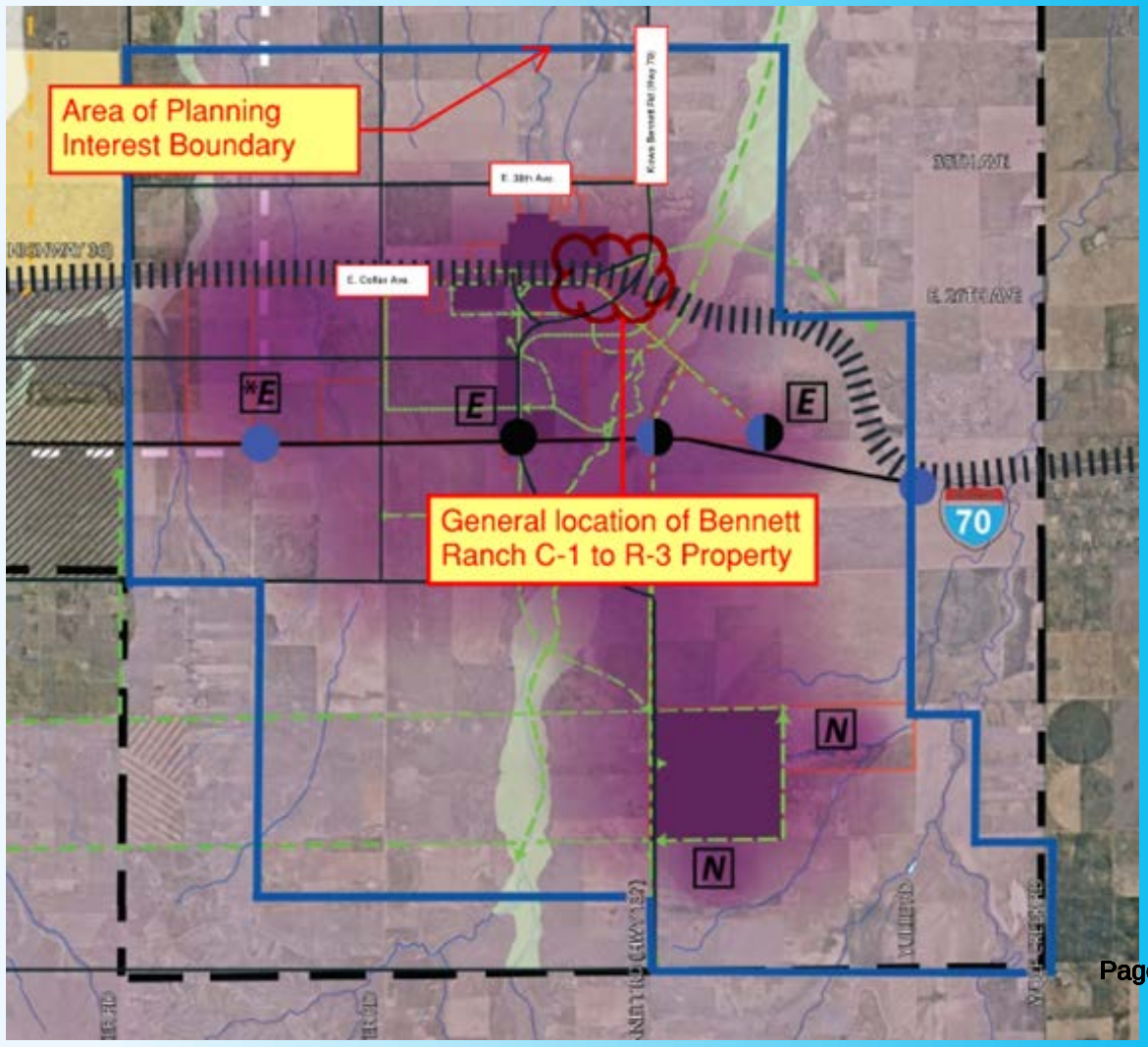
Direction	Zone District	Land Use
North	R-2 and R-3 Residential	Bennett Ranch Subdivision (LGI Homes)
East	A-3, Unincorporated Adams Co.	Agricultural, Vacant
South	A-3, Unincorporated Adams Co.	Agricultural, Vacant
West	I - Industrial	Industrial (Bennett Welding and Blue Sky Storage

Availability of Public Infrastructure

- Future subdivision plats and subdivision agreements will require the developer to design, finance and construct both onsite and offsite improvements.
  - Water and Sewer – Town of Bennett
  - Regional Stormwater – Bennett Ranch Regional System
  - Fire Protection – Bennett-Watkins Fire Rescue (consistent with IFC and other standards)
  - Access – E. Palmer Ave./Hwy 79, Morgan Way and Washington Way
  - Law Enforcement – Adams County Sheriff
  - Electricity – CORE Electric Cooperative
  - Natural Gas – Colorado Natural Gas
  - Telecom – Eastern Slope Technologies or Comcast
  - Bennett School District 29J, initial request for cash-in-lieu of land dedication

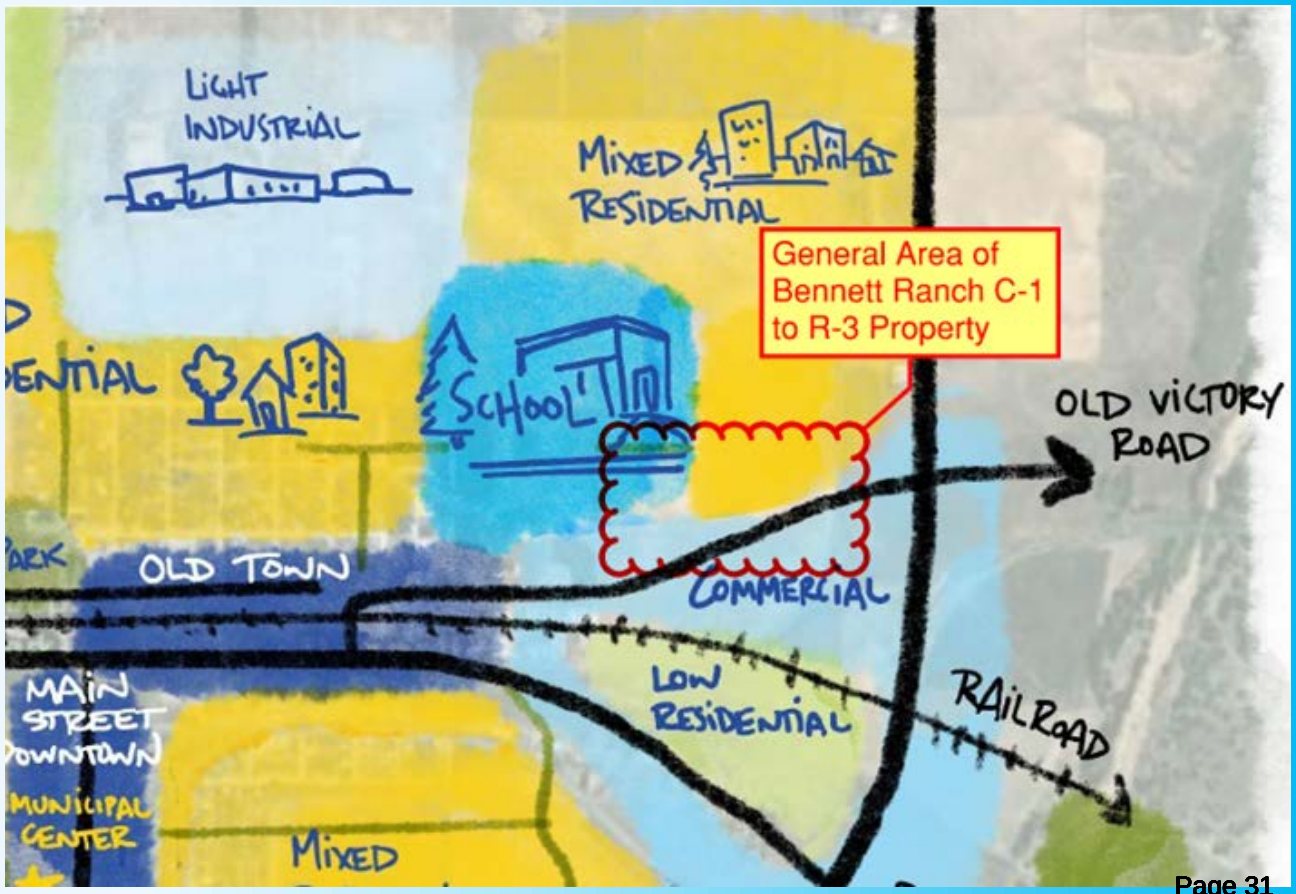
Consistency with 2021 Comprehensive Plan

- Property is within the Area of Planning Interest
- Contiguous to existing Town boundaries



Consistency with 2021 Comprehensive Plan

- Consistent with the Town Centre Land Use Concept
- Zoning can accommodate both Mixed Residential and Commercial Land Uses



Consistency with the Intent of the Zoning Code

(1) Implement the Town's goals, policies, plans, and programs to preserve and enhance the quality of life of its citizens and to promote economic vitality of its businesses;

(2) Promote superior land use, design and design flexibility;

(3) Support the development of Bennett as a model healthy community of interconnected employment and neighborhood centers;

(4) Maintain and enhance a quality residential environment in the Town;

(5) Provide a diversity of housing types at various densities;

(6) Provide adequate services and facilities to support existing and projected areas of population and growth;

(7) Promote logical extensions of and efficient use of the Town's infrastructure;

(8) Ensure that the fiscal impact of subdivision and development is borne by those parties who receive the benefits therefrom;

(9) Support programs and help provide facilities that meet the recreational, cultural, public safety and educational needs of the community.

Staff Findings on Case No. 21.08

Staff finds the proposed zoning is consistent with:

- the goals and policies of the Comprehensive Plan;
- the purpose of the Bennett Land Use Code outlined in Section 16-1-50; and
- the Planned Development approval criteria outlined in Section 16-2-350.

Staff Recommendation

Staff recommends the Planning and Zoning Commission approve Resolution No. 2023-01 recommending approval of the proposed rezoning of the 6.84 acres from C – General Commercial to R-3 – High Density Residential.

(See Proposed Resolution)

henry design group

Landscape Architecture • Planning • Entitlements

September 15, 2022

Steve Hebert, Planning and Economic Development Manager
Town of Bennett
207 Muegge Way
Bennett, CO 80101

Re: Bennett Ranch – Zoning Amendment – Revised Letter of Intent

Dear Mr. Hebert,

Please find included herein the amended proposed rezoning documents for Bennett Ranch. The amendment addresses the referral comments received from the initial submittal in May of 2021. As indicated in the letter from the Town, the technical review agencies do not identify any particular concerns with the proposed rezoning. The proposal is also a result of conversations between the Town and applicant.

To address the concerns of Planning, the proposed rezoning has been amended to maintain a net Commercial development parcel of 1.48 Acres. The parcel will be accessed from Morgan Way and Ardennais Lane. The Commercial site is appropriately located due to the adjacent Bennett Welding property to the west of Morgan Way. The remaining 6.84 acres is proposed to be rezoned to R-3 as a continuation of LGI's townhome development.

The proposed amended rezoning application is for the existing 9.03 Acre Bennett Ranch Commercial area. The R-3 amendment area is intended to allow for additional housing diversity which will contribute to the residential community of Bennett. The 1.48 acres commercial parcel will accommodate the convenient provision of goods and services to the immediate neighborhood of Bennett Ranch as envisioned by the Town. The reduction in the Bennett Ranch commercial area, which is on the eastern edge of Town, will hopefully drive new commercial users to the Town core. Additionally, the opportunity exists for significant commercial development to be focused along the potential realignment of Highway 79, Interstate-70 and within the larger mixed-use neighborhoods west and south of Town where neighborhood centers can be established.

The amended rezoning application includes the following information:

1. Rezoning Map
2. Conceptual Site Plan Exhibit
3. Zoning parcels legal description and exhibits

henry design group

Landscape Architecture • Planning • Entitlements

4. Traffic Trip Generation Conformance Letter
5. CDOT Access permit for Morgan Way
6. Response to questions raised in the July 26, 2022 email from Mr. Hebert
7. Updated adjacent landowners within 300-feet
8. Title Commitment dated November 19, 202; although there are no changes to the title work, an update is in process.

Thank you for your time and efforts in reviewing this proposed amended rezoning application and we look forward to working with the Town of Bennett to see this neighborhood to fruition.

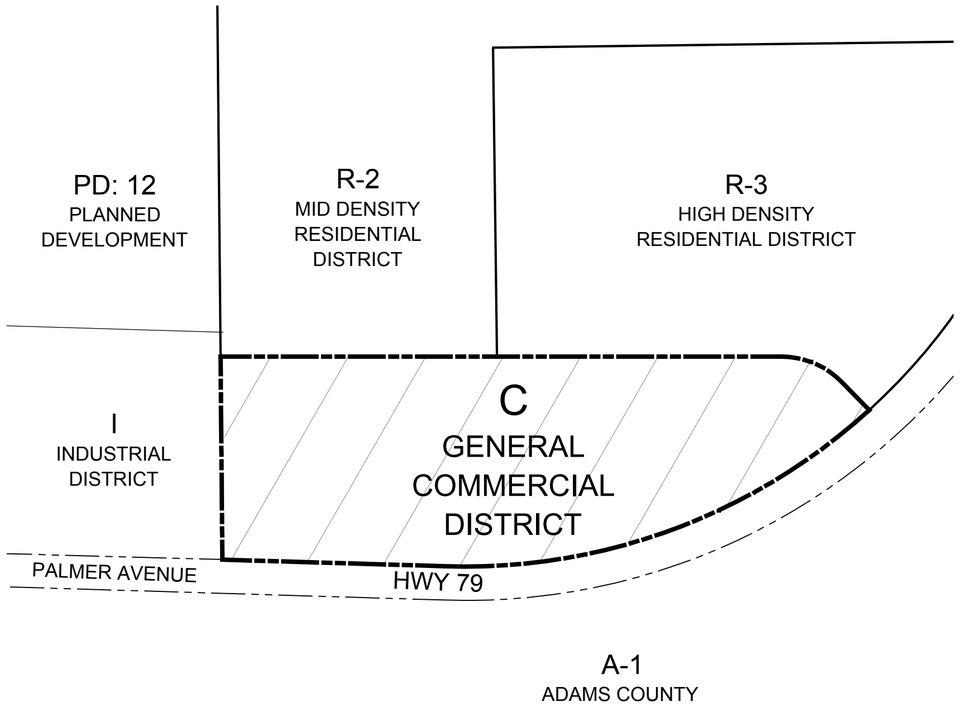
Respectfully submitted:

Karen Z. Henry, Principal

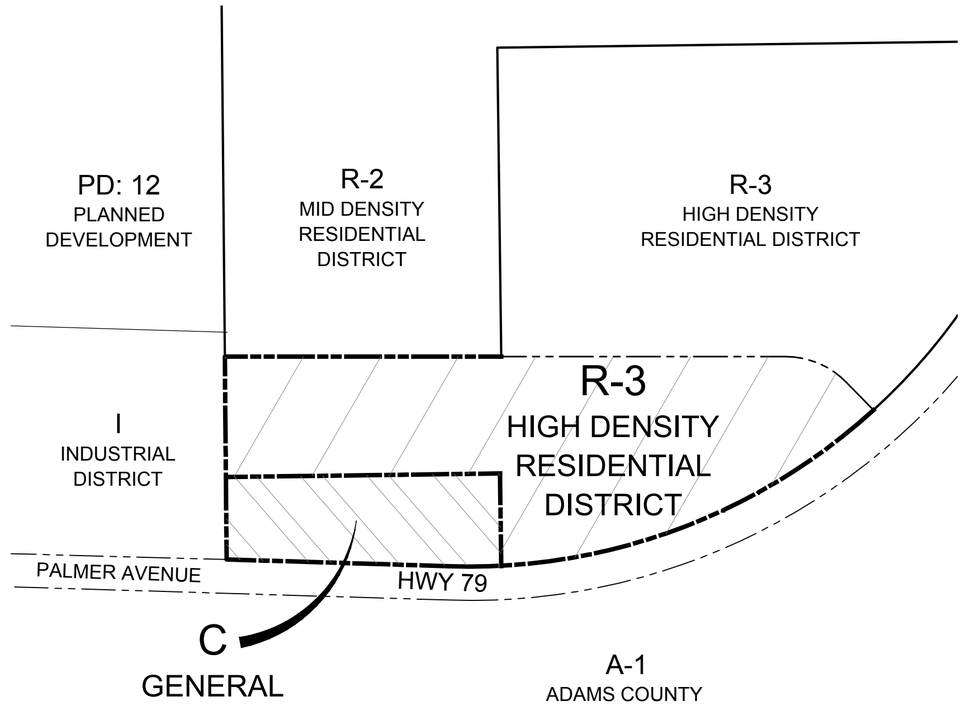
ZONING AMENDMENT
BENNETT RANCH

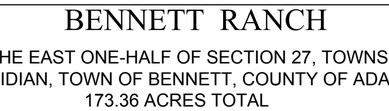
A PARCEL OF LAND LOCATED IN THE EAST ONE-HALF OF SECTION 27, TOWNSHIP 3 SOUTH, RANGE 63 WEST
OF THE SIXTH PRINCIPAL MERIDIAN, TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
173.36 ACRES TOTAL

EXISTING ZONING



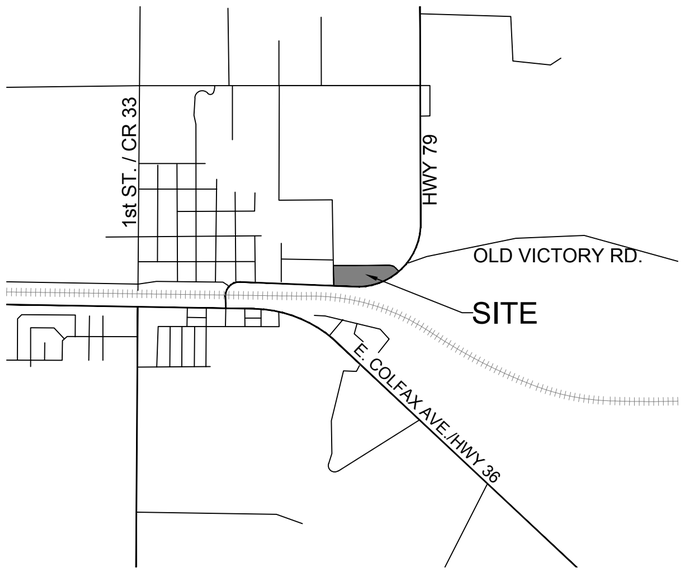
PROPOSED ZONING





VICINITY MAP

SCALE: 1" = 2,000'



LEGAL DESCRIPTIONS

SEE ATTACHED EXHIBIT A FOR LEGAL DESCRIPTIONS

LEGAL DESCRIPTION A

BEING A PORTION OF THAT REAL PROPERTY AS DESCRIBED BY TRACT N, BENNETT RANCH - FILING NO. 1 RECORDED AT RECEPTION NO. 2020000123425, IN THE EAST HALF OF SECTION 27, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH P.M., COUNTY OF ADAMS, STATE OF COLORADO, MORE PARTICULARLY DESCRIBED AS FOLLOWS:

EXHIBIT A - ZONING C

COMMENCING AT THE EAST 1/4 CORNER OF SAID SECTION, FROM WHENCE THE NORTHEAST CORNER OF SAID NORTHEAST QUARTER (NE 1/4) BEARS SOUTH 00°35'38" EAST A DISTANCE OF 2649.23 FEET, WITH ALL BEARINGS HEREIN RELATED THERETO, TO THE POINT OF COMMENCEMENT;

THENCE NORTH 00°35'38" WEST, 54.56 FEET ALONG THE NE 1/4 OF SAID SECTION;
THENCE SOUTH 89°24'22" WEST, 70.00 FEET TO A POINT ON THE BOUNDARY OF SAID REAL PROPERTY;
THENCE SOUTH WEST ALONG THE BOUNDARY OF SAID REAL PROPERTY THROUGH A CURVE, HAVING A RADIUS OF 1097.50 FEET, WHOSE LONG CHORD BEARS SOUTH 42°49'56" WEST AND HAS A CHORD LENGTH OF 1508.88 FEET, THROUGH A CENTRAL ANGLE OF 86°51'08", FOR AN ARC LENGTH OF 1663.65 FEET, TO THE POINT OF BEGINNING;

THENCE LEAVING SAID BOUNDARY, SOUTH 00°44'38" EAST, 24.41 FEET;

THENCE SOUTHWEST THROUGH A CURVE, HAVING A RADIUS OF 1122.50 FEET, WHOSE LONG CHORD BEARS SOUTH 89°03'28" WEST AND HAS A CHORD LENGTH OF 102.33 FEET, THROUGH A CENTRAL ANGLE OF 05°13'30", FOR AN ARC LENGTH OF 102.36 FEET,
THENCE NORTH 88°19'31" WEST, 414.67 FEET;

THENCE NORTH 00°31'22" WEST, 174.52 FEET;

THENCE NORTH 89°15'22" EAST, 515.95 FEET;

THENCE SOUTH 00°44'38" EAST, 167.25 FEET TO THE POINT OF BEGINNING.

CONTAINING 95,579 SQUARE FEET OR 2.194 ACRES OF LAND, MORE OR LESS.

END OF LEGAL DESCRIPTION.

LEGAL DESCRIPTION B

BEING A PORTION OF THAT REAL PROPERTY AS DESCRIBED BY TRACT N, BENNETT RANCH - FILING NO. 1 RECORDED AT RECEPTION NO. 2020000123425, IN THE EAST HALF OF SECTION 27, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH P.M., COUNTY OF ADAMS, STATE OF COLORADO, MORE PARTICULARLY DESCRIBED AS FOLLOWS:

EXHIBIT B - ZONING R-3

COMMENCING AT THE EAST 1/4 CORNER OF SAID SECTION, FROM WHENCE THE NORTHEAST CORNER OF SAID NORTHEAST QUARTER (NE 1/4) BEARS SOUTH 00°35'38" EAST A DISTANCE OF 2649.23 FEET, WITH ALL BEARINGS HEREIN RELATED THERETO, TO THE POINT OF COMMENCEMENT;

THENCE NORTH 00°35'38" WEST, 54.56 FEET ALONG THE NE 1/4 OF SAID SECTION;
THENCE SOUTH 89°24'22" WEST, 70.00 FEET TO A POINT ON THE BOUNDARY OF SAID REAL PROPERTY;
THENCE SOUTH WEST ALONG THE BOUNDARY OF SAID REAL PROPERTY THROUGH A CURVE, HAVING A RADIUS OF 1097.50 FEET, WHOSE LONG CHORD BEARS SOUTH 23°29'22" WEST AND HAS A CHORD LENGTH OF 895.70 FEET, THROUGH A CENTRAL ANGLE OF 48°10'00", FOR AN ARC LENGTH OF 922.63 FEET, TO THE POINT OF BEGINNING;

THENCE LEAVING SAID BOUNDARY, SOUTH 44°19'20" EAST, 26.02 FEET;

THENCE SOUTHWEST THROUGH A CURVE, HAVING A RADIUS OF 1122.50 FEET, WHOSE LONG CHORD BEARS SOUTH 67°02'40" WEST AND HAS A CHORD LENGTH OF 745.73 FEET, THROUGH A CENTRAL ANGLE OF 38°48'06", FOR AN ARC LENGTH OF 760.17 FEET,
THENCE NORTH 00°44'38" WEST, 191.66 FEET;

THENCE SOUTH 89°15'22" WEST, 515.95 FEET;

THENCE NORTH 00°31'22" WEST, 203.73 FEET;

THENCE NORTH 90°00'00" EAST, 1045.06 FEET;

THENCE SOUTHEAST THROUGH A CURVE, HAVING A RADIUS OF 157.50 FEET, WHOSE LONG CHORD BEARS SOUTH 67°09'40" EAST AND HAS A CHORD LENGTH OF 122.26 FEET, THROUGH A CENTRAL ANGLE OF 45°40'40", FOR AN ARC LENGTH OF 125.56 FEET,

THENCE SOUTH 44°19'20" EAST, 44.38 FEET TO THE POINT OF BEGINNING.

CONTAINING 297,967 SQUARE FEET OR 6.840 ACRES OF LAND, MORE OR LESS.

END OF LEGAL DESCRIPTION.

APPLICANT:
Bennett Ranch, LLC

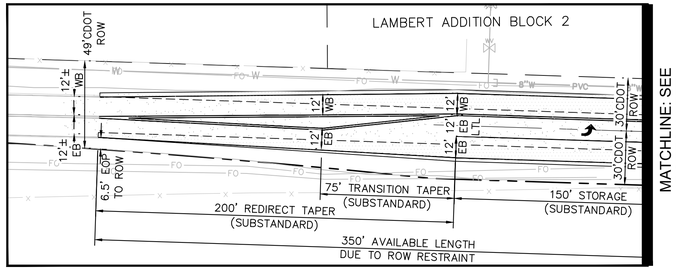
PLANNER:
henry design group
Landscape Architecture • Planning • Entitlements
1501 Wazee Street Suite 1-C, Denver, Colorado 80202
303.446.2368 | henrydesigngroup.com

BENNETT RANCH
Zoning Amendment
Bennett, Colorado

ISSUE DATE:	3-23-2021
REVISIONS:	9-14-2022

SHEET NUMBER

1 of 1



BENNETT RANCH - FILING 03

CONCEPTUAL TOWNHOME SITE PLAN

BENNETT, COLORADO

Kimley»Horn
© 2022 KIMLEY-HORN AND ASSOCIATES, INC.
4582 SOUTH ULSTER STREET, SUITE 1500
DENVER, CO 80237 (303) 228-2300

DESIGNED	DRAWN	CHECKED
KHTEAM	KHTEAM	TAF

SCALE (H): 1"=40'
SCALE (V): N/A

CONCEPTUAL LAYOUT
NOT FOR CONSTRUCTION.

DATE: AUGUST 2022
PROJECT NO. 196011004
DWG. NAME BR - COM REZONE- CONCEPT

SHEET NO. 1 of 1 shts

CASE NO.: TBD

LSC TRANSPORTATION CONSULTANTS, INC.

1889 York Street
Denver, CO 80206
(303) 333-1105
FAX (303) 333-1107
E-mail: lsc@lscdenver.com

December 7, 2018

Mr. Michael Blumenthal
Bennett Ranch, LLC
17 Beacon Hill Lane
Greenwood Village, CO 80111

Re: Bennett Ranch
Traffic Impact Analysis
Bennett, CO
LSC #181140

Dear Mr. Blumenthal:

In response to your request, LSC Transportation Consultants, Inc. has prepared this traffic impact analysis for the proposed Bennett Ranch development. As shown on Figure 1, the site is located south of E. 38th Avenue and west of SH 79 (Kiowa-Bennett Road) in Bennett, Colorado.

REPORT CONTENTS

The report contains the following: the existing roadway and traffic conditions in the vicinity of the site including the lane geometries, traffic controls, posted speed limits, etc.; the existing weekday peak-hour traffic volumes; the existing daily traffic volumes in the area; the typical weekday site-generated traffic volume projections for the site; the assignment of the projected traffic volumes to the area roadways; the projected long-term background and resulting total traffic volumes on the area roadways; the site's projected traffic impacts; and any recommended roadway improvements to mitigate the site's traffic impacts.

LAND USE AND ACCESS

The site is proposed to include about 416 single-family dwelling units, about 231 multi-family dwelling units, a 17.68-acre area to be dedicated to the school district, a 15.36-acre park, a 20,000 square-foot fire station, and about 99,600 square feet of retail space. Full movement access points are proposed to E. 38th Avenue and SH 79 (Kiowa-Bennett Road or Palmer Avenue) as shown in the conceptual site plan in Figure 2.

ROADWAY AND TRAFFIC CONDITIONS

Area Roadways

The major roadways in the site's vicinity are shown on Figure 1 and are described below.

- **SH 79 (Kiowa-Bennett Road and/or Palmer Avenue)** is a north-south, two-lane state highway east of the site. South of E. 38th Avenue, it is classified by CDOT as NR-B (Non-Rural Arterial) and as R-B (Rural Highway) north of E. 38th Avenue. The intersection with E. 38th Avenue is stop-sign controlled. The posted speed limit in the vicinity of the site transitions from 35 to 65 mph as the roadway moves from urban to rural. The 2013 *SH 79-Kiowa Bennett Corridor PEL Study* (SH 79 PEL) shows SH 79 being realigned in the future between the site and I-70. The portion south of the site (Palmer Avenue) will likely be turned over to the Town of Bennett with the primary alignment headed south to cross E. Colfax Avenue. Both roadways are assumed to be four-lane roadways adjacent to the site by 2040. All full movement access proposed to SH 79 is consistent with the August, 2018 *SH 79 Access Control Plan* by SM Rocha, LLC.

- **E. 38th Avenue** is an east-west, two-lane gravel collector roadway north of the site. The intersection with SH 79 is stop-sign controlled. No speed limit is posted in the vicinity of the site.

Existing Traffic Conditions

Figure 3 shows the existing lane geometries, traffic controls, posted speed limits, and traffic volumes in the site's vicinity on a typical weekday. The weekday peak-hour traffic volumes and daily traffic counts are from the attached traffic counts conducted by Counter Measures in September and November, 2018.

2023 and 2040 Background Traffic

Figure 4 shows the estimated 2023 background traffic and Figure 5 shows the estimated 2040 background traffic based on an annual growth rate of 2.3 percent on SH 79 at E. 38th Avenue per the SH 79 PEL.

Existing, 2023, and 2040 Background Levels of Service

Level of service (LOS) is a quantitative measure of the level of congestion or delay at an intersection. Level of service is indicated on a scale from "A" to "F." LOS A is indicative of little congestion or delay and LOS F is indicative of a high level of congestion or delay. Attached are specific level of service definitions for unsignalized intersections.

The intersections in Figures 3, 4, and 5 were analyzed as appropriate to determine the existing, 2023, and 2040 background levels of service using Synchro. Table 1 shows the level of service analysis results. The level of service reports are attached.

- **SH 79 (Kiowa-Bennett Road)/E. 38th Avenue:** All movements at this unsignalized intersection currently operate at LOS "A" during both morning and afternoon peak-hours and are expected to operate at LOS "B" or better through 2040.

- **SH 79 (Palmer Avenue)/Old Victory Road:** All movements at this unsignalized intersection currently operate at LOS "B" or better during both morning and afternoon peak-hours and are expected to do so through 2023. This intersection is expected to be reconfigured by 2040.

- **SH 79 (Kiowa-Bennett Road)/Old Victory Road/Palmer Avenue:** All movements at this future unsignalized intersection are expected to operate at LOS "B" or better through 2040.

- **SH 79 (Palmer Avenue)/Greg's Place**: All movements at this unsignalized intersection currently operate at LOS "B" or better during both morning and afternoon peak-hours and are expected to do so through 2040.

- **SH 79 (Palmer Avenue)/8th Street**: All movements at this unsignalized intersection currently operate at LOS "C" or better during both morning and afternoon peak-hours and are expected to operate at LOS "D" or better through 2040.

TRIP GENERATION

Table 2 shows the estimated average weekday, morning peak-hour, and afternoon peak-hour trip generation for the proposed site based on the rates from *Trip Generation, 10th Edition, 2017* by the Institute of Transportation Engineers (ITE) for the proposed land use.

The site is projected to generate about 8,147 primary vehicle-trips on the average weekday, with about half entering and half exiting during a 24-hour period. During the morning peak-hour, which generally occurs for one hour between 6:30 and 8:30 a.m., about 167 vehicles would enter and about 351 vehicles would exit the site. During the afternoon peak-hour, which generally occurs for one hour between 4:00 and 6:00 p.m., about 526 vehicles would enter and about 405 vehicles would exit. This assumes 34 percent of the shopping center land use trips are pass-by trips.

TRIP DISTRIBUTION

Figure 6 shows the estimated 2023 and 2040 directional distribution of the site-generated traffic volumes on the area roadways. The estimates were based on the location of the site with respect to the regional population, employment, and activity centers; and the site's proposed land use.

TRIP ASSIGNMENT

Figure 7a shows the estimated 2023 primary site-generated traffic volumes based on the 2023 directional distribution percentages (from Figure 6) and the primary trip generation estimate (from Table 2).

Figure 7b shows the estimated 2040 primary site-generated traffic volumes based on the 2040 directional distribution percentages (from Figure 6) and the primary trip generation estimate (from Table 2).

Figures 8a and 8b show the estimated 2023 and 2040 pass-by site-generated traffic volumes.

2023 AND 2040 TOTAL TRAFFIC

Figure 9 shows the 2023 total traffic which is the sum of 2040 background traffic volumes (from Figure 4) and the 2023 site-generated traffic volumes (from Figures 7a and 8a). Figure 9 also shows the recommended 2023 lane geometry and traffic control.

Figure 10 shows the 2040 total traffic which is the sum of 2040 background traffic volumes (from Figure 5) and the 2040 site-generated traffic volumes (from Figures 7b and 8b). Figure 10 also shows the recommended 2040 lane geometry and traffic control.

PROJECTED LEVELS OF SERVICE

The intersections in Figures 9 and 10 were analyzed to determine the 2023 and 2040 total levels of service. Table 1 shows the level of service analysis results. The level of service reports are attached.

- **E. 38th Avenue/Northwest Site Access:** All movements at this future unsignalized intersection are expected to operate at LOS "A" during both morning and afternoon peak-hours through 2040.

- **E. 38th Avenue/Northeast Site Access:** All movements at this future unsignalized intersection are expected to operate at LOS "A" during both morning and afternoon peak-hours through 2040.

- **E. 38th Avenue/Fire Station Access:** All movements at this future unsignalized intersection are expected to operate at LOS "A" during both morning and afternoon peak-hours through 2040.

- **SH 79 (Kiowa-Bennett Road)/E. 38th Avenue:** All movements at this unsignalized intersection are expected to operate at LOS "C" or better during both morning and afternoon peak-hours through 2040.

- **SH 79 (Kiowa-Bennett Road)/East Site Access:** All movements at this future unsignalized intersection are expected to operate at LOS "B" or better during both morning and afternoon peak-hours through 2040.

- **SH 79 (Kiowa-Bennett Road)/Old Victory Road:** All movements at this unsignalized intersection are expected to operate at LOS "B" or better during both morning and afternoon peak-hours through 2023. This intersection is expected to be reconfigured by 2040.

- **SH 79 (Kiowa-Bennett Road)/Old Victory Road/Palmer Avenue:** All movements at this future unsignalized intersection are expected to operate at LOS "D" or better during both morning and afternoon peak-hours through 2040 with the exception of the eastbound left-turn movement which is expected to operate at LOS "F" in the 2040 afternoon peak-hour.

- **Palmer Avenue/Southeast Site Access:** All movements at this future unsignalized intersection are expected to operate at LOS "B" or better during both morning and afternoon peak-hours through 2040.

- **SH 79 (Kiowa-Bennett Road)/RIRO Commercial Access:** All movements at this unsignalized intersection are expected to operate at LOS "B" or better during both morning and afternoon peak-hours through 2023 while Palmer Avenue remains under CDOT jurisdiction.

- **SH 79 (Kiowa-Bennett Road)/Full Movement Commercial Access:** All movements at this future unsignalized intersection are expected to operate at LOS "B" or better during both morning and afternoon peak-hours in 2040 after Palmer Avenue transitions from CDOT to Town jurisdiction.

- **SH 79 (Kiowa-Bennett Road)/Gregs Place:** All movements at this unsignalized intersection are expected to operate at LOS "C" or better during both morning and afternoon peak-hours through 2040 with the following exception: The southbound left-turn movement will likely operate at LOS "E" during the 2023 afternoon peak-hour prior to SH 79 being relocated away from the Palmer Avenue alignment.

- **SH 79 (Kiowa-Bennett Road)/8th Street:** All movements at this unsignalized intersection are expected to operate at LOS "D" or better during both morning and afternoon peak-hours through 2040 with the following exception: The southbound left-turn movement will likely operate at LOS "E" during both peak-hours prior to SH 79 being relocated away from the Palmer Avenue alignment.

TRAFFIC SIGNAL WARRANT ANALYSIS

Figure 11 shows the 2040 background and total traffic volumes from Figures 5 and 10 for the SH 79/Old Victory Road/Palmer Avenue intersection plotted on a four-hour traffic signal warrant chart. It shows a traffic signal will likely be warranted by 2040.

CONCLUSIONS AND RECOMMENDATIONS

Trip Generation

1. The site is projected to generate about 8,147 primary vehicle-trips on the average weekday, with about half entering and half exiting during a 24-hour period. During the morning peak-hour, about 167 vehicles would enter and about 351 vehicles would exit the site. During the afternoon peak-hour, about 526 vehicles would enter and about 405 vehicles would exit. This assumes 34 percent of the shopping center trips are pass-by trips.

Projected Levels of Service

2. All movements at the intersections analyzed are expected to operate at LOS "D" or better during both morning and afternoon peak-hours through 2040 with the following exceptions: The southbound left-turn movements from Gregs Place and 8th Street to SH 79 (Palmer Avenue) could operate at LOS "E" by 2023 prior to SH 79 being relocated away from the Palmer Avenue alignment. The eastbound left-turn movement from Palmer Avenue to realigned SH 79 could operate at LOS "F" in the 2040 afternoon peak-hour. Traffic signal control or a left-turn acceleration lane may be needed by 2040.

Conclusions

3. The impact of the Bennett Ranch development can be accommodated by the existing roadway network with the following recommended improvements.

Recommendations

4. CDOT and the Town of Bennett coordinate to realign and widen SH 79 through Bennett as planned in the *SH 79-Kiowa Bennett Corridor PEL Study* between 2023 and 2040.

5. The recommended turn lane lengths for intersections impacted by the site are shown in Figures 9 and 10.

6. The intersection of realigned SH 79 with Old Victory Road and Palmer Avenue may require traffic signal control or an eastbound to northbound left-turn acceleration lane by 2040.

* * * * *

We trust our findings will assist you in gaining approval of the proposed Bennett Ranch development. Please contact me if you have any questions or need further assistance.

Sincerely,

LSC TRANSPORTATION CONSULTANTS, INC.

By_____
Christopher S. McGranahan, PE, PTOE
Principal

COLORADO LICENSED
CHRISTOPHER S. MCGRANAHAN
39018
PROFESSIONAL ENGINEER

12-7-18

CSM/wc

Enclosures: Tables 1 and 2
Figures 1 - 11
Traffic Count Reports
Level of Service Definitions
Level of Service Reports

Z:\LSC\Projects\2018\181140-BennettRanch\Report\BennettRanch-120718.wpd

Table 1 (Page 1 of 2)
Intersection Levels of Service Analysis
Bennett Ranch
Bennett, CO
LSC #181140; December, 2018

Intersection Location	Traffic Control	Existing Traffic Level of Service AM	Existing Traffic Level of Service PM	2023 Background Traffic Level of Service AM	2023 Background Traffic Level of Service PM	2023 Total Traffic Level of Service AM	2023 Total Traffic Level of Service PM	2040 Background Traffic Level of Service AM	2040 Background Traffic Level of Service PM	2040 Total Traffic Level of Service AM	2040 Total Traffic Level of Service PM
E. 38th Avenue/Northwest Site Access	TWSC										
NB Approach		--	--	--	--	A	A	--	--	A	A
WB Approach		--	--	--	--	A	A	--	--	A	A
Critical Movement Delay		--	--	--	--	8.7	8.9	--	--	8.9	9.0
E. 38th Avenue/Northeast Site Access	TWSC										
NB Approach		--	--	--	--	A	A	--	--	A	A
WB Approach		--	--	--	--	A	A	--	--	A	A
Critical Movement Delay		--	--	--	--	8.7	8.7	--	--	8.9	8.8
E. 38th Avenue/Fire Station Access	TWSC										
NB Approach		--	--	--	--	A	A	--	--	A	A
WB Approach		--	--	--	--	A	A	--	--	A	A
Critical Movement Delay		--	--	--	--	8.7	8.6	--	--	8.8	8.9
SH 79/E. 38th Avenue	TWSC										
NB Approach		A	A	A	A	--	--	--	--	--	--
NB Left		--	--	--	--	A	A	A	A	A	A
EB Approach		A	A	B	B	B	B	B	B	B	B
WB Approach		A	A	B	B	B	B	B	B	B	C
SB Approach		A	A	A	A	--	--	--	--	--	--
SB Left		--	--	--	--	A	A	A	A	A	A
Critical Movement Delay		9.4	9.1	10.4	11.1	11.0	12.4	11.6	12.7	12.7	15.4
SH 79/East Site Access	TWSC										
NB Left		--	--	--	--	A	A	--	--	A	A
EB Approach		--	--	--	--	B	B	--	--	B	B
Critical Movement Delay		--	--	--	--	10.1	10.1	--	--	10.2	10.0
SH 79 (Palmer Avenue)/Old Victory Road	TWSC										
WB Approach		B	B	B	B	B	B	--	--	--	--
SB Approach		A	A	A	A	A	A	--	--	--	--
Critical Movement Delay		10.5	10.7	10.6	11.5	11.6	13.1	--	--	--	--

Table 1 (Page 2 of 2)
Intersection Levels of Service Analysis
Bennett Ranch
Bennett, CO
LSC #181140; December, 2018

Intersection Location	Traffic Control	Existing Traffic Level of Service AM	Existing Traffic Level of Service PM	2023 Background Traffic Level of Service AM	2023 Background Traffic Level of Service PM	2023 Total Traffic Level of Service AM	2023 Total Traffic Level of Service PM	2040 Background Traffic Level of Service AM	2040 Background Traffic Level of Service PM	2040 Total Traffic Level of Service AM	2040 Total Traffic Level of Service PM
SH 79/Old Victory Rd./Palmer Ave.	TWSC										
NB Left		--	--	--	--	--	--	A	A	A	A
EB Left		--	--	--	--	--	--	B	B	C	F
EB Through/Right		--	--	--	--	--	--	B	B	B	B
WB Left		--	--	--	--	--	--	B	B	C	D
WB Through/Right		--	--	--	--	--	--	B	B	B	C
SB Left		--	--	--	--	--	--	A	A	A	A
Critical Movement Delay		--	--	--	--	--	--	14.4	14.4	22.0	55.5
Palmer Avenue/Southeast Site Access	TWSC										
NB Approach		--	--	--	--	--	--	A	A	B	B
EB Left		--	--	--	--	A	A	--	--	A	A
WB Left		--	--	--	--	--	--	A	A	A	A
SB Approach		--	--	--	--	B	B	--	--	B	B
Critical Movement Delay		--	--	--	--	10.7	13.3	9.6	9.5	11.6	13.3
Palmer Avenue/Commercial Access	TWSC										
EB Left	RIRO in 2023	--	--	--	--	--	--	--	--	A	A
SB Right	Full Move-	--	--	--	--	B	B	--	--	B	B
Critical Movement Delay	ment in 2040	--	--	--	--	10.2	10.4	--	--	10.4	11.4
Palmer Avenue/Greg's Place	TWSC										
EB Approach or Left		A	A	A	A	A	A	A	A	A	A
SB Approach		B	B	B	B	--	--	B	A	--	--
SB Left		--	--	--	--	C	E	--	--	B	B
SB Right		--	--	--	--	B	B	--	--	A	A
Critical Movement Delay		10.5	10.3	10.8	11.1	16.7	44.2	10.2	9.8	12.5	14.6
Palmer Avenue/8th Street	TWSC										
EB Approach or Left		A	A	A	A	B	A	A	A	A	A
SB Left		C	C	D	B	E	E	D	B	D	B
SB Right		B	B	B	B	C	B	A	A	A	A
Critical Movement Delay		23.0	15.9	26.3	14.7	46.4	43.8	26.5	12.9	28.8	14.8

Table 2
ESTIMATED TRAFFIC GENERATION
Bennett Ranch
Bennett, CO
LSC #181140; December 2018

Traffic Analysis Zone	Trip Generating Category	Quantity	Trip Generation Rates (1) Average Weekday	AM Peak-Hour In	AM Peak-Hour Out	PM Peak-Hour In	PM Peak-Hour Out	Vehicle-Trips Generated Average Weekday	AM Peak-Hour In	AM Peak-Hour Out	PM Peak-Hour In	PM Peak-Hour Out
A	Single-Family Housing (2)	117 DU (3)	9.44	0.185	0.555	0.624	0.366	1,104	22	65	73	43
B	Multi-Family Housing (4)	116 DU	7.32	0.106	0.354	0.353	0.207	849	12	41	41	24
C	Fire Station (5)	20 KSF (6)	2.40	0.341	0.139	0.139	0.341	48	7	3	3	7
D	Dedication to School District (7)	17.68 Acres	--	--	--	--	--	0	0	0	0	0
E	Park (8)	15.36 Acres	--	--	--	--	--	0	0	0	0	0
F	Single-Family Housing	103 DU	9.44	0.185	0.555	0.624	0.366	972	19	57	64	38
G	Single-Family Housing	96 DU	9.44	0.185	0.555	0.624	0.366	906	18	53	60	35
H	Single-Family Housing	100 DU	9.44	0.185	0.555	0.624	0.366	944	19	55	62	37
I	Multifamily Housing	115 DU	7.32	0.106	0.354	0.353	0.207	842	12	41	41	24
J	Shopping Center (9)	99.6 KSF	37.75	0.583	0.357	1.829	1.981	3,760	58	36	182	197
						Total =		**9,425**	**167**	**351**	**526**	**405**
						Passby Trips (10) =		1,278	16	16	64	64
						Primary Trips =		**8,147**	**151**	**335**	**462**	**341**

Notes:

(1) Source: *Trip Generation*, Institute of Transportation Engineers, 10th Edition, 2017.
(2) ITE Land Use No. 210 - Single-Family Detached Housing
(3) DU = Dwelling Unit
(4) ITE Land Use No. 220 - Multifamily Housing (Low-Rise)
(5) ITE Land Use No. 575 - Fire and Rescue Station; weekday average was assumed to be 5x the PM Peak and AM Peak is the reverse of the PM Peak
(6) KSF = 1,000 square feet
(7) Land to be dedicated to the School District to add to the overall campus to the west of the site. This estimate may need to be updated once the proposed use for the school site is more defined.
(8) Public Park
(9) ITE Land Use No. 820 - Shopping Center; a FAR of 0.30 was assumed on 7.62 acres.
(10) A passby trip rate of 34 percent was assumed for the shopping center use.

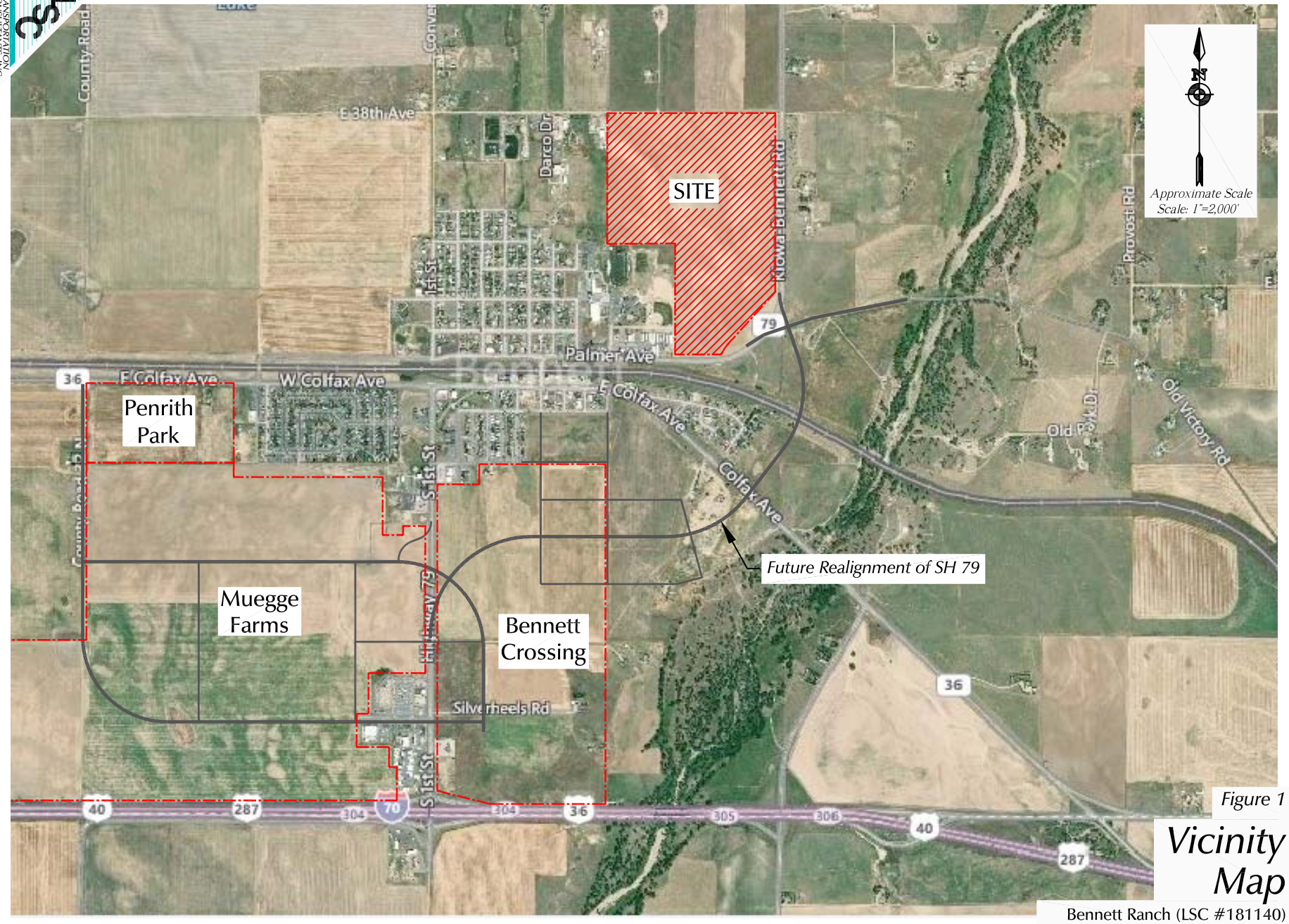


Figure 1

Vicinity Map

Bennett Ranch (LSC #181140)

Figure 2

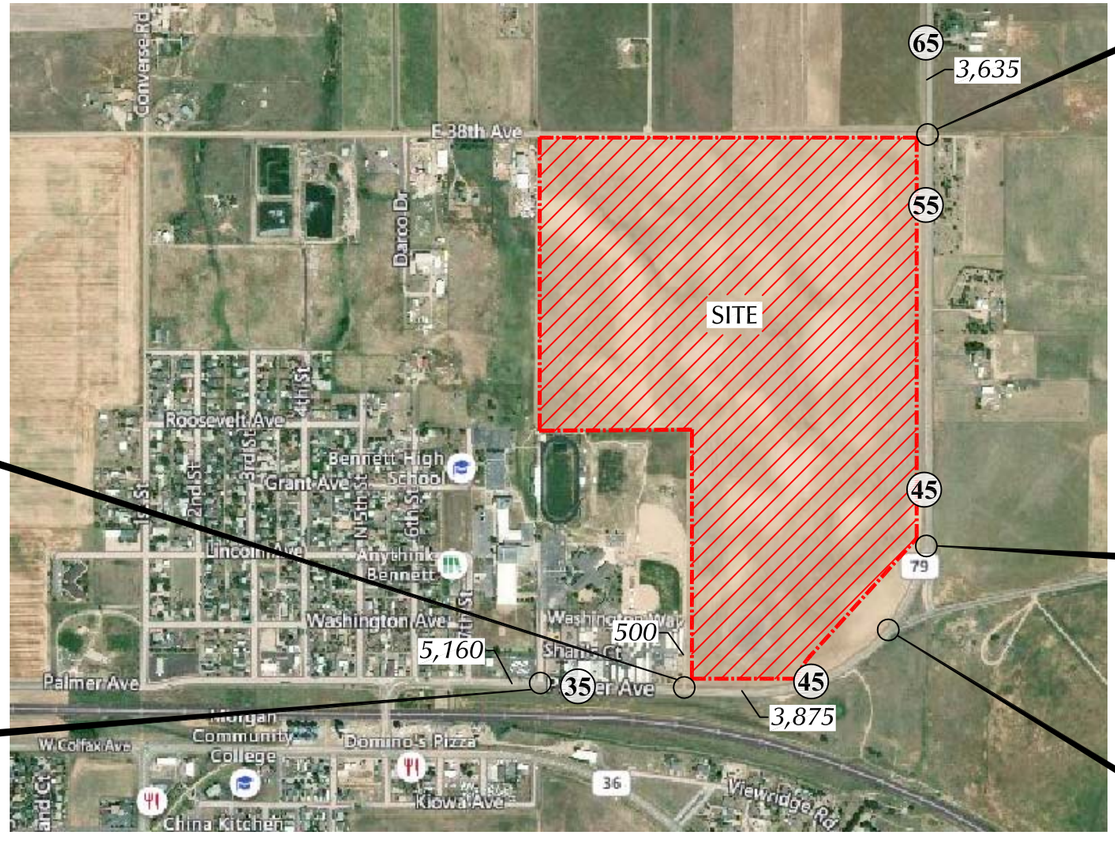
Site Plan

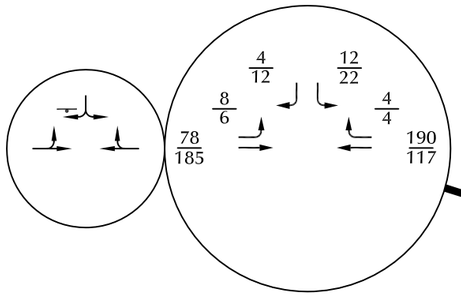
Bennett Ranch (LSC #181140)

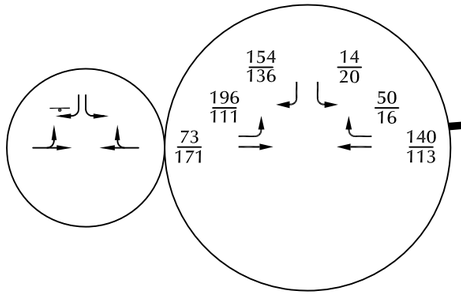
Note: Full Movement Access locations to SH 79 are consistent with the August, 2018 SH 79 Access Control Plan.

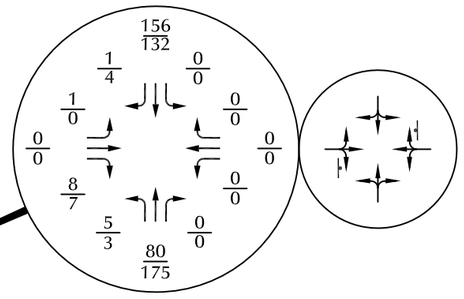
LSC TRANSPORTATION CONSULTANTS, INC.

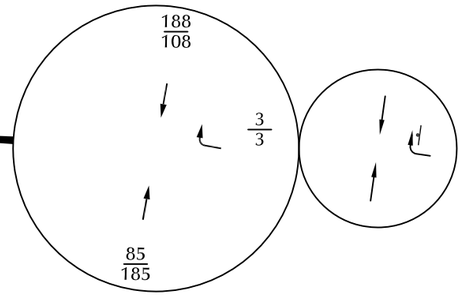
Approximate Scale
Scale: 1"= 1,000'

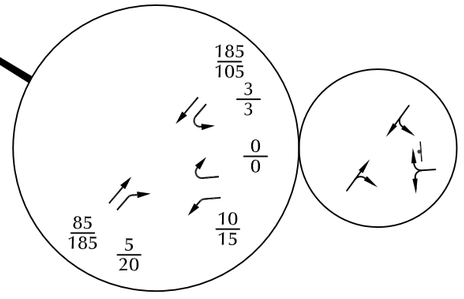












LEGEND:

⊦ = Stop Sign

(30) = Speed Limit

26/35 = AM Peak Hour Traffic / PM Peak Hour Traffic

1,000 = Average Daily Traffic

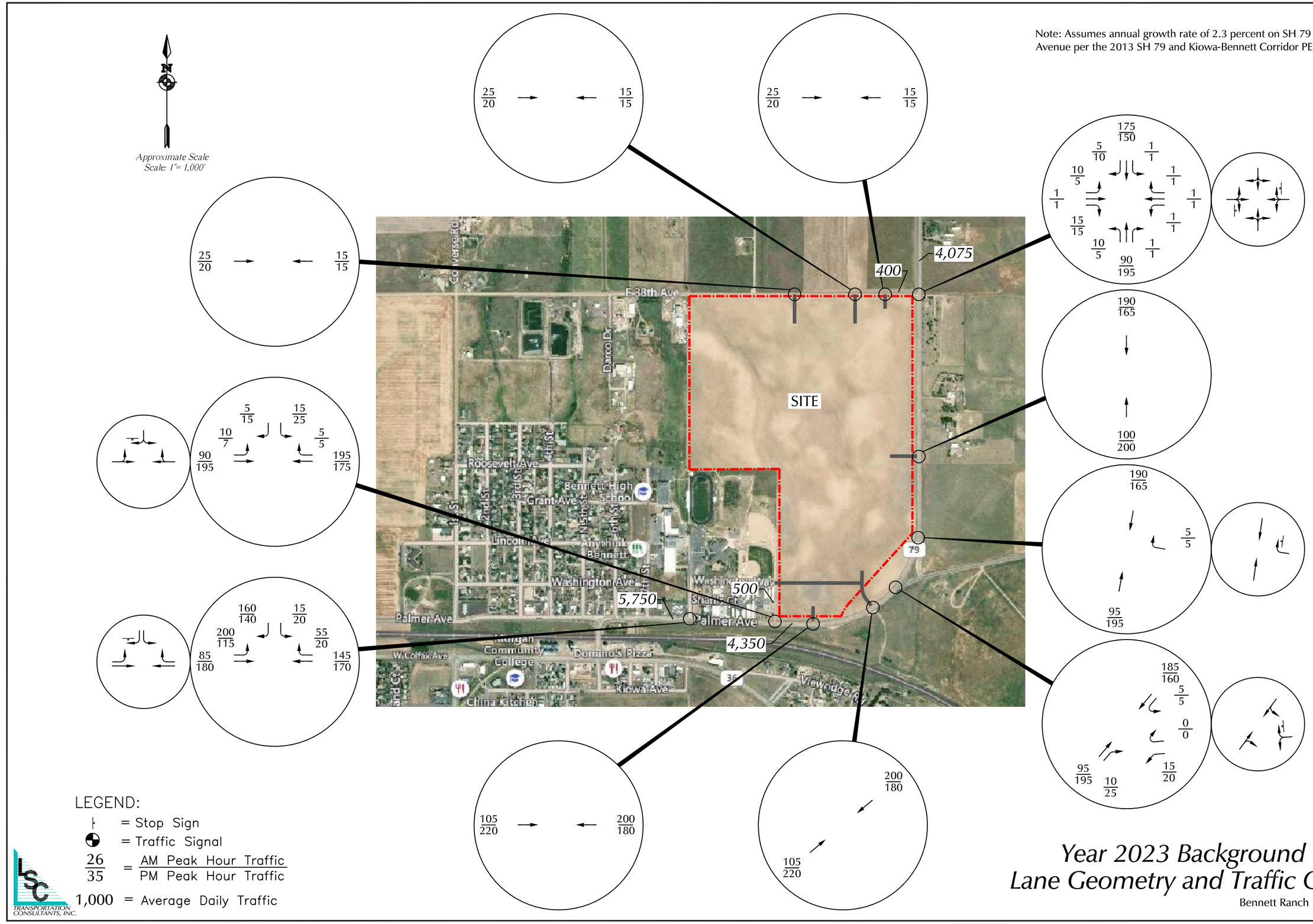
LSC TRANSPORTATION CONSULTANTS, INC.

Figure 3

Existing Traffic, Lane Geometry and Traffic Control

Bennett Ranch (LSC #181140)

Note: Assumes annual growth rate of 2.3 percent on SH 79 at E. 38th Avenue per the 2013 SH 79 and Kiowa-Bennett Corridor PEL Study.



LEGEND:

- ⊦ = Stop Sign
- ◓ = Traffic Signal
- 26/35 = AM Peak Hour Traffic / PM Peak Hour Traffic
- 1,000 = Average Daily Traffic

LSC TRANSPORTATION CONSULTANTS, INC.

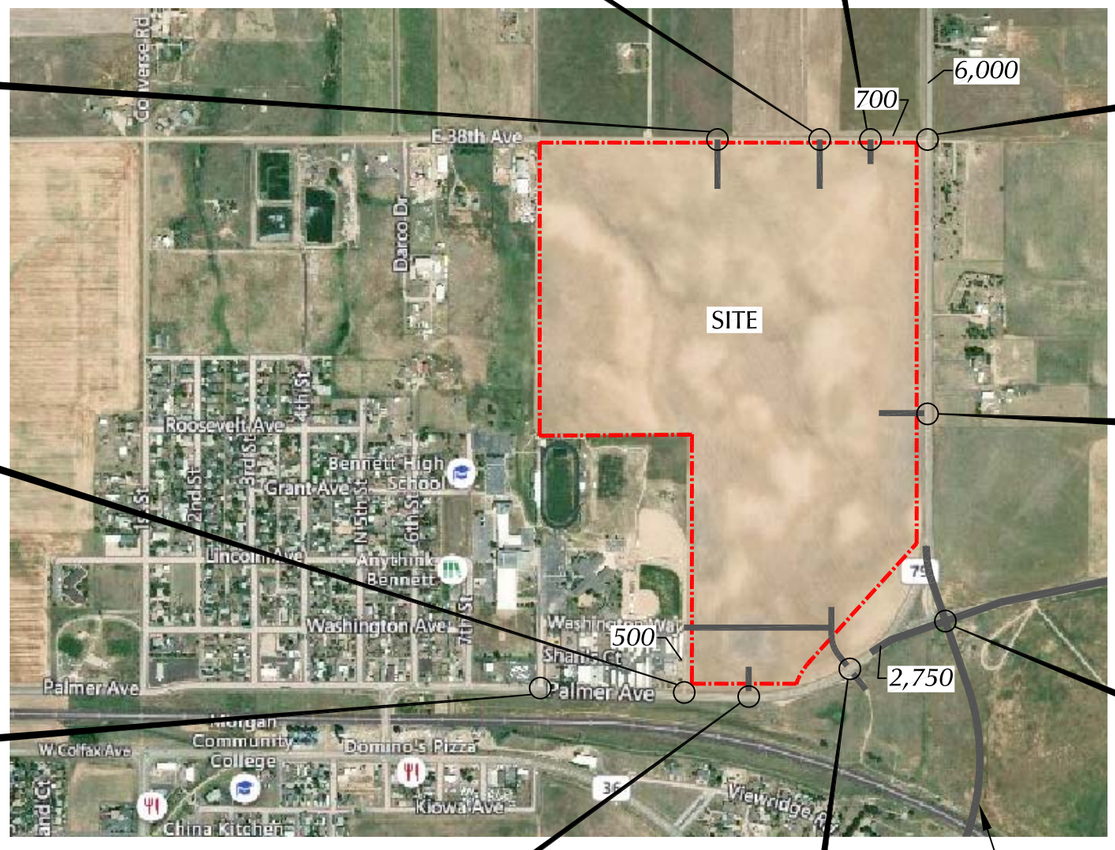
Figure 4

Year 2023 Background Traffic, Lane Geometry and Traffic Control

Bennett Ranch (LSC #181140)

Note: Assumes annual growth rate of 2.3 percent on SH 79 at E. 38th Avenue per the 2013 SH 79 and Kiowa-Bennett Corridor PEL Study.

Approximate Scale
Scale: 1"= 1,000'



$\frac{40}{35}$ → ← $\frac{25}{25}$

$\frac{40}{35}$ → ← $\frac{25}{25}$

$\frac{40}{35}$ → ← $\frac{25}{25}$

$\frac{260}{220}$ $\frac{10}{15}$ $\frac{1}{1}$ $\frac{15}{10}$ $\frac{1}{1}$ $\frac{1}{1}$ $\frac{1}{1}$ $\frac{25}{25}$ $\frac{1}{1}$ $\frac{15}{10}$ $\frac{1}{1}$ $\frac{135}{285}$

$\frac{285}{245}$ ↓ $\frac{150}{295}$

$\frac{10}{20}$ $\frac{20}{30}$ $\frac{15}{10}$ $\frac{10}{10}$ $\frac{115}{115}$ → ← $\frac{150}{110}$

$\frac{120}{115}$ $\frac{70}{60}$ $\frac{175}{95}$ $\frac{100}{50}$ $\frac{60}{65}$ → ← $\frac{60}{80}$

$\frac{205}{175}$ $\frac{10}{10}$ $\frac{70}{60}$ $\frac{10}{10}$ $\frac{45}{75}$ $\frac{10}{10}$ $\frac{10}{10}$ $\frac{15}{15}$ $\frac{80}{60}$ $\frac{15}{15}$ $\frac{80}{50}$ $\frac{95}{210}$

$\frac{135}{145}$ → ← $\frac{160}{120}$

$\frac{145}{105}$ $\frac{15}{15}$ $\frac{15}{15}$ $\frac{120}{130}$ $\frac{15}{15}$ $\frac{15}{15}$

Future Realignment of SH 79

LEGEND:

- ⊦ = Stop Sign
- ◓ = Traffic Signal
- $\frac{26}{35}$ = $\frac{\text{AM Peak Hour Traffic}}{\text{PM Peak Hour Traffic}}$
- 1,000 = Average Daily Traffic

LSC TRANSPORTATION CONSULTANTS, INC.

Figure 5

Year 2040 Background Traffic, Lane Geometry and Traffic Control

Bennett Ranch (LSC #181140)

Figure 6

Directional Distribution of Site-Generated Traffic

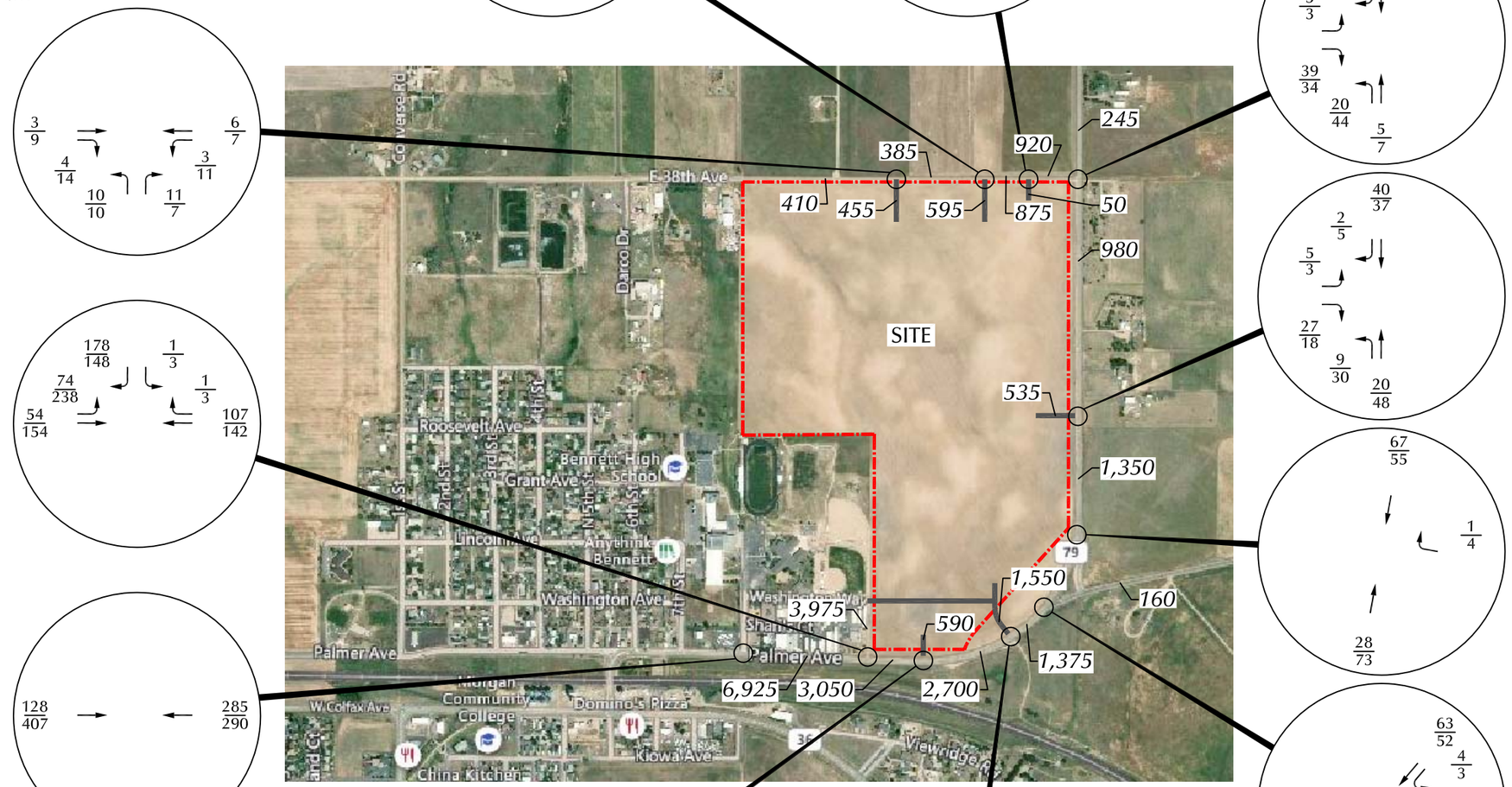
Bennett Ranch (LSC #181140)

LEGEND:

$\frac{5\%}{5\%}$ = $\frac{\text{2023 Percent Directional Distribution}}{\text{2040 Percent Directional Distribution}}$

N

Approximate Scale
Scale: 1"= 1,000'



LEGEND:

$\frac{26}{35}$ = AM Peak Hour Traffic / PM Peak Hour Traffic

1,000 = Average Daily Traffic

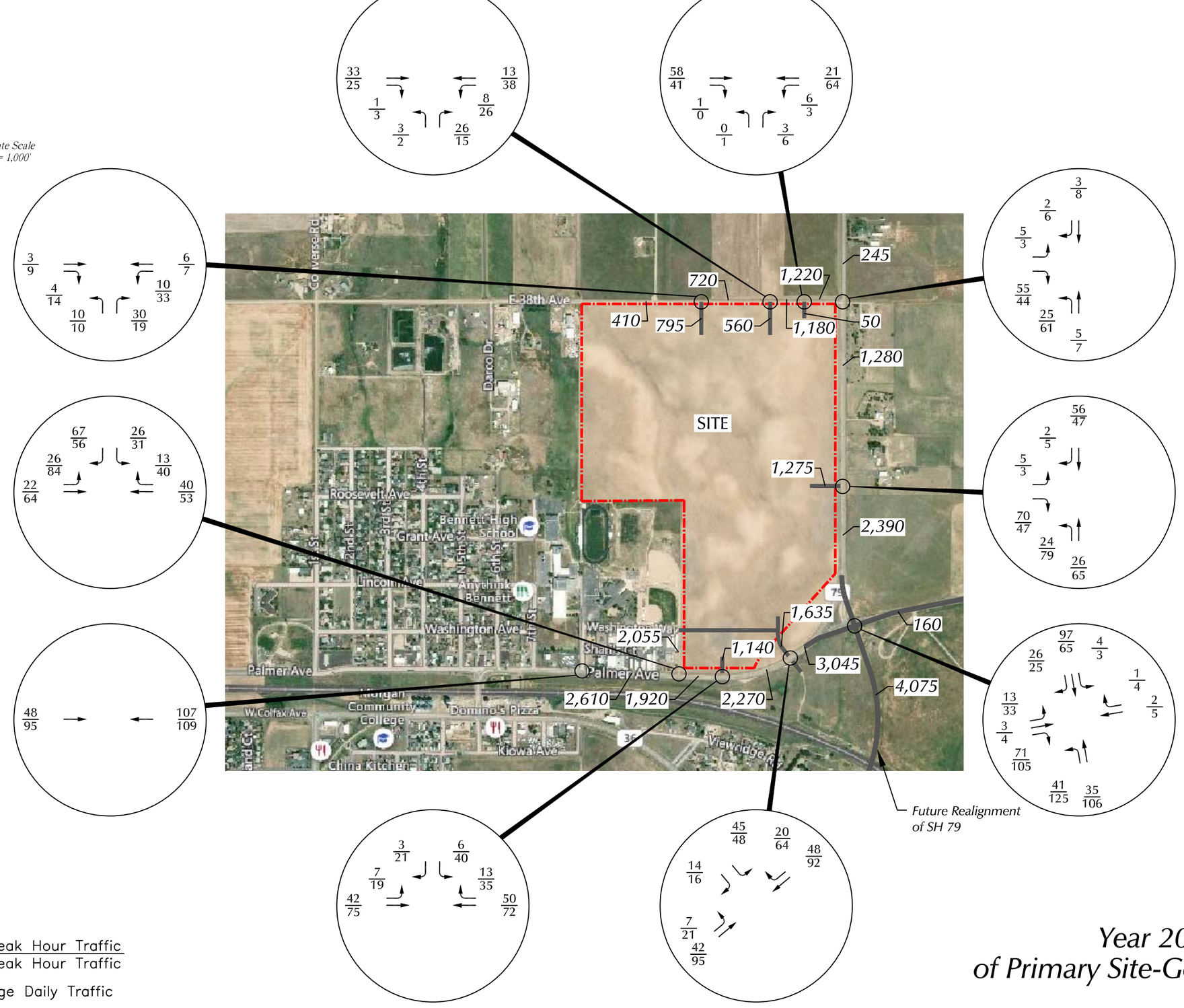
LSC TRANSPORTATION CONSULTANTS, INC.

Figure 7a

Year 2023 Assignment of Primary Site-Generated Traffic

Bennett Ranch (LSC #181140)

Approximate Scale
Scale: 1"= 1,000'



LEGEND:

$\frac{26}{35}$ = AM Peak Hour Traffic / PM Peak Hour Traffic

1,000 = Average Daily Traffic

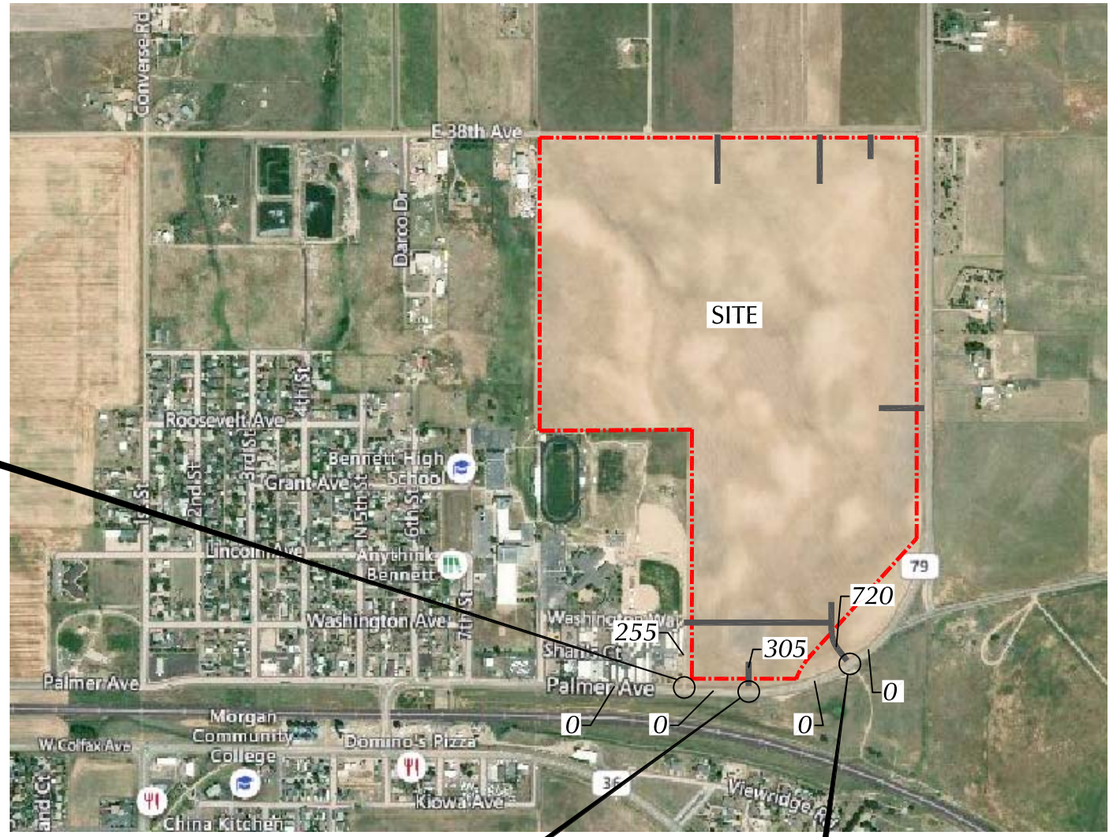
LSC TRANSPORTATION CONSULTANTS, INC.

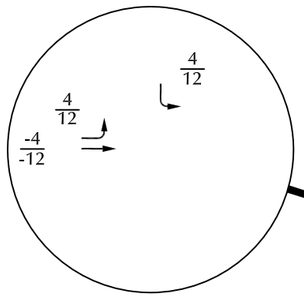
Figure 7b

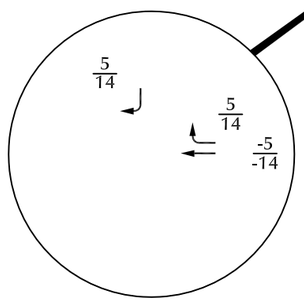
Year 2040 Assignment of Primary Site-Generated Traffic

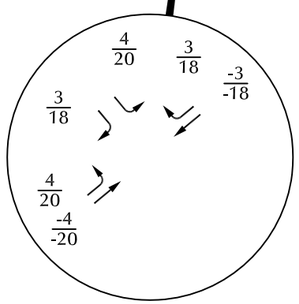
Bennett Ranch (LSC #181140)

Approximate Scale
Scale: 1"= 1,000'









LEGEND:

$\frac{26}{35}$ = $\frac{\text{AM Peak Hour Traffic}}{\text{PM Peak Hour Traffic}}$

1,000 = Average Daily Traffic

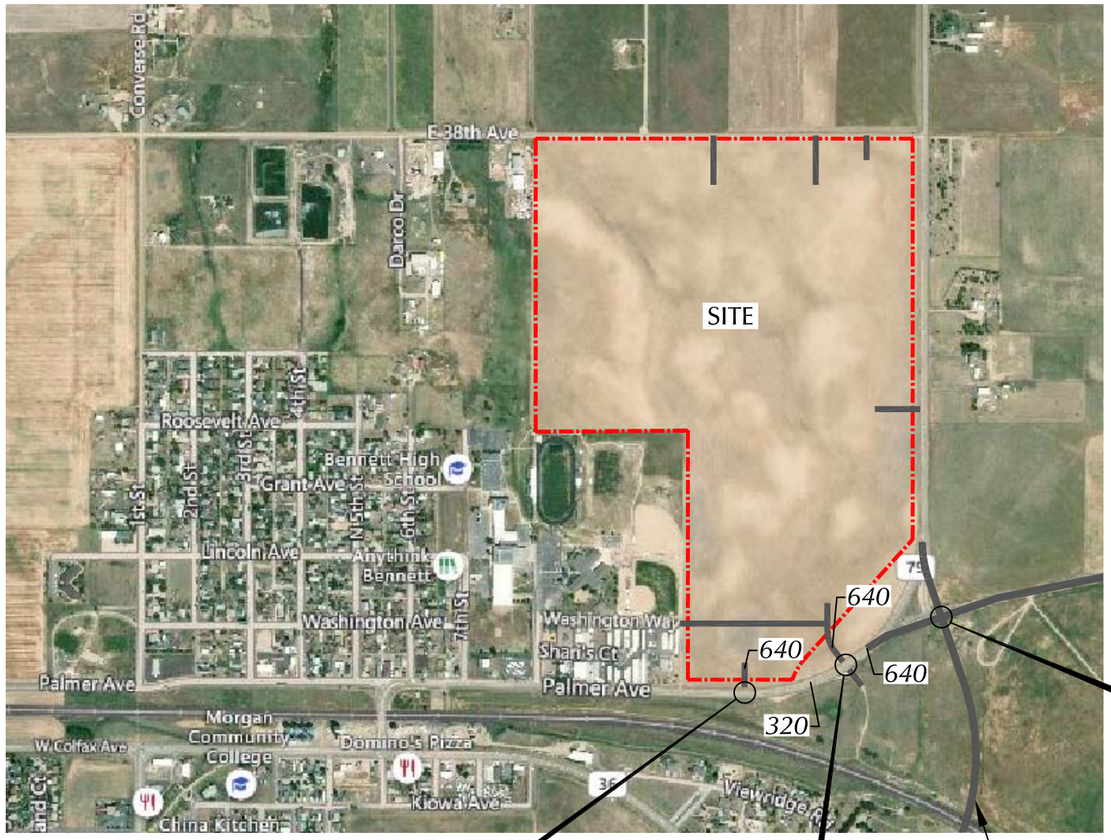
LSC TRANSPORTATION CONSULTANTS, INC.

Figure 8a

Year 2023 Assignment of Passby Site-Generated Traffic

Bennett Ranch (LSC #181140)

Approximate Scale
Scale: 1"= 1,000'



LEGEND:

$\frac{26}{35}$ = AM Peak Hour Traffic / PM Peak Hour Traffic

1,000 = Average Daily Traffic

LSC TRANSPORTATION CONSULTANTS, INC.

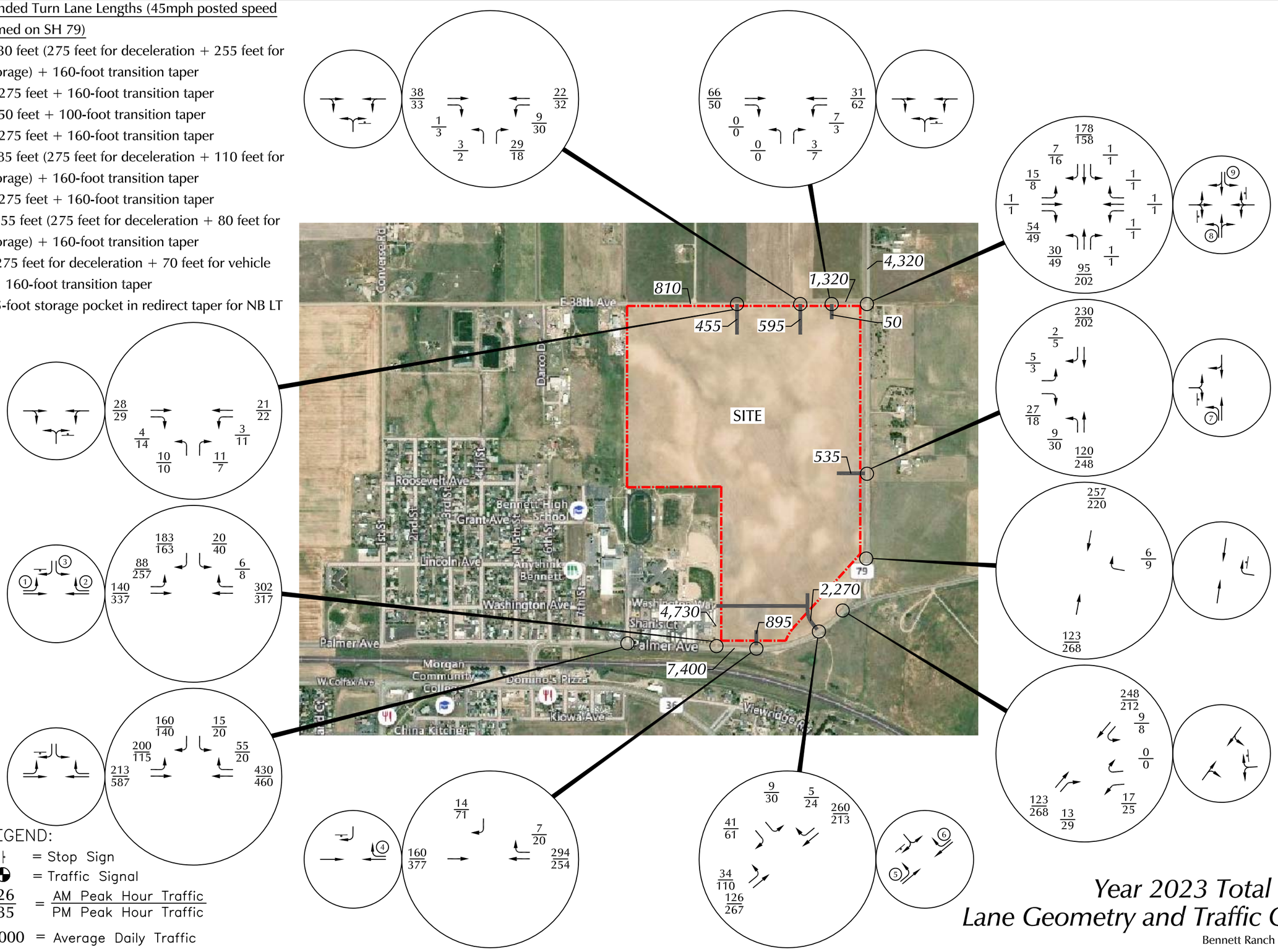
Figure 8b

Year 2040 Assignment of Passby Site-Generated Traffic

Bennett Ranch (LSC #181140)

Recommended Turn Lane Lengths (45mph posted speed limit assumed on SH 79)

① EB LT = 530 feet (275 feet for deceleration + 255 feet for vehicle storage) + 160-foot transition taper
② WB RT = 275 feet + 160-foot transition taper
③ SB LT = 150 feet + 100-foot transition taper
④ WB RT = 275 feet + 160-foot transition taper
⑤ EB LT = 385 feet (275 feet for deceleration + 110 feet for vehicle storage) + 160-foot transition taper
⑥ WB RT = 275 feet + 160-foot transition taper
⑦ NB LT = 355 feet (275 feet for deceleration + 80 feet for vehicle storage) + 160-foot transition taper
⑧ 345 feet (275 feet for deceleration + 70 feet for vehicle storage) + 160-foot transition taper
⑨ Provide 25-foot storage pocket in redirect taper for NB LT lane.



LEGEND:

= Stop Sign
= Traffic Signal
26/35 = AM Peak Hour Traffic / PM Peak Hour Traffic
1,000 = Average Daily Traffic

LSC TRANSPORTATION CONSULTANTS, INC.

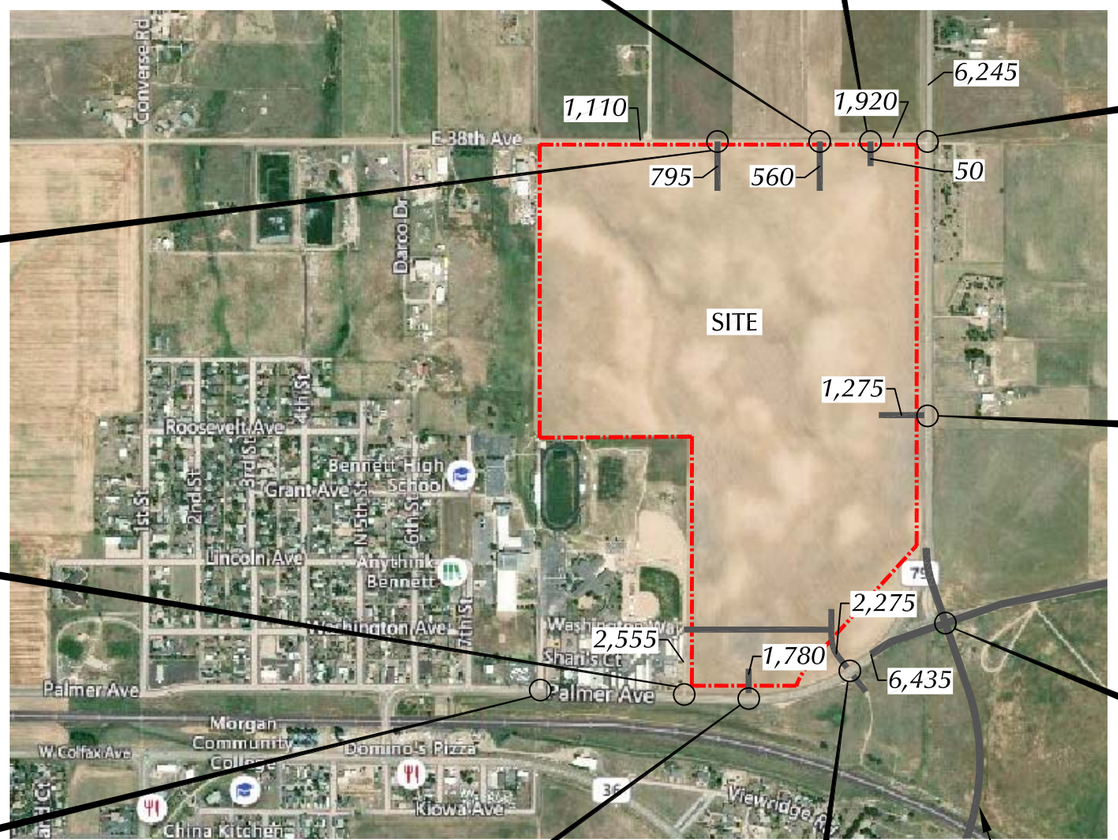
Figure 9

Year 2023 Total Traffic, Lane Geometry and Traffic Control

Bennett Ranch (LSC #181140)

Recommended Turn Lane Lengths (45mph posted speed limit assumed on SH 79)

① = 150 feet + 100-foot transition taper
② = 100 feet + 100-foot transition taper
③ = 465 feet (275 feet for deceleration + 190 feet for vehicle storage) + 160-foot transition taper
④ = 275 feet + 160-foot transition taper
⑤ = 300 feet (275 feet for deceleration + 25 feet for vehicle storage) + 160-foot transition taper
⑥ = 275 feet + 160-foot transition taper



LEGEND:

= Stop Sign
= Traffic Signal
26/35 = AM Peak Hour Traffic / PM Peak Hour Traffic
1,000 = Average Daily Traffic

LSC TRANSPORTATION CONSULTANTS, INC.

Figure 10

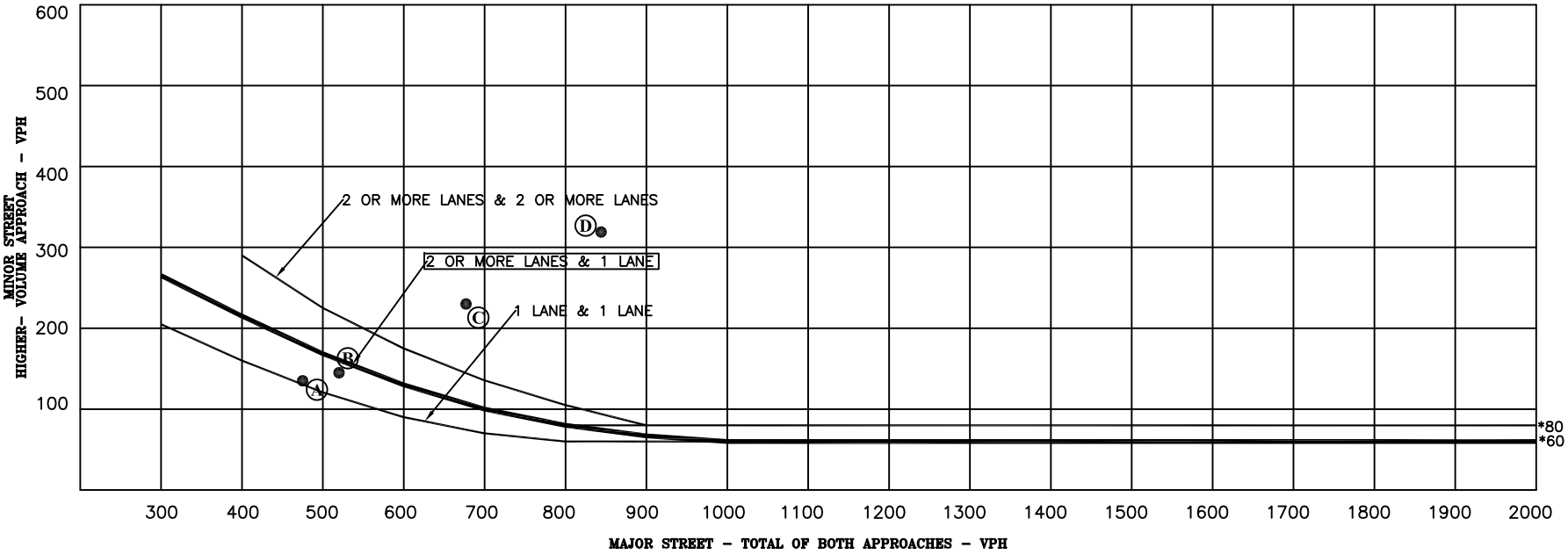
Year 2040 Total Traffic, Lane Geometry and Traffic Control

Bennett Ranch (LSC #181140)

TRANSPORTATION CONSULTANTS, INC.

Figure 4C-2. Warrant 2 Four-Hour Vehicular Volume (70% Factor)

(Community Less than 10,000 population or above 40 mph on Major Street)



* Note: 80 vph applies as the lower threshold volumes for a minor-street approach with two or more lanes and 60 vph applies as the lower threshold volume for a minor-street approach with one lane.

Data Points = (Major Street, Minor Street)

Ⓐ 2040 Background AM Peak = (475,135)
Ⓑ 2040 Background PM Peak = (520,145)
Ⓒ 2040 Total AM Peak = (677,230)
Ⓓ 2040 Total PM Peak = (844,319)

Figure 11

Warrant 2 - Four-Hour Vehicular Volume SH 79/Old Victory Road/Palmer Avenue

Bennett Ranch (LSC #181140)

COUNTER MEASURES INC.
1889 YORK STREET
DENVER.COLORADO
303-333-7409

N/S STREET: KIOWA BENNETT RD
E/W STREET: 38TH AVE
CITY: BENNETT
COUNTY: ADAMS

File Name : KIOW38TH
Site Code : 00000020
Start Date : 9/20/2018
Page No : 1

Groups Printed- VEHICLES

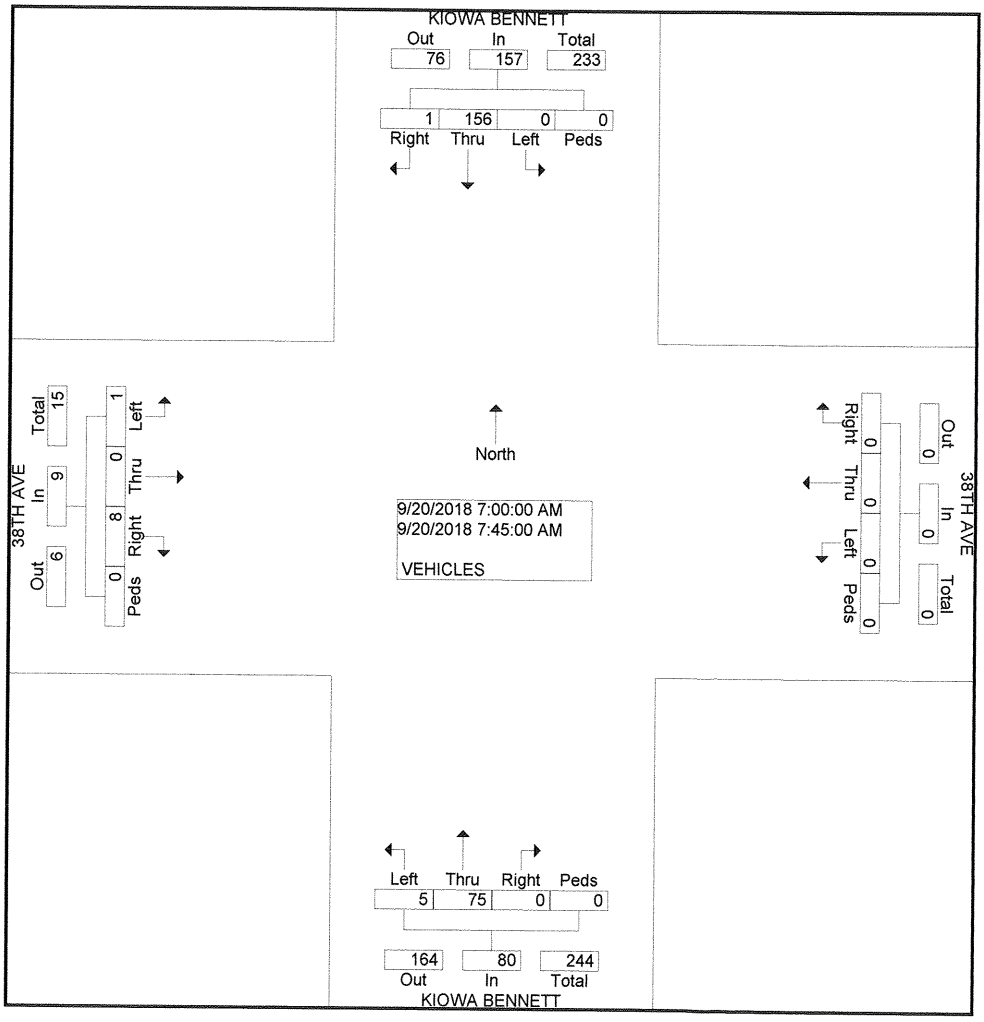
	KIOWA BENNETT Southbound				38TH AVE Westbound				KIOWA BENNETT Northbound				38TH AVE Eastbound				
Start Time	Left	Thru	Right	Peds	Left	Thru	Right	Peds	Left	Thru	Right	Peds	Left	Thru	Right	Peds	Int. Total
Factor	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	
06:30 AM	0	19	0	0	0	0	0	0	1	24	0	0	1	0	2	0	47
06:45 AM	0	30	0	0	0	0	0	0	0	24	0	0	0	0	0	0	54
Total	0	49	0	0	0	0	0	0	1	48	0	0	1	0	2	0	101
07:00 AM	0	34	0	0	0	0	0	0	3	16	0	0	0	0	1	0	54
07:15 AM	0	32	0	0	0	0	0	0	0	13	0	0	0	0	4	0	49
07:30 AM	0	45	0	0	0	0	0	0	1	23	0	0	0	0	2	0	71
07:45 AM	0	45	1	0	0	0	0	0	1	23	0	0	1	0	1	0	72
Total	0	156	1	0	0	0	0	0	5	75	0	0	1	0	8	0	246
08:00 AM	0	20	0	0	0	0	0	0	0	22	0	0	0	0	1	0	43
08:15 AM	0	31	1	0	0	0	0	0	0	24	0	0	0	0	0	0	56
Total	0	51	1	0	0	0	0	0	0	46	0	0	0	0	1	0	99
04:00 PM	0	22	0	0	0	0	0	0	0	26	0	0	0	0	2	0	50
04:15 PM	0	23	0	0	0	0	0	0	3	27	0	0	1	0	2	0	56
04:30 PM	0	30	0	0	0	0	0	0	0	41	0	0	0	0	0	0	71
04:45 PM	0	34	2	0	0	0	0	0	3	55	0	0	0	0	1	0	95
Total	0	109	2	0	0	0	0	0	6	149	0	0	1	0	5	0	272
05:00 PM	0	41	2	0	0	0	0	0	0	32	0	0	0	0	4	0	79
05:15 PM	0	27	0	0	0	0	0	0	0	38	0	0	0	0	2	0	67
05:30 PM	0	31	0	0	0	0	0	0	3	35	0	0	0	0	2	0	71
05:45 PM	0	29	0	0	0	0	0	0	1	27	0	0	0	0	0	0	57
Total	0	128	2	0	0	0	0	0	4	132	0	0	0	0	8	0	274
Grand Total	0	493	6	0	0	0	0	0	16	450	0	0	3	0	24	0	992
Apprch %	0.0	98.8	1.2	0.0	0.0	0.0	0.0	0.0	3.4	96.6	0.0	0.0	11.1	0.0	88.9	0.0	
Total %	0.0	49.7	0.6	0.0	0.0	0.0	0.0	0.0	1.6	45.4	0.0	0.0	0.3	0.0	2.4	0.0	

COUNTER MEASURES INC.
1889 YORK STREET
DENVER,COLORADO
303-333-7409

N/S STREET: KIOWA BENNETT RD
E/W STREET: 38TH AVE
CITY: BENNETT
COUNTY: ADAMS

File Name : KIOW38TH
Site Code : 00000020
Start Date : 9/20/2018
Page No : 2

	KIOWA BENNETT Southbound					38TH AVE Westbound					KIOWA BENNETT Northbound					38TH AVE Eastbound					
Start Time	Left	Thru	Right	Peds	App. Total	Left	Thru	Right	Peds	App. Total	Left	Thru	Right	Peds	App. Total	Left	Thru	Right	Peds	App. Total	Int. Total
Peak Hour From 06:30 AM to 08:30 AM - Peak 1 of 1																					
Intersection	07:00 AM																				
Volume	0	156	1	0	157	0	0	0	0	0	5	75	0	0	80	1	0	8	0	9	246
Percent	0.0	99.4	0.6	0.0		0.0	0.0	0.0	0.0		6.3	93.8	0.0	0.0		11.1	0.0	88.9	0.0		
07:45 Volume	0	45	1	0	46	0	0	0	0	0	1	23	0	0	24	1	0	1	0	2	72
Peak Factor																					0.854
High Int.	07:45 AM					6:15:00 AM					07:30 AM					07:15 AM					
Volume	0	45	1	0	46	0	0	0	0	0	1	23	0	0	24	0	0	4	0	4	
Peak Factor					0.853										0.833					0.563	

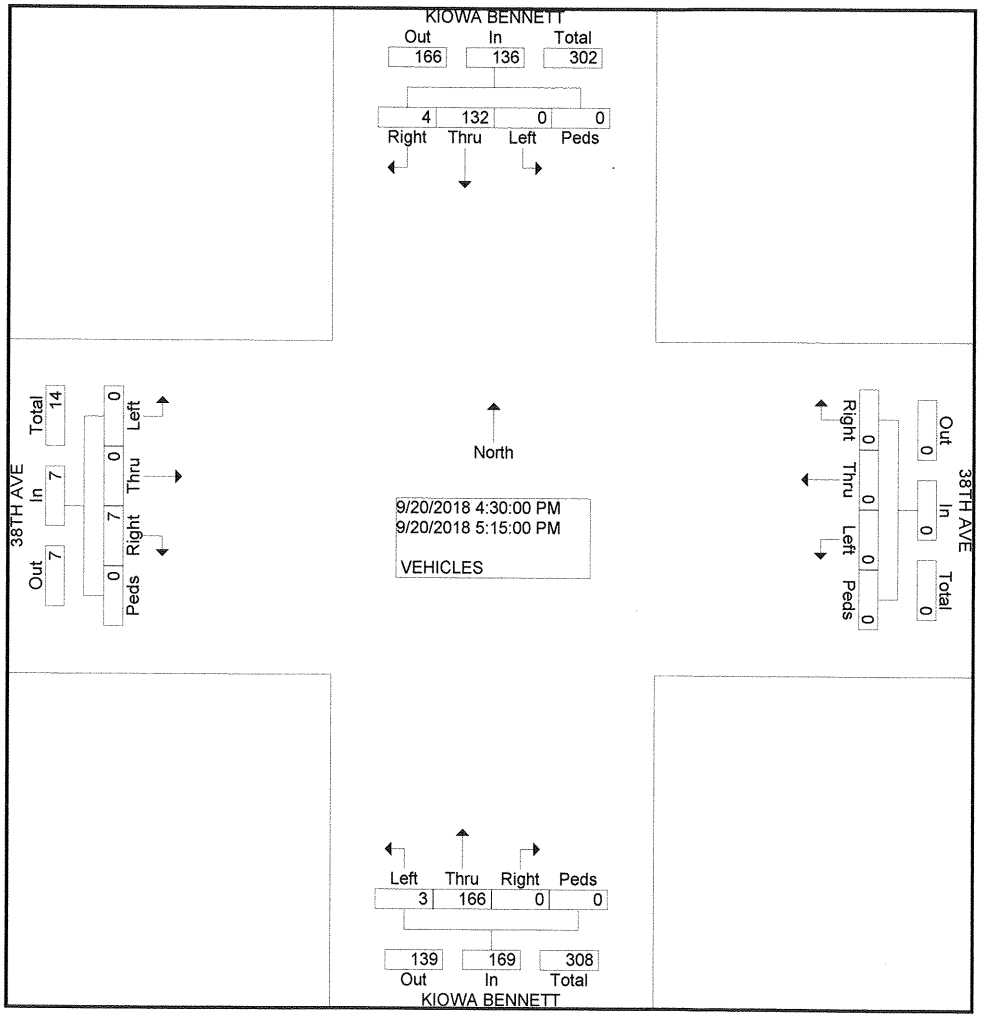


COUNTER MEASURES INC.
1889 YORK STREET
DENVER.COLORADO
303-333-7409

N/S STREET: KIOWA BENNETT RD
E/W STREET: 38TH AVE
CITY: BENNETT
COUNTY: ADAMS

File Name : KIOW38TH
Site Code : 00000020
Start Date : 9/20/2018
Page No : 2

	KIOWA BENNETT Southbound					38TH AVE Westbound					KIOWA BENNETT Northbound					38TH AVE Eastbound					
Start Time	Left	Thru	Right	Peds	App. Total	Left	Thru	Right	Peds	App. Total	Left	Thru	Right	Peds	App. Total	Left	Thru	Right	Peds	App. Total	Int. Total
Peak Hour From 04:00 PM to 05:45 PM - Peak 1 of 1																					
Intersection	04:30 PM																				
Volume	0	132	4	0	136	0	0	0	0	0	3	166	0	0	169	0	0	7	0	7	312
Percent	0.0	97.1	2.9	0.0		0.0	0.0	0.0	0.0		1.8	98.2	0.0	0.0		0.0	0.0	100.0	0.0		
04:45 Volume	0	34	2	0	36	0	0	0	0	0	3	55	0	0	58	0	0	1	0	1	95
Peak Factor																					0.821
High Int.	05:00 PM										04:45 PM					05:00 PM					
Volume	0	41	2	0	43	0	0	0	0	0	3	55	0	0	58	0	0	4	0	4	
Peak Factor					0.791										0.728					0.438	



COUNTER MEASURES INC.
1889 YORK STREET
DENVER.COLORADO
303-333-7409

N/S STREET: GREG'S PL
E/W STREET: PALMER AVE
CITY: BENNETT
COUNTY: ADAMS

File Name : GREGPALM
Site Code : 00000022
Start Date : 9/20/2018
Page No : 1

Groups Printed- VEHICLES

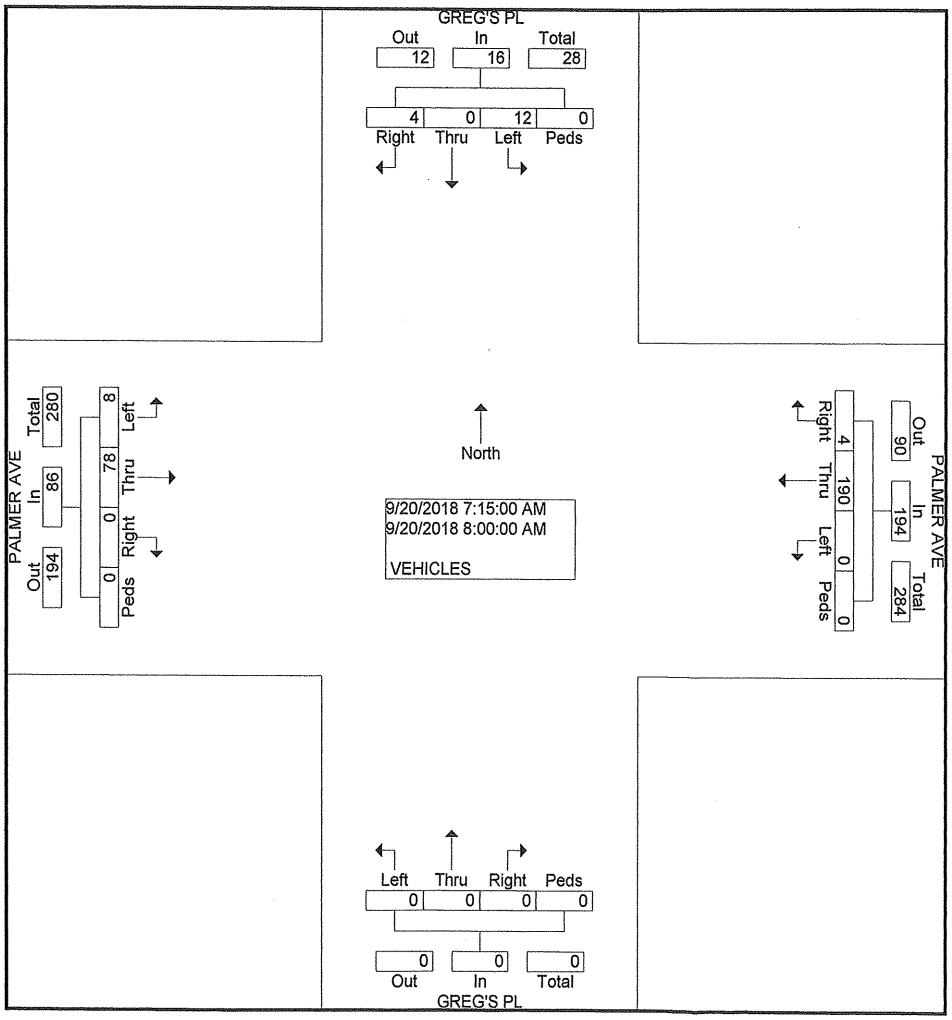
	GREG'S PL Southbound				PALMER AVE Westbound				GREG'S PL Northbound				PALMER AVE Eastbound				
Start Time	Left	Thru	Right	Peds	Left	Thru	Right	Peds	Left	Thru	Right	Peds	Left	Thru	Right	Peds	Int. Total
Factor	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	
06:30 AM	0	1	0	0	0	22	0	0	0	0	0	0	1	15	0	0	39
06:45 AM	0	0	0	0	0	35	0	0	0	0	0	0	0	24	0	0	59
Total	0	1	0	0	0	57	0	0	0	0	0	0	1	39	0	0	98
07:00 AM	0	0	0	0	0	33	1	0	0	0	0	0	0	9	0	0	43
07:15 AM	1	0	0	0	0	42	1	0	0	0	0	0	0	11	0	0	55
07:30 AM	5	0	0	0	0	63	2	0	0	0	0	0	3	17	0	0	90
07:45 AM	2	0	4	0	0	52	0	0	0	0	0	0	1	26	0	0	85
Total	8	0	4	0	0	190	4	0	0	0	0	0	4	63	0	0	273
08:00 AM	4	0	0	0	0	33	1	0	0	0	0	0	4	24	0	0	66
08:15 AM	1	0	0	0	0	34	0	0	0	0	0	0	3	25	0	0	63
Total	5	0	0	0	0	67	1	0	0	0	0	0	7	49	0	0	129
04:00 PM	10	0	7	0	0	35	1	0	0	0	0	0	3	42	0	0	98
04:15 PM	7	0	5	0	0	20	1	0	0	0	0	0	1	36	0	0	70
04:30 PM	2	0	0	0	0	29	2	0	0	0	0	0	1	51	0	0	85
04:45 PM	3	0	0	0	0	33	0	0	0	0	0	0	1	56	0	0	93
Total	22	0	12	0	0	117	4	0	0	0	0	0	6	185	0	0	346
05:00 PM	1	0	1	0	0	39	0	0	0	0	0	0	1	36	0	0	78
05:15 PM	1	0	0	0	0	29	0	0	0	0	0	0	2	43	0	0	75
05:30 PM	0	0	0	0	0	33	0	0	0	0	0	0	0	39	0	0	72
05:45 PM	1	0	1	0	0	34	0	0	0	0	0	0	1	29	0	0	66
Total	3	0	2	0	0	135	0	0	0	0	0	0	4	147	0	0	291
Grand Total	38	1	18	0	0	566	9	0	0	0	0	0	22	483	0	0	1137
Apprch %	66.7	1.8	31.6	0.0	0.0	98.4	1.6	0.0	0.0	0.0	0.0	0.0	4.4	95.6	0.0	0.0	
Total %	3.3	0.1	1.6	0.0	0.0	49.8	0.8	0.0	0.0	0.0	0.0	0.0	1.9	42.5	0.0	0.0	

COUNTER MEASURES INC.
1889 YORK STREET
DENVER,COLORADO
303-333-7409

N/S STREET: GREG'S PL
E/W STREET: PALMER AVE
CITY: BENNETT
COUNTY: ADAMS

File Name : GREGPALM
Site Code : 00000022
Start Date : 9/20/2018
Page No : 2

	GREG'S PL Southbound					PALMER AVE Westbound					GREG'S PL Northbound					PALMER AVE Eastbound					
Start Time	Left	Thru	Right	Peds	App. Total	Left	Thru	Right	Peds	App. Total	Left	Thru	Right	Peds	App. Total	Left	Thru	Right	Peds	App. Total	Int. Total
Peak Hour From 07:15 AM to 08:00 AM - Peak 1 of 1																					
Intersection	07:15 AM																				
Volume	12	0	4	0	16	0	190	4	0	194	0	0	0	0	0	8	78	0	0	86	296
Percent	75.0	0.0	25.0	0.0		0.0	97.9	2.1	0.0		0.0	0.0	0.0	0.0		9.3	90.7	0.0	0.0		
07:30 Volume	5	0	0	0	5	0	63	2	0	65	0	0	0	0	0	3	17	0	0	20	90
Peak Factor																					0.822
High Int.	07:45 AM					07:30 AM										08:00 AM					
Volume	2	0	4	0	6	0	63	2	0	65	0	0	0	0	0	4	24	0	0	28	
Peak Factor					0.667					0.746										0.768	

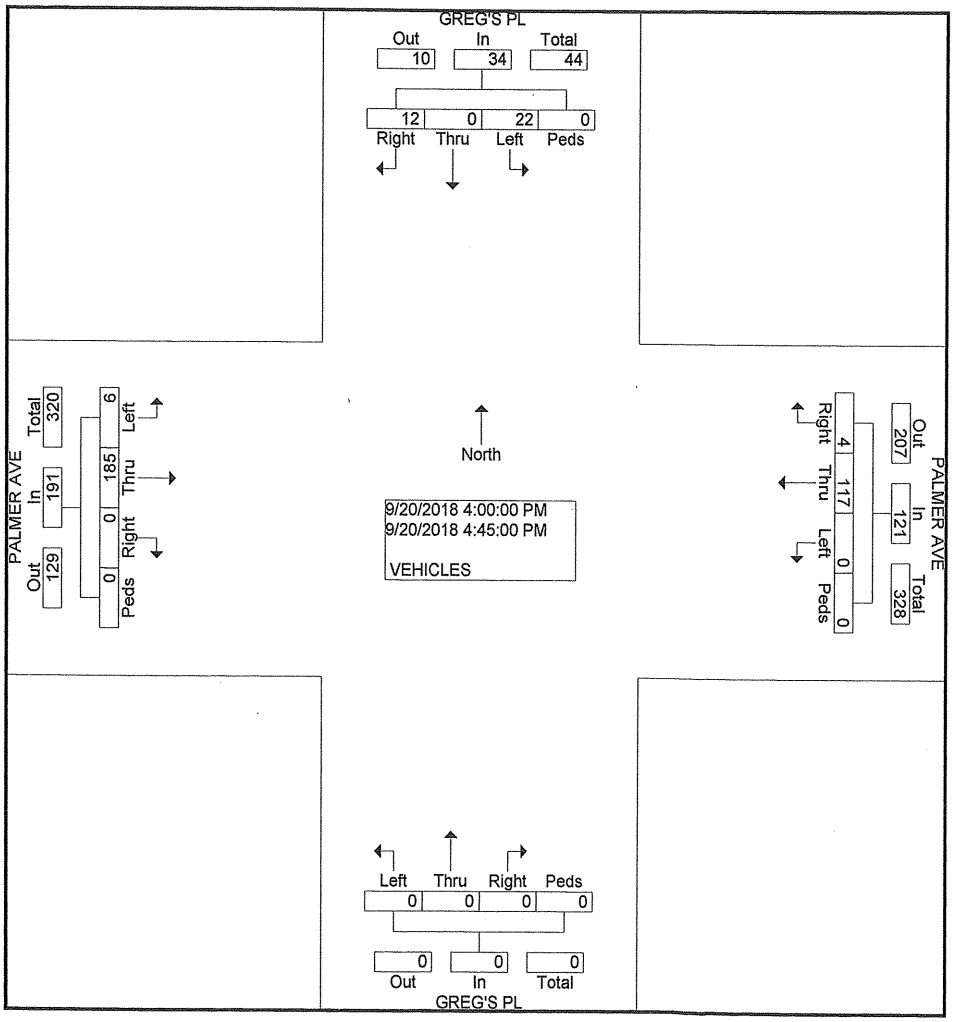


COUNTER MEASURES INC.
1889 YORK STREET
DENVER.COLORADO
303-333-7409

N/S STREET: GREG'S PL
E/W STREET: PALMER AVE
CITY: BENNETT
COUNTY: ADAMS

File Name : GREGPALM
Site Code : 00000022
Start Date : 9/20/2018
Page No : 2

	GREG'S PL Southbound					PALMER AVE Westbound					GREG'S PL Northbound					PALMER AVE Eastbound					
Start Time	Left	Thru	Right	Peds	App. Total	Left	Thru	Right	Peds	App. Total	Left	Thru	Right	Peds	App. Total	Left	Thru	Right	Peds	App. Total	Int. Total
Peak Hour From 04:00 PM to 04:45 PM - Peak 1 of 1																					
Intersection	04:00 PM																				
Volume	22	0	12	0	34	0	117	4	0	121	0	0	0	0	0	6	185	0	0	191	346
Percent	64.7	0.0	35.3	0.0		0.0	96.7	3.3	0.0		0.0	0.0	0.0	0.0		3.1	96.9	0.0	0.0		
04:00 Volume	10	0	7	0	17	0	35	1	0	36	0	0	0	0	0	3	42	0	0	45	98
Peak Factor																					0.883
High Int.	04:00 PM					04:00 PM										04:45 PM					
Volume	10	0	7	0	17	0	35	1	0	36	0	0	0	0	0	1	56	0	0	57	
Peak Factor					0.500					0.840										0.838	



COUNTER MEASURES INC.
1889 YORK STREET
DENVER,COLORADO
303-333-7409

N/S STREET: 8THST
E/W STREET: PALMER AVE
CITY: BENNETT
COUNTY: ADAMS

File Name : 8THPALM
Site Code : 00000015
Start Date : 9/20/2018
Page No : 1

Groups Printed- VEHICLES

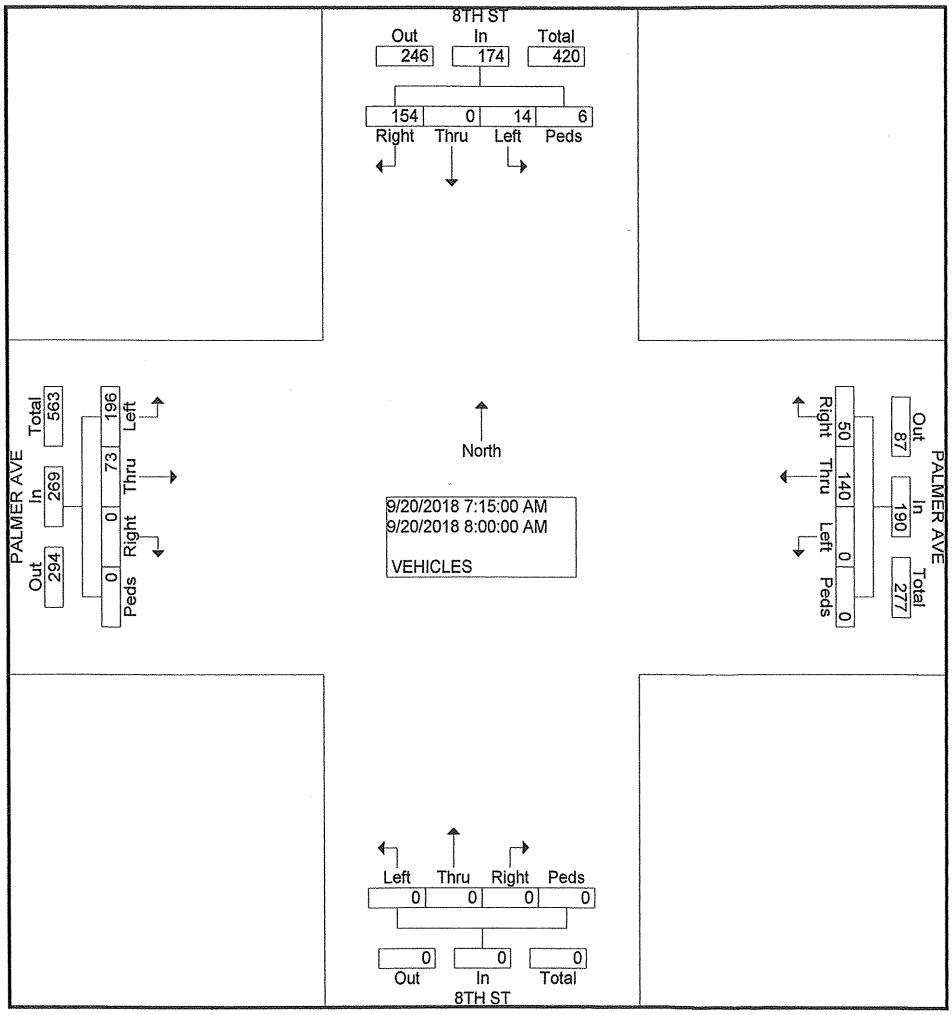
	8TH ST Southbound				PALMER AVE Westbound				8TH ST Northbound				PALMER AVE Eastbound				
Start Time	Left	Thru	Right	Peds	Left	Thru	Right	Peds	Left	Thru	Right	Peds	Left	Thru	Right	Peds	Int. Total
Factor	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	
06:30 AM	0	0	3	0	0	22	0	0	0	0	0	0	2	16	0	0	43
06:45 AM	0	0	0	0	0	34	1	0	0	0	0	0	6	24	0	0	65
Total	0	0	3	0	0	56	1	0	0	0	0	0	8	40	0	0	108
07:00 AM	0	0	1	0	0	33	0	0	0	0	0	0	14	9	0	0	57
07:15 AM	1	0	8	0	0	33	9	0	0	0	0	0	29	11	0	0	91
07:30 AM	3	0	40	4	0	40	23	0	0	0	0	0	69	17	0	0	196
07:45 AM	4	0	73	2	0	39	13	0	0	0	0	0	83	23	0	0	237
Total	8	0	122	6	0	145	45	0	0	0	0	0	195	60	0	0	581
08:00 AM	6	0	33	0	0	28	5	0	0	0	0	0	15	22	0	0	109
08:15 AM	3	0	10	0	0	34	0	0	0	0	0	0	10	25	0	0	82
Total	9	0	43	0	0	62	5	0	0	0	0	0	25	47	0	0	191
04:00 PM	6	0	58	6	0	34	8	0	0	0	0	2	41	39	0	0	194
04:15 PM	3	0	38	0	0	24	1	0	0	0	0	0	27	34	0	0	127
04:30 PM	8	0	20	0	0	24	5	0	0	0	0	0	21	44	0	0	122
04:45 PM	3	0	20	0	0	31	2	0	0	0	0	0	22	54	0	0	132
Total	20	0	136	6	0	113	16	0	0	0	0	2	111	171	0	0	575
05:00 PM	3	0	15	2	0	35	5	0	0	0	0	0	16	34	0	0	110
05:15 PM	4	0	20	0	0	25	4	0	0	0	0	0	20	41	0	0	114
05:30 PM	2	0	11	0	0	33	0	0	0	0	0	0	10	37	0	0	93
05:45 PM	2	0	9	0	0	33	2	0	0	0	0	0	13	28	0	0	87
Total	11	0	55	2	0	126	11	0	0	0	0	0	59	140	0	0	404
Grand Total	48	0	359	14	0	502	78	0	0	0	0	2	398	458	0	0	1859
Apprch %	11.4	0.0	85.3	3.3	0.0	86.6	13.4	0.0	0.0	0.0	0.0	100.0	46.5	53.5	0.0	0.0	
Total %	2.6	0.0	19.3	0.8	0.0	27.0	4.2	0.0	0.0	0.0	0.0	0.1	21.4	24.6	0.0	0.0	

COUNTER MEASURES INC.
1889 YORK STREET
DENVER.COLORADO
303-333-7409

N/S STREET: 8THST
E/W STREET: PALMER AVE
CITY: BENNETT
COUNTY: ADAMS

File Name : 8THPALM
Site Code : 00000015
Start Date : 9/20/2018
Page No : 2

	8TH ST Southbound					PALMER AVE Westbound					8TH ST Northbound					PALMER AVE Eastbound					
Start Time	Left	Thru	Right	Peds	App. Total	Left	Thru	Right	Peds	App. Total	Left	Thru	Right	Peds	App. Total	Left	Thru	Right	Peds	App. Total	Int. Total
Peak Hour From 07:15 AM to 08:00 AM - Peak 1 of 1																					
Intersection	07:15 AM																				
Volume	14	0	154	6	174	0	140	50	0	190	0	0	0	0	0	196	73	0	0	269	633
Percent	8.0	0.0	88.5	3.4		0.0	73.7	26.3	0.0		0.0	0.0	0.0	0.0		72.9	27.1	0.0	0.0		
07:45 Volume	4	0	73	2	79	0	39	13	0	52	0	0	0	0	0	83	23	0	0	106	237
Peak Factor																					0.668
High Int.	07:45 AM					07:30 AM										07:45 AM					
Volume	4	0	73	2	79	0	40	23	0	63	0	0	0	0	0	83	23	0	0	106	
Peak Factor					0.551					0.754										0.634	

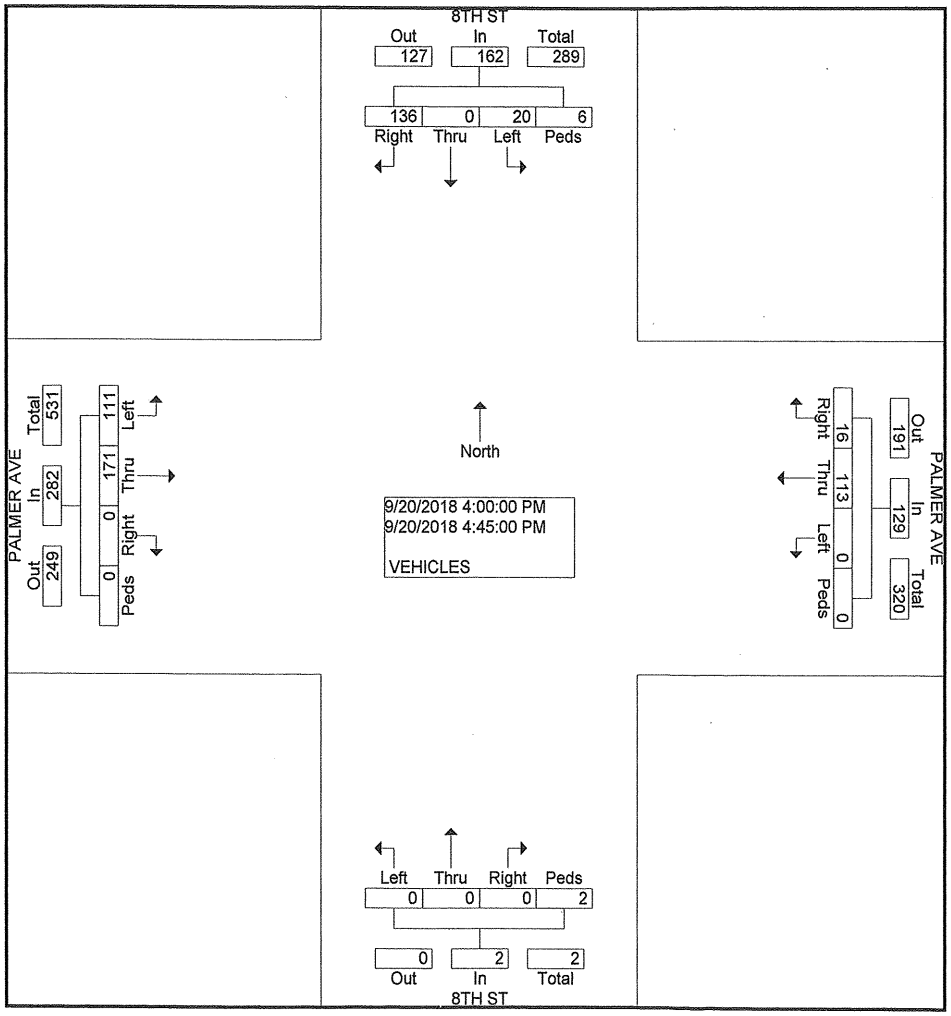


COUNTER MEASURES INC.
1889 YORK STREET
DENVER.COLORADO
303-333-7409

N/S STREET: 8THST
E/W STREET: PALMER AVE
CITY: BENNETT
COUNTY: ADAMS

File Name : 8THPALM
Site Code : 00000015
Start Date : 9/20/2018
Page No : 2

	8TH ST Southbound					PALMER AVE Westbound					8TH ST Northbound					PALMER AVE Eastbound					
Start Time	Left	Thru	Right	Peds	App. Total	Left	Thru	Right	Peds	App. Total	Left	Thru	Right	Peds	App. Total	Left	Thru	Right	Peds	App. Total	Int. Total
Peak Hour From 04:00 PM to 04:45 PM - Peak 1 of 1																					
Intersection	04:00 PM																				
Volume	20	0	136	6	162	0	113	16	0	129	0	0	0	2	2	111	171	0	0	282	575
Percent	12.3	0.0	84.0	3.7		0.0	87.6	12.4	0.0		0.0	0.0	0.0	100.0		39.4	60.6	0.0	0.0		
04:00 Volume	6	0	58	6	70	0	34	8	0	42	0	0	0	2	2	41	39	0	0	80	194
Peak Factor																					0.741
High Int.	04:00 PM					04:00 PM					04:00 PM					04:00 PM					
Volume	6	0	58	6	70	0	34	8	0	42	0	0	0	2	2	41	39	0	0	80	
Peak Factor					0.579					0.768					0.250					0.881	



COUNTER MEASURES INC.

1889 YORK STREET
DENVER,COLORADO 80206
303-333-7409

Location: KIOWA-BENNETT RD N/O 38TH AVE
City: BENNETT
County: ADAMS
Direction: NORTHBOUND-SOUTHBOUND

Site Code: 112619
Station ID: 112619

Start	26-Nov-18		Tue		Wed		Thu		Fri		Weekday Average		Sat		Sun	
Time	NB	SB	NB	SB	NB	SB	NB	SB	NB	SB	NB	SB	NB	SB	NB	SB
12:00 AM	*	*	18	9	*	*	*	*	*	*	18	9	*	*	*	*
01:00	*	*	4	8	*	*	*	*	*	*	4	8	*	*	*	*
02:00	*	*	6	6	*	*	*	*	*	*	6	6	*	*	*	*
03:00	*	*	10	7	*	*	*	*	*	*	10	7	*	*	*	*
04:00	*	*	5	6	*	*	*	*	*	*	5	6	*	*	*	*
05:00	*	*	18	12	*	*	*	*	*	*	18	12	*	*	*	*
06:00	*	*	40	44	*	*	*	*	*	*	40	44	*	*	*	*
07:00	*	*	63	100	*	*	*	*	*	*	63	100	*	*	*	*
08:00	*	*	94	**166**	*	*	*	*	*	*	94	**166**	*	*	*	*
09:00	*	*	**136**	135	*	*	*	*	*	*	**136**	135	*	*	*	*
10:00	*	*	112	165	*	*	*	*	*	*	112	165	*	*	*	*
11:00	*	*	117	114	*	*	*	*	*	*	117	114	*	*	*	*
12:00 PM	*	*	118	114	*	*	*	*	*	*	118	114	*	*	*	*
01:00	*	*	107	130	*	*	*	*	*	*	107	130	*	*	*	*
02:00	*	*	128	124	*	*	*	*	*	*	128	124	*	*	*	*
03:00	*	*	111	86	*	*	*	*	*	*	111	86	*	*	*	*
04:00	*	*	124	118	*	*	*	*	*	*	124	118	*	*	*	*
05:00	*	*	**194**	**140**	*	*	*	*	*	*	**194**	**140**	*	*	*	*
06:00	*	*	150	126	*	*	*	*	*	*	150	126	*	*	*	*
07:00	*	*	106	66	*	*	*	*	*	*	106	66	*	*	*	*
08:00	*	*	74	50	*	*	*	*	*	*	74	50	*	*	*	*
09:00	*	*	50	26	*	*	*	*	*	*	50	26	*	*	*	*
10:00	*	*	36	26	*	*	*	*	*	*	36	26	*	*	*	*
11:00	*	*	34	3	*	*	*	*	*	*	34	3	*	*	*	*
Total	0	0	1855	1781	0	0	0	0	0	0	1855	1781	0	0	0	0
Day	0		3636		0		0		0		3636		0		0	
AM Peak	-	-	09:00	08:00	-	-	-	-	-	-	09:00	08:00	-	-	-	-
Vol.	-	-	136	166	-	-	-	-	-	-	136	166	-	-	-	-
PM Peak	-	-	17:00	17:00	-	-	-	-	-	-	17:00	17:00	-	-	-	-
Vol.	-	-	194	140	-	-	-	-	-	-	194	140	-	-	-	-

Comb. Total	0		3636		0		0		0		3636		0		0	

ADT ADT 3,636 AADT 3,636

Location:PALMER AVE E/O GREGS PL
City: BENNETT
County: ADAMS
Direction: WESTBOUND-EASTBOUND

COUNTER MEASURES INC.
1889 YORK STREET
DENVER,COLORADO 80206
303-333-7409

Site Code: 112617
Station ID: 112617

Start	26-Nov-18		Tue		Wed		Thu		Fri		Weekday Average		Sat		Sun	
Time	WB	EB	WB	EB	WB	EB	WB	EB	WB	EB	WB	EB	WB	EB	WB	EB
12:00 AM	*	*	9	18	*	*	*	*	*	*	9	18	*	*	*	*
01:00	*	*	8	6	*	*	*	*	*	*	8	6	*	*	*	*
02:00	*	*	6	6	*	*	*	*	*	*	6	6	*	*	*	*
03:00	*	*	4	10	*	*	*	*	*	*	4	10	*	*	*	*
04:00	*	*	8	3	*	*	*	*	*	*	8	3	*	*	*	*
05:00	*	*	12	14	*	*	*	*	*	*	12	14	*	*	*	*
06:00	*	*	58	36	*	*	*	*	*	*	58	36	*	*	*	*
07:00	*	*	98	50	*	*	*	*	*	*	98	50	*	*	*	*
08:00	*	*	**190**	98	*	*	*	*	*	*	**190**	98	*	*	*	*
09:00	*	*	142	**144**	*	*	*	*	*	*	142	**144**	*	*	*	*
10:00	*	*	154	99	*	*	*	*	*	*	154	99	*	*	*	*
11:00	*	*	137	126	*	*	*	*	*	*	137	126	*	*	*	*
12:00 PM	*	*	102	106	*	*	*	*	*	*	102	106	*	*	*	*
01:00	*	*	142	129	*	*	*	*	*	*	142	129	*	*	*	*
02:00	*	*	125	138	*	*	*	*	*	*	125	138	*	*	*	*
03:00	*	*	106	117	*	*	*	*	*	*	106	117	*	*	*	*
04:00	*	*	112	137	*	*	*	*	*	*	112	137	*	*	*	*
05:00	*	*	**149**	**232**	*	*	*	*	*	*	**149**	**232**	*	*	*	*
06:00	*	*	132	199	*	*	*	*	*	*	132	199	*	*	*	*
07:00	*	*	52	127	*	*	*	*	*	*	52	127	*	*	*	*
08:00	*	*	52	89	*	*	*	*	*	*	52	89	*	*	*	*
09:00	*	*	28	62	*	*	*	*	*	*	28	62	*	*	*	*
10:00	*	*	22	42	*	*	*	*	*	*	22	42	*	*	*	*
11:00	*	*	8	32	*	*	*	*	*	*	8	32	*	*	*	*
Total	0	0	1856	2020	0	0	0	0	0	0	1856	2020	0	0	0	0
Day	0		3876		0		0		0		3876		0		0	
AM Peak	-	-	08:00	09:00	-	-	-	-	-	-	08:00	09:00	-	-	-	-
Vol.	-	-	190	144	-	-	-	-	-	-	190	144	-	-	-	-
PM Peak	-	-	17:00	17:00	-	-	-	-	-	-	17:00	17:00	-	-	-	-
Vol.	-	-	149	232	-	-	-	-	-	-	149	232	-	-	-	-

Comb. Total	0		3876		0		0		0		3876		0		0	

ADT ADT 3,876 AADT 3,876

Location: PALMER AVE W/O 8TH ST
City: BENNETT
County: ADAMS
Direction: WESTBOUND-EASTBOUND

COUNTER MEASURES INC.

1889 YORK STREET
DENVER,COLORADO 80206
303-333-7409

Site Code: 112610
Station ID: 112610

Start	26-Nov-18		Tue		Wed		Thu		Fri		Weekday Average		Sat		Sun	
Time	WB	EB	WB	EB	WB	EB	WB	EB	WB	EB	WB	EB	WB	EB	WB	EB
12:00 AM	*	*	12	18	*	*	*	*	*	*	12	18	*	*	*	*
01:00	*	*	8	7	*	*	*	*	*	*	8	7	*	*	*	*
02:00	*	*	6	6	*	*	*	*	*	*	6	6	*	*	*	*
03:00	*	*	5	10	*	*	*	*	*	*	5	10	*	*	*	*
04:00	*	*	8	4	*	*	*	*	*	*	8	4	*	*	*	*
05:00	*	*	13	14	*	*	*	*	*	*	13	14	*	*	*	*
06:00	*	*	54	42	*	*	*	*	*	*	54	42	*	*	*	*
07:00	*	*	110	62	*	*	*	*	*	*	110	62	*	*	*	*
08:00	*	*	214	220	*	*	*	*	*	*	214	220	*	*	*	*
09:00	*	*	**258**	**230**	*	*	*	*	*	*	**258**	**230**	*	*	*	*
10:00	*	*	164	120	*	*	*	*	*	*	164	120	*	*	*	*
11:00	*	*	152	149	*	*	*	*	*	*	152	149	*	*	*	*
12:00 PM	*	*	161	161	*	*	*	*	*	*	161	161	*	*	*	*
01:00	*	*	165	146	*	*	*	*	*	*	165	146	*	*	*	*
02:00	*	*	156	176	*	*	*	*	*	*	156	176	*	*	*	*
03:00	*	*	118	138	*	*	*	*	*	*	118	138	*	*	*	*
04:00	*	*	130	207	*	*	*	*	*	*	130	207	*	*	*	*
05:00	*	*	**298**	**366**	*	*	*	*	*	*	**298**	**366**	*	*	*	*
06:00	*	*	190	219	*	*	*	*	*	*	190	219	*	*	*	*
07:00	*	*	70	142	*	*	*	*	*	*	70	142	*	*	*	*
08:00	*	*	80	106	*	*	*	*	*	*	80	106	*	*	*	*
09:00	*	*	60	73	*	*	*	*	*	*	60	73	*	*	*	*
10:00	*	*	30	42	*	*	*	*	*	*	30	42	*	*	*	*
11:00	*	*	8	33	*	*	*	*	*	*	8	33	*	*	*	*
Total	0	0	2470	2691	0	0	0	0	0	0	2470	2691	0	0	0	0
Day	0		5161		0		0		0		5161		0		0	
AM Peak	-	-	09:00	09:00	-	-	-	-	-	-	09:00	09:00	-	-	-	-
Vol.	-	-	258	230	-	-	-	-	-	-	258	230	-	-	-	-
PM Peak	-	-	17:00	17:00	-	-	-	-	-	-	17:00	17:00	-	-	-	-
Vol.	-	-	298	366	-	-	-	-	-	-	298	366	-	-	-	-

Comb. Total	0	5161	0	0	0	5161	0	0

ADT ADT 5,161 AADT 5,161

LEVEL OF SERVICE DEFINITIONS

From *Highway Capacity Manual*, Transportation Research Board, 2010

UNSIGNALIZED INTERSECTION LEVEL OF SERVICE (LOS)

Applicable to Two-Way Stop Control, All-Way Stop Control, and Roundabouts

LOS	Average Vehicle Control Delay	Operational Characteristics
A	<10 seconds	Normally, vehicles on the stop-controlled approach only have to wait up to 10 seconds before being able to clear the intersection. Left-turning vehicles on the uncontrolled street do not have to wait to make their turn.
B	10 to 15 seconds	Vehicles on the stop-controlled approach will experience delays before being able to clear the intersection. The delay could be up to 15 seconds. Left-turning vehicles on the uncontrolled street may have to wait to make their turn.
C	15 to 25 seconds	Vehicles on the stop-controlled approach can expect delays in the range of 15 to 25 seconds before clearing the intersection. Motorists may begin to take chances due to the long delays, thereby posing a safety risk to through traffic. Left-turning vehicles on the uncontrolled street will now be required to wait to make their turn causing a queue to be created in the turn lane.
D	25 to 35 seconds	This is the point at which a traffic signal may be warranted for this intersection. The delays for the stop-controlled intersection are not considered to be excessive. The length of the queue may begin to block other public and private access points.
E	35 to 50 seconds	The delays for all critical traffic movements are considered to be unacceptable. The length of the queues for the stop-controlled approaches as well as the left-turn movements are extremely long. There is a high probability that this intersection will meet traffic signal warrants. The ability to install a traffic signal is affected by the location of other existing traffic signals. Consideration may be given to restricting the accesses by eliminating the left-turn movements from and to the stop-controlled approach.
F	>50 seconds	The delay for the critical traffic movements are probably in excess of 100 seconds. The length of the queues are extremely long. Motorists are selecting alternative routes due to the long delays. The only remedy for these long delays is installing a traffic signal or restricting the accesses. The potential for accidents at this intersection are extremely high due to motorist taking more risky chances. If the median permits, motorists begin making two-stage left-turns.

Intersection	
Int Delay, s/veh	0.5

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕			↕			↕	
Traffic Vol, veh/h	1	0	8	0	0	0	5	80	0	0	156	1
Future Vol, veh/h	1	0	8	0	0	0	5	80	0	0	156	1
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	-	-	-	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	85	85	85	85	85	85	85	85	85	85	85	85
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	1	0	9	0	0	0	6	94	0	0	184	1

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	291	291	185	295	291	94	185	0	0	94	0	0
Stage 1	185	185	-	106	106	-	-	-	-	-	-	-
Stage 2	106	106	-	189	185	-	-	-	-	-	-	-
Critical Hdwy	7.12	6.52	6.22	7.12	6.52	6.22	4.12	-	-	4.12	-	-
Critical Hdwy Stg 1	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Follow-up Hdwy	3.518	4.018	3.318	3.518	4.018	3.318	2.218	-	-	2.218	-	-
Pot Cap-1 Maneuver	661	619	857	657	619	963	1390	-	-	1500	-	-
Stage 1	817	747	-	900	807	-	-	-	-	-	-	-
Stage 2	900	807	-	813	747	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	658	616	857	647	616	963	1390	-	-	1500	-	-
Mov Cap-2 Maneuver	658	616	-	647	616	-	-	-	-	-	-	-
Stage 1	813	747	-	896	803	-	-	-	-	-	-	-
Stage 2	896	803	-	804	747	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	9.4	0	0.4	0
HCM LOS	A	A		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	WBLn1	SBL	SBT	SBR
Capacity (veh/h)	1390	-	-	829	-	1500	-	-
HCM Lane V/C Ratio	0.004	-	-	0.013	-	-	-	-
HCM Control Delay (s)	7.6	0	-	9.4	0	0	-	-
HCM Lane LOS	A	A	-	A	A	A	-	-
HCM 95th %tile Q(veh)	0	-	-	0	-	0	-	-

Intersection	
Int Delay, s/veh	0.4

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	10	0	85	5	3	185
Future Vol, veh/h	10	0	85	5	3	185
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	-	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	84	84	84	84	84	84
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	12	0	101	6	4	220

Major/Minor	Minor1		Major1		Major2	
Conflicting Flow All	332	104	0	0	107	0
Stage 1	104	-	-	-	-	-
Stage 2	228	-	-	-	-	-
Critical Hdwy	6.42	6.22	-	-	4.12	-
Critical Hdwy Stg 1	5.42	-	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-	-
Follow-up Hdwy	3.518	3.318	-	-	2.218	-
Pot Cap-1 Maneuver	663	951	-	-	1484	-
Stage 1	920	-	-	-	-	-
Stage 2	810	-	-	-	-	-
Platoon blocked, %			-	-		-
Mov Cap-1 Maneuver	661	951	-	-	1484	-
Mov Cap-2 Maneuver	661	-	-	-	-	-
Stage 1	917	-	-	-	-	-
Stage 2	810	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s	10.5	0	0.1
HCM LOS	B		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	SBL	SBT
Capacity (veh/h)	-	-	661	1484	-
HCM Lane V/C Ratio	-	-	0.018	0.002	-
HCM Control Delay (s)	-	-	10.5	7.4	0
HCM Lane LOS	-	-	B	A	A
HCM 95th %tile Q(veh)	-	-	0.1	0	-

Intersection	
Int Delay, s/veh	0.8

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	8	78	190	4	12	4
Future Vol, veh/h	8	78	190	4	12	4
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	82	82	82	82	82	82
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	10	95	232	5	15	5

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	237	0	-	0	350	235
Stage 1	-	-	-	-	235	-
Stage 2	-	-	-	-	115	-
Critical Hdwy	4.12	-	-	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	2.218	-	-	-	3.518	3.318
Pot Cap-1 Maneuver	1330	-	-	-	647	804
Stage 1	-	-	-	-	804	-
Stage 2	-	-	-	-	910	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1330	-	-	-	642	804
Mov Cap-2 Maneuver	-	-	-	-	642	-
Stage 1	-	-	-	-	798	-
Stage 2	-	-	-	-	910	-

Approach	EB	WB	SB
HCM Control Delay, s	0.7	0	10.5
HCM LOS			B

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1
Capacity (veh/h)	1330	-	-	-	676
HCM Lane V/C Ratio	0.007	-	-	-	0.029
HCM Control Delay (s)	7.7	0	-	-	10.5
HCM Lane LOS	A	A	-	-	B
HCM 95th %tile Q(veh)	0	-	-	-	0.1

Intersection	
Int Delay, s/veh	6

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	196	73	140	50	14	154
Future Vol, veh/h	196	73	140	50	14	154
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	0
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	67	67	67	67	67	67
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	293	109	209	75	21	230

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	284	0	-	0	942	247
Stage 1	-	-	-	-	247	-
Stage 2	-	-	-	-	695	-
Critical Hdwy	4.12	-	-	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	2.218	-	-	-	3.518	3.318
Pot Cap-1 Maneuver	1278	-	-	-	292	792
Stage 1	-	-	-	-	794	-
Stage 2	-	-	-	-	495	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1278	-	-	-	221	792
Mov Cap-2 Maneuver	-	-	-	-	221	-
Stage 1	-	-	-	-	600	-
Stage 2	-	-	-	-	495	-

Approach	EB	WB	SB
HCM Control Delay, s	6.3	0	12.4
HCM LOS			B

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1	SBLn2
Capacity (veh/h)	1278	-	-	-	221	792
HCM Lane V/C Ratio	0.229	-	-	-	0.095	0.29
HCM Control Delay (s)	8.7	0	-	-	23	11.4
HCM Lane LOS	A	A	-	-	C	B
HCM 95th %tile Q(veh)	0.9	-	-	-	0.3	1.2

Intersection	
Int Delay, s/veh	0.3

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕			↕			↕	
Traffic Vol, veh/h	0	0	7	0	0	0	3	175	0	0	132	4
Future Vol, veh/h	0	0	7	0	0	0	3	175	0	0	132	4
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	-	-	-	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	82	82	82	82	82	82	82	82	82	82	82	82
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	0	0	9	0	0	0	4	213	0	0	161	5

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	385	385	164	389	387	213	166	0	0	213	0	0
Stage 1	164	164	-	221	221	-	-	-	-	-	-	-
Stage 2	221	221	-	168	166	-	-	-	-	-	-	-
Critical Hdwy	7.12	6.52	6.22	7.12	6.52	6.22	4.12	-	-	4.12	-	-
Critical Hdwy Stg 1	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Follow-up Hdwy	3.518	4.018	3.318	3.518	4.018	3.318	2.218	-	-	2.218	-	-
Pot Cap-1 Maneuver	573	549	881	570	547	827	1412	-	-	1357	-	-
Stage 1	838	762	-	781	720	-	-	-	-	-	-	-
Stage 2	781	720	-	834	761	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	572	547	881	563	545	827	1412	-	-	1357	-	-
Mov Cap-2 Maneuver	572	547	-	563	545	-	-	-	-	-	-	-
Stage 1	835	762	-	779	718	-	-	-	-	-	-	-
Stage 2	779	718	-	826	761	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	9.1	0	0.1	0
HCM LOS	A	A		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	WBLn1	SBL	SBT	SBR
Capacity (veh/h)	1412	-	-	881	-	1357	-	-
HCM Lane V/C Ratio	0.003	-	-	0.01	-	-	-	-
HCM Control Delay (s)	7.6	0	-	9.1	0	0	-	-
HCM Lane LOS	A	A	-	A	A	A	-	-
HCM 95th %tile Q(veh)	0	-	-	0	-	0	-	-

Intersection	
Int Delay, s/veh	0.6

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	15	0	185	20	3	105
Future Vol, veh/h	15	0	185	20	3	105
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	-	-	-	-	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	17	0	210	23	3	119

Major/Minor	Minor1		Major1		Major2	
Conflicting Flow All	347	222	0	0	233	0
Stage 1	222	-	-	-	-	-
Stage 2	125	-	-	-	-	-
Critical Hdwy	6.42	6.22	-	-	4.12	-
Critical Hdwy Stg 1	5.42	-	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-	-
Follow-up Hdwy	3.518	3.318	-	-	2.218	-
Pot Cap-1 Maneuver	650	818	-	-	1335	-
Stage 1	815	-	-	-	-	-
Stage 2	901	-	-	-	-	-
Platoon blocked, %			-	-		-
Mov Cap-1 Maneuver	649	818	-	-	1335	-
Mov Cap-2 Maneuver	649	-	-	-	-	-
Stage 1	813	-	-	-	-	-
Stage 2	901	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s	10.7	0	0.2
HCM LOS	B		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	SBL	SBT
Capacity (veh/h)	-	-	649	1335	-
HCM Lane V/C Ratio	-	-	0.026	0.003	-
HCM Control Delay (s)	-	-	10.7	7.7	0
HCM Lane LOS	-	-	B	A	A
HCM 95th %tile Q(veh)	-	-	0.1	0	-

Intersection	
Int Delay, s/veh	1.1

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	6	185	117	4	22	12
Future Vol, veh/h	6	185	117	4	22	12
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	7	210	133	5	25	14

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	138	0	-	0	360	136
Stage 1	-	-	-	-	136	-
Stage 2	-	-	-	-	224	-
Critical Hdwy	4.12	-	-	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	2.218	-	-	-	3.518	3.318
Pot Cap-1 Maneuver	1446	-	-	-	639	913
Stage 1	-	-	-	-	890	-
Stage 2	-	-	-	-	813	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1446	-	-	-	636	913
Mov Cap-2 Maneuver	-	-	-	-	636	-
Stage 1	-	-	-	-	886	-
Stage 2	-	-	-	-	813	-

Approach	EB	WB	SB
HCM Control Delay, s	0.2	0	10.3
HCM LOS			B

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1
Capacity (veh/h)	1446	-	-	-	712
HCM Lane V/C Ratio	0.005	-	-	-	0.054
HCM Control Delay (s)	7.5	0	-	-	10.3
HCM Lane LOS	A	A	-	-	B
HCM 95th %tile Q(veh)	0	-	-	-	0.2

Intersection	
Int Delay, s/veh	4.5

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	111	171	113	16	20	136
Future Vol, veh/h	111	171	113	16	20	136
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	0
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	74	74	74	74	74	74
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	150	231	153	22	27	184

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	175	0	-	0	695	164
Stage 1	-	-	-	-	164	-
Stage 2	-	-	-	-	531	-
Critical Hdwy	4.12	-	-	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	2.218	-	-	-	3.518	3.318
Pot Cap-1 Maneuver	1401	-	-	-	408	881
Stage 1	-	-	-	-	865	-
Stage 2	-	-	-	-	590	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1401	-	-	-	358	881
Mov Cap-2 Maneuver	-	-	-	-	358	-
Stage 1	-	-	-	-	759	-
Stage 2	-	-	-	-	590	-

Approach	EB	WB	SB
HCM Control Delay, s	3.1	0	10.9
HCM LOS			B

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1	SBLn2
Capacity (veh/h)	1401	-	-	-	358	881
HCM Lane V/C Ratio	0.107	-	-	-	0.075	0.209
HCM Control Delay (s)	7.9	0	-	-	15.9	10.2
HCM Lane LOS	A	A	-	-	C	B
HCM 95th %tile Q(veh)	0.4	-	-	-	0.2	0.8

Intersection	
Int Delay, s/veh	1.2

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕			↕			↕	
Traffic Vol, veh/h	10	1	15	1	1	1	10	90	1	1	175	5
Future Vol, veh/h	10	1	15	1	1	1	10	90	1	1	175	5
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	-	-	-	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	88	88	88	88	88	88	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	11	1	17	1	1	1	11	102	1	1	199	6

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	330	329	202	338	332	103	205	0	0	103	0	0
Stage 1	204	204	-	125	125	-	-	-	-	-	-	-
Stage 2	126	125	-	213	207	-	-	-	-	-	-	-
Critical Hdwy	7.12	6.52	6.22	7.12	6.52	6.22	4.12	-	-	4.12	-	-
Critical Hdwy Stg 1	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Follow-up Hdwy	3.518	4.018	3.318	3.518	4.018	3.318	2.218	-	-	2.218	-	-
Pot Cap-1 Maneuver	623	590	839	616	588	952	1366	-	-	1489	-	-
Stage 1	798	733	-	879	792	-	-	-	-	-	-	-
Stage 2	878	792	-	789	731	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	617	584	839	598	582	952	1366	-	-	1489	-	-
Mov Cap-2 Maneuver	617	584	-	598	582	-	-	-	-	-	-	-
Stage 1	791	732	-	871	785	-	-	-	-	-	-	-
Stage 2	868	785	-	771	730	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	10.2	10.4	0.8	0
HCM LOS	B	B		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	WBLn1	SBL	SBT	SBR
Capacity (veh/h)	1366	-	-	726	676	1489	-	-
HCM Lane V/C Ratio	0.008	-	-	0.041	0.005	0.001	-	-
HCM Control Delay (s)	7.7	0	-	10.2	10.4	7.4	0	-
HCM Lane LOS	A	A	-	B	B	A	A	-
HCM 95th %tile Q(veh)	0	-	-	0.1	0	0	-	-

Intersection	
Int Delay, s/veh	0.6

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	15	0	95	10	5	185
Future Vol, veh/h	15	0	95	10	5	185
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	-	-	-	-	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	17	0	108	11	6	210

Major/Minor	Minor1		Major1		Major2	
Conflicting Flow All	336	114	0	0	119	0
Stage 1	114	-	-	-	-	-
Stage 2	222	-	-	-	-	-
Critical Hdwy	6.42	6.22	-	-	4.12	-
Critical Hdwy Stg 1	5.42	-	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-	-
Follow-up Hdwy	3.518	3.318	-	-	2.218	-
Pot Cap-1 Maneuver	659	939	-	-	1469	-
Stage 1	911	-	-	-	-	-
Stage 2	815	-	-	-	-	-
Platoon blocked, %			-	-		-
Mov Cap-1 Maneuver	656	939	-	-	1469	-
Mov Cap-2 Maneuver	656	-	-	-	-	-
Stage 1	906	-	-	-	-	-
Stage 2	815	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s	10.6	0	0.2
HCM LOS	B		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	SBL	SBT
Capacity (veh/h)	-	-	656	1469	-
HCM Lane V/C Ratio	-	-	0.026	0.004	-
HCM Control Delay (s)	-	-	10.6	7.5	0
HCM Lane LOS	-	-	B	A	A
HCM 95th %tile Q(veh)	-	-	0.1	0	-

Intersection	
Int Delay, s/veh	0.9

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	10	90	195	5	15	5
Future Vol, veh/h	10	90	195	5	15	5
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	80	80	80	80	80	80
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	13	113	244	6	19	6

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	250	0	-	0	386	247
Stage 1	-	-	-	-	247	-
Stage 2	-	-	-	-	139	-
Critical Hdwy	4.12	-	-	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	2.218	-	-	-	3.518	3.318
Pot Cap-1 Maneuver	1316	-	-	-	617	792
Stage 1	-	-	-	-	794	-
Stage 2	-	-	-	-	888	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1316	-	-	-	610	792
Mov Cap-2 Maneuver	-	-	-	-	610	-
Stage 1	-	-	-	-	785	-
Stage 2	-	-	-	-	888	-

Approach	EB	WB	SB
HCM Control Delay, s	0.8	0	10.8
HCM LOS			B

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1
Capacity (veh/h)	1316	-	-	-	647
HCM Lane V/C Ratio	0.009	-	-	-	0.039
HCM Control Delay (s)	7.8	0	-	-	10.8
HCM Lane LOS	A	A	-	-	B
HCM 95th %tile Q(veh)	0	-	-	-	0.1

Intersection	
Int Delay, s/veh	5.9

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	200	85	145	55	15	160
Future Vol, veh/h	200	85	145	55	15	160
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	300	-	-	300	0	0
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	70	70	70	70	70	70
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	286	121	207	79	21	229

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	286	0	-	0	900	207
Stage 1	-	-	-	-	207	-
Stage 2	-	-	-	-	693	-
Critical Hdwy	4.12	-	-	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	2.218	-	-	-	3.518	3.318
Pot Cap-1 Maneuver	1276	-	-	-	309	833
Stage 1	-	-	-	-	828	-
Stage 2	-	-	-	-	496	-
Platoon blocked, %			-	-	-	
Mov Cap-1 Maneuver	1276	-	-	-	240	833
Mov Cap-2 Maneuver	-	-	-	-	190	-
Stage 1	-	-	-	-	643	-
Stage 2	-	-	-	-	496	-

Approach	EB	WB	SB
HCM Control Delay, s	6.1	0	12.2
HCM LOS			B

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1	SBLn2
Capacity (veh/h)	1276	-	-	-	190	833
HCM Lane V/C Ratio	0.224	-	-	-	0.113	0.274
HCM Control Delay (s)	8.6	-	-	-	26.3	10.9
HCM Lane LOS	A	-	-	-	D	B
HCM 95th %tile Q(veh)	0.9	-	-	-	0.4	1.1

Intersection	
Int Delay, s/veh	0.7

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕			↕			↕	
Traffic Vol, veh/h	5	1	15	1	1	1	5	195	1	1	150	10
Future Vol, veh/h	5	1	15	1	1	1	5	195	1	1	150	10
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	-	-	-	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	88	88	88	88	88	88	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	6	1	17	1	1	1	6	222	1	1	170	11

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	414	413	176	422	418	223	181	0	0	223	0	0
Stage 1	178	178	-	235	235	-	-	-	-	-	-	-
Stage 2	236	235	-	187	183	-	-	-	-	-	-	-
Critical Hdwy	7.12	6.52	6.22	7.12	6.52	6.22	4.12	-	-	4.12	-	-
Critical Hdwy Stg 1	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Follow-up Hdwy	3.518	4.018	3.318	3.518	4.018	3.318	2.218	-	-	2.218	-	-
Pot Cap-1 Maneuver	549	529	867	542	526	817	1394	-	-	1346	-	-
Stage 1	824	752	-	768	710	-	-	-	-	-	-	-
Stage 2	767	710	-	815	748	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	545	526	867	528	523	817	1394	-	-	1346	-	-
Mov Cap-2 Maneuver	545	526	-	528	523	-	-	-	-	-	-	-
Stage 1	820	751	-	764	706	-	-	-	-	-	-	-
Stage 2	761	706	-	797	747	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	10	11.1	0.2	0
HCM LOS	B	B		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	WBLn1	SBL	SBT	SBR
Capacity (veh/h)	1394	-	-	740	596	1346	-	-
HCM Lane V/C Ratio	0.004	-	-	0.032	0.006	0.001	-	-
HCM Control Delay (s)	7.6	0	-	10	11.1	7.7	0	-
HCM Lane LOS	A	A	-	B	B	A	A	-
HCM 95th %tile Q(veh)	0	-	-	0.1	0	0	-	-

Intersection	
Int Delay, s/veh	0.1

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	0	5	195	0	0	165
Future Vol, veh/h	0	5	195	0	0	165
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	-	0	-	-	-	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	0	6	222	0	0	188

Major/Minor	Minor1		Major1		Major2	
Conflicting Flow All	-	222	0	-	-	-
Stage 1	-	-	-	-	-	-
Stage 2	-	-	-	-	-	-
Critical Hdwy	-	6.22	-	-	-	-
Critical Hdwy Stg 1	-	-	-	-	-	-
Critical Hdwy Stg 2	-	-	-	-	-	-
Follow-up Hdwy	-	3.318	-	-	-	-
Pot Cap-1 Maneuver	0	818	-	0	0	-
Stage 1	0	-	-	0	0	-
Stage 2	0	-	-	0	0	-
Platoon blocked, %			-			-
Mov Cap-1 Maneuver	-	818	-	-	-	-
Mov Cap-2 Maneuver	-	-	-	-	-	-
Stage 1	-	-	-	-	-	-
Stage 2	-	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s	9.4	0	0
HCM LOS	A		

Minor Lane/Major Mvmt	NBT	WBLn1	SBT
Capacity (veh/h)	-	818	-
HCM Lane V/C Ratio	-	0.007	-
HCM Control Delay (s)	-	9.4	-
HCM Lane LOS	-	A	-
HCM 95th %tile Q(veh)	-	0	-

Intersection	
Int Delay, s/veh	0.6

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	20	0	195	25	5	160
Future Vol, veh/h	20	0	195	25	5	160
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	-	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	23	0	222	28	6	182

Major/Minor	Minor1		Major1		Major2	
Conflicting Flow All	430	236	0	0	250	0
Stage 1	236	-	-	-	-	-
Stage 2	194	-	-	-	-	-
Critical Hdwy	6.42	6.22	-	-	4.12	-
Critical Hdwy Stg 1	5.42	-	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-	-
Follow-up Hdwy	3.518	3.318	-	-	2.218	-
Pot Cap-1 Maneuver	582	803	-	-	1316	-
Stage 1	803	-	-	-	-	-
Stage 2	839	-	-	-	-	-
Platoon blocked, %			-	-		-
Mov Cap-1 Maneuver	579	803	-	-	1316	-
Mov Cap-2 Maneuver	579	-	-	-	-	-
Stage 1	799	-	-	-	-	-
Stage 2	839	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s	11.5	0	0.2
HCM LOS	B		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	SBL	SBT
Capacity (veh/h)	-	-	579	1316	-
HCM Lane V/C Ratio	-	-	0.039	0.004	-
HCM Control Delay (s)	-	-	11.5	7.7	0
HCM Lane LOS	-	-	B	A	A
HCM 95th %tile Q(veh)	-	-	0.1	0	-

Intersection	
Int Delay, s/veh	1.2

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	7	195	175	5	25	15
Future Vol, veh/h	7	195	175	5	25	15
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	85	85	85	85	85	85
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	8	229	206	6	29	18

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	212	0	-	0	454	209
Stage 1	-	-	-	-	209	-
Stage 2	-	-	-	-	245	-
Critical Hdwy	4.12	-	-	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	2.218	-	-	-	3.518	3.318
Pot Cap-1 Maneuver	1358	-	-	-	564	831
Stage 1	-	-	-	-	826	-
Stage 2	-	-	-	-	796	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1358	-	-	-	560	831
Mov Cap-2 Maneuver	-	-	-	-	560	-
Stage 1	-	-	-	-	820	-
Stage 2	-	-	-	-	796	-

Approach	EB	WB	SB
HCM Control Delay, s	0.3	0	11.1
HCM LOS			B

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1
Capacity (veh/h)	1358	-	-	-	638
HCM Lane V/C Ratio	0.006	-	-	-	0.074
HCM Control Delay (s)	7.7	0	-	-	11.1
HCM Lane LOS	A	A	-	-	B
HCM 95th %tile Q(veh)	0	-	-	-	0.2

Intersection	
Int Delay, s/veh	2.7

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	28	4	3	21	10	11
Future Vol, veh/h	28	4	3	21	10	11
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	32	5	3	24	11	13

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	37	0	65	35
Stage 1	-	-	-	-	35	-
Stage 2	-	-	-	-	30	-
Critical Hdwy	-	-	4.12	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	-	-	2.218	-	3.518	3.318
Pot Cap-1 Maneuver	-	-	1574	-	941	1038
Stage 1	-	-	-	-	987	-
Stage 2	-	-	-	-	993	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	1574	-	939	1038
Mov Cap-2 Maneuver	-	-	-	-	939	-
Stage 1	-	-	-	-	985	-
Stage 2	-	-	-	-	993	-

Approach	EB	WB	NB
HCM Control Delay, s	0	0.9	8.7
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	988	-	-	1574	-
HCM Lane V/C Ratio	0.024	-	-	0.002	-
HCM Control Delay (s)	8.7	-	-	7.3	0
HCM Lane LOS	A	-	-	A	A
HCM 95th %tile Q(veh)	0.1	-	-	0	-

Intersection	
Int Delay, s/veh	3.4

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	38	1	9	22	3	29
Future Vol, veh/h	38	1	9	22	3	29
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	43	1	10	25	3	33

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	44	0	89	44
Stage 1	-	-	-	-	44	-
Stage 2	-	-	-	-	45	-
Critical Hdwy	-	-	4.12	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	-	-	2.218	-	3.518	3.318
Pot Cap-1 Maneuver	-	-	1564	-	912	1026
Stage 1	-	-	-	-	978	-
Stage 2	-	-	-	-	977	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	1564	-	907	1026
Mov Cap-2 Maneuver	-	-	-	-	907	-
Stage 1	-	-	-	-	972	-
Stage 2	-	-	-	-	977	-

Approach	EB	WB	NB
HCM Control Delay, s	0	2.1	8.7
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	1014	-	-	1564	-
HCM Lane V/C Ratio	0.036	-	-	0.007	-
HCM Control Delay (s)	8.7	-	-	7.3	0
HCM Lane LOS	A	-	-	A	A
HCM 95th %tile Q(veh)	0.1	-	-	0	-

Intersection	
Int Delay, s/veh	0.7

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	66	0	7	31	0	3
Future Vol, veh/h	66	0	7	31	0	3
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	75	0	8	35	0	3

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	75	0	126	75
Stage 1	-	-	-	-	75	-
Stage 2	-	-	-	-	51	-
Critical Hdwy	-	-	4.12	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	-	-	2.218	-	3.518	3.318
Pot Cap-1 Maneuver	-	-	1524	-	869	986
Stage 1	-	-	-	-	948	-
Stage 2	-	-	-	-	971	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	1524	-	865	986
Mov Cap-2 Maneuver	-	-	-	-	865	-
Stage 1	-	-	-	-	943	-
Stage 2	-	-	-	-	971	-

Approach	EB	WB	NB
HCM Control Delay, s	0	1.4	8.7
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	986	-	-	1524	-
HCM Lane V/C Ratio	0.003	-	-	0.005	-
HCM Control Delay (s)	8.7	-	-	7.4	0
HCM Lane LOS	A	-	-	A	A
HCM 95th %tile Q(veh)	0	-	-	0	-

Intersection	
Int Delay, s/veh	2.6

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	15	1	54	1	1	1	30	95	1	1	178	7
Future Vol, veh/h	15	1	54	1	1	1	30	95	1	1	178	7
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	300	-	-	50	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	88	88	88	88	88	88	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	17	1	61	1	1	1	34	108	1	1	202	8

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	386	385	206	416	389	109	210	0	0	109	0	0
Stage 1	208	208	-	177	177	-	-	-	-	-	-	-
Stage 2	178	177	-	239	212	-	-	-	-	-	-	-
Critical Hdwy	7.12	6.52	6.22	7.12	6.52	6.22	4.12	-	-	4.12	-	-
Critical Hdwy Stg 1	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Follow-up Hdwy	3.518	4.018	3.318	3.518	4.018	3.318	2.218	-	-	2.218	-	-
Pot Cap-1 Maneuver	573	549	835	547	546	945	1361	-	-	1481	-	-
Stage 1	794	730	-	825	753	-	-	-	-	-	-	-
Stage 2	824	753	-	764	727	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	560	535	835	496	532	945	1361	-	-	1481	-	-
Mov Cap-2 Maneuver	560	535	-	496	532	-	-	-	-	-	-	-
Stage 1	774	729	-	804	734	-	-	-	-	-	-	-
Stage 2	801	734	-	706	726	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	10.4	11	1.8	0
HCM LOS	B	B		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	WBLn1	SBL	SBT	SBR
Capacity (veh/h)	1361	-	-	750	606	1481	-	-
HCM Lane V/C Ratio	0.025	-	-	0.106	0.006	0.001	-	-
HCM Control Delay (s)	7.7	-	-	10.4	11	7.4	-	-
HCM Lane LOS	A	-	-	B	B	A	-	-
HCM 95th %tile Q(veh)	0.1	-	-	0.4	0	0	-	-

Intersection	
Int Delay, s/veh	1

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Traffic Vol, veh/h	5	27	9	120	230	2
Future Vol, veh/h	5	27	9	120	230	2
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	-	200	-	-	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	6	31	10	136	261	2

Major/Minor	Minor2		Major1		Major2	
Conflicting Flow All	418	262	263	0	-	0
Stage 1	262	-	-	-	-	-
Stage 2	156	-	-	-	-	-
Critical Hdwy	6.42	6.22	4.12	-	-	-
Critical Hdwy Stg 1	5.42	-	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-	-
Follow-up Hdwy	3.518	3.318	2.218	-	-	-
Pot Cap-1 Maneuver	591	777	1301	-	-	-
Stage 1	782	-	-	-	-	-
Stage 2	872	-	-	-	-	-
Platoon blocked, %				-	-	-
Mov Cap-1 Maneuver	586	777	1301	-	-	-
Mov Cap-2 Maneuver	586	-	-	-	-	-
Stage 1	776	-	-	-	-	-
Stage 2	872	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s	10.1	0.5	0
HCM LOS	B		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	SBT	SBR
Capacity (veh/h)	1301	-	739	-	-
HCM Lane V/C Ratio	0.008	-	0.049	-	-
HCM Control Delay (s)	7.8	-	10.1	-	-
HCM Lane LOS	A	-	B	-	-
HCM 95th %tile Q(veh)	0	-	0.2	-	-

Intersection	
Int Delay, s/veh	0.7

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	17	0	123	13	9	248
Future Vol, veh/h	17	0	123	13	9	248
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	-	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	19	0	140	15	10	282

Major/Minor	Minor1		Major1		Major2	
Conflicting Flow All	450	148	0	0	155	0
Stage 1	148	-	-	-	-	-
Stage 2	302	-	-	-	-	-
Critical Hdwy	6.42	6.22	-	-	4.12	-
Critical Hdwy Stg 1	5.42	-	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-	-
Follow-up Hdwy	3.518	3.318	-	-	2.218	-
Pot Cap-1 Maneuver	567	899	-	-	1425	-
Stage 1	880	-	-	-	-	-
Stage 2	750	-	-	-	-	-
Platoon blocked, %			-	-		-
Mov Cap-1 Maneuver	562	899	-	-	1425	-
Mov Cap-2 Maneuver	562	-	-	-	-	-
Stage 1	873	-	-	-	-	-
Stage 2	750	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s	11.6	0	0.3
HCM LOS	B		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	SBL	SBT
Capacity (veh/h)	-	-	562	1425	-
HCM Lane V/C Ratio	-	-	0.034	0.007	-
HCM Control Delay (s)	-	-	11.6	7.5	0
HCM Lane LOS	-	-	B	A	A
HCM 95th %tile Q(veh)	-	-	0.1	0	-

Intersection	
Int Delay, s/veh	1.7

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	34	126	260	5	9	41
Future Vol, veh/h	34	126	260	5	9	41
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	200	-	-	200	0	-
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	39	143	295	6	10	47

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	301	0	-	0	516	295
Stage 1	-	-	-	-	295	-
Stage 2	-	-	-	-	221	-
Critical Hdwy	4.12	-	-	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	2.218	-	-	-	3.518	3.318
Pot Cap-1 Maneuver	1260	-	-	-	519	744
Stage 1	-	-	-	-	755	-
Stage 2	-	-	-	-	816	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1260	-	-	-	503	744
Mov Cap-2 Maneuver	-	-	-	-	503	-
Stage 1	-	-	-	-	732	-
Stage 2	-	-	-	-	816	-

Approach	EB	WB	SB
HCM Control Delay, s	1.7	0	10.7
HCM LOS			B

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1
Capacity (veh/h)	1260	-	-	-	685
HCM Lane V/C Ratio	0.031	-	-	-	0.083
HCM Control Delay (s)	7.9	-	-	-	10.7
HCM Lane LOS	A	-	-	-	B
HCM 95th %tile Q(veh)	0.1	-	-	-	0.3

Intersection	
Int Delay, s/veh	0.3

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations		↑	↑	↱		↱
Traffic Vol, veh/h	0	160	294	7	0	14
Future Vol, veh/h	0	160	294	7	0	14
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	200	-	0
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	0	182	334	8	0	16

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	-	0	-	0	-	334
Stage 1	-	-	-	-	-	-
Stage 2	-	-	-	-	-	-
Critical Hdwy	-	-	-	-	-	6.22
Critical Hdwy Stg 1	-	-	-	-	-	-
Critical Hdwy Stg 2	-	-	-	-	-	-
Follow-up Hdwy	-	-	-	-	-	3.318
Pot Cap-1 Maneuver	0	-	-	-	0	708
Stage 1	0	-	-	-	0	-
Stage 2	0	-	-	-	0	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	-	-	-	-	-	708
Mov Cap-2 Maneuver	-	-	-	-	-	-
Stage 1	-	-	-	-	-	-
Stage 2	-	-	-	-	-	-

Approach	EB	WB	SB
HCM Control Delay, s	0	0	10.2
HCM LOS			B

Minor Lane/Major Mvmt	EBT	WBT	WBR	SBLn1
Capacity (veh/h)	-	-	-	708
HCM Lane V/C Ratio	-	-	-	0.022
HCM Control Delay (s)	-	-	-	10.2
HCM Lane LOS	-	-	-	B
HCM 95th %tile Q(veh)	-	-	-	0.1

Intersection	
Int Delay, s/veh	4.7

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	88	140	302	6	20	183
Future Vol, veh/h	88	140	302	6	20	183
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	200	-	-	200	0	100
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	80	80	80	80	80	80
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	110	175	378	8	25	229

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	386	0	-	0	773	378
Stage 1	-	-	-	-	378	-
Stage 2	-	-	-	-	395	-
Critical Hdwy	4.12	-	-	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	2.218	-	-	-	3.518	3.318
Pot Cap-1 Maneuver	1172	-	-	-	367	669
Stage 1	-	-	-	-	693	-
Stage 2	-	-	-	-	681	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1172	-	-	-	333	669
Mov Cap-2 Maneuver	-	-	-	-	333	-
Stage 1	-	-	-	-	628	-
Stage 2	-	-	-	-	681	-

Approach	EB	WB	SB
HCM Control Delay, s	3.2	0	13.5
HCM LOS			B

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1	SBLn2
Capacity (veh/h)	1172	-	-	-	333	669
HCM Lane V/C Ratio	0.094	-	-	-	0.075	0.342
HCM Control Delay (s)	8.4	-	-	-	16.7	13.2
HCM Lane LOS	A	-	-	-	C	B
HCM 95th %tile Q(veh)	0.3	-	-	-	0.2	1.5

Intersection	
Int Delay, s/veh	5.4

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	200	213	430	55	15	160
Future Vol, veh/h	200	213	430	55	15	160
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	200	-	-	200	0	0
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	70	70	70	70	70	70
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	286	304	614	79	21	229

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	693	0	-	0	1490	614
Stage 1	-	-	-	-	614	-
Stage 2	-	-	-	-	876	-
Critical Hdwy	4.12	-	-	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	2.218	-	-	-	3.518	3.318
Pot Cap-1 Maneuver	902	-	-	-	136	492
Stage 1	-	-	-	-	540	-
Stage 2	-	-	-	-	407	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	902	-	-	-	93	492
Mov Cap-2 Maneuver	-	-	-	-	108	-
Stage 1	-	-	-	-	369	-
Stage 2	-	-	-	-	407	-

Approach	EB	WB	SB
HCM Control Delay, s	5.2	0	20.9
HCM LOS			C

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1	SBLn2
Capacity (veh/h)	902	-	-	-	108	492
HCM Lane V/C Ratio	0.317	-	-	-	0.198	0.465
HCM Control Delay (s)	10.8	-	-	-	46.4	18.5
HCM Lane LOS	B	-	-	-	E	C
HCM 95th %tile Q(veh)	1.4	-	-	-	0.7	2.4

Intersection	
Int Delay, s/veh	2.5

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	29	14	11	22	10	7
Future Vol, veh/h	29	14	11	22	10	7
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	33	16	13	25	11	8

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	49	0	92	41
Stage 1	-	-	-	-	41	-
Stage 2	-	-	-	-	51	-
Critical Hdwy	-	-	4.12	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	-	-	2.218	-	3.518	3.318
Pot Cap-1 Maneuver	-	-	1558	-	908	1030
Stage 1	-	-	-	-	981	-
Stage 2	-	-	-	-	971	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	1558	-	901	1030
Mov Cap-2 Maneuver	-	-	-	-	901	-
Stage 1	-	-	-	-	973	-
Stage 2	-	-	-	-	971	-

Approach	EB	WB	NB
HCM Control Delay, s	0	2.4	8.9
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	950	-	-	1558	-
HCM Lane V/C Ratio	0.02	-	-	0.008	-
HCM Control Delay (s)	8.9	-	-	7.3	0
HCM Lane LOS	A	-	-	A	A
HCM 95th %tile Q(veh)	0.1	-	-	0	-

Intersection	
Int Delay, s/veh	3.4

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	33	3	30	32	2	18
Future Vol, veh/h	33	3	30	32	2	18
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	38	3	34	36	2	20

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	41	0	144	40
Stage 1	-	-	-	-	40	-
Stage 2	-	-	-	-	104	-
Critical Hdwy	-	-	4.12	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	-	-	2.218	-	3.518	3.318
Pot Cap-1 Maneuver	-	-	1568	-	849	1031
Stage 1	-	-	-	-	982	-
Stage 2	-	-	-	-	920	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	1568	-	830	1031
Mov Cap-2 Maneuver	-	-	-	-	830	-
Stage 1	-	-	-	-	960	-
Stage 2	-	-	-	-	920	-

Approach	EB	WB	NB
HCM Control Delay, s	0	3.6	8.7
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	1007	-	-	1568	-
HCM Lane V/C Ratio	0.023	-	-	0.022	-
HCM Control Delay (s)	8.7	-	-	7.3	0
HCM Lane LOS	A	-	-	A	A
HCM 95th %tile Q(veh)	0.1	-	-	0.1	-

Intersection	
Int Delay, s/veh	0.7

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	50	0	3	62	0	7
Future Vol, veh/h	50	0	3	62	0	7
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	57	0	3	70	0	8

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	57	0	133	57
Stage 1	-	-	-	-	57	-
Stage 2	-	-	-	-	76	-
Critical Hdwy	-	-	4.12	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	-	-	2.218	-	3.518	3.318
Pot Cap-1 Maneuver	-	-	1547	-	861	1009
Stage 1	-	-	-	-	966	-
Stage 2	-	-	-	-	947	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	1547	-	859	1009
Mov Cap-2 Maneuver	-	-	-	-	859	-
Stage 1	-	-	-	-	964	-
Stage 2	-	-	-	-	947	-

Approach	EB	WB	NB
HCM Control Delay, s	0	0.3	8.6
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	1009	-	-	1547	-
HCM Lane V/C Ratio	0.008	-	-	0.002	-
HCM Control Delay (s)	8.6	-	-	7.3	0
HCM Lane LOS	A	-	-	A	A
HCM 95th %tile Q(veh)	0	-	-	0	-

Intersection	
Int Delay, s/veh	2.1

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕		↰	↱		↰	↱	
Traffic Vol, veh/h	8	1	49	1	1	1	49	202	1	1	158	16
Future Vol, veh/h	8	1	49	1	1	1	49	202	1	1	158	16
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	300	-	-	50	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	88	88	88	88	88	88	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	9	1	56	1	1	1	56	230	1	1	180	18

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	535	534	189	563	543	231	198	0	0	231	0	0
Stage 1	191	191	-	343	343	-	-	-	-	-	-	-
Stage 2	344	343	-	220	200	-	-	-	-	-	-	-
Critical Hdwy	7.12	6.52	6.22	7.12	6.52	6.22	4.12	-	-	4.12	-	-
Critical Hdwy Stg 1	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Follow-up Hdwy	3.518	4.018	3.318	3.518	4.018	3.318	2.218	-	-	2.218	-	-
Pot Cap-1 Maneuver	456	452	853	437	447	808	1375	-	-	1337	-	-
Stage 1	811	742	-	672	637	-	-	-	-	-	-	-
Stage 2	671	637	-	782	736	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	440	433	853	395	428	808	1375	-	-	1337	-	-
Mov Cap-2 Maneuver	440	433	-	395	428	-	-	-	-	-	-	-
Stage 1	778	741	-	644	611	-	-	-	-	-	-	-
Stage 2	642	611	-	729	735	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	10.3	12.4	1.5	0
HCM LOS	B	B		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	WBLn1	SBL	SBT	SBR
Capacity (veh/h)	1375	-	-	744	491	1337	-	-
HCM Lane V/C Ratio	0.04	-	-	0.089	0.007	0.001	-	-
HCM Control Delay (s)	7.7	-	-	10.3	12.4	7.7	-	-
HCM Lane LOS	A	-	-	B	B	A	-	-
HCM 95th %tile Q(veh)	0.1	-	-	0.3	0	0	-	-

Intersection	
Int Delay, s/veh	0.9

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Traffic Vol, veh/h	3	18	30	248	202	5
Future Vol, veh/h	3	18	30	248	202	5
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	-	200	-	-	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	3	20	34	282	230	6

Major/Minor	Minor2		Major1		Major2	
Conflicting Flow All	583	233	236	0	-	0
Stage 1	233	-	-	-	-	-
Stage 2	350	-	-	-	-	-
Critical Hdwy	6.42	6.22	4.12	-	-	-
Critical Hdwy Stg 1	5.42	-	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-	-
Follow-up Hdwy	3.518	3.318	2.218	-	-	-
Pot Cap-1 Maneuver	475	806	1331	-	-	-
Stage 1	806	-	-	-	-	-
Stage 2	713	-	-	-	-	-
Platoon blocked, %				-	-	-
Mov Cap-1 Maneuver	463	806	1331	-	-	-
Mov Cap-2 Maneuver	463	-	-	-	-	-
Stage 1	785	-	-	-	-	-
Stage 2	713	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s	10.1	0.8	0
HCM LOS	B		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	SBT	SBR
Capacity (veh/h)	1331	-	729	-	-
HCM Lane V/C Ratio	0.026	-	0.033	-	-
HCM Control Delay (s)	7.8	-	10.1	-	-
HCM Lane LOS	A	-	B	-	-
HCM 95th %tile Q(veh)	0.1	-	0.1	-	-

Intersection	
Int Delay, s/veh	0.2

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	0	9	268	0	0	220
Future Vol, veh/h	0	9	268	0	0	220
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	-	0	-	-	-	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	0	10	305	0	0	250

Major/Minor	Minor1		Major1		Major2	
Conflicting Flow All	-	305	0	-	-	-
Stage 1	-	-	-	-	-	-
Stage 2	-	-	-	-	-	-
Critical Hdwy	-	6.22	-	-	-	-
Critical Hdwy Stg 1	-	-	-	-	-	-
Critical Hdwy Stg 2	-	-	-	-	-	-
Follow-up Hdwy	-	3.318	-	-	-	-
Pot Cap-1 Maneuver	0	735	-	0	0	-
Stage 1	0	-	-	0	0	-
Stage 2	0	-	-	0	0	-
Platoon blocked, %			-			-
Mov Cap-1 Maneuver	-	735	-	-	-	-
Mov Cap-2 Maneuver	-	-	-	-	-	-
Stage 1	-	-	-	-	-	-
Stage 2	-	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s	10	0	0
HCM LOS	B		

Minor Lane/Major Mvmt	NBT	WBLn1	SBT
Capacity (veh/h)	-	735	-
HCM Lane V/C Ratio	-	0.014	-
HCM Control Delay (s)	-	10	-
HCM Lane LOS	-	B	-
HCM 95th %tile Q(veh)	-	0	-

Intersection	
Int Delay, s/veh	0.7

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	25	0	268	29	8	212
Future Vol, veh/h	25	0	268	29	8	212
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	-	-	-	-	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	28	0	305	33	9	241

Major/Minor	Minor1		Major1		Major2	
Conflicting Flow All	581	322	0	0	338	0
Stage 1	322	-	-	-	-	-
Stage 2	259	-	-	-	-	-
Critical Hdwy	6.42	6.22	-	-	4.12	-
Critical Hdwy Stg 1	5.42	-	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-	-
Follow-up Hdwy	3.518	3.318	-	-	2.218	-
Pot Cap-1 Maneuver	476	719	-	-	1221	-
Stage 1	735	-	-	-	-	-
Stage 2	784	-	-	-	-	-
Platoon blocked, %			-	-		-
Mov Cap-1 Maneuver	472	719	-	-	1221	-
Mov Cap-2 Maneuver	472	-	-	-	-	-
Stage 1	728	-	-	-	-	-
Stage 2	784	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s	13.1	0	0.3
HCM LOS	B		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	SBL	SBT
Capacity (veh/h)	-	-	472	1221	-
HCM Lane V/C Ratio	-	-	0.06	0.007	-
HCM Control Delay (s)	-	-	13.1	8	0
HCM Lane LOS	-	-	B	A	A
HCM 95th %tile Q(veh)	-	-	0.2	0	-

Intersection	
Int Delay, s/veh	3

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	110	267	213	24	30	61
Future Vol, veh/h	110	267	213	24	30	61
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	200	-	-	200	0	-
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	125	303	242	27	34	69

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	269	0	-	0	795	242
Stage 1	-	-	-	-	242	-
Stage 2	-	-	-	-	553	-
Critical Hdwy	4.12	-	-	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	2.218	-	-	-	3.518	3.318
Pot Cap-1 Maneuver	1295	-	-	-	357	797
Stage 1	-	-	-	-	798	-
Stage 2	-	-	-	-	576	-
Platoon blocked, %			-	-	-	
Mov Cap-1 Maneuver	1295	-	-	-	322	797
Mov Cap-2 Maneuver	-	-	-	-	322	-
Stage 1	-	-	-	-	721	-
Stage 2	-	-	-	-	576	-

Approach	EB	WB	SB
HCM Control Delay, s	2.4	0	13.3
HCM LOS			B

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1
Capacity (veh/h)	1295	-	-	-	536
HCM Lane V/C Ratio	0.097	-	-	-	0.193
HCM Control Delay (s)	8.1	-	-	-	13.3
HCM Lane LOS	A	-	-	-	B
HCM 95th %tile Q(veh)	0.3	-	-	-	0.7

Intersection	
Int Delay, s/veh	1

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations		↑	↑	↱		↱
Traffic Vol, veh/h	0	377	254	20	0	71
Future Vol, veh/h	0	377	254	20	0	71
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	200	-	0
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	0	428	289	23	0	81

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	-	0	-	0	-	289
Stage 1	-	-	-	-	-	-
Stage 2	-	-	-	-	-	-
Critical Hdwy	-	-	-	-	-	6.22
Critical Hdwy Stg 1	-	-	-	-	-	-
Critical Hdwy Stg 2	-	-	-	-	-	-
Follow-up Hdwy	-	-	-	-	-	3.318
Pot Cap-1 Maneuver	0	-	-	-	0	750
Stage 1	0	-	-	-	0	-
Stage 2	0	-	-	-	0	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	-	-	-	-	-	750
Mov Cap-2 Maneuver	-	-	-	-	-	-
Stage 1	-	-	-	-	-	-
Stage 2	-	-	-	-	-	-

Approach	EB	WB	SB
HCM Control Delay, s	0	0	10.4
HCM LOS			B

Minor Lane/Major Mvmt	EBT	WBT	WBR	SBLn1
Capacity (veh/h)	-	-	-	750
HCM Lane V/C Ratio	-	-	-	0.108
HCM Control Delay (s)	-	-	-	10.4
HCM Lane LOS	-	-	-	B
HCM 95th %tile Q(veh)	-	-	-	0.4

Intersection	
Int Delay, s/veh	5.4

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	257	337	317	8	40	163
Future Vol, veh/h	257	337	317	8	40	163
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	200	-	-	200	0	100
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	90	90	90	90	90	90
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	286	374	352	9	44	181

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	361	0	-	0	1298	352
Stage 1	-	-	-	-	352	-
Stage 2	-	-	-	-	946	-
Critical Hdwy	4.12	-	-	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	2.218	-	-	-	3.518	3.318
Pot Cap-1 Maneuver	1198	-	-	-	178	692
Stage 1	-	-	-	-	712	-
Stage 2	-	-	-	-	377	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1198	-	-	-	135	692
Mov Cap-2 Maneuver	-	-	-	-	135	-
Stage 1	-	-	-	-	542	-
Stage 2	-	-	-	-	377	-

Approach	EB	WB	SB
HCM Control Delay, s	3.9	0	18.3
HCM LOS			C

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1	SBLn2
Capacity (veh/h)	1198	-	-	-	135	692
HCM Lane V/C Ratio	0.238	-	-	-	0.329	0.262
HCM Control Delay (s)	8.9	-	-	-	44.2	12
HCM Lane LOS	A	-	-	-	E	B
HCM 95th %tile Q(veh)	0.9	-	-	-	1.3	1

Intersection	
Int Delay, s/veh	1.3

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	15	1	25	1	1	1	15	135	1	1	260	10
Future Vol, veh/h	15	1	25	1	1	1	15	135	1	1	260	10
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	300	-	-	50	-	300
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	88	88	88	88	88	88	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	17	1	28	1	1	1	17	153	1	1	295	11

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	408	485	295	505	496	77	306	0	0	154	0	0
Stage 1	297	297	-	188	188	-	-	-	-	-	-	-
Stage 2	111	188	-	317	308	-	-	-	-	-	-	-
Critical Hdwy	7.33	6.53	6.23	7.33	6.53	6.93	4.13	-	-	4.13	-	-
Critical Hdwy Stg 1	6.13	5.53	-	6.53	5.53	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.53	5.53	-	6.13	5.53	-	-	-	-	-	-	-
Follow-up Hdwy	3.519	4.019	3.319	3.519	4.019	3.319	2.219	-	-	2.219	-	-
Pot Cap-1 Maneuver	541	481	744	464	474	969	1253	-	-	1425	-	-
Stage 1	711	667	-	796	744	-	-	-	-	-	-	-
Stage 2	883	744	-	693	660	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	533	474	744	441	467	969	1253	-	-	1425	-	-
Mov Cap-2 Maneuver	533	474	-	441	467	-	-	-	-	-	-	-
Stage 1	701	666	-	785	734	-	-	-	-	-	-	-
Stage 2	869	734	-	665	659	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	11	11.6	0.8	0
HCM LOS	B	B		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	WBLn1	SBL	SBT	SBR
Capacity (veh/h)	1253	-	-	642	551	1425	-	-
HCM Lane V/C Ratio	0.014	-	-	0.073	0.006	0.001	-	-
HCM Control Delay (s)	7.9	-	-	11	11.6	7.5	-	-
HCM Lane LOS	A	-	-	B	B	A	-	-
HCM 95th %tile Q(veh)	0	-	-	0.2	0	0	-	-

Intersection	
Int Delay, s/veh	4.2

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	45	10	80	15	10	10	80	95	15	10	205	70
Future Vol, veh/h	45	10	80	15	10	10	80	95	15	10	205	70
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	150	-	-	150	-	-	300	-	300	300	-	300
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	92	92	92	92	92	92	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	49	11	87	16	11	11	87	103	16	11	223	76

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	476	538	112	416	598	52	299	0	0	119	0	0
Stage 1	245	245	-	277	277	-	-	-	-	-	-	-
Stage 2	231	293	-	139	321	-	-	-	-	-	-	-
Critical Hdwy	7.54	6.54	6.94	7.54	6.54	6.94	4.14	-	-	4.14	-	-
Critical Hdwy Stg 1	6.54	5.54	-	6.54	5.54	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.54	5.54	-	6.54	5.54	-	-	-	-	-	-	-
Follow-up Hdwy	3.52	4.02	3.32	3.52	4.02	3.32	2.22	-	-	2.22	-	-
Pot Cap-1 Maneuver	472	448	920	521	414	1005	1259	-	-	1467	-	-
Stage 1	737	702	-	706	680	-	-	-	-	-	-	-
Stage 2	751	669	-	850	650	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	430	414	920	436	383	1005	1259	-	-	1467	-	-
Mov Cap-2 Maneuver	430	414	-	436	383	-	-	-	-	-	-	-
Stage 1	686	697	-	657	633	-	-	-	-	-	-	-
Stage 2	680	623	-	752	645	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	11.5	12.6	3.4	0.3
HCM LOS	B	B		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	EBLn2	WBLn1	WBLn2	SBL	SBT	SBR
Capacity (veh/h)	1259	-	-	430	810	436	555	1467	-	-
HCM Lane V/C Ratio	0.069	-	-	0.114	0.121	0.037	0.039	0.007	-	-
HCM Control Delay (s)	8.1	-	-	14.4	10.1	13.6	11.8	7.5	-	-
HCM Lane LOS	A	-	-	B	B	B	B	A	-	-
HCM 95th %tile Q(veh)	0.2	-	-	0.4	0.4	0.1	0.1	0	-	-

Intersection	
Int Delay, s/veh	1.2

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	120	15	15	145	15	15
Future Vol, veh/h	120	15	15	145	15	15
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	200	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	130	16	16	158	16	16

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	146	0	249	73
Stage 1	-	-	-	-	138	-
Stage 2	-	-	-	-	111	-
Critical Hdwy	-	-	4.14	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	-	-	2.22	-	3.52	3.32
Pot Cap-1 Maneuver	-	-	1434	-	718	974
Stage 1	-	-	-	-	874	-
Stage 2	-	-	-	-	901	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	1434	-	710	974
Mov Cap-2 Maneuver	-	-	-	-	710	-
Stage 1	-	-	-	-	864	-
Stage 2	-	-	-	-	901	-

Approach	EB	WB	NB
HCM Control Delay, s	0	0.7	9.6
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	821	-	-	1434	-
HCM Lane V/C Ratio	0.04	-	-	0.011	-
HCM Control Delay (s)	9.6	-	-	7.5	-
HCM Lane LOS	A	-	-	A	-
HCM 95th %tile Q(veh)	0.1	-	-	0	-

Intersection	
Int Delay, s/veh	1.3

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	15	115	150	10	20	10
Future Vol, veh/h	15	115	150	10	20	10
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	200	-	-	-	0	-
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	80	80	80	80	80	80
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	19	144	188	13	25	13

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	201	0	-	0	305	101
Stage 1	-	-	-	-	195	-
Stage 2	-	-	-	-	110	-
Critical Hdwy	4.14	-	-	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	2.22	-	-	-	3.52	3.32
Pot Cap-1 Maneuver	1368	-	-	-	663	935
Stage 1	-	-	-	-	819	-
Stage 2	-	-	-	-	902	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1368	-	-	-	654	935
Mov Cap-2 Maneuver	-	-	-	-	654	-
Stage 1	-	-	-	-	808	-
Stage 2	-	-	-	-	902	-

Approach	EB	WB	SB
HCM Control Delay, s	0.9	0	10.2
HCM LOS			B

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1
Capacity (veh/h)	1368	-	-	-	727
HCM Lane V/C Ratio	0.014	-	-	-	0.052
HCM Control Delay (s)	7.7	-	-	-	10.2
HCM Lane LOS	A	-	-	-	B
HCM 95th %tile Q(veh)	0	-	-	-	0.2

Intersection	
Int Delay, s/veh	7.6

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	175	60	60	100	70	120
Future Vol, veh/h	175	60	60	100	70	120
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	200	-	-	200	0	0
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	70	70	70	70	70	70
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	250	86	86	143	100	171

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	229	0	-	0	629	43
Stage 1	-	-	-	-	86	-
Stage 2	-	-	-	-	543	-
Critical Hdwy	4.14	-	-	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	2.22	-	-	-	3.52	3.32
Pot Cap-1 Maneuver	1336	-	-	-	414	1018
Stage 1	-	-	-	-	927	-
Stage 2	-	-	-	-	546	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1336	-	-	-	337	1018
Mov Cap-2 Maneuver	-	-	-	-	266	-
Stage 1	-	-	-	-	754	-
Stage 2	-	-	-	-	546	-

Approach	EB	WB	SB
HCM Control Delay, s	6.2	0	15.6
HCM LOS			C

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1	SBLn2
Capacity (veh/h)	1336	-	-	-	266	1018
HCM Lane V/C Ratio	0.187	-	-	-	0.376	0.168
HCM Control Delay (s)	8.3	-	-	-	26.5	9.3
HCM Lane LOS	A	-	-	-	D	A
HCM 95th %tile Q(veh)	0.7	-	-	-	1.7	0.6

Intersection	
Int Delay, s/veh	0.9

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	10	1	25	1	1	1	10	285	1	1	220	15
Future Vol, veh/h	10	1	25	1	1	1	10	285	1	1	220	15
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	300	-	-	50	-	300
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	88	88	88	88	88	88	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	11	1	28	1	1	1	11	324	1	1	250	17

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	437	599	250	622	616	163	267	0	0	325	0	0
Stage 1	252	252	-	347	347	-	-	-	-	-	-	-
Stage 2	185	347	-	275	269	-	-	-	-	-	-	-
Critical Hdwy	7.33	6.53	6.23	7.33	6.53	6.93	4.13	-	-	4.13	-	-
Critical Hdwy Stg 1	6.13	5.53	-	6.53	5.53	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.53	5.53	-	6.13	5.53	-	-	-	-	-	-	-
Follow-up Hdwy	3.519	4.019	3.319	3.519	4.019	3.319	2.219	-	-	2.219	-	-
Pot Cap-1 Maneuver	516	414	788	385	405	854	1295	-	-	1233	-	-
Stage 1	751	698	-	643	634	-	-	-	-	-	-	-
Stage 2	800	634	-	730	686	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	510	410	788	368	401	854	1295	-	-	1233	-	-
Mov Cap-2 Maneuver	510	410	-	368	401	-	-	-	-	-	-	-
Stage 1	745	697	-	638	629	-	-	-	-	-	-	-
Stage 2	791	629	-	702	685	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	10.7	12.7	0.3	0
HCM LOS	B	B		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	WBLn1	SBL	SBT	SBR
Capacity (veh/h)	1295	-	-	669	470	1233	-	-
HCM Lane V/C Ratio	0.009	-	-	0.061	0.007	0.001	-	-
HCM Control Delay (s)	7.8	-	-	10.7	12.7	7.9	-	-
HCM Lane LOS	A	-	-	B	B	A	-	-
HCM 95th %tile Q(veh)	0	-	-	0.2	0	0	-	-

Intersection	
Int Delay, s/veh	3.8

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	75	10	60	15	10	10	50	210	15	10	175	60
Future Vol, veh/h	75	10	60	15	10	10	50	210	15	10	175	60
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	150	-	-	150	-	-	300	-	300	300	-	300
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	92	92	92	92	92	92	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	82	11	65	16	11	11	54	228	16	11	190	65

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	440	564	95	459	613	114	255	0	0	244	0	0
Stage 1	212	212	-	336	336	-	-	-	-	-	-	-
Stage 2	228	352	-	123	277	-	-	-	-	-	-	-
Critical Hdwy	7.54	6.54	6.94	7.54	6.54	6.94	4.14	-	-	4.14	-	-
Critical Hdwy Stg 1	6.54	5.54	-	6.54	5.54	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.54	5.54	-	6.54	5.54	-	-	-	-	-	-	-
Follow-up Hdwy	3.52	4.02	3.32	3.52	4.02	3.32	2.22	-	-	2.22	-	-
Pot Cap-1 Maneuver	501	433	943	485	406	917	1307	-	-	1319	-	-
Stage 1	770	726	-	652	640	-	-	-	-	-	-	-
Stage 2	754	630	-	868	680	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	466	412	943	426	386	917	1307	-	-	1319	-	-
Mov Cap-2 Maneuver	466	412	-	426	386	-	-	-	-	-	-	-
Stage 1	738	720	-	625	614	-	-	-	-	-	-	-
Stage 2	702	604	-	789	675	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	12.3	12.7	1.4	0.3
HCM LOS	B	B		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	EBLn2	WBLn1	WBLn2	SBL	SBT	SBR
Capacity (veh/h)	1307	-	-	466	796	426	543	1319	-	-
HCM Lane V/C Ratio	0.042	-	-	0.175	0.096	0.038	0.04	0.008	-	-
HCM Control Delay (s)	7.9	-	-	14.4	10	13.8	11.9	7.8	-	-
HCM Lane LOS	A	-	-	B	B	B	B	A	-	-
HCM 95th %tile Q(veh)	0.1	-	-	0.6	0.3	0.1	0.1	0	-	-

Intersection	
Int Delay, s/veh	1.3

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	130	15	15	105	15	15
Future Vol, veh/h	130	15	15	105	15	15
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	200	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	141	16	16	114	16	16

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	157	0	238	79
Stage 1	-	-	-	-	149	-
Stage 2	-	-	-	-	89	-
Critical Hdwy	-	-	4.14	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	-	-	2.22	-	3.52	3.32
Pot Cap-1 Maneuver	-	-	1420	-	729	965
Stage 1	-	-	-	-	863	-
Stage 2	-	-	-	-	924	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	1420	-	721	965
Mov Cap-2 Maneuver	-	-	-	-	721	-
Stage 1	-	-	-	-	854	-
Stage 2	-	-	-	-	924	-

Approach	EB	WB	NB
HCM Control Delay, s	0	0.9	9.5
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	825	-	-	1420	-
HCM Lane V/C Ratio	0.04	-	-	0.011	-
HCM Control Delay (s)	9.5	-	-	7.6	-
HCM Lane LOS	A	-	-	A	-
HCM 95th %tile Q(veh)	0.1	-	-	0	-

Intersection	
Int Delay, s/veh	1.9

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	10	115	110	10	30	20
Future Vol, veh/h	10	115	110	10	30	20
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	200	-	-	-	0	-
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	85	85	85	85	85	85
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	12	135	129	12	35	24

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	141	0	-	0	227	71
Stage 1	-	-	-	-	135	-
Stage 2	-	-	-	-	92	-
Critical Hdwy	4.14	-	-	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	2.22	-	-	-	3.52	3.32
Pot Cap-1 Maneuver	1440	-	-	-	741	977
Stage 1	-	-	-	-	877	-
Stage 2	-	-	-	-	921	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1440	-	-	-	735	977
Mov Cap-2 Maneuver	-	-	-	-	735	-
Stage 1	-	-	-	-	870	-
Stage 2	-	-	-	-	921	-

Approach	EB	WB	SB
HCM Control Delay, s	0.6	0	9.8
HCM LOS			A

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1
Capacity (veh/h)	1440	-	-	-	816
HCM Lane V/C Ratio	0.008	-	-	-	0.072
HCM Control Delay (s)	7.5	-	-	-	9.8
HCM Lane LOS	A	-	-	-	A
HCM 95th %tile Q(veh)	0	-	-	-	0.2

Intersection	
Int Delay, s/veh	5.5

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	95	65	80	50	60	115
Future Vol, veh/h	95	65	80	50	60	115
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	200	-	-	200	0	0
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	75	75	75	75	75	75
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	127	87	107	67	80	153

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	174	0	-	0	405	54
Stage 1	-	-	-	-	107	-
Stage 2	-	-	-	-	298	-
Critical Hdwy	4.14	-	-	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	2.22	-	-	-	3.52	3.32
Pot Cap-1 Maneuver	1400	-	-	-	574	1002
Stage 1	-	-	-	-	906	-
Stage 2	-	-	-	-	727	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1400	-	-	-	522	1002
Mov Cap-2 Maneuver	-	-	-	-	533	-
Stage 1	-	-	-	-	824	-
Stage 2	-	-	-	-	727	-

Approach	EB	WB	SB
HCM Control Delay, s	4.6	0	10.5
HCM LOS			B

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1	SBLn2
Capacity (veh/h)	1400	-	-	-	533	1002
HCM Lane V/C Ratio	0.09	-	-	-	0.15	0.153
HCM Control Delay (s)	7.8	-	-	-	12.9	9.2
HCM Lane LOS	A	-	-	-	B	A
HCM 95th %tile Q(veh)	0.3	-	-	-	0.5	0.5

Intersection	
Int Delay, s/veh	3.3

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	43	4	10	32	10	30
Future Vol, veh/h	43	4	10	32	10	30
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	49	5	11	36	11	34

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	54	0	110	52
Stage 1	-	-	-	-	52	-
Stage 2	-	-	-	-	58	-
Critical Hdwy	-	-	4.12	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	-	-	2.218	-	3.518	3.318
Pot Cap-1 Maneuver	-	-	1551	-	887	1016
Stage 1	-	-	-	-	970	-
Stage 2	-	-	-	-	965	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	1551	-	881	1016
Mov Cap-2 Maneuver	-	-	-	-	881	-
Stage 1	-	-	-	-	963	-
Stage 2	-	-	-	-	965	-

Approach	EB	WB	NB
HCM Control Delay, s	0	1.7	8.9
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	979	-	-	1551	-
HCM Lane V/C Ratio	0.046	-	-	0.007	-
HCM Control Delay (s)	8.9	-	-	7.3	0
HCM Lane LOS	A	-	-	A	A
HCM 95th %tile Q(veh)	0.1	-	-	0	-

Intersection	
Int Delay, s/veh	2.1

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	73	1	8	38	3	26
Future Vol, veh/h	73	1	8	38	3	26
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	83	1	9	43	3	30

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	84	0	145	84
Stage 1	-	-	-	-	84	-
Stage 2	-	-	-	-	61	-
Critical Hdwy	-	-	4.12	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	-	-	2.218	-	3.518	3.318
Pot Cap-1 Maneuver	-	-	1513	-	847	975
Stage 1	-	-	-	-	939	-
Stage 2	-	-	-	-	962	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	1513	-	842	975
Mov Cap-2 Maneuver	-	-	-	-	842	-
Stage 1	-	-	-	-	933	-
Stage 2	-	-	-	-	962	-

Approach	EB	WB	NB
HCM Control Delay, s	0	1.3	8.9
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	959	-	-	1513	-
HCM Lane V/C Ratio	0.034	-	-	0.006	-
HCM Control Delay (s)	8.9	-	-	7.4	0
HCM Lane LOS	A	-	-	A	A
HCM 95th %tile Q(veh)	0.1	-	-	0	-

Intersection	
Int Delay, s/veh	0.5

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	98	1	6	46	0	3
Future Vol, veh/h	98	1	6	46	0	3
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	111	1	7	52	0	3

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	112	0	178	112
Stage 1	-	-	-	-	112	-
Stage 2	-	-	-	-	66	-
Critical Hdwy	-	-	4.12	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	-	-	2.218	-	3.518	3.318
Pot Cap-1 Maneuver	-	-	1478	-	812	941
Stage 1	-	-	-	-	913	-
Stage 2	-	-	-	-	957	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	1478	-	808	941
Mov Cap-2 Maneuver	-	-	-	-	808	-
Stage 1	-	-	-	-	908	-
Stage 2	-	-	-	-	957	-

Approach	EB	WB	NB
HCM Control Delay, s	0	0.9	8.8
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	941	-	-	1478	-
HCM Lane V/C Ratio	0.004	-	-	0.005	-
HCM Control Delay (s)	8.8	-	-	7.4	0
HCM Lane LOS	A	-	-	A	A
HCM 95th %tile Q(veh)	0	-	-	0	-

Intersection	
Int Delay, s/veh	2.7

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	20	1	80	1	1	1	40	140	1	1	263	12
Future Vol, veh/h	20	1	80	1	1	1	40	140	1	1	263	12
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	300	-	-	50	-	0
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	88	88	88	88	88	88	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	23	1	91	1	1	1	45	159	1	1	299	14

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	471	551	299	604	565	80	313	0	0	160	0	0
Stage 1	301	301	-	250	250	-	-	-	-	-	-	-
Stage 2	170	250	-	354	315	-	-	-	-	-	-	-
Critical Hdwy	7.33	6.53	6.23	7.33	6.53	6.93	4.13	-	-	4.13	-	-
Critical Hdwy Stg 1	6.13	5.53	-	6.53	5.53	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.53	5.53	-	6.13	5.53	-	-	-	-	-	-	-
Follow-up Hdwy	3.519	4.019	3.319	3.519	4.019	3.319	2.219	-	-	2.219	-	-
Pot Cap-1 Maneuver	489	441	740	396	433	965	1246	-	-	1418	-	-
Stage 1	707	664	-	733	699	-	-	-	-	-	-	-
Stage 2	816	699	-	662	655	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	474	425	740	337	417	965	1246	-	-	1418	-	-
Mov Cap-2 Maneuver	474	425	-	337	417	-	-	-	-	-	-	-
Stage 1	682	663	-	707	674	-	-	-	-	-	-	-
Stage 2	784	674	-	579	654	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	11.6	12.7	1.8	0
HCM LOS	B	B		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	WBLn1	SBL	SBT	SBR
Capacity (veh/h)	1246	-	-	662	469	1418	-	-
HCM Lane V/C Ratio	0.036	-	-	0.173	0.007	0.001	-	-
HCM Control Delay (s)	8	-	-	11.6	12.7	7.5	-	-
HCM Lane LOS	A	-	-	B	B	A	-	-
HCM 95th %tile Q(veh)	0.1	-	-	0.6	0	0	-	-

Intersection	
Int Delay, s/veh	1.6

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Traffic Vol, veh/h	5	70	24	176	341	2
Future Vol, veh/h	5	70	24	176	341	2
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	-	300	-	-	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	6	80	27	200	388	2

Major/Minor	Minor2		Major1		Major2	
Conflicting Flow All	543	195	390	0	-	0
Stage 1	389	-	-	-	-	-
Stage 2	154	-	-	-	-	-
Critical Hdwy	6.84	6.94	4.14	-	-	-
Critical Hdwy Stg 1	5.84	-	-	-	-	-
Critical Hdwy Stg 2	5.84	-	-	-	-	-
Follow-up Hdwy	3.52	3.32	2.22	-	-	-
Pot Cap-1 Maneuver	470	814	1165	-	-	-
Stage 1	654	-	-	-	-	-
Stage 2	858	-	-	-	-	-
Platoon blocked, %				-	-	-
Mov Cap-1 Maneuver	459	814	1165	-	-	-
Mov Cap-2 Maneuver	459	-	-	-	-	-
Stage 1	639	-	-	-	-	-
Stage 2	858	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s	10.2	1	0
HCM LOS	B		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	SBT	SBR
Capacity (veh/h)	1165	-	774	-	-
HCM Lane V/C Ratio	0.023	-	0.11	-	-
HCM Control Delay (s)	8.2	-	10.2	-	-
HCM Lane LOS	A	-	B	-	-
HCM 95th %tile Q(veh)	0.1	-	0.4	-	-

Intersection	
Int Delay, s/veh	5.4

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	62	13	155	15	12	11	125	126	15	14	298	100
Future Vol, veh/h	62	13	155	15	12	11	125	126	15	14	298	100
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	150	-	-	150	-	-	300	-	300	300	-	300
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	92	92	92	92	92	92	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	67	14	168	16	13	12	136	137	16	15	324	109

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	701	779	162	608	872	69	433	0	0	153	0	0
Stage 1	354	354	-	409	409	-	-	-	-	-	-	-
Stage 2	347	425	-	199	463	-	-	-	-	-	-	-
Critical Hdwy	7.54	6.54	6.94	7.54	6.54	6.94	4.14	-	-	4.14	-	-
Critical Hdwy Stg 1	6.54	5.54	-	6.54	5.54	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.54	5.54	-	6.54	5.54	-	-	-	-	-	-	-
Follow-up Hdwy	3.52	4.02	3.32	3.52	4.02	3.32	2.22	-	-	2.22	-	-
Pot Cap-1 Maneuver	325	326	854	380	287	980	1123	-	-	1425	-	-
Stage 1	636	629	-	590	594	-	-	-	-	-	-	-
Stage 2	642	585	-	784	562	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	278	283	854	264	249	980	1123	-	-	1425	-	-
Mov Cap-2 Maneuver	278	283	-	264	249	-	-	-	-	-	-	-
Stage 1	559	622	-	519	522	-	-	-	-	-	-	-
Stage 2	543	514	-	609	556	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	14.3	16.7	4.1	0.3
HCM LOS	B	C		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	EBLn2	WBLn1	WBLn2	SBL	SBT	SBR
Capacity (veh/h)	1123	-	-	278	739	264	387	1425	-	-
HCM Lane V/C Ratio	0.121	-	-	0.242	0.247	0.062	0.065	0.011	-	-
HCM Control Delay (s)	8.6	-	-	22	11.5	19.5	14.9	7.6	-	-
HCM Lane LOS	A	-	-	C	B	C	B	A	-	-
HCM 95th %tile Q(veh)	0.4	-	-	0.9	1	0.2	0.2	0	-	-

Intersection	
Int Delay, s/veh	2.5

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	9	164	15	15	195	26	15	0	15	51	0	16
Future Vol, veh/h	9	164	15	15	195	26	15	0	15	51	0	16
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Free	Free	Stop	Stop	Stop	Stop	Stop	Stop
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	300	-	300	300	-	300	-	-	-	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	92	92	92	92	92	92	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	10	178	16	16	212	28	16	0	16	55	0	17

Major/Minor	Major1			Major2			Minor1			Minor2		
Conflicting Flow All	240	0	0	194	0	0	336	470	89	353	458	106
Stage 1	-	-	-	-	-	-	198	198	-	244	244	-
Stage 2	-	-	-	-	-	-	138	272	-	109	214	-
Critical Hdwy	4.14	-	-	4.14	-	-	7.54	6.54	6.94	7.54	6.54	6.94
Critical Hdwy Stg 1	-	-	-	-	-	-	6.54	5.54	-	6.54	5.54	-
Critical Hdwy Stg 2	-	-	-	-	-	-	6.54	5.54	-	6.54	5.54	-
Follow-up Hdwy	2.22	-	-	2.22	-	-	3.52	4.02	3.32	3.52	4.02	3.32
Pot Cap-1 Maneuver	1324	-	-	1377	-	-	594	490	951	577	498	928
Stage 1	-	-	-	-	-	-	785	736	-	738	703	-
Stage 2	-	-	-	-	-	-	851	683	-	885	724	-
Platoon blocked, %		-	-		-	-						
Mov Cap-1 Maneuver	1324	-	-	1377	-	-	574	480	951	559	488	928
Mov Cap-2 Maneuver	-	-	-	-	-	-	574	480	-	559	488	-
Stage 1	-	-	-	-	-	-	779	730	-	732	695	-
Stage 2	-	-	-	-	-	-	825	675	-	863	718	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	0.4	0.5	10.3	11.6
HCM LOS			B	B

Minor Lane/Major Mvmt	NBLn1	EBL	EBT	EBR	WBL	WBT	WBR	SBLn1
Capacity (veh/h)	716	1324	-	-	1377	-	-	618
HCM Lane V/C Ratio	0.046	0.007	-	-	0.012	-	-	0.118
HCM Control Delay (s)	10.3	7.7	-	-	7.6	-	-	11.6
HCM Lane LOS	B	A	-	-	A	-	-	B
HCM 95th %tile Q(veh)	0.1	0	-	-	0	-	-	0.4

Intersection	
Int Delay, s/veh	0.6

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	9	175	208	19	12	5
Future Vol, veh/h	9	175	208	19	12	5
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	300	-	-	300	0	-
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	10	190	226	21	13	5

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	247	0	-	0	341	113
Stage 1	-	-	-	-	226	-
Stage 2	-	-	-	-	115	-
Critical Hdwy	4.14	-	-	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	2.22	-	-	-	3.52	3.32
Pot Cap-1 Maneuver	1316	-	-	-	629	918
Stage 1	-	-	-	-	790	-
Stage 2	-	-	-	-	897	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1316	-	-	-	624	918
Mov Cap-2 Maneuver	-	-	-	-	624	-
Stage 1	-	-	-	-	784	-
Stage 2	-	-	-	-	897	-

Approach	EB	WB	SB
HCM Control Delay, s	0.4	0	10.4
HCM LOS			B

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1
Capacity (veh/h)	1316	-	-	-	689
HCM Lane V/C Ratio	0.007	-	-	-	0.027
HCM Control Delay (s)	7.8	-	-	-	10.4
HCM Lane LOS	A	-	-	-	B
HCM 95th %tile Q(veh)	0	-	-	-	0.1

Intersection	
Int Delay, s/veh	3.2

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	41	137	190	23	46	77
Future Vol, veh/h	41	137	190	23	46	77
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	300	-	-	300	0	100
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	80	80	80	80	80	80
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	51	171	238	29	58	96

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	267	0	-	0	426	119
Stage 1	-	-	-	-	238	-
Stage 2	-	-	-	-	188	-
Critical Hdwy	4.14	-	-	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	2.22	-	-	-	3.52	3.32
Pot Cap-1 Maneuver	1294	-	-	-	557	910
Stage 1	-	-	-	-	779	-
Stage 2	-	-	-	-	825	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1294	-	-	-	535	910
Mov Cap-2 Maneuver	-	-	-	-	535	-
Stage 1	-	-	-	-	749	-
Stage 2	-	-	-	-	825	-

Approach	EB	WB	SB
HCM Control Delay, s	1.8	0	10.6
HCM LOS			B

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1	SBLn2
Capacity (veh/h)	1294	-	-	-	535	910
HCM Lane V/C Ratio	0.04	-	-	-	0.107	0.106
HCM Control Delay (s)	7.9	-	-	-	12.5	9.4
HCM Lane LOS	A	-	-	-	B	A
HCM 95th %tile Q(veh)	0.1	-	-	-	0.4	0.4

Intersection	
Int Delay, s/veh	6.4

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	175	108	167	100	70	120
Future Vol, veh/h	175	108	167	100	70	120
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	300	-	-	300	0	100
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	70	70	70	70	70	70
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	250	154	239	143	100	171

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	382	0	-	0	816	120
Stage 1	-	-	-	-	239	-
Stage 2	-	-	-	-	577	-
Critical Hdwy	4.14	-	-	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	2.22	-	-	-	3.52	3.32
Pot Cap-1 Maneuver	1173	-	-	-	315	909
Stage 1	-	-	-	-	778	-
Stage 2	-	-	-	-	525	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1173	-	-	-	248	909
Mov Cap-2 Maneuver	-	-	-	-	249	-
Stage 1	-	-	-	-	612	-
Stage 2	-	-	-	-	525	-

Approach	EB	WB	SB
HCM Control Delay, s	5.5	0	16.9
HCM LOS			C

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1	SBLn2
Capacity (veh/h)	1173	-	-	-	249	909
HCM Lane V/C Ratio	0.213	-	-	-	0.402	0.189
HCM Control Delay (s)	8.9	-	-	-	28.8	9.9
HCM Lane LOS	A	-	-	-	D	A
HCM 95th %tile Q(veh)	0.8	-	-	-	1.8	0.7

Intersection	
Int Delay, s/veh	3.3

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	44	14	33	32	10	19
Future Vol, veh/h	44	14	33	32	10	19
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	50	16	38	36	11	22

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	66	0	170	58
Stage 1	-	-	-	-	58	-
Stage 2	-	-	-	-	112	-
Critical Hdwy	-	-	4.12	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	-	-	2.218	-	3.518	3.318
Pot Cap-1 Maneuver	-	-	1536	-	820	1008
Stage 1	-	-	-	-	965	-
Stage 2	-	-	-	-	913	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	1536	-	800	1008
Mov Cap-2 Maneuver	-	-	-	-	800	-
Stage 1	-	-	-	-	941	-
Stage 2	-	-	-	-	913	-

Approach	EB	WB	NB
HCM Control Delay, s	0	3.8	9
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	925	-	-	1536	-
HCM Lane V/C Ratio	0.036	-	-	0.024	-
HCM Control Delay (s)	9	-	-	7.4	0
HCM Lane LOS	A	-	-	A	A
HCM 95th %tile Q(veh)	0.1	-	-	0.1	-

Intersection	
Int Delay, s/veh	2

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	60	3	26	63	2	15
Future Vol, veh/h	60	3	26	63	2	15
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	68	3	30	72	2	17

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	71	0	202	70
Stage 1	-	-	-	-	70	-
Stage 2	-	-	-	-	132	-
Critical Hdwy	-	-	4.12	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	-	-	2.218	-	3.518	3.318
Pot Cap-1 Maneuver	-	-	1529	-	787	993
Stage 1	-	-	-	-	953	-
Stage 2	-	-	-	-	894	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	1529	-	771	993
Mov Cap-2 Maneuver	-	-	-	-	771	-
Stage 1	-	-	-	-	934	-
Stage 2	-	-	-	-	894	-

Approach	EB	WB	NB
HCM Control Delay, s	0	2.2	8.8
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	960	-	-	1529	-
HCM Lane V/C Ratio	0.02	-	-	0.019	-
HCM Control Delay (s)	8.8	-	-	7.4	0
HCM Lane LOS	A	-	-	A	A
HCM 95th %tile Q(veh)	0.1	-	-	0.1	-

Intersection	
Int Delay, s/veh	0.5

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	76	0	3	89	1	6
Future Vol, veh/h	76	0	3	89	1	6
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	86	0	3	101	1	7

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	86	0	193	86
Stage 1	-	-	-	-	86	-
Stage 2	-	-	-	-	107	-
Critical Hdwy	-	-	4.12	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	-	-	2.218	-	3.518	3.318
Pot Cap-1 Maneuver	-	-	1510	-	796	973
Stage 1	-	-	-	-	937	-
Stage 2	-	-	-	-	917	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	1510	-	794	973
Mov Cap-2 Maneuver	-	-	-	-	794	-
Stage 1	-	-	-	-	935	-
Stage 2	-	-	-	-	917	-

Approach	EB	WB	NB
HCM Control Delay, s	0	0.2	8.9
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	943	-	-	1510	-
HCM Lane V/C Ratio	0.008	-	-	0.002	-
HCM Control Delay (s)	8.9	-	-	7.4	0
HCM Lane LOS	A	-	-	A	A
HCM 95th %tile Q(veh)	0	-	-	0	-

Intersection	
Int Delay, s/veh	2.2

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	13	1	69	1	1	1	71	292	1	1	228	21
Future Vol, veh/h	13	1	69	1	1	1	71	292	1	1	228	21
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	300	-	-	50	-	1000
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	88	88	88	88	88	88	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	15	1	78	1	1	1	81	332	1	1	259	24

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	590	756	259	808	780	167	283	0	0	333	0	0
Stage 1	261	261	-	495	495	-	-	-	-	-	-	-
Stage 2	329	495	-	313	285	-	-	-	-	-	-	-
Critical Hdwy	7.33	6.53	6.23	7.33	6.53	6.93	4.13	-	-	4.13	-	-
Critical Hdwy Stg 1	6.13	5.53	-	6.53	5.53	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.53	5.53	-	6.13	5.53	-	-	-	-	-	-	-
Follow-up Hdwy	3.519	4.019	3.319	3.519	4.019	3.319	2.219	-	-	2.219	-	-
Pot Cap-1 Maneuver	405	337	779	286	326	849	1278	-	-	1225	-	-
Stage 1	743	692	-	526	545	-	-	-	-	-	-	-
Stage 2	659	545	-	697	675	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	384	315	779	244	305	849	1278	-	-	1225	-	-
Mov Cap-2 Maneuver	384	315	-	244	305	-	-	-	-	-	-	-
Stage 1	696	691	-	493	511	-	-	-	-	-	-	-
Stage 2	615	511	-	625	674	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	11.4	15.4	1.6	0
HCM LOS	B	C		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	WBLn1	SBL	SBT	SBR
Capacity (veh/h)	1278	-	-	661	351	1225	-	-
HCM Lane V/C Ratio	0.063	-	-	0.143	0.01	0.001	-	-
HCM Control Delay (s)	8	-	-	11.4	15.4	7.9	-	-
HCM Lane LOS	A	-	-	B	C	A	-	-
HCM 95th %tile Q(veh)	0.2	-	-	0.5	0	0	-	-

Intersection	
Int Delay, s/veh	1.5

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Traffic Vol, veh/h	3	47	79	360	292	5
Future Vol, veh/h	3	47	79	360	292	5
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	-	1000	-	-	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	88	88	88	88	88	88
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	3	53	90	409	332	6

Major/Minor	Minor2		Major1		Major2	
Conflicting Flow All	720	169	338	0	-	0
Stage 1	335	-	-	-	-	-
Stage 2	385	-	-	-	-	-
Critical Hdwy	6.84	6.94	4.14	-	-	-
Critical Hdwy Stg 1	5.84	-	-	-	-	-
Critical Hdwy Stg 2	5.84	-	-	-	-	-
Follow-up Hdwy	3.52	3.32	2.22	-	-	-
Pot Cap-1 Maneuver	363	845	1218	-	-	-
Stage 1	697	-	-	-	-	-
Stage 2	657	-	-	-	-	-
Platoon blocked, %				-	-	-
Mov Cap-1 Maneuver	336	845	1218	-	-	-
Mov Cap-2 Maneuver	336	-	-	-	-	-
Stage 1	645	-	-	-	-	-
Stage 2	657	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s	10	1.6	0
HCM LOS	B		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	SBT	SBR
Capacity (veh/h)	1218	-	775	-	-
HCM Lane V/C Ratio	0.074	-	0.073	-	-
HCM Control Delay (s)	8.2	0.2	10	-	-
HCM Lane LOS	A	A	B	-	-
HCM 95th %tile Q(veh)	0.2	-	0.2	-	-

Intersection	
Int Delay, s/veh	10

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	124	14	181	15	15	14	191	300	15	13	224	101
Future Vol, veh/h	124	14	181	15	15	14	191	300	15	13	224	101
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	150	-	-	150	-	-	300	-	300	300	-	300
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	92	92	92	92	92	92	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	135	15	197	16	16	15	208	326	16	14	243	110

Major/Minor	Minor2			Minor1			Major1			Major2		
Conflicting Flow All	858	1029	122	899	1123	163	353	0	0	342	0	0
Stage 1	271	271	-	742	742	-	-	-	-	-	-	-
Stage 2	587	758	-	157	381	-	-	-	-	-	-	-
Critical Hdwy	7.54	6.54	6.94	7.54	6.54	6.94	4.14	-	-	4.14	-	-
Critical Hdwy Stg 1	6.54	5.54	-	6.54	5.54	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.54	5.54	-	6.54	5.54	-	-	-	-	-	-	-
Follow-up Hdwy	3.52	4.02	3.32	3.52	4.02	3.32	2.22	-	-	2.22	-	-
Pot Cap-1 Maneuver	251	232	906	234	204	853	1202	-	-	1214	-	-
Stage 1	712	684	-	374	420	-	-	-	-	-	-	-
Stage 2	463	413	-	829	612	-	-	-	-	-	-	-
Platoon blocked, %								-	-		-	-
Mov Cap-1 Maneuver	197	190	906	148	167	853	1202	-	-	1214	-	-
Mov Cap-2 Maneuver	197	190	-	148	167	-	-	-	-	-	-	-
Stage 1	589	676	-	309	347	-	-	-	-	-	-	-
Stage 2	358	342	-	627	605	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	29	24.1	3.3	0.3
HCM LOS	D	C		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1	EBLn2	WBLn1	WBLn2	SBL	SBT	SBR
Capacity (veh/h)	1202	-	-	197	713	148	273	1214	-	-
HCM Lane V/C Ratio	0.173	-	-	0.684	0.297	0.11	0.115	0.012	-	-
HCM Control Delay (s)	8.6	-	-	55.5	12.2	32.3	19.9	8	-	-
HCM Lane LOS	A	-	-	F	B	D	C	A	-	-
HCM 95th %tile Q(veh)	0.6	-	-	4.2	1.2	0.4	0.4	0	-	-

Intersection	
Int Delay, s/veh	2.8

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	29	233	15	15	205	88	15	0	15	72	0	24
Future Vol, veh/h	29	233	15	15	205	88	15	0	15	72	0	24
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Free	Free	Stop	Stop	Stop	Stop	Stop	Stop
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	300	-	300	300	-	300	-	-	-	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	92	92	92	92	92	92	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	32	253	16	16	223	96	16	0	16	78	0	26

Major/Minor	Major1			Major2			Minor1			Minor2		
Conflicting Flow All	319	0	0	269	0	0	461	668	127	446	588	112
Stage 1	-	-	-	-	-	-	317	317	-	255	255	-
Stage 2	-	-	-	-	-	-	144	351	-	191	333	-
Critical Hdwy	4.14	-	-	4.14	-	-	7.54	6.54	6.94	7.54	6.54	6.94
Critical Hdwy Stg 1	-	-	-	-	-	-	6.54	5.54	-	6.54	5.54	-
Critical Hdwy Stg 2	-	-	-	-	-	-	6.54	5.54	-	6.54	5.54	-
Follow-up Hdwy	2.22	-	-	2.22	-	-	3.52	4.02	3.32	3.52	4.02	3.32
Pot Cap-1 Maneuver	1238	-	-	1292	-	-	484	378	900	496	420	920
Stage 1	-	-	-	-	-	-	669	653	-	727	695	-
Stage 2	-	-	-	-	-	-	844	631	-	792	642	-
Platoon blocked, %		-	-		-	-						
Mov Cap-1 Maneuver	1238	-	-	1292	-	-	457	364	900	473	404	920
Mov Cap-2 Maneuver	-	-	-	-	-	-	457	364	-	473	404	-
Stage 1	-	-	-	-	-	-	652	636	-	708	687	-
Stage 2	-	-	-	-	-	-	810	623	-	758	625	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	0.8	0.4	11.3	13.3
HCM LOS			B	B

Minor Lane/Major Mvmt	NBLn1	EBL	EBT	EBR	WBL	WBT	WBR	SBLn1
Capacity (veh/h)	606	1238	-	-	1292	-	-	538
HCM Lane V/C Ratio	0.054	0.025	-	-	0.013	-	-	0.194
HCM Control Delay (s)	11.3	8	-	-	7.8	-	-	13.3
HCM Lane LOS	B	A	-	-	A	-	-	B
HCM 95th %tile Q(veh)	0.2	0.1	-	-	0	-	-	0.7

Intersection	
Int Delay, s/veh	2.2

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	27	212	184	59	64	29
Future Vol, veh/h	27	212	184	59	64	29
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	300	-	-	300	0	-
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	29	230	200	64	70	32

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	264	0	-	0	373	100
Stage 1	-	-	-	-	200	-
Stage 2	-	-	-	-	173	-
Critical Hdwy	4.14	-	-	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	2.22	-	-	-	3.52	3.32
Pot Cap-1 Maneuver	1297	-	-	-	601	936
Stage 1	-	-	-	-	814	-
Stage 2	-	-	-	-	840	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1297	-	-	-	588	936
Mov Cap-2 Maneuver	-	-	-	-	588	-
Stage 1	-	-	-	-	796	-
Stage 2	-	-	-	-	840	-

Approach	EB	WB	SB
HCM Control Delay, s	0.9	0	11.4
HCM LOS			B

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1
Capacity (veh/h)	1297	-	-	-	665
HCM Lane V/C Ratio	0.023	-	-	-	0.152
HCM Control Delay (s)	7.8	-	-	-	11.4
HCM Lane LOS	A	-	-	-	B
HCM 95th %tile Q(veh)	0.1	-	-	-	0.5

Intersection	
Int Delay, s/veh	3.8

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	94	179	163	50	61	76
Future Vol, veh/h	94	179	163	50	61	76
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	300	-	-	300	0	100
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	85	85	85	85	85	85
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	111	211	192	59	72	89

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	251	0	-	0	520	96
Stage 1	-	-	-	-	192	-
Stage 2	-	-	-	-	328	-
Critical Hdwy	4.14	-	-	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	2.22	-	-	-	3.52	3.32
Pot Cap-1 Maneuver	1311	-	-	-	486	942
Stage 1	-	-	-	-	822	-
Stage 2	-	-	-	-	702	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1311	-	-	-	445	942
Mov Cap-2 Maneuver	-	-	-	-	445	-
Stage 1	-	-	-	-	752	-
Stage 2	-	-	-	-	702	-

Approach	EB	WB	SB
HCM Control Delay, s	2.8	0	11.6
HCM LOS			B

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1	SBLn2
Capacity (veh/h)	1311	-	-	-	445	942
HCM Lane V/C Ratio	0.084	-	-	-	0.161	0.095
HCM Control Delay (s)	8	-	-	-	14.6	9.2
HCM Lane LOS	A	-	-	-	B	A
HCM 95th %tile Q(veh)	0.3	-	-	-	0.6	0.3

Intersection	
Int Delay, s/veh	4.2

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Traffic Vol, veh/h	95	160	189	50	60	115
Future Vol, veh/h	95	160	189	50	60	115
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	300	-	-	300	0	100
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	75	75	75	75	75	75
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	127	213	252	67	80	153

Major/Minor	Major1		Major2		Minor2	
Conflicting Flow All	319	0	-	0	613	126
Stage 1	-	-	-	-	252	-
Stage 2	-	-	-	-	361	-
Critical Hdwy	4.14	-	-	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	2.22	-	-	-	3.52	3.32
Pot Cap-1 Maneuver	1238	-	-	-	424	901
Stage 1	-	-	-	-	767	-
Stage 2	-	-	-	-	676	-
Platoon blocked, %		-	-	-		
Mov Cap-1 Maneuver	1238	-	-	-	380	901
Mov Cap-2 Maneuver	-	-	-	-	447	-
Stage 1	-	-	-	-	688	-
Stage 2	-	-	-	-	676	-

Approach	EB	WB	SB
HCM Control Delay, s	3.1	0	11.5
HCM LOS			B

Minor Lane/Major Mvmt	EBL	EBT	WBT	WBR	SBLn1	SBLn2
Capacity (veh/h)	1238	-	-	-	447	901
HCM Lane V/C Ratio	0.102	-	-	-	0.179	0.17
HCM Control Delay (s)	8.2	-	-	-	14.8	9.8
HCM Lane LOS	A	-	-	-	B	A
HCM 95th %tile Q(veh)	0.3	-	-	-	0.6	0.6

LSC TRANSPORTATION CONSULTANTS, INC.

1889 York Street
Denver, CO 80206
(303) 333-1105
FAX (303) 333-1107
E-mail: lsc@lscdenver.com

August 29, 2022

Mr. Kacy Flemons
LGI Homes, LLC
3401 Quebec Street, Suite 4060
Denver, CO 80207

Re: Bennett Ranch Planning
Area J Trip Generation
Conformance Letter
Bennett, CO
LSC #181141

Dear Mr. Flemons:

Per your request, we have completed this trip generation conformance letter for the proposed Bennett Ranch Planning Area J development in Bennett, Colorado.

INTRODUCTION

The purpose of this letter is to estimate the trip generation potential of the currently proposed land use for Planning Area J and compare it to the previously approved land use in the December, 2018 *Bennett Ranch TIA* (2018 TIA) by LSC. Table 2 from the 2018 TIA is attached for reference.

LAND USE

Planning Area J of the overall site was previously proposed as about 99,600 square feet of shopping center. The currently proposed land use includes about 20,000 square feet of shopping center and about 44 townhome dwelling units.

ACCESS

The 2018 TIA assumed two full movement and one right-in/right-out access in the area of Planning Area J. The currently proposed plan assumes one full movement and one right-in/right-out access in the area of Planning Area J. This reduction is supported by the large decrease in trip generation potential. The conceptual site plan is attached.

TRIP GENERATION

Table 1 shows the estimated average weekday, morning peak-hour, and afternoon peak-hour trip generation approved for Bennett Ranch Planning Area J and for the currently proposed

land use based on the rates from Trip Generation, 11th Edition, 2021, by the Institute of Transportation Engineers (ITE).

The currently proposed land use is projected to generate about 2,374 fewer vehicle-trips on the average weekday, with about half entering and half exiting during a 24-hour period. During the morning peak-hour, which generally occurs for one hour between 6:30 and 8:30 a.m., about 17 fewer vehicles would enter and about 13 fewer vehicles would exit the site. During the afternoon peak-hour, which generally occurs for one hour between 4:00 and 6:00 p.m., about 102 fewer vehicles would enter and about 123 fewer vehicles would exit.

ACCESS VS. TRIP GENERATION POTENTIAL

The proposed plan has 60 percent of the access assumed in the 2018 TIA but the daily trip generation potential is about 37 percent of that assumed in the 2018 TIA. The morning peak-hour trip generation potential is 68 percent of that assumed in the 2018 TIA but is not the basis for access permit applications. The afternoon peak-hour trip generation potential is 41 percent of that assumed in the 2018 TIA and will be the permitted volume for any future access permit applications. The reduction in access is appropriate considering the decrease in trip generation potential.

CONCLUSION

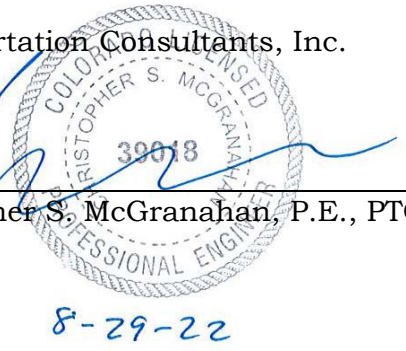
The proposed Bennett Ranch Planning Area J trip generation potential is well below the previously approved trip generation potential and is appropriate for the modified access plan. No further analysis should be necessary.

* * *

We trust this information will assist you in planning for the proposed Bennett Ranch Planning Area J development.

Respectfully submitted,

LSC Transportation Consultants, Inc.



By:_____
Christopher S. McGranahan, P.E., PTOE

CSM/wc

Enclosure: Table 2 from 2018 TIA
Conceptual Site Plan
Table 1

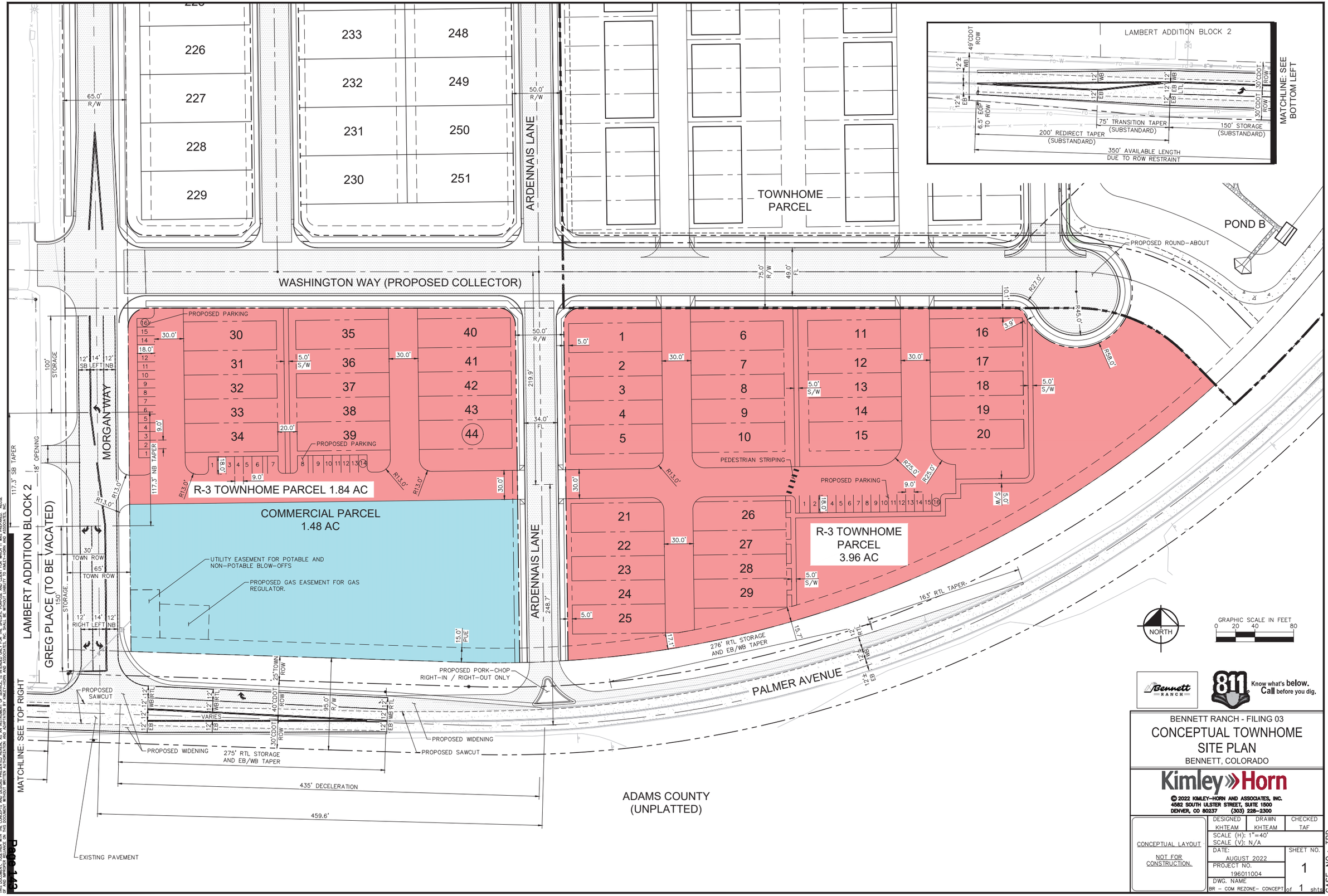
W:\LSC\Projects\2018\181141-BennettRanchFilingJ\Report\BennettRanch-PA-J-082922.wpd

Table 2
ESTIMATED TRAFFIC GENERATION
Bennett Ranch
Bennett, CO
LSC #181140; December 2018

Traffic Analysis Zone	Trip Generating Category	Quantity	Trip Generation Rates [1] Average Weekday	AM Peak-Hour In	AM Peak-Hour Out	PM Peak-Hour In	PM Peak-Hour Out	Vehicle-Trips Generated Average Weekday	AM Peak-Hour In	AM Peak-Hour Out	PM Peak-Hour In	PM Peak-Hour Out
A	Single-Family Housing [2]	117 DU [3]	9.44	0.185	0.555	0.624	0.366	1,104	22	65	73	43
B	Multi-Family Housing [4]	116 DU	7.32	0.106	0.354	0.353	0.207	849	12	41	41	24
C	Fire Station [5]	20 KSF [6]	2.40	0.341	0.139	0.139	0.341	48	7	3	3	7
D	Dedication to School District [7]	17.68 Acres	--	--	--	--	--	0	0	0	0	0
E	Park [8]	15.36 Acres	--	--	--	--	--	0	0	0	0	0
F	Single-Family Housing	103 DU	9.44	0.185	0.555	0.624	0.366	972	19	57	64	38
G	Single-Family Housing	96 DU	9.44	0.185	0.555	0.624	0.366	906	18	53	60	35
H	Single-Family Housing	100 DU	9.44	0.185	0.555	0.624	0.366	944	19	55	62	37
I	Multifamily Housing	115 DU	7.32	0.106	0.354	0.353	0.207	842	12	41	41	24
J	Shopping Center [9]	99.6 KSF	37.75	0.583	0.357	1.829	1.981	3,760	58	36	182	197
						Total =		**9,425**	**167**	**351**	**526**	**405**
						Passby Trips [10] =		1,278	16	16	64	64
						Primary Trips =		**8,147**	**151**	**335**	**462**	**341**

Notes:

(1) Source: *Trip Generation*, Institute of Transportation Engineers, 10th Edition, 2017.
(2) ITE Land Use No. 210 - Single-Family Detached Housing
(3) DU = Dwelling Unit
(4) ITE Land Use No. 220 - Multifamily Housing (Low-Rise)
(5) ITE Land Use No. 575 - Fire and Rescue Station; weekday average was assumed to be 5x the PM Peak and AM Peak is the reverse of the PM Peak
(6) KSF = 1,000 square feet
(7) Land to be dedicated to the School District to add to the overall campus to the west of the site. This estimate may need to be updated once the proposed use for the school site is more defined.
(8) Public Park
(9) ITE Land Use No. 820 - Shopping Center; a FAR of 0.30 was assumed on 7.62 acres.
(10) A passby trip rate of 34 percent was assumed for the shopping center use.



BENNETT RANCH - FILING 03

CONCEPTUAL TOWNHOME SITE PLAN

BENNETT, COLORADO

Kimley»Horn

4582 SOUTH ULSTER STREET, SUITE 1500
DENVER, CO 80237 (303) 228-2300

DESIGNED	DRAWN	CHECKED
KHTEAM	KHTEAM	TAF

SCALE (H): 1"=40'
SCALE (V): N/A

CONCEPTUAL LAYOUT.
NOT FOR CONSTRUCTION.

DATE: AUGUST 2022
PROJECT NO. 196011004
DWG. NAME BR – COM REZONE– CONCEPT

SHEET NO. 1 of 1 shts

CASE NO.: TBD

Know what's below. Call before you dig.

Table 1
ESTIMATED TRAFFIC GENERATION
Bennett Ranch Planning Area J Conformance Letter
Bennett, CO
LSC #181141; August, 2022

Traffic Analysis Zone	Trip Generating Category	Quantity	Trip Generation Rates [1] Average Weekday	AM Peak-Hour In	AM Peak-Hour Out	PM Peak-Hour In	PM Peak-Hour Out	Vehicle-Trips Generated Average Weekday	AM Peak-Hour In	AM Peak-Hour Out	PM Peak-Hour In	PM Peak-Hour Out
PREVIOUSLY APPROVED LAND USE FOR PLANNING AREA J FROM DECEMBER, 2018 *BENNETT RANCH TIA* BY LSC												
J	Shopping Center	99.6 KSF	37.75	0.583	0.357	1.829	1.981	3,760	58	36	182	197
CURRENTLY PROPOSED LAND USE FOR PLANNING AREA J												
J	Shopping Center [2]	20 KSF [3]	54.45	1.416	0.944	3.295	3.295	1,089	28	19	66	66
	Townhomes [4]	44 DU [5]	6.74	0.304	0.096	0.321	0.189	297	13	4	14	8
							Total	**1,386**	**41**	**23**	**80**	**74**
						Net Increase =		**-2,374**	**-17**	**-13**	**-102**	**-123**
									AM = -30		**PM = -225**	

Notes:
(1) Source: *Trip Generation*, Institute of Transportation Engineers, 11th Edition, 2021
(2) ITE Land Use No. 822 - Strip Retail Plaza (<40k)
(3) KSF = 1,000 square feet
(4) ITE Land Use No. 220 - Multifamily Housing (Low-Rise)
(5) DU = Dwelling Unit

TERRAMAX, INC.
CONSULTING ◊ ENGINEERING

Engineering Review Memo

To:	Stephen Hebert, Town Planner
	Chad Bunger, Community & Economic Development Director
From:	Dan Giroux, PE, Engineering Consultant to the Town
Date:	Tuesday, November 8, 2022
Project:	Bennett Ranch Commercial Rezone Application
Subject:	Engineering Review for 2nd Submittal

Per the request of the Town of Bennett, Terramax, Inc. has reviewed the 2nd submittal application materials for the proposed Bennett Ranch Commercial Rezone. I have the following comments to offer on the proposed revised Rezone:

Water Supply
- Major water supply components such as groundwater wells and water storage tanks for the overall Bennett Ranch development are sufficient for the proposed revised rezoned land use.

Water Distribution Systems
- The water distribution system being developed at the overall Bennett Ranch development is sufficient to accommodate the proposed revised rezoned land use.
- This includes both potable and non-potable water distribution systems.

Sanitary Sewer & Wastewater Treatment Systems
- The sanitary sewer collection system being developed at the overall Bennett Ranch development is sufficient to accommodate the proposed revised rezoned land use.
- The Town's wastewater treatment system is sufficient to accommodate the proposed revised rezoned land use.

Access
- Pedestrian access & circulation, supported by the Palmer/79 sidewalk/Trail will continue to be important for residential as it was for commercial.
- The Palmer/79 noise issues and noise mitigation will be a greater factor with the residential than for the previously proposed commercial areas.
- This is the same noise & noise mitigation issue the Town is confronting and working through in several areas of Town with new development and roadway expansions, however.

Stormwater Management
- Major stormwater improvements such as storm sewer, channels, management ponds, and outfall systems will need to be reviewed and adjusted as needed for the proposed land use.
- Typically, commercial land uses can incorporate private on-site/on-lot stormwater management ponds, while residential would be associated with more regional improvements, maintained by an Owners Association or management group.
- It's anticipated these stormwater management system differences and changes can be accommodated and addressed for the proposed revised rezoned land use.

Steve & Chad, this concludes my engineering review of the 2nd submittal application materials for the proposed Bennett Ranch Commercial Rezone. Please let me know if you have any questions, or require additional information pertaining to the submitted information, or my review.

DANGIROUX@TERRAMAX.US ◊ (303) 929-3194

Memorandum

To: Steve Hebert, AICP, Bennett Planning & Economic Development Manager

From: Gabrielle Renner, PE PTOE RSP1

Town Traffic Engineer

Date: 5/17/2021

Re: Case No. 21.08 Bennett Ranch Commercial Rezoning

Town of Bennett Case 21.08 is for the proposed rezoning of Bennett Ranch Development's commercial land use. The rezoning would be for R-3 High Density Residential with the purpose of townhomes to be built. The purpose of this memorandum is to review the proposed rezoning request for a land use change is part of the Bennett Ranch Development was reviewed for any adverse traffic impacts.

The overall Bennett Ranch Development is shown in **Figure 1.** The proposed rezoning is labeled C – General Commercial District in the southern portion of the property.

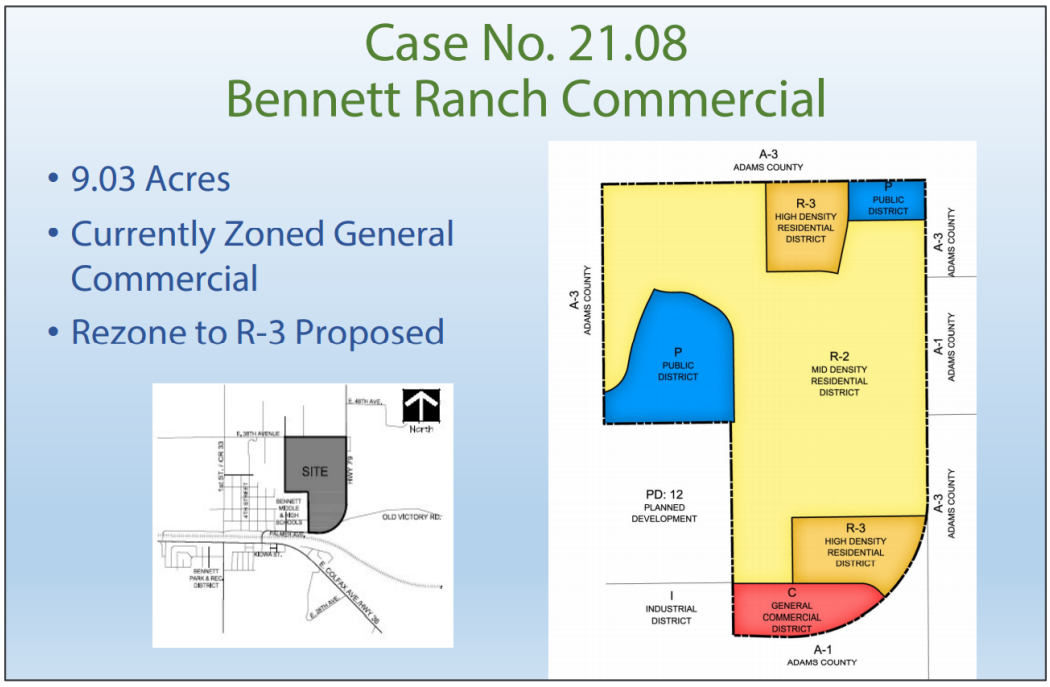


Figure 1: Bennett Ranch Site Layout

A review of the 2018 Bennett Ranch Traffic Impact Study completed by LSC Transportation Consultants identified the General Commercial District to generate approximately 3,760 vehicles per day (vpd). The rezoning that is proposed would generate approximately 730 – 1,100 vpd. The rezoning indicated a significate reduction in generated development traffic and there would be no adverse traffic impacts for the proposed rezoning with the planned roadway improvements remain the same. There are no traffic related concerns with the proposed rezoning.

Jacobs

Memorandum

6312 S. Fiddlers Green Circle
Suite 300N
Greenwood Village, CO 80111
T +1.303.771.0900

www.jacobs.com

Subject	Bennett Ranch Commercial Rezone 2nd Submittal Package
Attention	Chad Bunger, Town Community & Economic Development Director
	Steve Hebert, AICP, Bennett Planning & Economic Development Manager
From	Mike Heugh, PE
	Town Traffic Engineer
Date	October 27, 2022
Copies to	Dan Giroux, PE, Town Engineer

Bennett Ranch Commercial Rezone 2nd Submittal – Town Traffic Comments

Bennett Traffic Conformance Letter (dated 08/29/22) Comments

1. No comments on this letter. As a note, the Bennett Ranch TIA included Bennett Ranch access via Washington Way, which has since been removed. The redistribution of Washington Way traffic should not create operational issues at Morgan Way and the RI/RO access due to the reduction in PA-J trips.

Conceptual Exhibit (dated Aug 2022)

1. It appears that the Ardennais Lane access overlaps with the Morgan Way deceleration lane for 45 mph. A waiver might be required.

RE: Bennett Ranch Commercial Rezoning - 2nd Submittal

Brooks Kaufman <BKaufman@core.coop> Thu, Oct 27, 2022 at 6:52 AM
To: Town of Bennett Planning <planning@bennett.co.us>

Steve

CORE approves the rezoning.

Respectfully

Brooks Kaufman

Lands and Rights of Way Manager

800.332.9540 MAIN

720.733.5493 DIRECT

303.912.0765 MOBILE

www.core.coop.

From: Town of Bennett Planning <planning@bennett.co.us>
Sent: Thursday, October 6, 2022 3:48 PM
To: Karl Smalley <ksmalley@adcogov.org>; Bennett School District 29J ATTN: Robin Purdy <robinp@bsd29j.com>; Bennett School District 29J: ATTN: Keith Yaich <keithy@bsd29j.com>; Robin Price <rprice@bennett.co.us>; Rick Martinez <rmartinez@bennett.co.us>; Daymon Johnson <djohnson@bennett.co.us>; Victoria Flamini <VictoriaFlamini@bennettfirerescue.org>; Bennett Watkins Fire Rescue <calebconnor@bennettfirerescue.org>; Colorado Department of Transportation (CDOT) Assistant Access Manager <david.dixon@state.co.us>; Colorado Department of Transportation (CDOT) Steve Loeffler <steven.loeffler@state.co.us>; Eastern Slope Rural Telephone <patw@esrta.com>; Brooks Kaufman <BKaufman@core.coop>; Jehn Water Consultants Inc <gburke@jehnwater.com>; Melinda Culley

<melinda@kellypc.com>; Daniel Giroux <dangiroux@terramax.us>; Chad Bunger <cbunger@bennett.co.us>; Steve Hebert <shebert@bennett.co.us>; Heugh, Michael <Michael.Heugh@jacobs.com>
Subject: Bennett Ranch Commercial Rezoning - 2nd Submittal

Hello again,

Below is a Dropbox link to the Bennett Ranch Commercial Rezoning - 2nd Submittal. We appreciate your review and comments. Please send your comments back via this email address or by mail to Town Hall by October 27, 2022.

https://www.dropbox.com/scl/fo/fm2lxfjwzntspzy7jb5bt/h?dl=0&rlkey=b6v2j40lnd57wc9euvienlokj

If you have any questions, please email or call Steve Hebert at shebert@bennett.co.us or the phone number below.

town of Bennett
welcome neighbors.

Planning Department
207 Muegge Way | Bennett CO, 80102
(303)644-3249 | planning@bennett.co.us
townofbennett.colorado.gov

Bennett-Watkins Fire Rescue

District Office: 303-644-3572 Fax: 303-644-3401
355 4th Street, Bennett, CO 80102
Email: LifeSafety@BennettFireRescue.org
"Striving to Preserve Life and Property"

October 17th, 2022

Steve Hebert
Town Planner
Town of Bennett
Re: Bennett Ranch Commercial Rezoning to R-3 for Townhomes – Case 21.08

Planner Hebert,

In regards to the submission for Bennett Ranch Commercial Rezoning to R-3 for Townhomes – Case 21.08, Bennett-Watkins Fire Rescue (BWFR) has the following comments and considerations:

- BWFR has no specific objections to the rezoning activities proposed in the application. The following comments are standing comments from previous rounds of referral that still apply to the overall development regardless of the rezoning proposed.

- The developer shall confer with Bennett Fire Protection District and ensure that the proposed development conforms to adopted (IFC) fire code standards.

- The developer shall ensure the proposed municipal water systems pertaining to hydrant distribution fire suppression is adequate to protect the proposed development as well as meet design expectations of both the Town of Bennett as well as Bennett-Watkins Fire Rescue. Considerations for design requirement shall include adopted codes and standards as well as ISO distribution and fire flow requirements.

- It is recommended that the developer work directly with Bennett-Watkins Fire Rescue, ISO, and Town of Bennett Staff to provide and review information pertaining to the needed fire flows for the proposed development. This information should be vetted against International Fire Code Requirements as well as ISO requirements. It is also likely that this information will also be required by the Town to include for hydraulic system modeling.

- Fire hydrant installation shall conforming to the painting and color coding system outlined in NFPA 291. The developer/install contactor is responsible for ensuring all hydrants are painted conforming to the TOB/BWFR standards.

- Areas of the development that include wildland-urban interface, greenbelts, or other open space areas are of particular concern for the Fire District. BWFR is interested in working with the developer to ensure that adequate access is provided to these areas should there be a need for vehicle access for wildfire suppression. As each development is unique, it is recommended that the developer work directly with BWFR to examine these interface areas and determine what access and service needs exist.

- Development access requirements are based on the adopted fire code applicable to the development. Two BWFR approved access points are required after the 30th dwelling unit is constructed. These access points are required to follow the remoteness guidelines, they shall be placed a distance apart equal to not less than one half of the length of the maximum overall diagonal dimension of the lot or area to be served, measured in a straight line between accesses.

The only exception to this requirement is if all dwelling units are constructed with approved automatic sprinkler systems and approved by BWFR.

- BWFR will incur unmet capital costs associated with new development. To address the needs of this unmet capital cost, BWFR has partnered with the Town to enact a development fee policy which establishes fees due for all new types of development. It is likely that fees will apply to the new proposed development. If the developer has additional questions or concerns regarding Fire District development fees or policies, they can contact the District Office at 303-644-3572.

Thank You

Caleb J. Connor
Fire Marshal
Life Safety Division
Bennett-Watkins Fire Rescue
303-644-3572 - Headquarters / 720-893-7672 - Direct
www.BennettFireRescue.org

Please clarify: is this RoW a reservation - for the eventual connection of Washington Way to Old Victory Road? See Fig & Table 7-2 of the ACP

A multi-modal sidewalk is recommended flanking the commercial & higher density parcel.

What is this proposed RoW - profile and does it match the cross-section profile presented in the PEL?

Show all planned future connections to SH 79 from the south & east side of SH 79 - matching the ACP. Need to ensure intersections align.

NOT consistent with the PEL

This intersection is NOT ID on the ACP. We need to ensure proper spacing exist between future planned intersections.

WASHINGTON WAY (PROPOSED COLLECTOR)

ARDENNAIS LANE

MORGAN WAY

LAMBERT ADDITION BLOCK 2

GREG PLACE (TO BE VACATED)

R-3 TOWNHOME PARCEL 1.84 AC

COMMERCIAL PARCEL 1.48 AC

R-3 TOWNHOME PARCEL 3.96 AC

TOWNHOME

POND B

PROPOSED ROUND-ABOUT

PALMER AVENUE

ADAMS COUNTY (UNPLATTED)

MATCHLINE: SEE TOP RIGHT

MATCHLINE: SEE TOP LEFT

PROPOSED PARKING

PROPOSED SAWCUT

PROPOSED WIDENING

PROPOSED PORK-CHOP RIGHT-IN / RIGHT-OUT ONLY

PEDESTRIAN STRIPING

UTILITY EASEMENT FOR POTABLE AND NON-POTABLE BLOW-OFFS

PROPOSED GAS EASEMENT FOR GAS REGULATOR.

EXISTING PAVEMENT

275' RTL STORAGE AND EB/WB TAPER

276' RTL STORAGE AND EB/WB TAPER

163' RTL TAPER

435' DECELERATION

459.6'

100' STORAGE

150' STORAGE

12' 14' 12' SB LEFT NB

12' 14' 12' RIGHT LEFT NB

117.3' SB TAPER

117.3' NB TAPER

18' OPENING

30' TOWN ROW

65' TOWN ROW

65.0' R/W

50.0' R/W

75.0' R/W

95.0' R/W

40'CDOT ROW

30'CDOT ROW

25'TOWN ROW

15.0' PUE

34.0' FL

49.0' FL

219.9'

248.7'

5.0' S/W

30.0'

20.0'

9.0'

R13.0'

R27.0'

R45.0'

R58.0'

R25.0'

10.1'

3.9'

17.1'

15.7'

12' EB

12' WB

12' WB RTL

12' EB LT

5.0' M/S

GRAPHIC SCALE IN FEET 0 20 40 80

NORTH

BENNETT RANCH - FILING 03

CONCEPTUAL TOWNHOME SITE PLAN

BENNETT, COLORADO

DESIGNED	DRAWN	CHECKED
KHTEAM	KHTEAM	TAF

SCALE (H): 1"=40'
SCALE (V): N/A

CONCEPTUAL LAYOUT

NOT FOR CONSTRUCTION.

DATE: AUGUST 2022

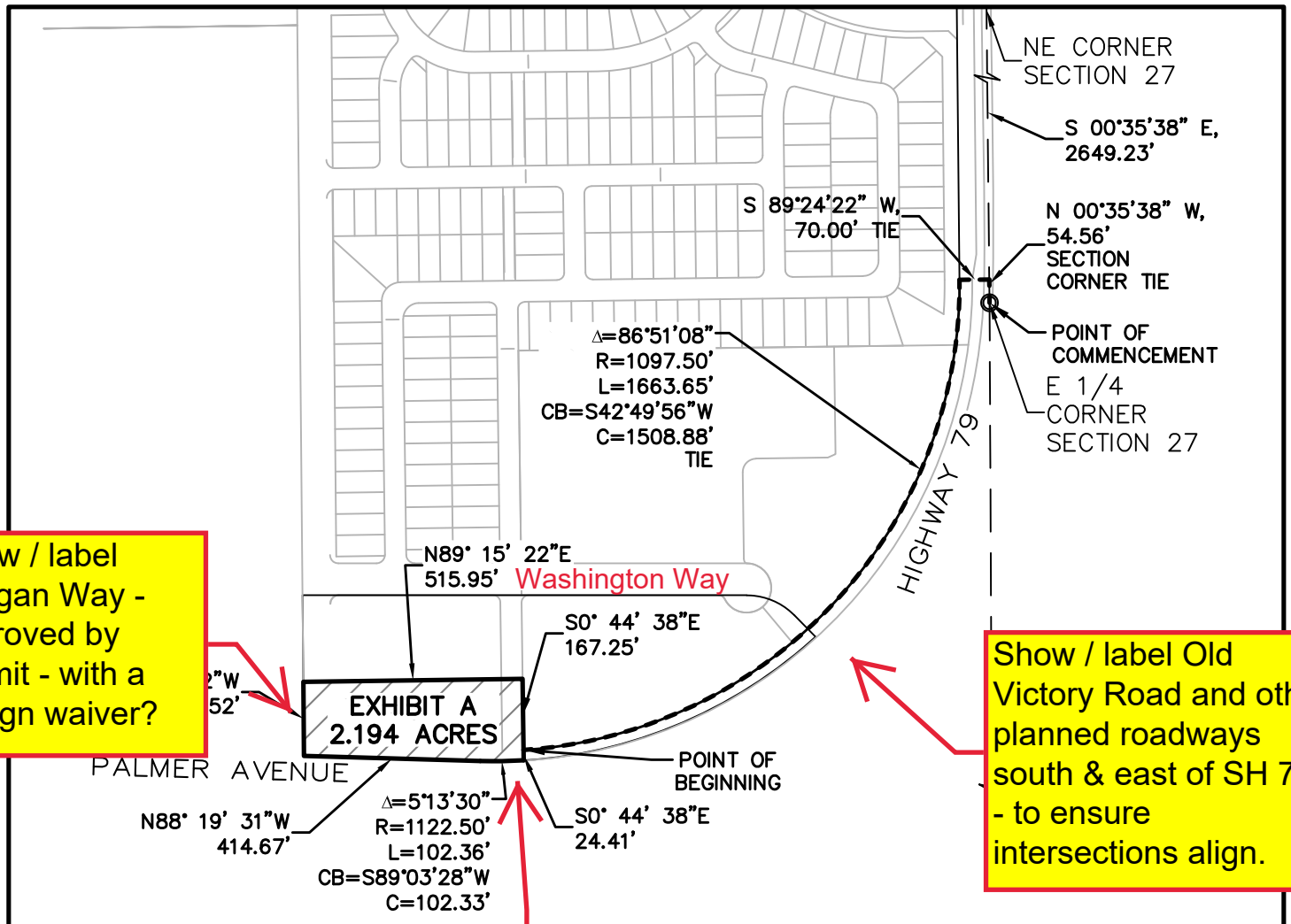
PROJECT NO. 196011004

DWG. NAME BR - COM REZONE- CONCEPT

SHEET NO. 1 of 1 shts

CASE NO.: TBD

Know what's below. Call before you dig.



Show / label Morgan Way - approved by permit - with a design waiver?

Show / label Old Victory Road and other planned roadways south & east of SH 79 - to ensure intersections align.

This roadway connection to SH 79 is NOT shown on either the PEL or ACP.

LEGAL DESCRIPTIO

BEING A PORTION OF THA ETT
RANCH – FILING NO. 1 RE EAST
HALF OF SECTION 27, TOW
COUNTY OF ADAMS, STATE
FOLLOWS:

EXHIBIT A – PROPOSED ZONING C

COMMENCING AT THE EAST 1/4 CORNER OF SAID SECTION, FROM WHENCE THE NORTHEAST CORNER OF SAID NORTHEAST QUARTER (NE 1/4) BEARS SOUTH 00°35'38" EAST A DISTANCE OF 2649.23 FEET, WITH ALL BEARINGS HEREIN RELATED THERETO, TO THE POINT OF COMMENCEMENT;

THENCE NORTH 00°35'38" WEST, 54.56 FEET ALONG THE NE 1/4 OF SAID SECTION;
THENCE SOUTH 89°24'22" WEST, 70.00 FEET TO A POINT ON THE BOUNDARY OF SAID REAL PROPERTY;
THENCE SOUTH WEST ALONG THE BOUNDARY OF SAID REAL PROPERTY THROUGH A CURVE, HAVING A RADIUS OF 1097.50 FEET, WHOSE LONG CHORD BEARS SOUTH 42°49'56" WEST AND HAS A CHORD LENGTH OF 1508.88 FEET, THROUGH A CENTRAL ANGLE OF 86°51'08", FOR AN ARC LENGTH OF 1663.65 FEET, TO THE POINT OF BEGINNING;

THENCE LEAVING SAID BOUNDARY, SOUTH 00°44'38" EAST, 24.41 FEET;
THENCE SOUTHWEST THROUGH A CURVE, HAVING A RADIUS OF 1122.50 FEET, WHOSE LONG CHORD BEARS SOUTH 89°03'28" WEST AND HAS A CHORD LENGTH OF 102.33 FEET, THROUGH A CENTRAL ANGLE OF 05°13'30", FOR AN ARC LENGTH OF 102.36 FEET,
THENCE NORTH 88°19'31" WEST, 414.67 FEET;
THENCE NORTH 00°31'22" WEST, 174.52 FEET;
THENCE NORTH 89°15'22" EAST, 515.95 FEET;
THENCE SOUTH 00°44'38" EAST, 167.25 FEET TO THE POINT OF BEGINNING.

CONTAINING 95,579 SQUARE FEET OR 2.194 ACRES OF LAND, MORE OR LESS.

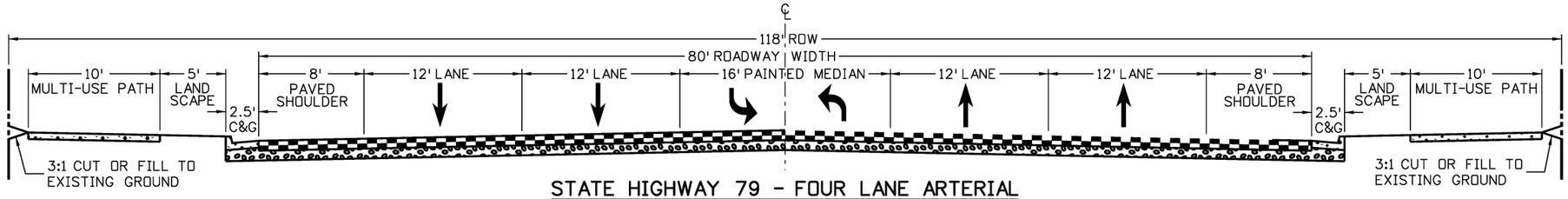
END OF LEGAL DESCRIPTION.

EXHIBIT A
COMMERCIAL ZONE
BENNETT RANCH
BENNETT, COLORADO

CIVILIAN ENGINEERING LLC
P.O. BOX 8
HYGIENE, CO 80533
720.340.1567
CIVILIANENGINEERING.COM

DATE	JOB No.	SHEET
08/02/2022	22311	EXBT A

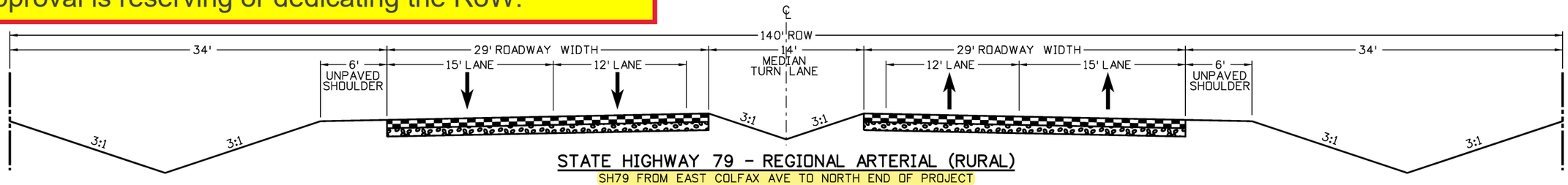
SCALE 1"=400' FEET (200 0 200 400)



STATE HIGHWAY 79 - FOUR LANE ARTERIAL

SH79 FROM I-70 TO EAST COLFAX AVE

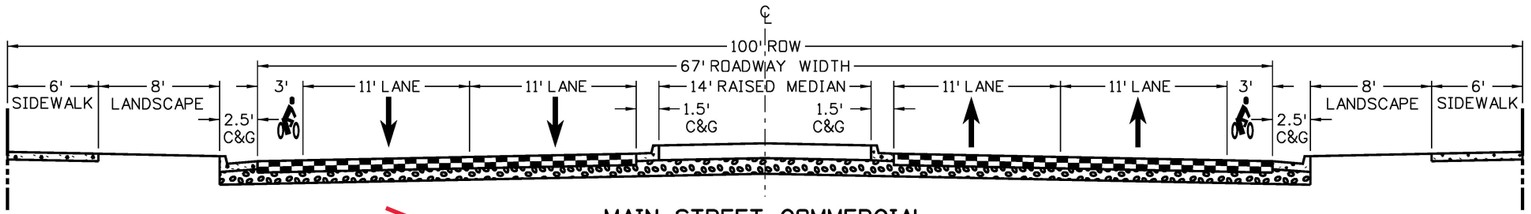
These cross section are in the PEL. Show that the Bennett Platting approval is reserving or dedicating the RoW.



STATE HIGHWAY 79 - REGIONAL ARTERIAL (RURAL)

SH79 FROM EAST COLFAX AVE TO NORTH END OF PROJECT

TYPICAL SECTION IS FROM FIGURE 10b OF THE ADAMS COUNTY TRANSPORTATION PLAN (DEC. 2012)

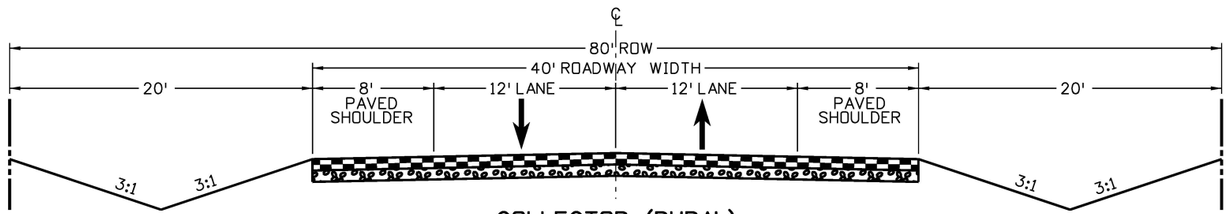


MAIN STREET COMMERCIAL

MAIN STREET

TYPICAL SECTION IS FROM PAGE 15 OF THE TOWN OF BENNETT DOWNTOWN PLANNING STUDY (DEC. 2010)

This would also be SH 36



COLLECTOR (RURAL)

EAST COLFAX AVE
OLD VICTORY ROAD

TYPICAL SECTION IS FROM FIGURE 10b OF THE ADAMS COUNTY TRANSPORTATION PLAN (DEC. 2012)

20406 5:48:20 PM S:\Tranproj\100030877 - SH 79 PEL\Atkins\HwyDes\Plans\30877TYP_SEC01.dgn

Print Date: 10/28/2013	Sheet Revisions			Colorado Department of Transportation	As Constructed
File Name: 30877TYP_SEC01.dgn	Date:	Comments	Init.	7328 S. Revere Parkway, Suite 204A, Centennial, CO 80112	No Revisions:
Horiz. Scale: 1:10 Vert. Scale: As Noted				Phone: 303-365-7234 FAX: 303-790-1037	Revised:
Unit Information Unit Leader Initials				Region 1 DRG	Void:
ATKINS 4601 DTC Boulevard, Suite 700, Denver, CO 80237, Phone: (303) 221-7275 Fax: (303) 221-7276					

SH 79 TYPICAL SECTIONS			Project No./Code
Designer: LDL	Structure Numbers		Project Number
Detailer: LDL			Code
Sheet Subset: TYP SECT	Subset Sheets: 01 of 01		Sheet Number 02

Figure 7-2
ACP: Existing and Proposed Accesses - Interim SH 79 Before Realignment

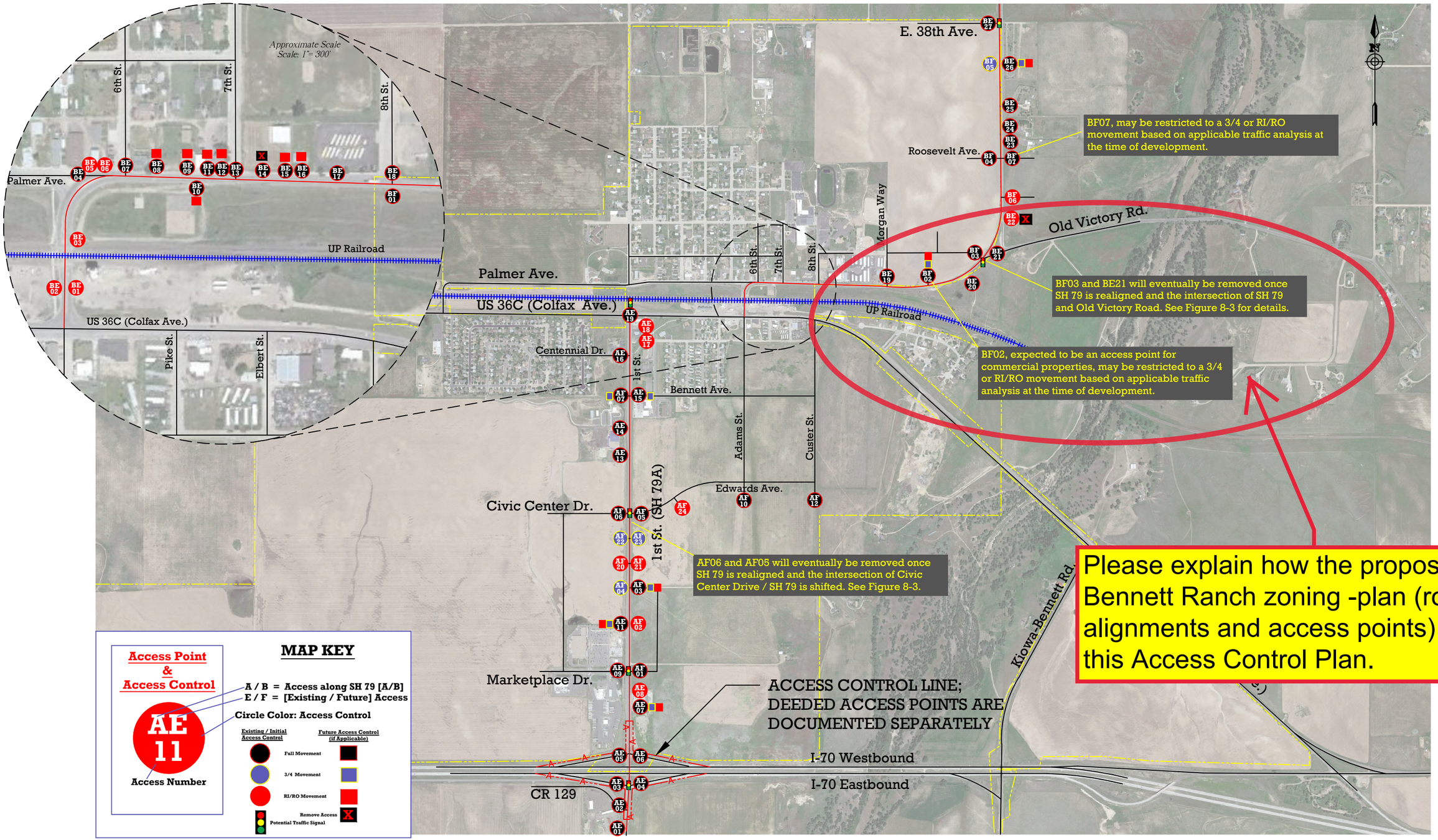


Table 7-2 (1 of 3)
Accesses Supporting Development before SH 79 Realignment

Access ID No.	Mile Post	Access Type	Access Name	Existing Configuration	Proposed Intersection Control	Proposed Configuration	Condition / Trigger
AE01	0.000	Private Drive	Bennett Lumber	Full Movement	Unsignalized	No Change	No Change
AE02	0.073	Public Roadway	CR 129	Full Movement	Unsignalized	No Change	Consider closing/moving to south when property to the west is redeveloped
AE03	0.121	Public Roadway	I-70 EB Off-Ramp	Full Movement	Signalized	No Change	Signalize when warranted
AE04	0.121	Public Roadway	I-70 EB On-Ramp	Full Movement	Signalized	No Change	Signalize when warranted
AE05	0.203	Public Roadway	I-70 WB On-Ramp	Full Movement	Unsignalized	No Change	No Change
AE06	0.203	Public Roadway	I-70 WB Off-Ramp	Full Movement	Unsignalized	No Change	No Change
AE07	0.326	Private Drive	Conoco South Access	Full Movement	Unsignalized	No Change	Convert to 3/4 or RI/RO based on traffic operations
AE08	0.362	Private Drive	Conoco North Access	Right-in/Right-out	Unsignalized	No Change	No Change
AF01	0.442	Public Roadway	Marketplace Dr.	New Access	Signalized	Full Movement	Signalize when warranted
AE09	0.442	Public Roadway	Marketplace Dr.	Full Movement	Signalized	No Change	Signalize when warranted
AF02	0.566	Private Drive	Bennett Crossing F1 Access	New Access	Unsignalized	Right-in/Right-out	New Access
AE11	0.566	Private Drive	King Soopers North Access	Full Movement	Unsignalized	Convert to 3/4 or RI/RO	Convert when requested by CDOT
AF03	0.650	Public Roadway	Pearl St.	New Access	Unsignalized	Full Movement	Convert to 3/4 or RI/RO when requested by CDOT
AF04	0.650	Public Roadway	Pearl St.	New Access	Unsignalized	Three-Quarter	New Access
AF20	0.720	Private Drive		New Access	Unsignalized	Right-in/Right-out	New Access
AF21	0.720	Private Drive		New Access	Unsignalized	Right-in/Right-out	New Access
AF22	0.790	Private Drive		New Access	Unsignalized	3/4 or Right-in/Right-out	New Access
AF23	0.790	Private Drive		New Access	Unsignalized	3/4 or Right-in/Right-out	New Access
AF05	0.870	Public Roadway	Interim Edwards Ave.	New Access	Signalized	Full Movement	Signalize when warranted. Access to move with realignment of SH79
AF06	0.870	Public Roadway	Civic Center Dr.	New Access	Signalized	Full Movement	Signalize when warranted. Access to move with realignment of SH79
AE13	0.903	Private Drive	Water Tank Access	Full Movement	Unsignalized	No Change	No Change
AE14	0.956	Private Drive	Muegge Way	Full Movement	Unsignalized	No Change	No Change
AF24	1.006	Private Drive		New Access	Unsignalized	Right-in/Right-out	New Access
AF07	1.027	Public Roadway	Bennett Ave.	New Access	Unsignalized	Full Movement	If signal warrants met, restrict to 3/4 movement
AE15	1.027	Public Roadway	Bennett Ave.	Full Movement	Unsignalized	Convert to 3/4	If signal warrants met, restrict to 3/4 movement
AE16	1.134	Public Roadway	Centennial Dr.	Full Movement	Unsignalized	No Change	No Change
AF10	1.142	Public Roadway	Adams St.	New Access	Unsignalized*	Full Movement	* Adams St. intersection to be signalized if UPRR crossing NOT constructed at Custer St.
AE17	1.191	Private Drive		Right-in/Right-out	Unsignalized	No Change	Combine with AE18 if possible when redeveloped
AE18	1.203	Private Drive		Right-in/Right-out	Unsignalized	No Change	Combine with AE17 if possible when redeveloped
AE19	1.230	Public Roadway	US 36	Full Movement	Signalized	No Change	Signalize when warranted
AF12	1.331	Public Roadway	Custer St.	New Access	Signalized	Full Movement	Custer St. intersection to be signalized if new RR crossing constructed at Custer St.

Table 7-2 (2 of 3)
Accesses Supporting Development before SH 79 Realignment

Access ID No.	Mile Post	Access Type	Access Name	Existing Configuration	Proposed Intersection Control	Proposed Configuration	Condition / Trigger
BE01	1.602	Private Drive	Roggens Access	Right-in/Right-out	Unsignalized	No Change	No Change
BE02	1.603	Private Drive	Roggens Access	Right-in/Right-out	Unsignalized	No Change	No Change
BE03	1.632	Private Drive	Park Access	Right-in/Right-out	Unsignalized	No Change	No Change
BE04	1.666	Public Roadway	Palmer Ave.	Full Movement	Unsignalized	No Change	No Change
BE05	1.671	Private Drive		Right-in/Right-out	Unsignalized	No Change	Combine with BE06 if possible when redeveloped
BE06	1.677	Private Drive		Right-in/Right-out	Unsignalized	No Change	Combine with BE05 if possible when redeveloped
BE07	1.689	Public Roadway	6th St.	Full Movement	Unsignalized	No Change	No Change
BE08	1.707	Private Drive		Full Movement	Unsignalized	Right-in/Right-out	Conversion will occur with roadway improvements
BE09	1.726	Private Drive		Full Movement	Unsignalized	Right-in/Right-out	Conversion will occur with roadway improvements
BE10	1.732	Private Drive	Park Access	Full Movement	Unsignalized	Right-in/Right-out	Conversion will occur with roadway improvements
BE11	1.740	Private Drive		Full Movement	Unsignalized	Right-in/Right-out	Conversion will occur with roadway improvements
BE12	1.747	Private Drive		Full Movement	Unsignalized	Right-in/Right-out	Conversion will occur with roadway improvements
BE13	1.757	Public Roadway	7th St.	Full Movement	Unsignalized	No Change	No Change
BE14	1.768	Private Drive		Full Movement	Unsignalized	Close Access	Access to be obtained from 7th Street when redeveloped
BE15	1.779	Private Drive		Full Movement	Unsignalized	Right-in/Right-out	Conversion will occur with roadway improvements
BE16	1.785	Private Drive		Full Movement	Unsignalized	Right-in/Right-out	Conversion will occur with roadway improvements
BE17	1.801	Private Drive	Emergency Access	Full Movement	Unsignalized	No Change	No Change
BF01	1.822	Private Drive	Maintenance Acc.	New Access	Unsignalized	Full Movement	Align with 8th Street
BE18	1.822	Public Roadway	8th St.	Full Movement	Unsignalized	No Change	No Change

RE: Bennett Ranch Commercial Rezoning - 2nd Submittal

1 message

Karl Smalley <KSmalley@adcogov.org> Thu, Oct 6, 2022 at 6:38 PM
To: Town of Bennett Planning <planning@bennett.co.us>

The Adams County Sheriff's Office has no objection to this project.

Karl Smalley, Commander

Adams County Sheriff's Office

Strasburg, Co 80136

From: Town of Bennett Planning <planning@bennett.co.us>
Sent: Thursday, October 6, 2022 3:48 PM
To: Karl Smalley <KSmalley@adcogov.org>; Bennett School District 29J ATTN: Robin Purdy <robinp@bsd29j.com>; Bennett School District 29J: ATTN: Keith Yaich <keithy@bsd29j.com>; Robin Price <rprice@bennett.co.us>; Rick Martinez <rmartinez@bennett.co.us>; Daymon Johnson <djohnson@bennett.co.us>; Victoria Flamini <VictoriaFlamini@bennettfirerescue.org>; Bennett Watkins Fire Rescue <calebconnor@bennettfirerescue.org>; Colorado Department of Transportation (CDOT) Assistant Access Manager <david.dixon@state.co.us>; steven.loeffler <steven.loeffler@state.co.us>; Eastern Slope Rural Telephone <patw@esrta.com>; Brooks Kaufman <BKaufman@core.coop>; Jehn Water Consultants Inc <gburke@jehnwater.com>; Melinda Culley <melinda@kellypc.com>; Daniel Giroux <dangiroux@terramax.us>; Chad Bunger <cbunger@bennett.co.us>; Steve Hebert <shebert@bennett.co.us>; Heugh, Michael <Michael.Heugh@jacobs.com>
Subject: Bennett Ranch Commercial Rezoning - 2nd Submittal

Hello again,

Below is a Dropbox link to the Bennett Ranch Commercial Rezoning - 2nd Submittal. We appreciate your review and comments. Please send your comments back via this email address or by mail to Town Hall by October 27, 2022.

https://www.dropbox.com/scl/fo/fm2lxfjwzntspzy7jb5bt/h?dl=0&rlkey=b6v2j40lnd57wc9euvienlokj

If you have any questions, please email or call Steve Hebert at shebert@bennett.co.us or the phone number below.

town of Bennett welcome neighbors.
Planning Department
207 Muegge Way | Bennett CO, 80102
(303)644-3249 | planning@bennett.co.us
townofbennett.colorado.gov

BENNETT SCHOOL DISTRICT 29J

April 27, 2021

Town of Bennett
207 Muegge Way
Bennett, CO 80102

RE: Case No. 21.08 – Bennett Ranch Commercial – Rezoning

Dear Steve;

Bennett School District 29J is pleased to review the rezoning proposal for Bennett Ranch Commercial. The application is for 9.03 acres of land being rezoned from General Commercial to R-3 multifamily zoning. The proposal indicates the units will be townhomes. No estimate on the number of units was provided with the application, but the R-3 zoning allows 1 dwelling unit per 2,400 s.f. or 18 dwelling units per acre.

The Application proposes residential development for property located within the School District's boundaries and, therefore, will have an impact on the School District's responsibility to provide adequate school facilities. Consequently, the School Dedication requirements must be met per Division 5 of the Bennett Municipal Code. The application does not indicate the number of dwelling units proposed for this property, but the calculations will be in the high density housing type per Section 16-5-510 of the Bennett Municipal Code.

The District will discuss the land dedication requirements with the Developer as the project moves forward anticipating that cash-in-lieu of land will be required due to the project size and location within the District. A development agreement will be drafted with the final plat approval to confirm the school dedication requirements.

Finally, the District is engaged in a Master Plan update that will result in forecasting growth within the District boundaries and the approximate location of new school sites and associated facilities. We are working with the Town's and Counties to assist in the analysis and planning to ensure the best outcome for the communities moving forward. The majority of our work should be completed the first half of the year. We believe this will have a positive benefit for Bennett Ranch community.

The School District respectfully requests the opportunity to evaluate the land dedication requirements through a development agreement when the project progresses through the platting process and the number of townhome units are determined. The District looks forward to working with the developer to address the dedication and safe routes to school as they move through the site planning and platting process.

615 7th Street Bennett, CO 80102 303-644-3234 PHONE 303-644-4121 FAX
Keithy@bsd29j.com www.bsd29j.com

Sincerely,

Mrs. Robin Purdy
School Superintendent

Mr. Keith Yaich
Chief Financial Officer

615 7th Street Bennett, CO 80102 303-644-3234 PHONE 303-644-4121 FAX
Keithy@bsd29j.com www.bsd29j.com

henry
design
group
1501 Wazee Street Suite 1-C, Denver, Colorado 80202
303.446.2368 • henrydesigngroup.com

March 23, 2021

Steve Hebert, Planning and Economic Development Manager
Town of Bennett
207 Muegge Way
Bennett, CO 80101

Re: Bennett Ranch – Zoning Amendment

Dear Mr. Hebert,

The amendment to the zoning of Bennett Ranch is intended to allow for additional housing variety and contribute to the community of Bennett. The 9.03 acres located in the southwest corner of the Bennett Ranch Subdivision are currently zoned General General Commercial District and we propose the site be rezoned for R-3 High Density Residential with the anticifpation of townhome residential units.

Thank you for your time and efforts in reviewing this proposal and we look forward to working with the Town of Bennett to see this neighborhood to fruition.

Respectfully submitted:

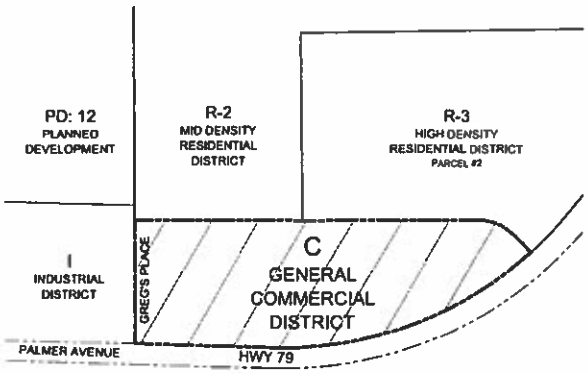
Karen Z. Henry

Karen Z. Henry, Principal

ZONING AMENDMENT
BENNETT RANCH

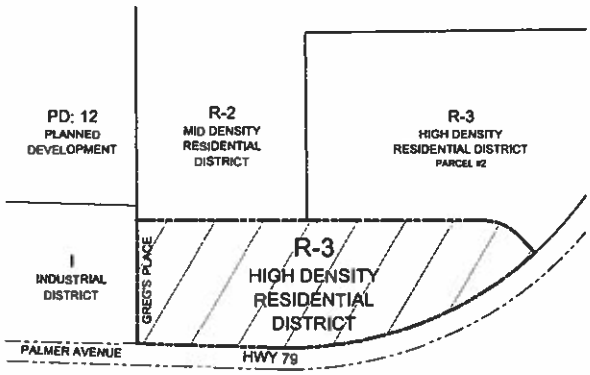
A PARCEL OF LAND LOCATED IN THE EAST ONE-HALF OF SECTION 27, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE SIXTH PRINCIPAL MERIDIAN, TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
173.36 ACRES TOTAL

EXISTING ZONING



A-1
ADAMS COUNTY

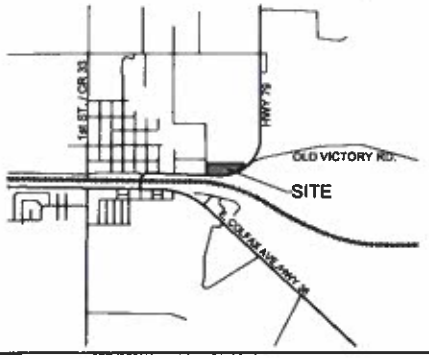
PROPOSED ZONING



A-1
ADAMS COUNTY

VICINITY MAP

SCALE 1" = 2,000'



LEGAL DESCRIPTION

SEE ATTACHED EXHIBIT A FOR LEGAL DESCRIPTIONS

Bennett Ranch, LLC

H

THE HENRY DESIGN GROUP

BENNETT RANCH
Zoning Amendment
Bennett, Colorado

ISSUE DATE 3-23-2021

REVISIONS:

1 of 1

BENNETT PLANNING AND ZONING COMMISSION

RESOLUTION NO. 2023-01

A RESOLUTION OF THE BENNETT PLANNING AND ZONING COMMISSION RECOMMENDING APPROVAL OF A REZONING FOR 6.84 ACRES IN THE BENNETT RANCH FILING No. 1 SUBDIVISION

WHEREAS, there has been submitted to the Planning and Zoning Commission of the Town of Bennett a request for approval of a rezoning of 6.84 acres in the Bennett Ranch Filing No. 1 Subdivision, which property is legally described in Exhibit A (the "Property"); and

WHEREAS, the Property is currently zoned C – General Commercial District and the proposed zoning for the Property is R-3 – High Density Residential District; and

WHEREAS, all materials related to the proposed rezoning have been reviewed by Town Staff and found to be in compliance with Town ordinances, regulations, and policies; and

WHEREAS, after a duly-noticed public hearing, at which evidence and testimony were entered into the record, the Planning and Zoning Commission finds that the proposed rezoning should be approved.

NOW, THEREFORE, BE IT RESOLVED BY THE PLANNING AND ZONING COMMISSION OF THE TOWN OF BENNETT, COLORADO:

Section 1. The Planning and Zoning Commission of the Town of Bennett hereby recommends that the property described in Exhibit A be rezoned from C – General Commercial District to R-3 High Density Residential District.

PASSED AND ADOPTED this ____ day of March 2023.

_____
Martin Metsker, Chairperson

ATTEST:

_____
Secretary

Suggested Motion

I move to approve Resolution No. 2023-01 - A Resolution of the Bennett Planning and Zoning Commission Recommending Approval of a Rezoning for 6.84 Acres in the Bennett Ranch Filing No. 1 Subdivision.

QUASI-JUDICIAL PUBLIC HEARING SCRIPT
(PLANNING COMMISSION)

CHAIR: I will now open the public hearing on the following application: Case No. PZ2022-0016 - Muegge Farms Filing No. 7 Final Plat

The purpose of the hearing is to provide a public forum for all interested parties who wish to comment on an application before the Commission. If you wish to speak please write your name and address on the sign-up sheet or in the chat box and you will be called on.

The Procedure for the public hearing will be as follows:

FIRST, there will be a presentation by the Town staff.

NEXT, we will have a presentation by the applicant.

After these two presentations we will allow people who signed up to speak for up to 3 minutes each. Please DO NOT REPEAT points made by others. It is fine to say, "I agree with the previous speaker's comments". Please direct your comments to the Commission, not the applicant or Town staff.

After receiving public comments, we will allow the applicant an opportunity to respond.

NEXT, the Planning Commission members may ask questions of anyone who testified.

I will then close the public hearing and no further testimony or other evidence will be received. The Planning Commission will discuss the matter and may take some kind of action.

Public hearings are recorded for the public record. All testimony must be presented, after you give your full name and address.

CHAIR: Do we have proper notification?

[Secretary to confirm on record notice has been provided]

Do any Commission members have any disclosures?

[Commissioners to disclose conflicts of interests, ex parte contacts, etc]

Town staff, please introduce the applicant and provide your staff report.

[Staff presentation]

Will the applicant or the applicant's representative present the application?

[Applicant presentation]

Do any of the Commissioners have questions of the applicant or Town staff?
[Question and Answer]

CHAIR: I will now open the public comment portion of the public hearing. For those wishing to speak, please clearly state your name and address for the record.

Has anyone signed up to speak at this public hearing?

[If more than one person has signed in, call them in order.]

Is there any interested party in the audience that has not signed up but who wishes to speak regarding the application?

[Additional public comment]

If there is no more public comment, I will now close the public comment portion of the public hearing.

CHAIR: Does the applicant wish to respond to any of the comments?

[Opportunity for applicant to provide any rebuttal evidence]

CHAIR: Before we turn to Commissioner questions and deliberation, I want to state that the documents included within the record for this public hearing include all application materials submitted by the applicant; all materials included in the Planning Commission packets; any PowerPoint or other presentations given tonight; all written referral and public comments received regarding the application; the public comment sign-up sheet; the public posting log and photographs of the notice, and the Town's subdivision and zoning ordinances and other applicable regulations. Does anyone have any objection to inclusion of these items in the record?

CHAIR: I will now close the public hearing and the Planning Commission members will deliberate on the evidence presented. During deliberations, Commission members may ask questions of Town staff, but no further public comment or other testimony or evidence will be received.

Who would like to begin?
Who is next?
Any other questions or comments

[If anyone believes the applicable criteria have not been met, then please explain why so we have those reasons for the record.]

CHAIR: We have a draft Resolution in front of us and I would entertain a motion.

We have a motion on the floor by Commissioner _____ and a second by Commissioner _____ to approve Planning and Zoning Commission Resolution No. 2023-02.

May we have a Roll-Call vote?

Motion carries/fails.

STAFF REPORT

TO: Members of the Planning and Zoning Commission

FROM: Steve Hebert, Planning Manager

DATE: March 27,2023

SUBJECT: Case No. PZ 2022-0016 Muegge Farms Filing No. 7 Final Plat

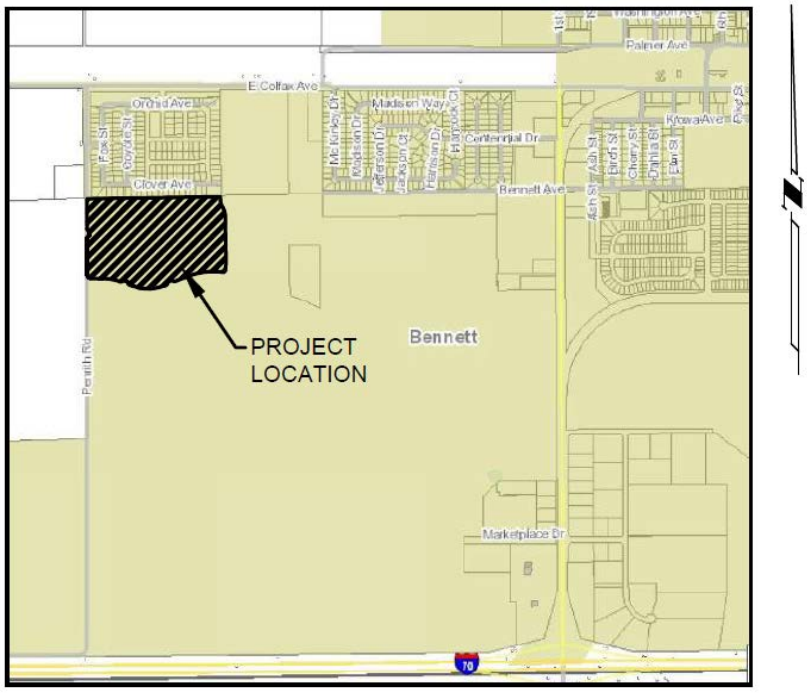
Applicant/Representative(s): Muegge Farms, LLC/MGV Investments, LLC, John Vitella/Jim Marshall

Location: South of SkyView and Brunner Subdivisions and North of the Future Civic Center Drive

Purpose: Subdivide 60.6 Acres into 243 Single-family Detached Lots, Tracts and Easements

Background

The applicant has submitted a final plat application to subdivide 60.6 acres for 243 single-family detached lots; various tracts for parks, trails, landscaping and storm drainage. The property is located immediately south of the SkyView and Brunner subdivisions. The plat is bordered on the west by the future Penrith Road extension, on the south by the future Civic Center Drive and on the east by Lark Sparrow Way. See the vicinity map below. The Planning and Zoning Commission reviewed a sketch plan for the project on May 23, 2022.



VICINITY MAP

The property is zoned PD as part of the Muegge Farms Outline Development Plan (ODP) and lies within Planning Area 1 (PA-1) of the ODP. Allowed uses in the PA-1 subzone include both single-family and multi-family residential and related uses.

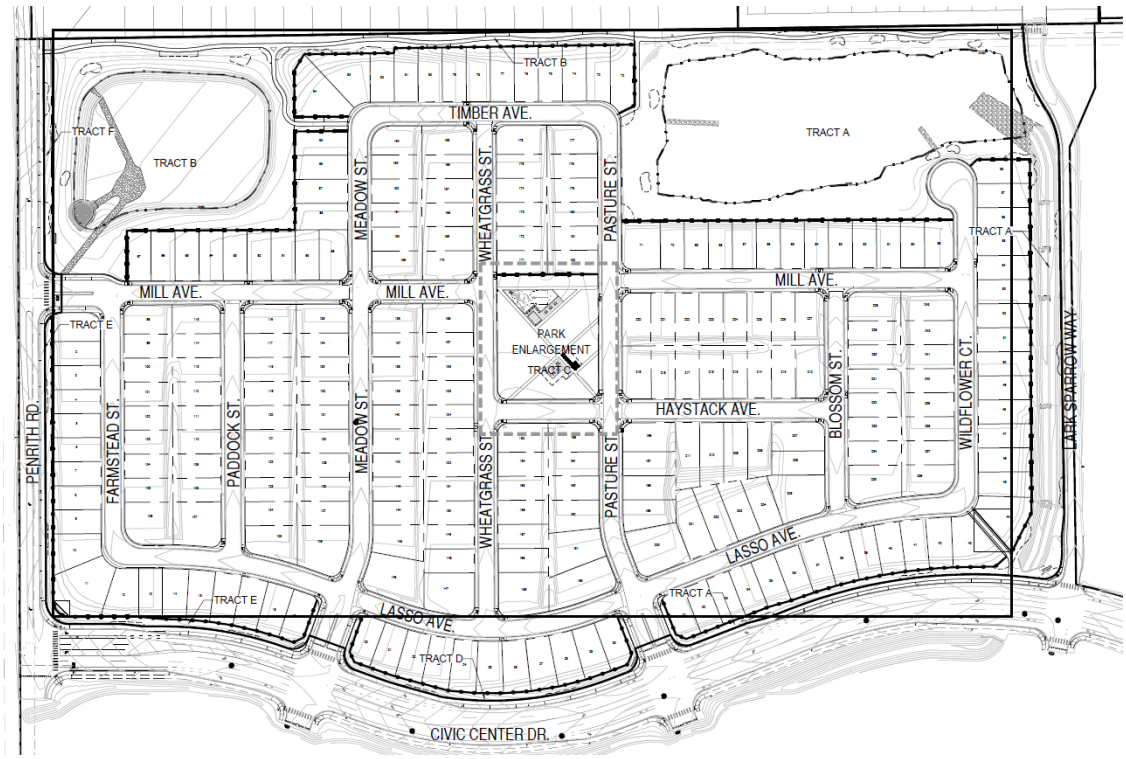
Site Photos

Looking Southeast from Penrith Rd.

Looking Northwest from Muegge Farms Filing 4 Subdivision

Proposed Lot Layout

The map below shows the proposed lot layout and street configuration, as depicted on the Final Development Plan, which accompanies the final plat.



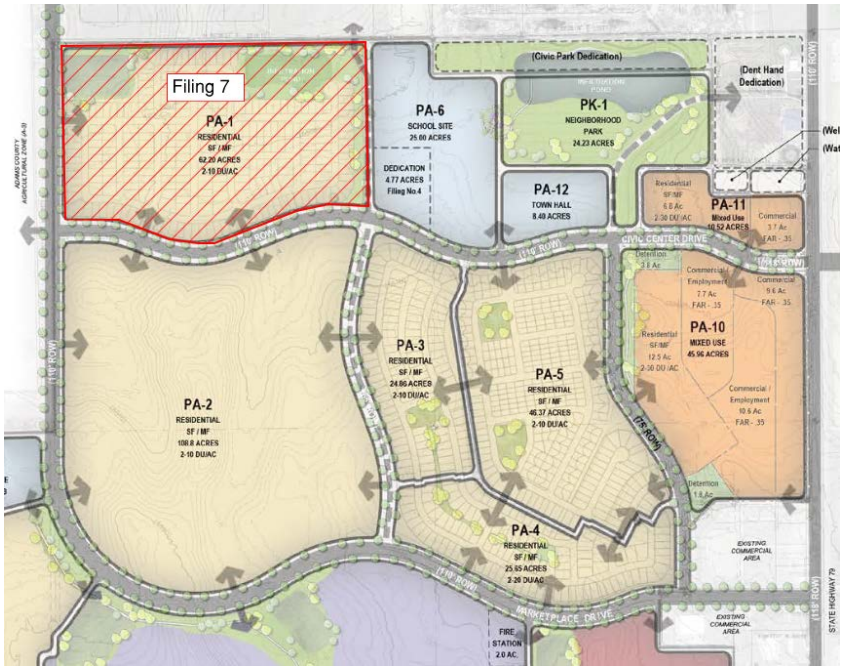
Access to the subdivision will be via an extension of Penrith Road south to the new Civic Center Drive. Civic Center Drive serves as the southern border of the subdivision. Construction documents are being reviewed by the Town and the road is expected to be under construction this summer. There will be a series of local streets serving the 243 lots. In addition, there is a proposed 1.25-acre park in the middle of the subdivision, along with tracts set aside for open space and stormwater detention.

The table below summarizes the proposed land uses and lot sizes.

LAND USE		
COVERAGE	AREA (ACRES)	PERCENT TOTAL
SINGLE FAMILY DETACHED RESIDENTIAL LOTS (243)	32.305	53.32%
PROPOSED RIGHT-OF-WAY	11.635	19.20%
DETENTION/PARK/OPEN SPACE TRACTS (6)	16.647	27.48%
OVERALL SITE AREA	60.587	100.00%
LARGEST LOT	11,835 SF	
SMALLEST LOT	4,836 SF	
AVERAGE LOT	5,782 SF	

Zoning and Land Use Regulations

Below is a subsection of the Muegge Farms Outline Development Plan. The Muegge Farms Filing No. 7 area is crosshatched.



The PA-1 subarea allows both single family and multi-family residential land uses, with a density range of 2-10 dwelling units (DUs)/acre. Other land uses allowed in PA-1 include public and private parks and open space, roads and parking, schools, religious institutions, group homes, accessory uses and home occupations.

The bulk and dimension standards in the ODP for PA-1 are listed in the table below. The ODP does not establish minimum lot sizes, just maximum densities.

BULK & DIMENSION STANDARDS

Land Use Category	Single-Family Detached	
	Single Lot	Clustered Lot
Minimum Lot Area		
Front Loaded		
Alley Loaded		
Front Yard Setback (minimum) [2,5,6]		
Front Loaded	10'	10'
Alley Loaded	5'	5'
Side Loaded	12'	10'
Side Yard Setback (minimum) [2]		
Front Loaded	5' (7' on Corner Lots)	5' (10' on Corner Lots)
Alley Loaded	5' (7' on Corner Lots)	5' (7' on Corner Lots)
Rear Yard Setback (minimum) [2,4]		
Front Loaded	10'	5'
Alley Loaded	4'	4'
Building Separation (minimum)	Building Code or 10' [7]	Building Code or 10' [7]
Maximum Building Height (Principal)	35'	35'
Maximum Building Height (Accessory)	20'	20'
Off-Street Parking Requirements	2 per Dwelling Unit	2 per Dwelling Unit

Surrounding Zoning and Land Use

The surrounding zoning and land uses are summarized in the table below.

Direction	Zone District	Current Land Use
North	R-2	Vacant (Brunner) & single-family residential (SkyView)
East	PD (school site)	Vacant
South	PD – Residential	Vacant
West	A-3 (Unincorporated Adams Co.)	Agricultural

Public Services and Utilities

Water
Water service will be provided by the Town of Bennett.

Sanitary Sewer
Sanitary sewer service will be provided by the Town of Bennett.

Stormwater Management
Stormwater will be accommodated by the Muegge Farms regional stormwater system, including two stormwater ponds on the north side of the subdivision.

Access and Traffic
Access will be via the soon to be constructed Civic Center Drive and the extension of Penrith Road, which will connect to Civic Center Drive. These streets and other streets within the Muegge Farms community will provide convenient vehicular, bike and pedestrian access north to East Colfax Avenue and east to CO Highway 79 and shopping at the Bennett Marketplace. The attached Traffic Impact Analysis compliance letter indicates the proposed final plat is consistent with the 2019 Master Traffic Impact Analysis, which included 276 dwelling units in PA-1. The proposed plat includes 243 units, just 88 percent of the original projection.

Fire and Rescue
Bennett-Watkins Fire Rescue (BWFR) will provide service. During the subdivision and development process, the applicant should meet directly with BWFR to review specific site and building plans to assure conformance with International Fire Code standards.

Gas, Electricity and Telecommunications
Natural gas will be provided by Colorado Natural Gas, electricity by CORE Electric Cooperative and telecommunications by Eastern Slope Technologies (ESRTA) or Comcast.

Public Land Dedication Requirements

Park Land and Public Facilities
Over time, the owner of the Muegge Farms master-planned community has dedicated public land to the Town of Bennett, consistent with the requirement of the Bennett Municipal Code. The 1.25-acre park will be considered part of the overall land dedication.

Bennett School District 29J
The Bennett School District 29J has indicated their preference for cash-in-lieu of land dedication, which will be payable pursuant to the Town of Bennett/School District IGA and the municipal code in effect at the time of building permit issuance or subdivision agreement.

Staff Analysis and Findings

Per Section 16-4-380 of the Bennett Municipal Code, the Town shall use the following criteria to evaluate the applicant's final plat application:

A. The final plat incorporates recommended changes, modifications and conditions attached to the sketch plan unless otherwise approved by the Planning Commission.

Staff Finding: The final plat is consistent with the previous sketch plan reviewed by the Planning and Zoning Commission in May 2022.

B. All applicable technical standards in accordance with this Chapter and adopted Town documents have been met.
   1. To establish appropriate standards for subdivision design that will:
      a. Encourage the development of sound, economical and stable neighborhoods and healthy living environments, in conformance with the goals and policies of the Comprehensive Plan.
      b. Provide lots of adequate size, configuration and design for the purpose for which they are intended to be used.
      c. Promote superior design and design flexibility.
      d. Preserve the significant natural features and environmental quality of the Town.
      e. Guide the physical development of the Town in ways that complement the Town's character and culture.
      f. Promote a cohesive sense of community among new and current residents, precluding neighborhood design or restrictions that in any way isolate any neighborhood from the rest of the community.
      g. Provide complete and accurate public land records.

Staff Finding: The proposed final plat will accommodate new development that meets the standards of good subdivision design. Tract C is a 1.248- acre park. There are several tracts that will accommodate future sidewalks and trail connections. Various other tracts will accommodate open space, landscaping, stormwater and utilities.

   2. To establish standards for utilities and other public services that will:
      a. Provide an efficient, adequate and economical supply of utilities and services to the land proposed for development without adverse effects to property that is currently served.
      b. Ensure that adequate stormwater drainage, sewage disposal, water supply and other utilities, services and improvements needed as a consequence of the subdivision of the land are provided.
      c. Provide for the reasonable extension of utilities and services to other lands that may be developed in the future.
      d. Provide the equitable distribution of the cost of new and expanded public services needed to support new land development.

Staff Finding: The proposed final plat, future subdivision agreement and construction documents will accommodate the extension of utilities and public services to serve the new residential neighborhood.

3. To ensure the provision of adequate and safe traffic circulation that will:
   a. Minimize traffic hazards through appropriate street design, providing safe and convenient vehicular and pedestrian traffic circulation systems.
   b. Provide adequate vehicular access to abutting properties.
   c. Provide streets of adequate capacity and appropriate design and function.

Staff Finding: Staff finds the proposed subdivision will accommodate future vehicular and pedestrian access to the single-family residential lots as well as the remaining tracts.

4. To ensure adequate public facilities that will:
   a. Provide for the recreational, cultural, educational and other public facility needs of the community.
   b. Facilitate effective law enforcement and fire protection.

Staff Finding: The proposed final plat reserves a park tract and provides a series of internal tracts for sidewalk and trails that accommodate pedestrian connections to the neighborhood and the surrounding community. The applicant will be required to pay cash-in-lieu of school land dedication, as well as the standard Town impact fees for public facilities

5. To contribute to the proper development of the community in accordance with the goals and policies of the Comprehensive Plan as it may be updated from time to time.

Staff Finding: The proposed plat is consistent with the principles in the 2021 Town of Bennett Comprehensive Plan related to:

- **Mixed land uses**
- **Access to healthy living**
- **Access to open space, trails and parks**
- **Contiguous development**
- **A variety of transportation choices**

C. Compliance with Zoning Regulations

Staff Finding: All lots meet the standards in the Muegge Farms Outline Development Plan, as noted above.

Referral Agency Review and Comments

The proposed Muegge Farms Filing No. 7 Final Plat was sent to several referral agencies for comment, including:

1. Town Planning
2. Town Engineer
3. Town Traffic Engineer
4. Town Attorney

5. Bennett-Watkins Fire Rescue (BWFR)
6. CORE Electric Cooperative
7. Colorado Natural Gas (CNG)
8. Bennett School District 29J

Each of the agencies had comments or recommendations that are either reflected on the final plat document or will be addressed at later stages of the review process such as the site plan or building permit. General cleanup of the document to include all agency comments will be completed before recording.

Public Comment

Notice of the March 27, 2023 Planning and Zoning Commission hearing and the April 11, 2023 Board of Trustees hearing was published in the Eastern Colorado News, posted on the subject property and sent to all property owners within 300 feet of the property. No comments, other than those from the referral agencies, have been received to date.

Staff Recommendation

Staff finds the proposed final plat is in compliance with the Subdivision Regulations in Chapter 16, Article IV of the Bennett Municipal Code. Staff also finds the plat has been processed according to Section 16-4-360 and meets the approval criteria in 16-4-380. Based upon these findings, Staff recommends the Planning and Zoning Commission adopt Resolution No. 2023-02, recommending the Board of Trustees approve Case No. PZ 2022-0016 - Muegge Farms Filing 7 Final Plat, with the following conditions:

1. Before recording the plat, the applicant shall update plat notes related to tracts, easements and maintenance in a manner directed by the Town Engineer and make other minor modifications as directed by Town Staff, Engineer and Attorney.

Attachments

1. Staff PowerPoint Presentation (PDF)
2. Letter of Intent/Narrative
3. Muegge Farms Filing No. 7 Final Plat
4. Muegge Farms Outline Development Plan
5. Combined Staff and Referral Agency Comments
6. Muegge Farms Filing No. 7 (PA-1) Traffic Impact Compliance Letter
7. Proposed Resolution No. 2023-02

Case No. PZ 2022-0016
Muegge Farms Filing No. 7
Final Plat

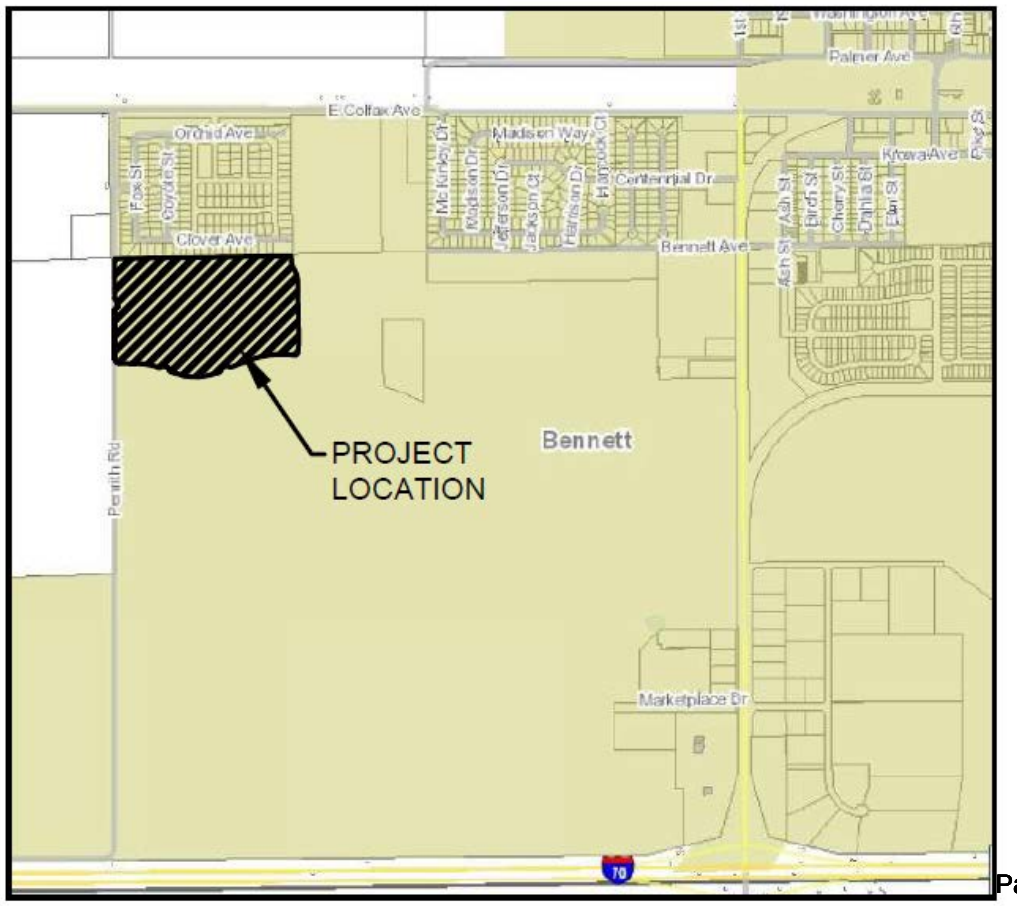
Planning and Zoning Commission

March 27, 2023

Steve Hebert, Planning Manager

Proposed Muegge Farms Filing No. 7 Final Plat

- 60.6 acres in Muegge Farms
- South of SkyView and Brunner Subdivisions and North of the Future Civic Center Drive
- Zoned Planned Development (PD) in Muegge Farms Outline Development Plan (ODP)
- PA-1 Subarea Zone allows single and multi-family land uses



VICINITY MAP

Muegge Farms Filing 7 Site Photos

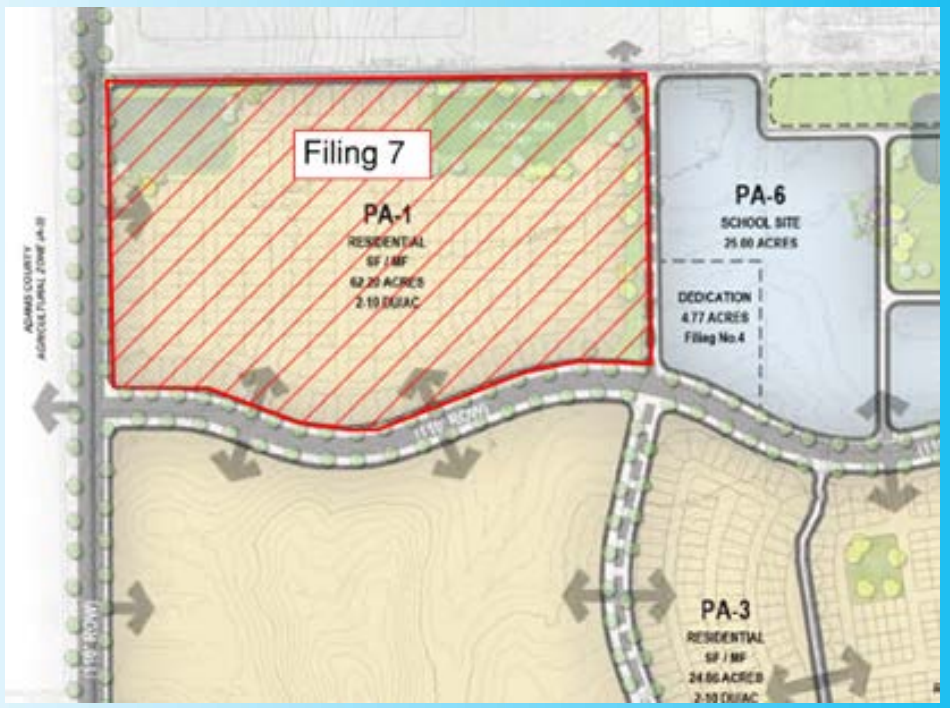
Looking Southeast from Penrith Rd.

Looking Northwest from Muegge Farms Filing No. 4 Subdivision (Oakwood)

Muegge Farms Outline Development Plan (ODP)

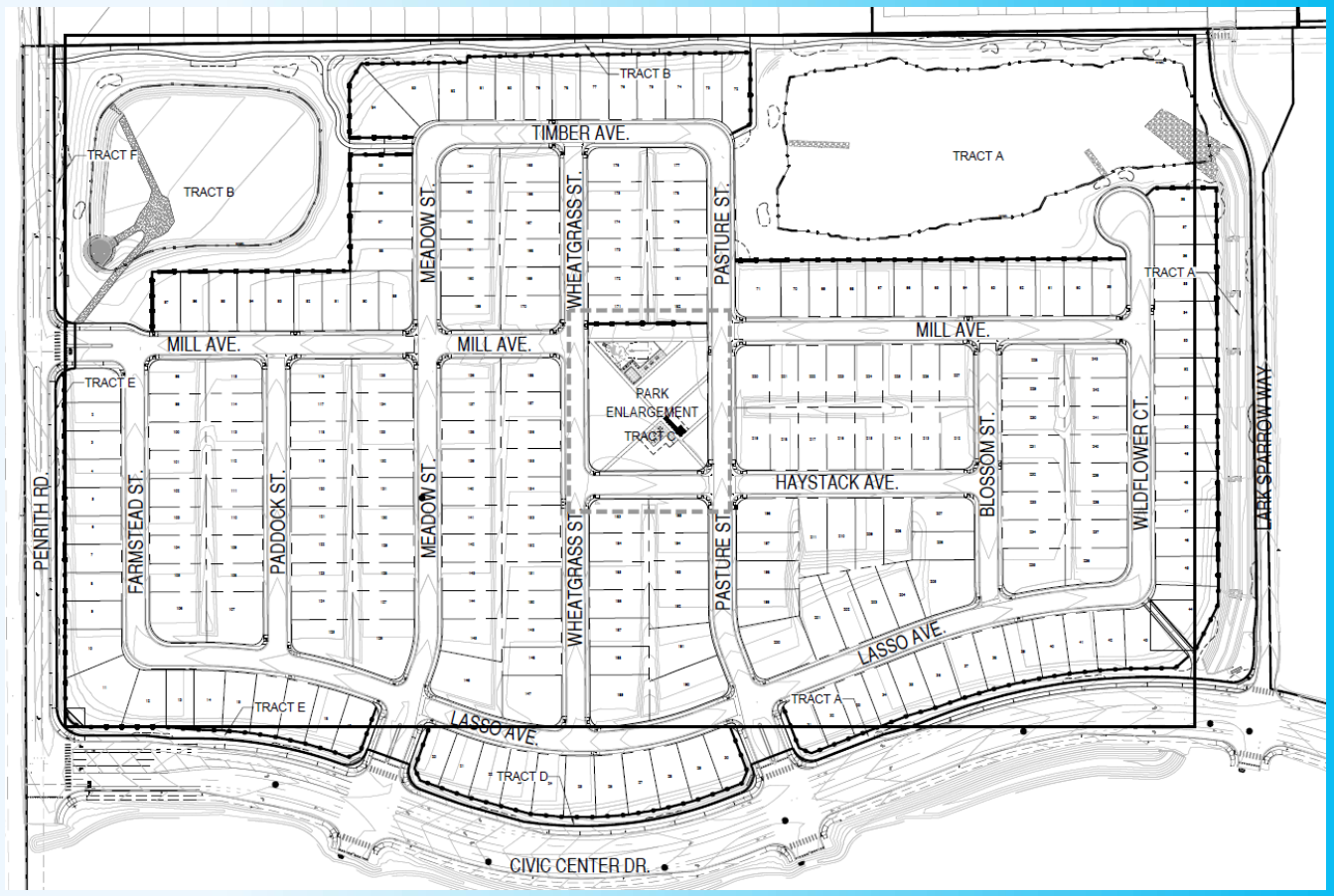
Single-Family and Multi-Family

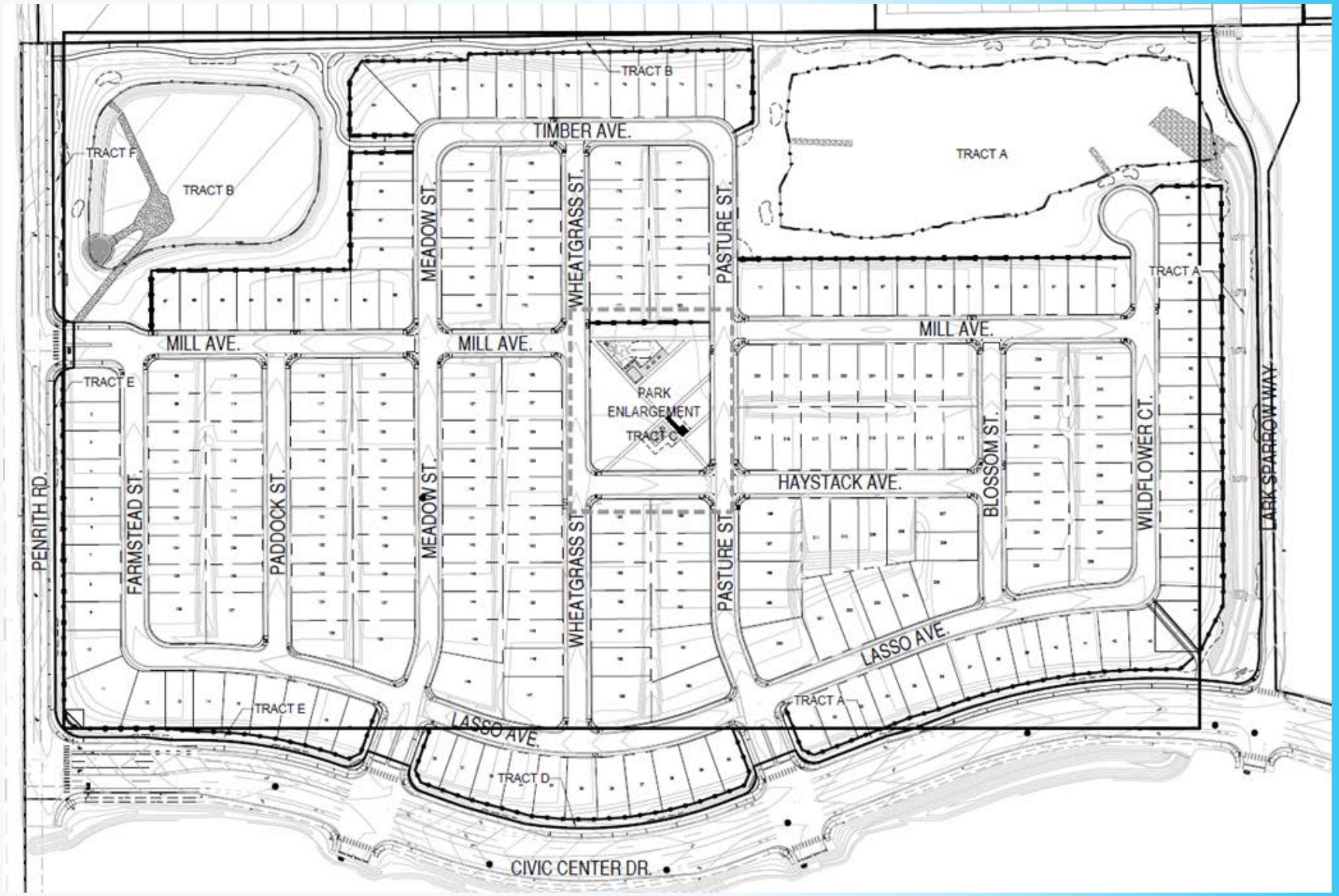
2–10 Dwelling Units/Acre in PA-1



Proposed Muegge Farms Filing No. 7

- 243 single-family lots
- Smallest lot – 4,836 sq. ft.
- Largest lot – 11,835 sq. ft.
- Average lot size is 5,782 sq. ft.
- 1.25-acre park
- Several open space, landscape and drainage tracts




TRACT B
TIMBER AVE.
TRACT F
TRACT B
TRACT A
MEADOW ST.
WHEATGRASS ST.
PASTURE ST.
TRACT A
MILL AVE.
MILL AVE.
MILL AVE.
TRACT E
PARK
ENLARGEMENT
TRACT C
PENRITH RD.
FARMSTEAD ST.
PADDOCK ST.
MEADOW ST.
WHEATGRASS ST.
PASTURE ST.
HAYSTACK AVE.
BLOSSOM ST.
WILDFLOWER CT.
LARK SPARROW WAY
LASSO AVE.
TRACT E
TRACT A
LASSO AVE.
TRACT D
CIVIC CENTER DR.

LAND USE

COVERAGE	AREA (ACRES)	PERCENT TOTAL
SINGLE FAMILY DETACHED RESIDENTIAL LOTS (243)	32.305	53.32%
PROPOSED RIGHT-OF-WAY	11.635	19.20%
DETENTION/PARK/OPEN SPACE TRACTS (6)	16.647	27.48%
OVERALL SITE AREA	60.587	100.00%
LARGEST LOT	11,835 SF	
SMALLEST LOT	4,836 SF	
AVERAGE LOT	5,782 SF	

Muegge Farms ODP Bulk & Dimension Standards

BULK & DIMENSION STANDARDS

Land Use Category	Single-Family Detached	
	Single Lot	Clustered Lot
Minimum Lot Area		
Front Loaded		
Alley Loaded		
Front Yard Setback (minimum) [2,5,6]		
Front Loaded	10'	10'
Alley Loaded	5'	5'
Side Loaded	12'	10'
Side Yard Setback (minimum) [2]		
Front Loaded	5' (7' on Corner Lots)	5' (10' on Corner Lots)
Alley Loaded	5' (7' on Corner Lots)	5' (7' on Corner Lots)
Rear Yard Setback (minimum) [2,4]		
Front Loaded	10'	5'
Alley Loaded	4'	4'
Building Separation (minimum)	Building Code or 10' [7]	Building Code or 10' [7]
Maximum Building Height (Principal)	35'	35'
Maximum Building Height (Accessory)	20'	20'
Off-Street Parking Requirements	2 per Dwelling Unit	2 per Dwelling Unit

Availability of Public Infrastructure

- Access – Penrith Road, Civic Center Drive, new local streets
- Water and Sewer – Town of Bennett
- Stormwater – Muegge Farms regional system
- Fire Protection – Bennett-Watkins Fire Rescue
- Law Enforcement – Adams County Sheriff
- Electricity – CORE Electric Cooperative
- Natural Gas – Colorado Natural Gas
- Telecom – Eastern Slope Technologies or Comcast
- Bennett School District - Cash-in-lieu

Staff Findings on Case No. PZ 2022-0016

Per Section 16-4-380 of the Bennett Municipal Code, the Town shall use the following criteria to evaluate the applicant's final plat application:

- Generally consistent with the Sketch Plan, with updates and improvements.
- All applicable technical standards in accordance with the Subdivision Regulations and adopted Town documents will be met.
- The proposed lot configuration will accommodate new development that meets the standards of good subdivision design, subject to improved vehicular access.
- The final plat document will accommodate extension of utilities and public services to serve future development.
- Public facilities will include improved parks, trails, stormwater and transportation facilities.
- All lots meet the standards of Muegge Farms ODP, and the related PA-1 sub-area zone district in the ODP.

Staff Recommendation

Staff recommends the Planning and Zoning Commission adopt Resolution No. 2023-02 recommending approval of the Muegge Farms Filing No. 7 Final Plat, with the following conditions:

1. Before recording the plat, the applicant shall update plat notes related to tracts, easements and maintenance in a manner directed by the Town Engineer and make other minor modifications as directed by Town Staff, Engineer and Attorney.

(See Resolution)

LETTER OF INTENT

April 11, 2022

Steve Hebert, AICP
Planning & Economic Development Manager
207 Muegge Way | Bennett CO, 80102
(303)644-3249 ext. 1030 | shebert@bennett.co.us
townofbennett.colorado.gov

Dear Steve,

OUR VISION

Where and how we choose to live can affect our health and well-being. Whether we call ourselves first time home buyers, move up family home buyers, empty-nesters, active adults, near-seniors, or residents, "community" is more important than ever. Where and how we choose to live makes a difference. It matters even more as we grow. The neighborhood and housing we select can help keep us stay active, connected, and engaged.

MUEGGE FARMS

Muegge Farms is approximately 700 acres of relatively flat terrain generally located in Section 33 and the Southeast Quarter of Section 32, of Township 3 South, Range 63 West of the 6th Principal Meridian, Town of Bennett, Adams County, Colorado. The site lies at the northwest corner of Interstate-70 and State Highway 79 - the gateway to the central business district of the Town of Bennett. The parcel was annexed to the Town of Bennett in March of 2001 and is zoned Planned Development for a variety of land uses under an Outline Development Plan (ODP).

THE APPLICATION / SKETCH PLAN FOR PLANNING AREA - 1

Planning Area - 1 is a parcel of ground approximately 60.6 Acres in size in the overall Muegge Farms Community as depicted. The site plan includes 243 Single Family lots nominally sized at approximately 5,500 sf with dimensions of 50' in width, and 100' to 110' in depth. The site design of PA-1 follows the guiding project principles of the ODP creating a complete, connected and diverse community that will fit within the existing character in the Town of Bennett.

The site plan proposes a central park that is within walking distance, or a short bike ride of all homes. This neighborhood 'meet-up' anticipates active areas along with more passive features such as ornamental planted gardens, and picnic areas which will be great places to sit and read, catch up on e-mail, and talk with friends.

As we grow, whether in the same house or the same community, these gathering places become even more important. Getting to these meeting places provides some of the physical activity that keeps us healthy. Being there in the company of friends provides the critical social interactions that keep us connected and engaged. Being part of a community also triggers an informal network of folks who might keep an eye out for each other.
Planning Area 1 is designed to support interactions and facilitate connections with friends, family, and community which is critical to remaining healthy, vital, and active. Staying active socially is good for our vitality and the community at large. Connecting with friends and family and sharing our time, wisdom, and experience helps maintain a sense of purpose, gets us out of the house, and keeps us engaged, focused, and learning. The site plan encourages multi modal transportation with sidewalks proposed adjacent to all streets within the community. The sidewalks provide a safe opportunity for people to walk to the park with the furthest distance being less than 1000'. The site plan also encourages people-to-people contact through architecture and site planning, and the creation of parks, open space, streets, and sidewalks for all to enjoy.

Other features of Planning Area - 1 include an infiltration pond in the North East corner of the site. This pond has been sized to accommodate on-site drainage for the proposed site plan and the Brunner Subdivision adjacent to the north, as well as off-site drainage from a portion of future development in Planning Area-2 to the south. Additionally, a detention pond in the North West corner of the site has been sized to accommodate storm flows from the proposed site plan as well as a portion of future development to the South in Planning Area-2.

Proposed pedestrian walks are configured in a holistic system that connects the parcel to the Town of Bennett's regional trail system. The trail system on the northern edge of Planning Area-1, as seen in the trails and sidewalks plan, will create a trail connection proposed within the Bennett Regional Trail Plan.

We believe the site plan design of Planning Area - 1 will further expand the connection of this parcel to future parcels within Muegge Farms while also bridging the gap and complimenting the existing character in the Town of Bennett.

Sincerely,

Paul Shoukas
PCS Group

pcs group | 200 Kalamath St. Denver, CO 80223 | (303) 531-4905 | www.pcsgroupco.com

MUEGGE FARMS FILING NO. 7

FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN, TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO

TOTAL AREA = 2,639,568 SQ. FT. OR 60.596 ACRES MORE OR LESS

1 OF 11

OWNERSHIP AND DEDICATION

KNOWN BY ALL PEOPLE BY THESE PRESENTS, THAT THE UNDERSIGNED MUEGGE FARMS, LLC, A COLORADO LIMITED LIABILITY COMPANY, BEING THE OWNER OF THE LAND SHOWN IN THIS FINAL PLAT AND DESCRIBED AS FOLLOWS:

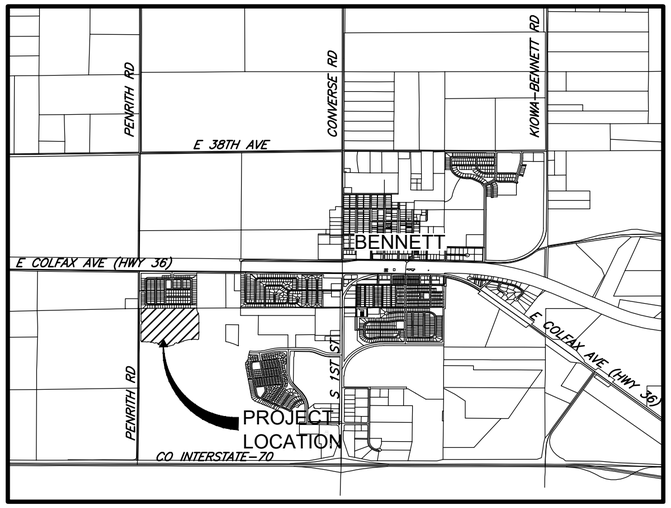
A PARCEL OF LAND LYING WITHIN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN, COUNTY OF ADAMS, STATE OF COLORADO, MORE PARTICULARLY DESCRIBED AS FOLLOWS:

COMMENCING AT THE NORTHWEST CORNER OF SAID SECTION 33, FROM WHICH THE NORTH LINE OF SAID NORTHWEST QUARTER BEARS N88°53'01"E, 2637.20 FEET; THENCE N89°09'04"E, A DISTANCE OF 55.00 FEET TO THE SOUTHWEST CORNER OF LOT 44, BLOCK 2, PENRITH PARK AMENDMENT #2 AS RECORDED AT RECEPTION NO. 2018000064291 OF THE ADAMS COUNTY RECORDS AND THE POINT OF BEGINNING;

THENCE ALONG THE SOUTH LINE OF SAID PENRITH PARK AMENDMENT #2 N89°09'04"E, 2,037.39 FEET;
THENCE S04°11'07"E, A DISTANCE OF 58.02 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE LEFT HAVING A RADIUS OF 222.00 FEET AND A CENTRAL ANGLE OF 27°14'45", 105.57 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT S31°25'52"E, A DISTANCE OF 25.00 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 178.00 FEET AND A CENTRAL ANGLE OF 30°34'57", 95.01 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT S00°50'56"E, A DISTANCE OF 750.88 FEET;
THENCE S06°07'10"W, A DISTANCE OF 45.33 FEET;
THENCE S00°50'56"E, A DISTANCE OF 25.00 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 172.50 FEET AND A CENTRAL ANGLE OF 11°41'35", 35.20 FEET TO A POINT OF COMPOUND CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 86°47'56", 53.02 FEET TO A POINT OF REVERSE CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE LEFT HAVING A RADIUS OF 1,055.00 FEET AND A CENTRAL ANGLE OF 28°54'20", 532.24 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT S68°44'16"W, A DISTANCE OF 47.00 FEET;
THENCE S74°42'00"W, A DISTANCE OF 48.13 FEET;
THENCE S68°44'16"W, A DISTANCE OF 121.88 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 90°00'00", 54.98 FEET;
THENCE ALONG A LINE NON-TANGENT TO SAID CURVE, S65°09'41"W, A DISTANCE OF 80.16 FEET TO A POINT ON A CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 90°00'00" (THE CHORD OF WHICH BEARS S23°44'16"W, 49.50 FEET), 54.98 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT S68°44'16"W, A DISTANCE OF 30.20 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 695.00 FEET AND A CENTRAL ANGLE OF 29°58'22", 358.73 FEET;
THENCE ALONG A LINE NON-TANGENT TO SAID CURVE, N74°45'13"W, A DISTANCE OF 72.47 FEET TO A POINT ON A CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 690.00 FEET AND A CENTRAL ANGLE OF 06°58'46" (THE CHORD OF WHICH BEARS N72°52'42"W, 67.81 FEET), 67.84 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT N70°04'14"W, A DISTANCE OF 50.60 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 90°00'00", 54.98 FEET;
THENCE ALONG A LINE NON-TANGENT TO SAID CURVE, N73°38'54"W, A DISTANCE OF 80.16 FEET TO A POINT ON A CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 89°52'11" (THE CHORD OF WHICH BEARS S64°51'51"W, 49.44 FEET), 54.90 FEET TO A POINT OF REVERSE CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE LEFT HAVING A RADIUS OF 755.00 FEET AND A CENTRAL ANGLE OF 19°47'56", 260.90 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT S90°00'00"W, A DISTANCE OF 40.94 FEET;
THENCE N83°58'09"W, A DISTANCE OF 47.59 FEET;
THENCE S90°00'00"W, A DISTANCE OF 108.92 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 48.50 FEET AND A CENTRAL ANGLE OF 89°44'10", 75.96 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT, BEING PARALLEL WITH AND 55.00 FEET EAST OF THE WEST LINE OF SAID NORTHWEST QUARTER N00°15'50"W, A DISTANCE OF 564.01 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 90°00'00" (THE CHORD OF WHICH BEARS N44°43'52"E, 49.49 FEET), 54.97 FEET;
THENCE ALONG A LINE NON-TANGENT TO SAID CURVE, N00°15'34"W, A DISTANCE OF 80.00 FEET TO A POINT ON A CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 90°00'00" (THE CHORD OF WHICH BEARS N45°15'50"W, 49.50 FEET), 54.98 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT, BEING PARALLEL WITH AND 55.00 FEET EAST OF SAID NORTHWEST QUARTER N00°15'50"W, A DISTANCE OF 454.58 FEET TO THE POINT OF BEGINNING.

CONTAINING AN AREA OF 2,639,568 SQUARE FEET OR 60.596 ACRES, MORE OR LESS.

HAVE LAID OUT, SUBDIVIDED AND PLATTED SAID LAND AS PER DRAWING HEREON CONTAINED UNDER THE NAME AND STYLE OF MUEGGE FARMS FILING NO. 7, A SUBDIVISION OF A PART OF THE TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO, AND BY THESE PRESENTS DOES HEREBY DEDICATE TO THE TOWN OF BENNETT THE STREETS, AVENUES (AND OTHER PUBLIC PLACES, TRACTS/OUTLOTS) AS SHOWN ON THE ACCOMPANYING PLAT FOR THE PUBLIC USE THEREOF FOREVER AND DOES FURTHER DEDICATE TO THE USE OF THE TOWN OF BENNETT AND ALL SERVING PUBLIC UTILITIES (AND OTHER APPROPRIATE ENTITIES) THOSE PORTIONS OF SAID REAL PROPERTY WHICH ARE SO DESIGNATED AS EASEMENTS AS SHOWN.



VICINITY MAP
(NTS)

OWNERSHIP AND DEDICATION (CONTINUED)

IT IS EXPRESSLY UNDERSTOOD AND AGREED BY THE UNDERSIGNED THAT ALL EXPENSES AND COSTS INVOLVED IN CONSTRUCTING AND INSTALLING SANITARY SEWER SYSTEM WORKS AND LINES, STORM DRAINAGE WORKS AND LINES, WATER SYSTEM WORKS AND LINES, GAS SERVICE LINES, ELECTRICAL SERVICE WORKS AND LINES, LANDSCAPING, CURBS, GUTTERS, STREET PAVEMENT, SIDEWALKS, AND OTHER UTILITIES AND SERVICES SHALL BE GUARANTEED AND PAID FOR BY THE SUBDIVIDER OR ARRANGEMENTS MADE BY THE SUBDIVIDER THEREOF WHICH ARE APPROVED BY THE TOWN OF BENNETT, COLORADO, AND SUCH SUMS SHALL NOT BE PAID BY THE TOWN OF BENNETT, AND THAT ANY ITEM SO CONSTRUCTED OR INSTALLED WHEN ACCEPTED BY THE TOWN OF BENNETT SHALL BECOME THE SOLE PROPERTY OF SAID TOWN OF BENNETT, COLORADO, EXCEPT PRIVATE ROADWAY CURBS, GUTTER AND PAVEMENT AND ITEMS OWNED BY MUNICIPALITY FRANCHISED UTILITIES, OTHER SERVING PUBLIC ENTITIES, WHICH WHEN CONSTRUCTED OR INSTALLED SHALL REMAIN AND/OR BECOME THE PROPERTY OF SUCH MUNICIPALITY FRANCHISED UTILITIES, OTHER SERVING PUBLIC ENTITIES AND SHALL NOT BECOME THE PROPERTY OF THE TOWN OF BENNETT, COLORADO.

EXECUTED THIS ___ DAY OF _____, A.D., 20____

BY: MUEGGE FARMS, LLC, A COLORADO LIMITED LIABILITY COMPANY

_____ _____ AS _____
NAME TITLE

STATE OF COLORADO)
)SS
COUNTY OF _____)
THE FOREGOING OWNERSHIP AND DEDICATION WAS ACKNOWLEDGED BEFORE ME THIS ____

DAY OF _____, 20___, BY _____ AS

AUTHORIZED SIGNATORY FOR MUEGGE FARMS, LLC, A COLORADO LIMITED LIABILITY COMPANY.

WITNESS MY HAND AND OFFICIAL SEAL:

NOTARY PUBLIC _____

MY COMMISSION EXPIRES _____

UTILITY EASEMENTS

UTILITY EASEMENTS AS SHOWN HEREON ARE HEREBY GRANTED FOR THE INSTALLATION, MAINTENANCE, AND OPERATION OF UTILITIES AND DRAINAGE FACILITIES, INCLUDING, BUT NOT LIMITED TO STREET LIGHTS, ELECTRIC LINES, GAS LINES, CABLE TELEVISION LINES, FIBER OPTIC LINES, AND TELEPHONE LINES, AS WELL AS PERPETUAL RIGHT FOR INGRESS AND EGRESS FOR INSTALLATION, MAINTENANCE, AND REPLACEMENT OF SUCH LINES.

ACKNOWLEDGEMENT CERTIFICATE

THE _____ METROPOLITAN DISTRICT NO. ___ HEREBY ACKNOWLEDGES AND ACCEPTS ITS PERPETUAL MAINTENANCE RESPONSIBILITIES FOR THE TRACTS SET FORTH ON THIS PLAT,

BY: _____ ITS: _____

STATE OF COLORADO)
)SS
COUNTY OF _____)

THE FOREGOING OWNERSHIP AND DEDICATION WAS ACKNOWLEDGED BEFORE ME

THIS ____ DAY OF _____, 20___,

WITNESS MY HAND AND OFFICIAL SEAL:

NOTARY PUBLIC _____

MY COMMISSION EXPIRES _____

GENERAL NOTES

1. NOTICE: ACCORDING TO COLORADO LAW YOU MUST COMMENCE ANY LEGAL ACTION BASED UPON ANY DEFECT IN THIS SURVEY WITHIN THREE (3) 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 (10) YEARS FROM THE DATE OF THE CERTIFICATION SHOWN HEREON.
2. BASIS OF BEARINGS: BEARINGS SHOWN HEREON ARE BASED UPON THE THE NORTH LINE OF THE NORTHWEST QUARTER OF SECTION 33 WHICH IS ASSUMED TO BEAR N88°53'01"E, 2637.20 FEET, SAID LINE IS MONUMENTED AS SHOWN HEREIN.
3. THE LINEAL UNITS OF MEASURE SHOWN ON THIS SURVEY ARE BASED UPON THE U.S. SURVEY FOOT.
4. THIS SURVEY DOES NOT CONSTITUTE A TITLE SEARCH BY EMK CONSULTANTS, INC. TO DETERMINE RECORD TITLE, EASEMENTS OR RIGHTS-OF-WAY. LAND TITLE GUARANTEE COMPANY ALTA COMMITMENT ORDER NO. ABC70590329.4 WITH AN EFFECTIVE DATE OF JULY 8, 2022 AT 5:00 P.M. WAS RELIED UPON FOR ALL INFORMATION REGARDING RECORD TITLE, EASEMENTS OF RECORD AND RIGHTS-OF-WAY.
5. ALL EASEMENTS SHALL BE KEPT FREE OF ABOVE AND BELOW GRADE OBSTRUCTIONS AND ENCROACHMENTS. ENCROACHMENTS INTO THE EASEMENTS WITH MONUMENT SIGN, MASONRY FENCE COLUMNS, WINDOW WELLS, COUNTERFORTS, MECHANICAL EQUIPMENT, BAY WINDOWS, FIREPLACES, FIRE PITS, PATIOS, DECKS RETAINING WALLS AND THEIR COMPONENTS, ETC. SHALL NOT BE PERMITTED.
6. IN ADDITION TO PLATTED EASEMENTS, EQUIPMENT OPERATING CLEARANCES SHALL BE MAINTAINED WITHOUT OBSTRUCTION.

GENERAL NOTES ARE CONTINUED ON SHEET 2.

SURVEYOR'S CERTIFICATE

I, STEPHEN H. HARDING, A PROFESSIONAL LAND SURVEYOR LICENSED TO PRACTICE LAND SURVEYING IN THE STATE OF COLORADO, DO HEREBY CERTIFY THAT THERE ARE NO ROADS, PIPELINES, IRRIGATION DITCHES OR OTHER EASEMENTS IN EVIDENCE OR KNOWN BY ME TO EXIST ON OR ACROSS THE HEREINBEFORE DESCRIBED PROPERTY, EXCEPT AS SHOWN ON THIS PLAT. I FURTHER CERTIFY THE THE SURVEY WAS PERFORMED UNDER MY DIRECT RESPONSIBILITY, SUPERVISION AND CHECKING, AND THAT THIS PLAT ACCURATELY REPRESENTS SAID SURVEY, AND THAT ALL MONUMENTS EXIST AS SHOWN HEREON.

_____
STEPHEN H. HARDING, PLS 29040
COLORADO LICENSED PROFESSIONAL LAND SURVEYOR
FOR AND ON BEHALF OF EMK CONSULTANTS, INC.

TOWN APPROVAL BLOCK

THIS IS TO CERTIFY THAT THE PLAT OF MUEGGE FARMS FILING NO. 7 WAS APPROVED ON

THE ___ DAY OF _____, 20___, BY RESOLUTION NO. _____ AND THAT THE MAYOR OF THE TOWN OF BENNETT ON BEHALF OF THE TOWN OF BENNETT, HEREBY ACKNOWLEDGES SAID PLAT UPON WHICH THIS CERTIFICATE IS ENDORSED FOR ALL PURPOSES INDICATED THEREON.

_____ _____ ATTEST: _____
MAYOR TOWN CLERK

PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com
JOB NO. 13301

MUEGGE FARMS FILING NO. 7
FINAL PLAT
DATE PREPARED: OCTOBER 28, 2022
REVISED: JANUARY 3, 2023
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE, COLORADO 80155 ATTN: JOHN VITELLA

SHEET 1 OF 11

MUEGGE FARMS FILING NO. 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,568 SQ. FT. OR 60.596 ACRES MORE OR LESS

GENERAL NOTES (CONTINUED)

7. ALL TRACTS SHALL BE OWNED AND MAINTAINED BY THE HOA/METRO DISTRICT, THEIR SUCCESSORS OR ASSIGNS. THE UNDERSIGNED GRANTS THE TOWN OF BENNETT A PERPETUAL RIGHT OF INGRESS AND EGRESS FROM AND TO SAID TRACTS. THE TOWN SHALL HAVE THE RIGHT, BUT NOT THE OBLIGATION, TO MAINTAIN, OPERATE, REPAIR AND RECONSTRUCT THE TRACT AND RELATED FACILITIES WHEN THE OWNER(S) FAIL TO ADEQUATELY MAINTAIN SUCH TRACTS AND RELATED FACILITIES, WHICH MAINTENANCE, OPERATION AND RECONSTRUCTION SHALL BE AT THE COST OF HOA/METRO DISTRICT.

8. THE POLICY OF THE TOWN REQUIRES THAT MAINTENANCE ACCESS SHALL BE PROVIDED TO ALL STORM DRAINAGE FACILITIES TO ASSURE CONTINUOUS OPERATIONAL CAPABILITY OF THE SYSTEM. THE PROPERTY OWNERS SHALL BE RESPONSIBLE FOR THE MAINTENANCE OF ALL DRAINAGE FACILITIES INCLUDING INLETS, PIPES, CULVERTS, CHANNELS, DITCHES, HYDRAULIC STRUCTURES, AND DETENTION BASINS LOCATED ON THEIR LAND UNLESS MODIFIED BY A SUBDIVISION AGREEMENT OR DEVELOPMENT AGREEMENT. SHOULD THE OWNER FAIL TO MAINTAIN SAID FACILITIES, THE TOWN OF BENNETT SHALL HAVE THE RIGHT BUT NOT THE OBLIGATION TO ENTER SAID LAND FOR THE SOLE PURPOSE OF OPERATIONS AND MAINTENANCE. ALL SUCH MAINTENANCE COSTS WILL BE ASSESSED TO THE PROPERTY OWNER(S).

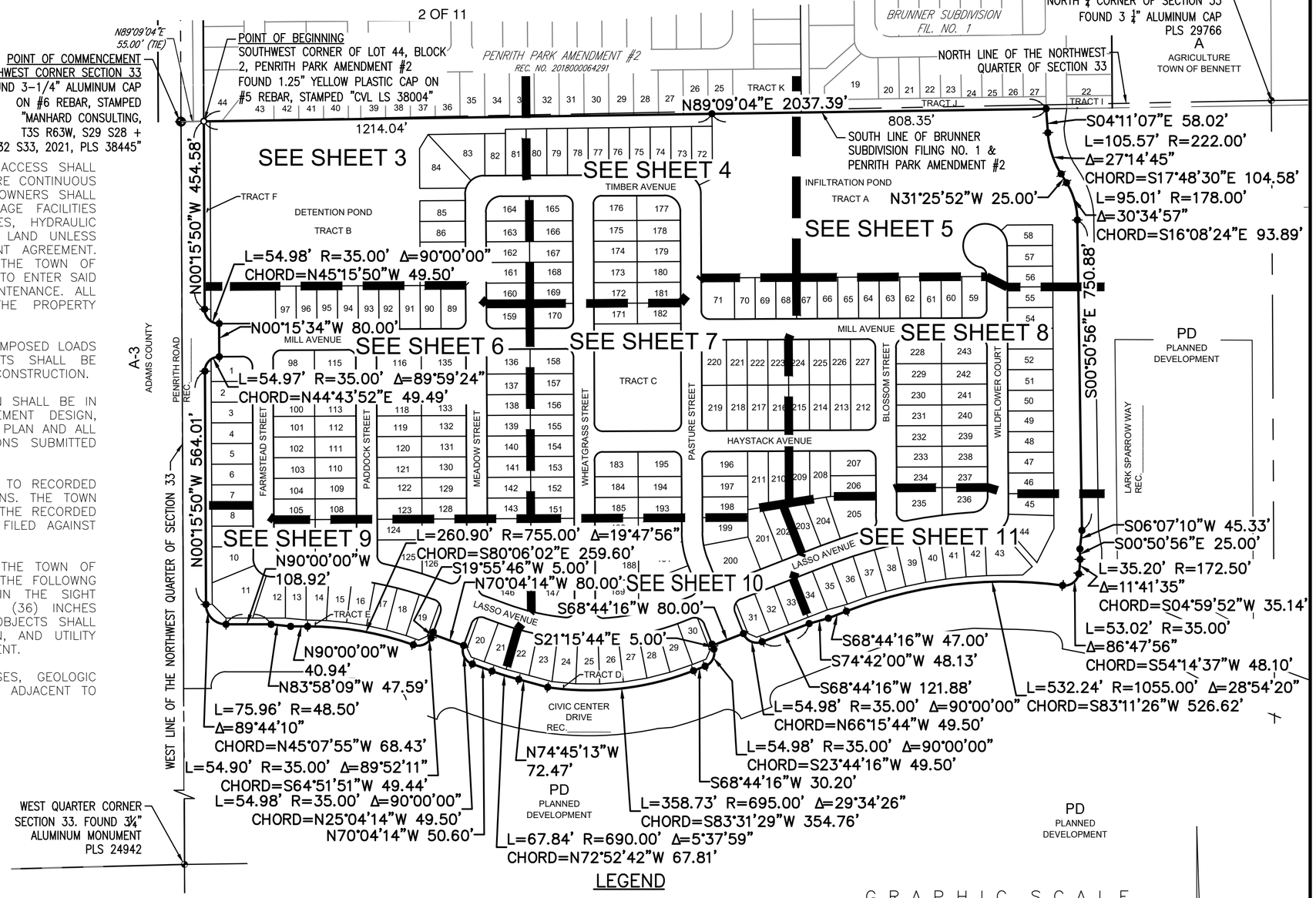
9. SURFACED ACCESS ROADS CAPABLE OF WITHSTANDING THE IMPOSED LOADS OF FIRE APPARATUS AND ALL REQUIRED FIRE HYDRANTS SHALL BE INSTALLED AND MADE SERVICEABLE PRIOR TO AND DURING CONSTRUCTION.

10. ALL INTERNAL ROAD AND DRAINAGE FACILITY CONSTRUCTION SHALL BE IN ACCORDANCE WITH STREET CONSTRUCTION PLANS, PAVEMENT DESIGN, GRADING AND EROSION CONTROL PLANS, A FINAL DRAINAGE PLAN AND ALL APPLICABLE TOWN ADOPTED STANDARDS AND SPECIFICATIONS SUBMITTED TO AND APPROVED BY THE TOWN OF BENNETT.

11. NOTICE IS GIVEN THAT THIS SUBDIVSION WILL BE SUBJECT TO RECORDED DECLARATION OF COVENANTS, CONDITIONS AND RESTRICTIONS. THE TOWN OF BENNETT IS NOT RESPONSIBLE FOR ENFORCEMENT OF THE RECORDED COVENANTS, CONDITONS AND RESTRICTONS THAT MAY BE FILED AGAINST THE SUBDIVISION PLAT.

12. SIGHT DISTANCE EASEMENTS ARE HEREBY DEDICATED TO THE TOWN OF BENNETT FOR SIGHT DISTANCE PURPOSES TOGETHER WITH THE FOLLOWNG RESTRICTIONS OVER SAID EASEMENTS: NO OBJECT WITHIN THE SIGHT DISTANCE EASEMENT SHALL BE MORE THAN THIRTY-SIX (36) INCHES ABOVE THE FLOWLINE OF THE ADJACENT STREET. SUCH OBJECTS SHALL INCLUDE BUT NOT BE LIMITED TO BUILDINGS, VEGETATION, AND UTILITY CABINETS. PARKING IS ALSO RESTRICTED WITHIN THE EASEMENT.

13. THERE ARE NO SIGNIFICANT NATURAL DRAINAGE COURSES, GEOLOGIC HAZARD AREAS, OR OTHER NATURAL FEATURES WITHIN OR ADJACENT TO THE SUBDIVISION.



LAND USE SUMMARY

TYPE	AREA (SQ. FT.)	AREA (ACRE)	PERCENT
TRACTS	725,136	16.647	27.48%
LOTS	1,407,220	32.305	53.32%
RIGHT-OF-WAY	506,812	11.635	19.20%
TOTAL	2,639,168	60.587	100.00%
LARGEST LOT	11,835	(LOT 11)	
SMALLEST LOT	4,836	(LOT 20,31)	
AVERAGE LOT	5,782		

TRACT SUMMARY

TRACT	AREA (SQ. FT.)	AREA (ACRE)	USE	OWNERSHIP	MAINTENANCE	SEE SHEET
A	388,850	8.927	DRAINAGE, LANDSCAPE ,OPEN SPACE, PUBLIC ACCESS	HOA/METRO DISTRICT	HOA/METRO DISTRICT	4,5,8,10,11
B	245,134	5.628	DRAINAGE, LANDSCAPE ,OPEN SPACE, PUBLIC ACCESS	HOA/METRO DISTRICT	HOA/METRO DISTRICT	3,4,6
C	54,368	1.248	PARK, LANDSCAPE, PUBLIC ACCESS	HOA/METRO DISTRICT	HOA/METRO DISTRICT	7
D	11,267	0.259	LANDSCAPE, PUBLIC ACCESS, UTILITIES	HOA/METRO DISTRICT	HOA/METRO DISTRICT	9,10
E	18,395	0.422	LANDSCAPE, PUBLIC ACCESS, UTILITIES	HOA/METRO DISTRICT	HOA/METRO DISTRICT	6,9
F	7,122	0.163	LANDSCAPE, PUBLIC ACCESS, UTILITIES	HOA/METRO DISTRICT	HOA/METRO DISTRICT	3,6
TOTAL	725,136	16.647				

LEGEND

- ✥ SECTION/ALIQUOT CORNER FOUND AS NOTED.
- ○ FOUND MONUMENT AS NOTED.
- ● SET NO. 5 REBAR WITH 1-1/2" ALUMINUM CAP "PLS 29040"

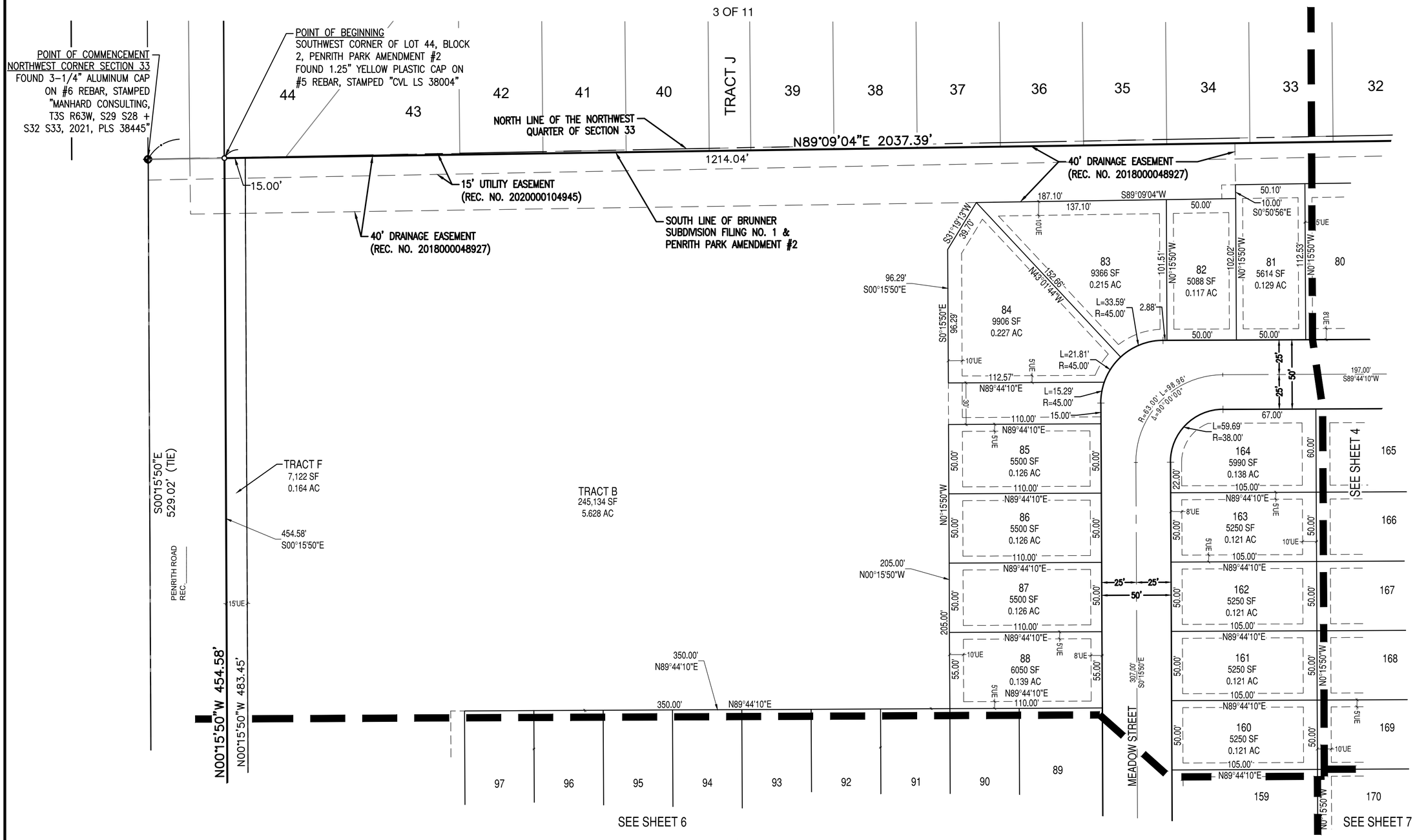
GRAPHIC SCALE
0 100 200 400 600
1 INCH = 200 FEET

PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com
JOB NO. 13301

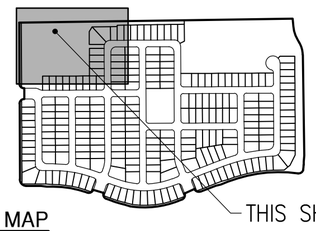
MUEGGE FARMS FILING NO. 7
FINAL PLAT
DATE PREPARED: OCTOBER 28, 2022
REVISED: JANUARY 3, 2023
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

MUEGGE FARMS FILING NO. 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,568 SQ. FT. OR 60.596 ACRES MORE OR LESS



KEY MAP



LEGEND

- SECTION/ALIQUOT CORNER FOUND AS NOTED.
- FOUND MONUMENT AS NOTED.
- SET NO. 5 REBAR WITH 1-1/2" ALUMINUM CAP "PLS 29040"
- UTILITY EASEMENT ("UE"), UNLESS OTHERWISE NOTED.

GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

N

PREPARED BY

EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com

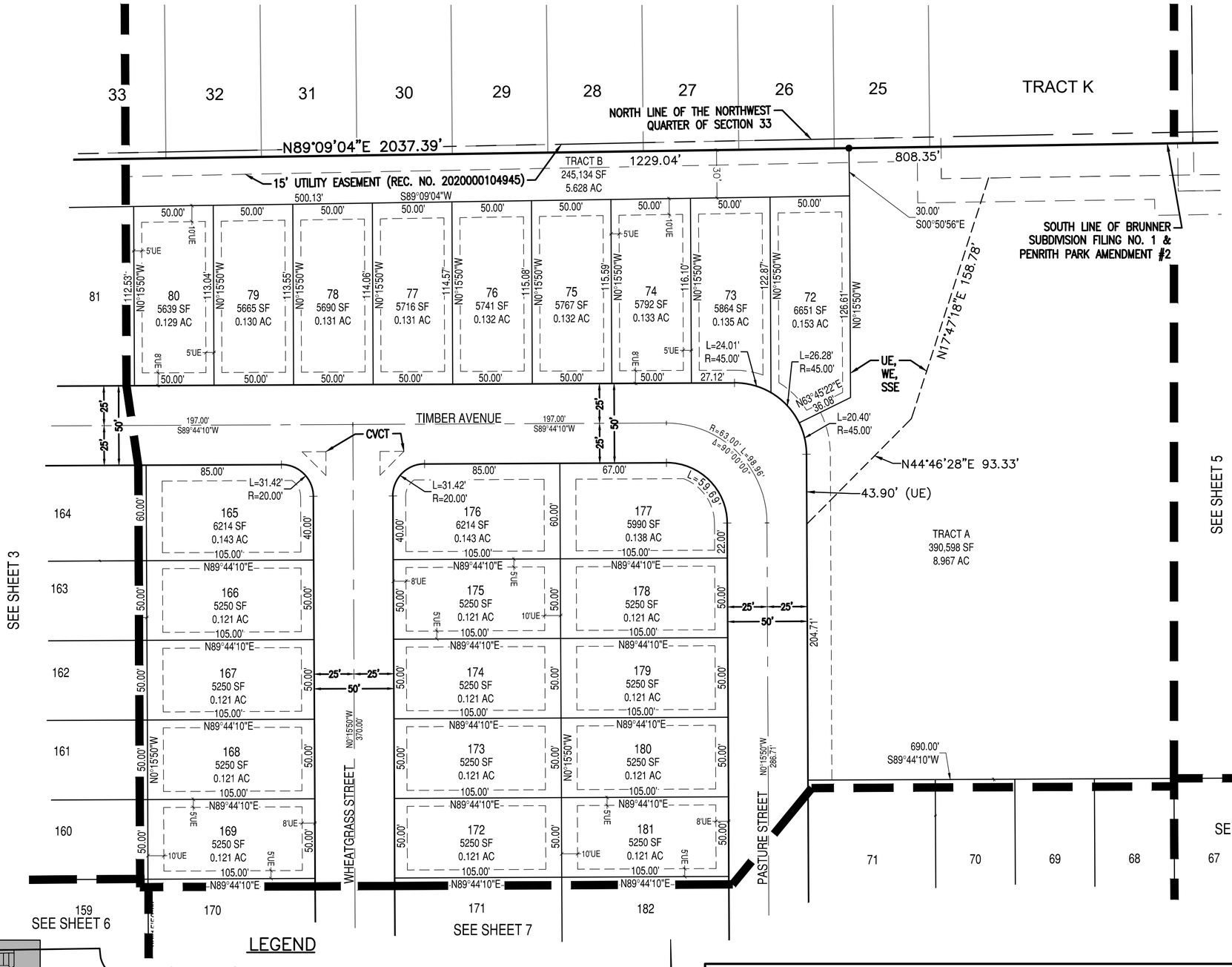
JOB NO. 13301

MUEGGE FARMS FILING NO. 7
FINAL PLAT
DATE PREPARED: OCTOBER 28, 2022
REVISED: JANUARY 3, 2023
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

MUEGGE FARMS FILING NO. 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,568 SQ. FT. OR 60.596 ACRES MORE OR LESS

4 OF 11

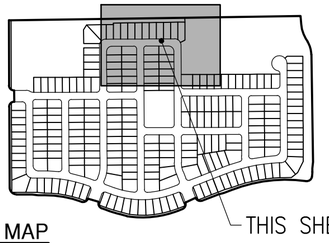


LEGEND

- SECTION/ALIQUOT CORNER FOUND AS NOTED.
- FOUND MONUMENT AS NOTED.
- SET NO. 5 REBAR WITH 1–1/2" ALUMINUM CAP "PLS 29040"
- UTILITY EASEMENT ("UE"), UNLESS OTHERWISE NOTED.
- CVCT CORNER VISION CLEARANCE TRIANGLE
- WE WATER EASEMENT
- SSE SANITARY SEWER EASEMENT

GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

KEY MAP



PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112–2019
(303)694–1520 www.EMKC.com
JOB NO. 13301

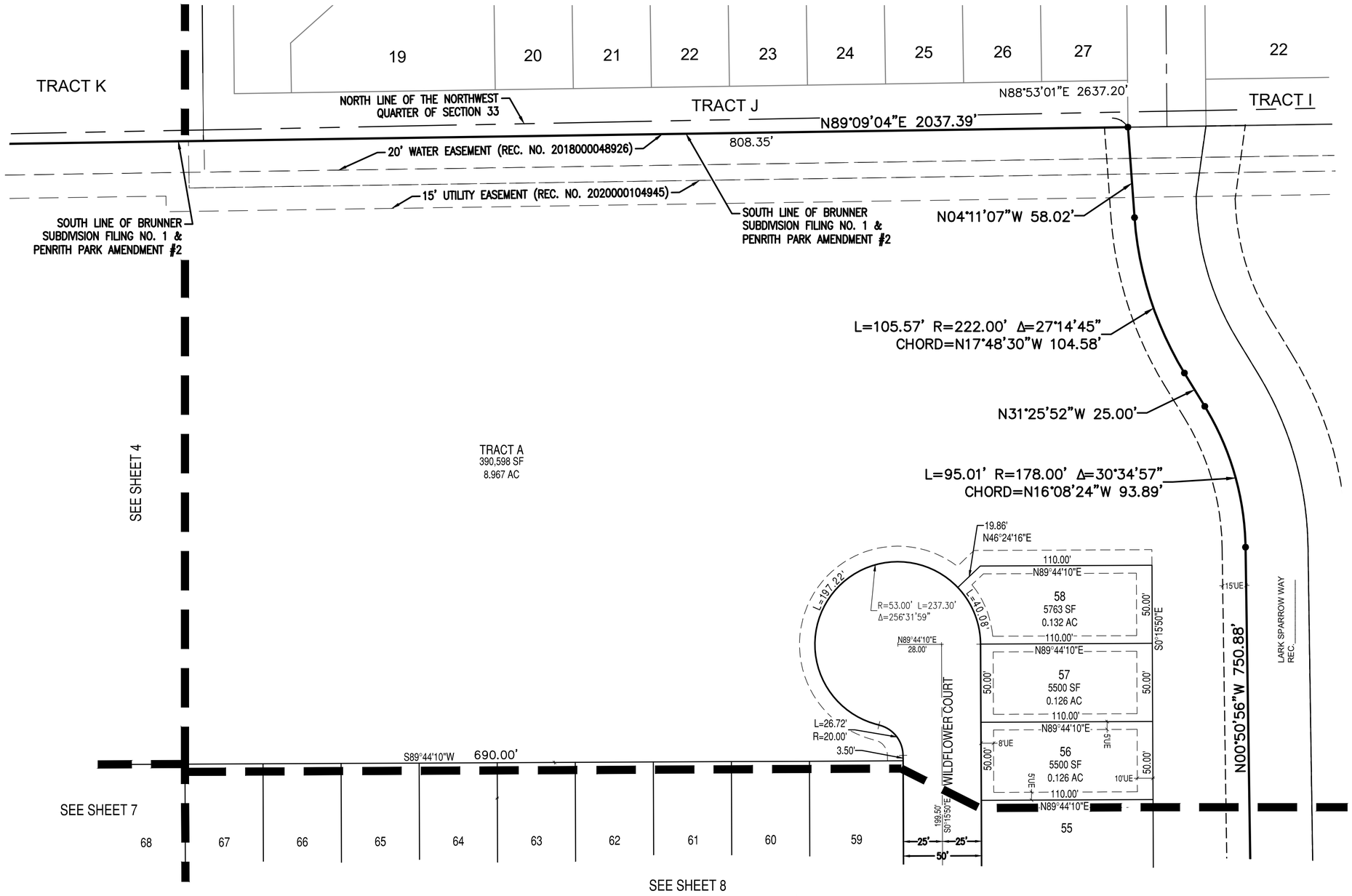
MUEGGE FARMS FILING NO. 7
FINAL PLAT
DATE PREPARED: OCTOBER 28, 2022
REVISED: JANUARY 3, 2023
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

SHEET 4 OF 11

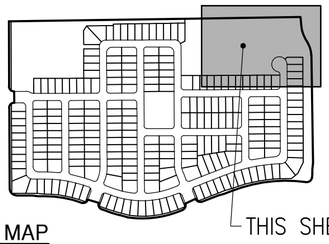
MUEGGE FARMS FILING NO. 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,568 SQ. FT. OR 60.596 ACRES MORE OR LESS

5 OF 11



KEY MAP



LEGEND

- SECTION/ALIQUOT CORNER FOUND AS NOTED.
- FOUND MONUMENT AS NOTED.
- SET NO. 5 REBAR WITH 1-1/2" ALUMINUM CAP "PLS 29040"
- UTILITY EASEMENT ("UE"), UNLESS OTHERWISE NOTED.

GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com
JOB NO. 13301

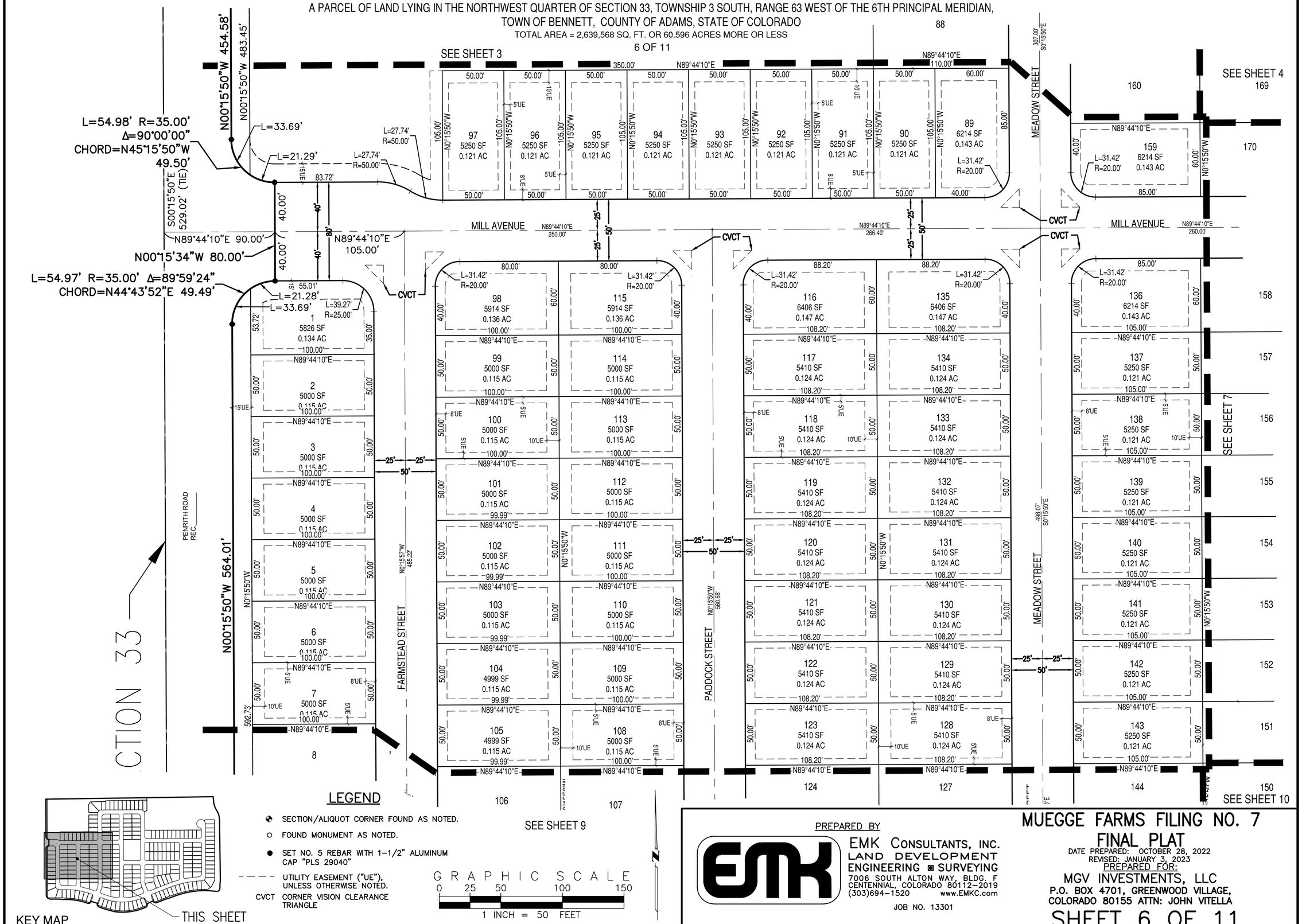
MUEGGE FARMS FILING NO. 7
FINAL PLAT
DATE PREPARED: OCTOBER 28, 2022
REVISED: JANUARY 3, 2023
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE, COLORADO 80155 ATTN: JOHN VITELLA

SHEET 5 OF 11

MUEGGE FARMS FILING NO. 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,568 SQ. FT. OR 60.596 ACRES MORE OR LESS

6 OF 11



LEGEND

- ◆ SECTION/ALIQUOT CORNER FOUND AS NOTED.
- ○ FOUND MONUMENT AS NOTED.
- ● SET NO. 5 REBAR WITH 1-1/2" ALUMINUM CAP "PLS 29040"
- ---- UTILITY EASEMENT ("UE"), UNLESS OTHERWISE NOTED.
- CVCT CORNER VISION CLEARANCE TRIANGLE

GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

KEY MAP

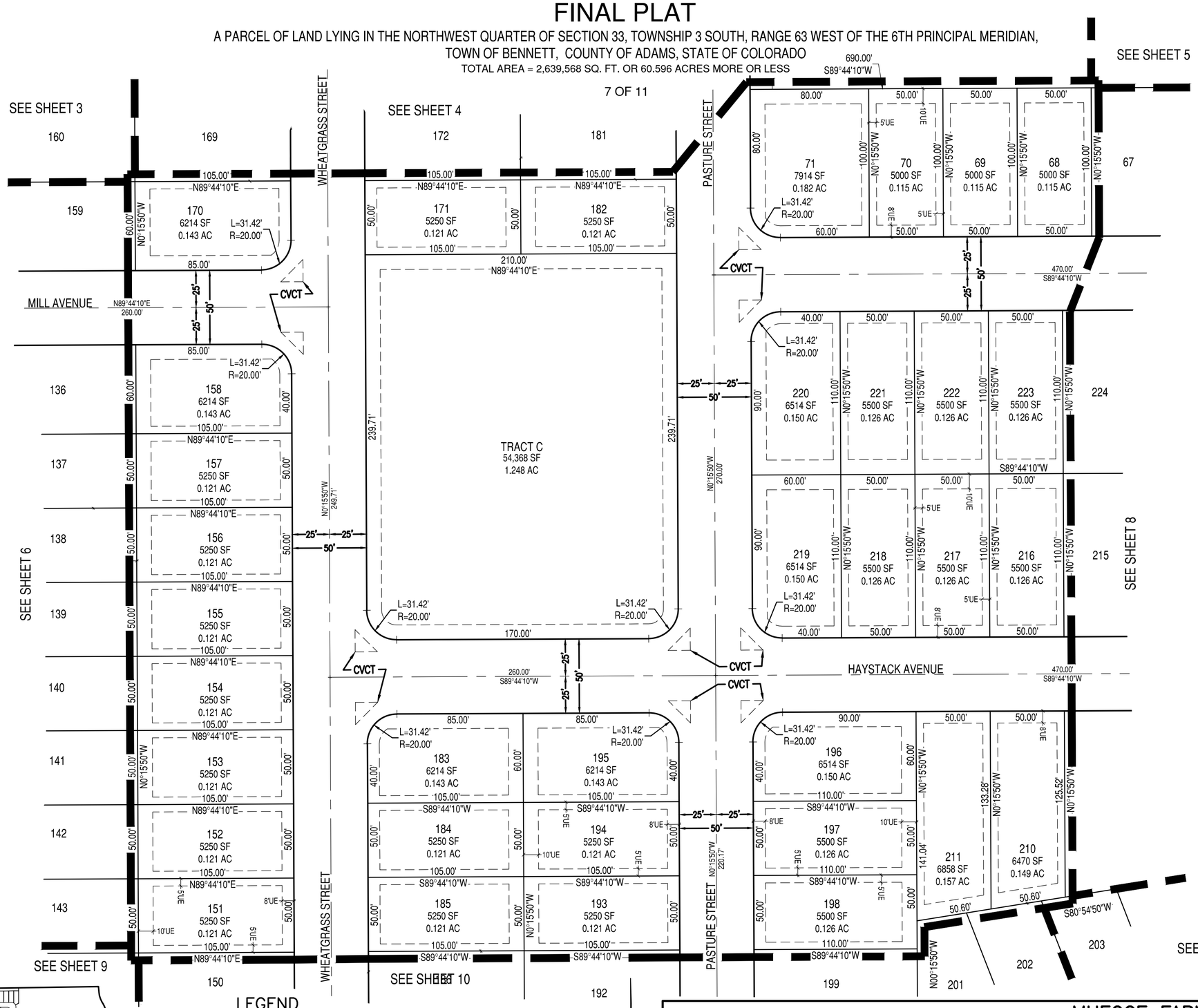
PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com
JOB NO. 13301

MUEGGE FARMS FILING NO. 7
FINAL PLAT
DATE PREPARED: OCTOBER 28, 2022
REVISED: JANUARY 3, 2023
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

SHEET 6 OF 11

MUEGGE FARMS FILING NO. 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,568 SQ. FT. OR 60.596 ACRES MORE OR LESS

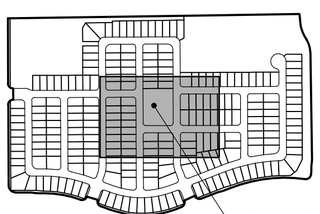


LEGEND

- SECTION/ALIQUOT CORNER FOUND AS NOTED.
- FOUND MONUMENT AS NOTED.
- SET NO. 5 REBAR WITH 1-1/2" ALUMINUM CAP "PLS 29040"
- UTILITY EASEMENT ("UE"), UNLESS OTHERWISE NOTED.
- CVCT CORNER VISION CLEARANCE TRIANGLE

GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

KEY MAP

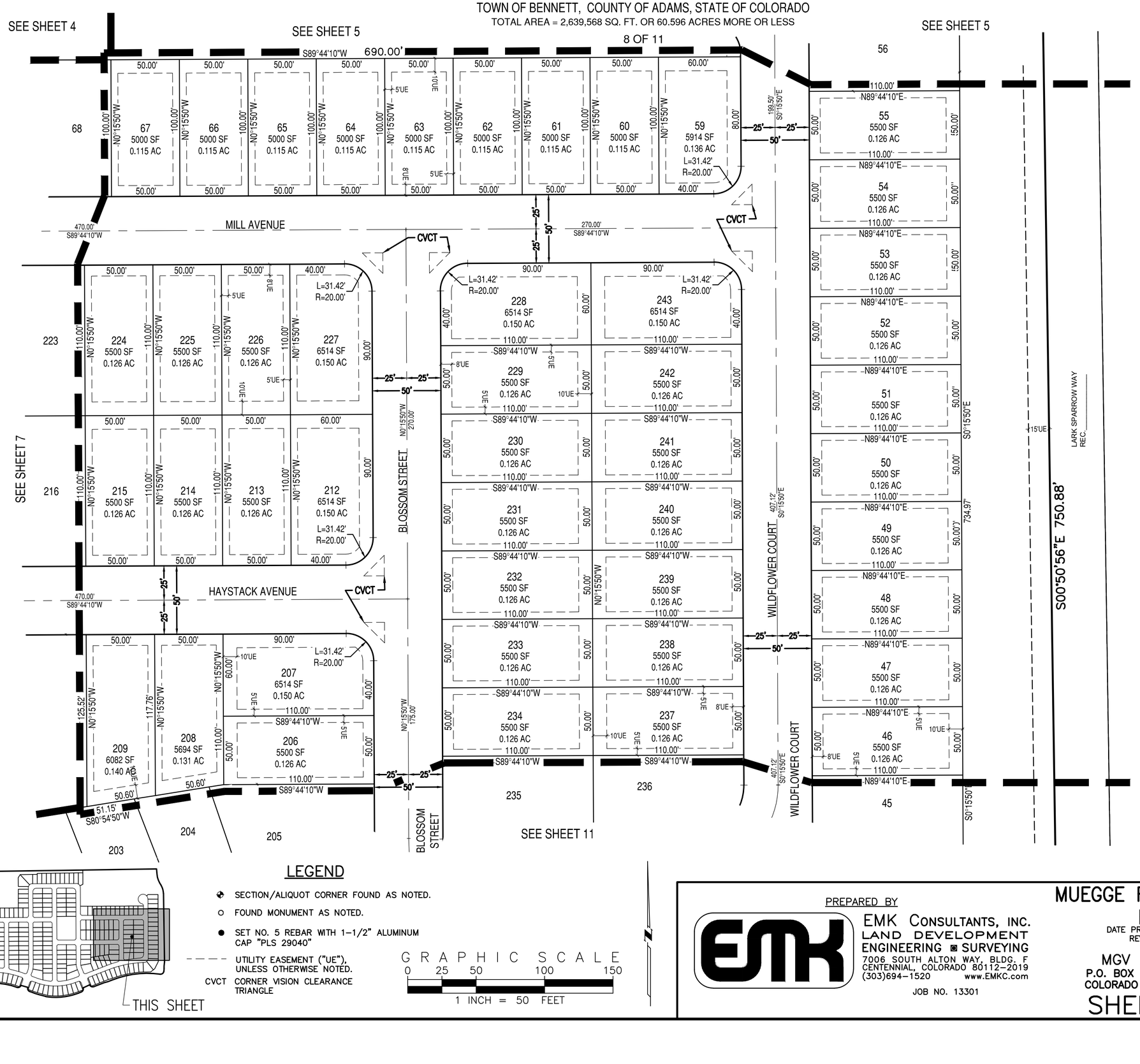


PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com
JOB NO. 13301

MUEGGE FARMS FILING NO. 7
FINAL PLAT
DATE PREPARED: OCTOBER 28, 2022
REVISED: JANUARY 3, 2023
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

MUEGGE FARMS FILING NO. 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,568 SQ. FT. OR 60.596 ACRES MORE OR LESS



LEGEND

- SECTION/ALIQUOT CORNER FOUND AS NOTED.
- FOUND MONUMENT AS NOTED.
- SET NO. 5 REBAR WITH 1-1/2" ALUMINUM CAP "PLS 29040"
- UTILITY EASEMENT ("UE"), UNLESS OTHERWISE NOTED.
- CVCT CORNER VISION CLEARANCE TRIANGLE

GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

KEY MAP

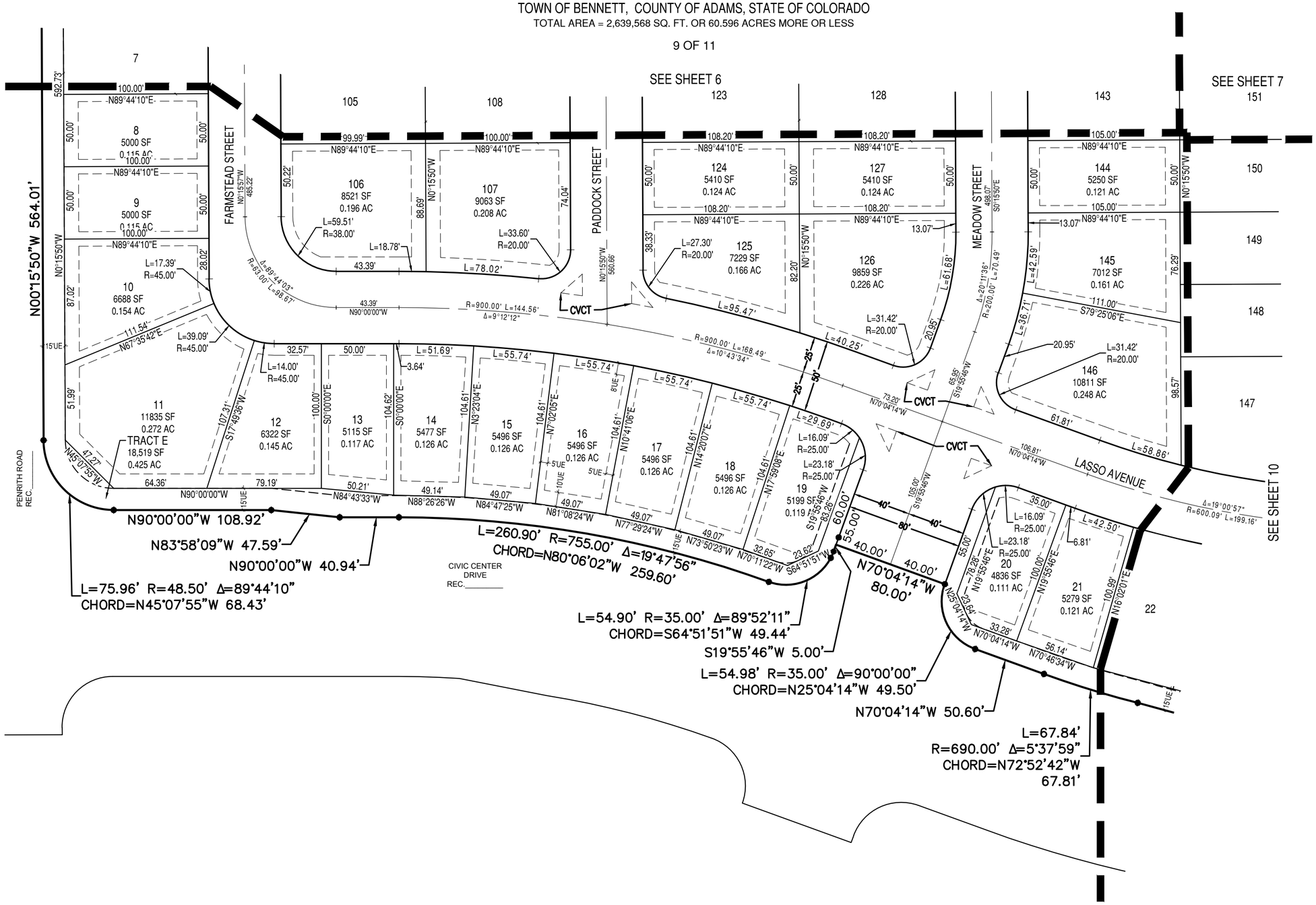
PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com
JOB NO. 13301

MUEGGE FARMS FILING NO. 7
FINAL PLAT
DATE PREPARED: OCTOBER 28, 2022
REVISED: JANUARY 3, 2023
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

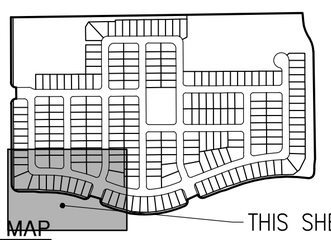
MUEGGE FARMS FILING NO. 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,568 SQ. FT. OR 60.596 ACRES MORE OR LESS

9 OF 11



KEY MAP



LEGEND

- SECTION/ALIQUOT CORNER FOUND AS NOTED.
- FOUND MONUMENT AS NOTED.
- SET NO. 5 REBAR WITH 1-1/2" ALUMINUM CAP "PLS 29040"
- UTILITY EASEMENT ("UE"), UNLESS OTHERWISE NOTED.
- CVCT CORNER VISION CLEARANCE TRIANGLE

GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

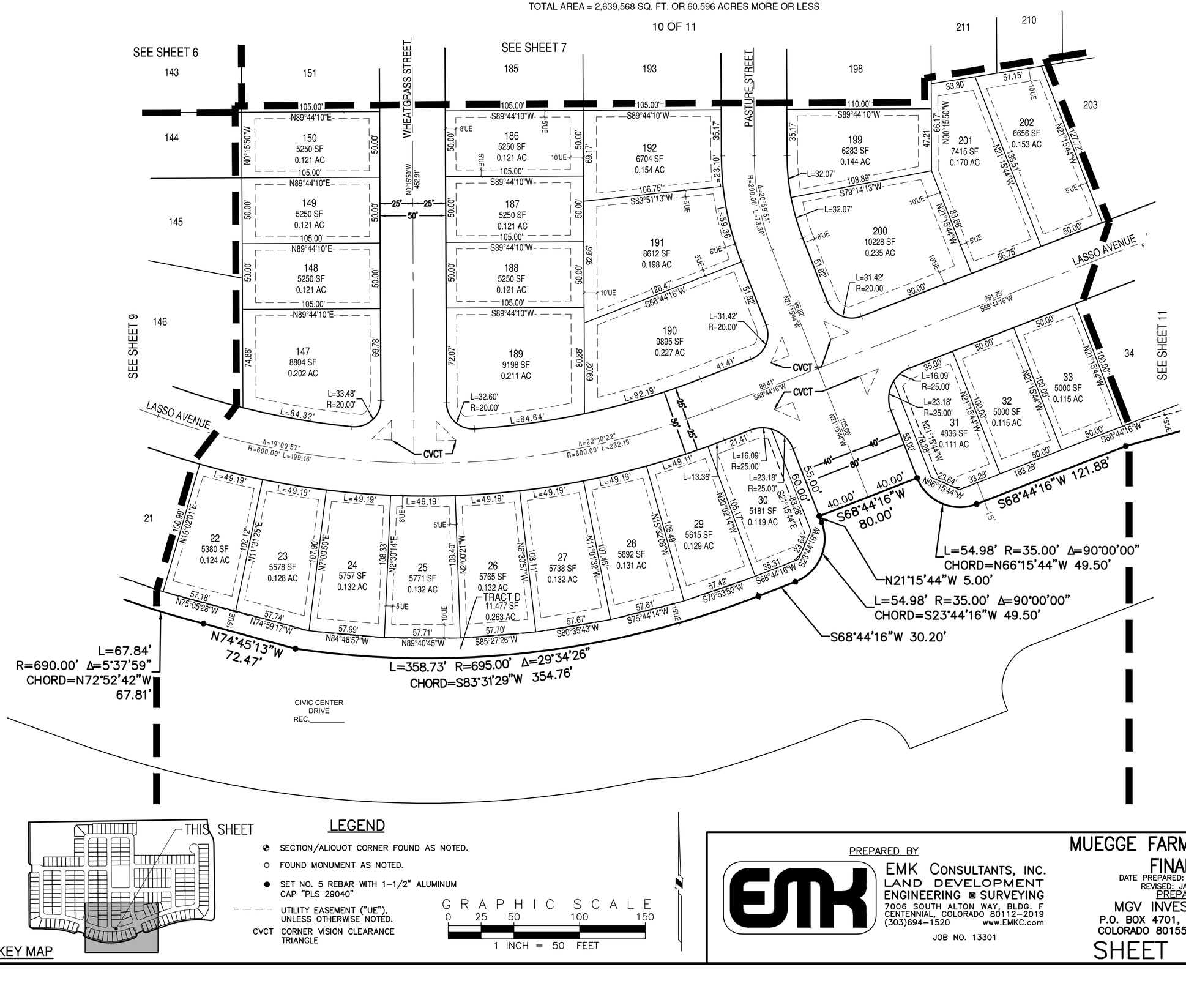
PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com
JOB NO. 13301

MUEGGE FARMS FILING NO. 7
FINAL PLAT
DATE PREPARED: OCTOBER 28, 2022
REVISED: JANUARY 3, 2023
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

SHEET 9 OF 11

MUEGGE FARMS FILING NO. 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,568 SQ. FT. OR 60.596 ACRES MORE OR LESS



KEY MAP

LEGEND

- SECTION/ALIQUOT CORNER FOUND AS NOTED.
- FOUND MONUMENT AS NOTED.
- SET NO. 5 REBAR WITH 1-1/2" ALUMINUM CAP "PLS 29040"
- UTILITY EASEMENT ("UE"), UNLESS OTHERWISE NOTED.
- CVCT CORNER VISION CLEARANCE TRIANGLE

GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com
JOB NO. 13301

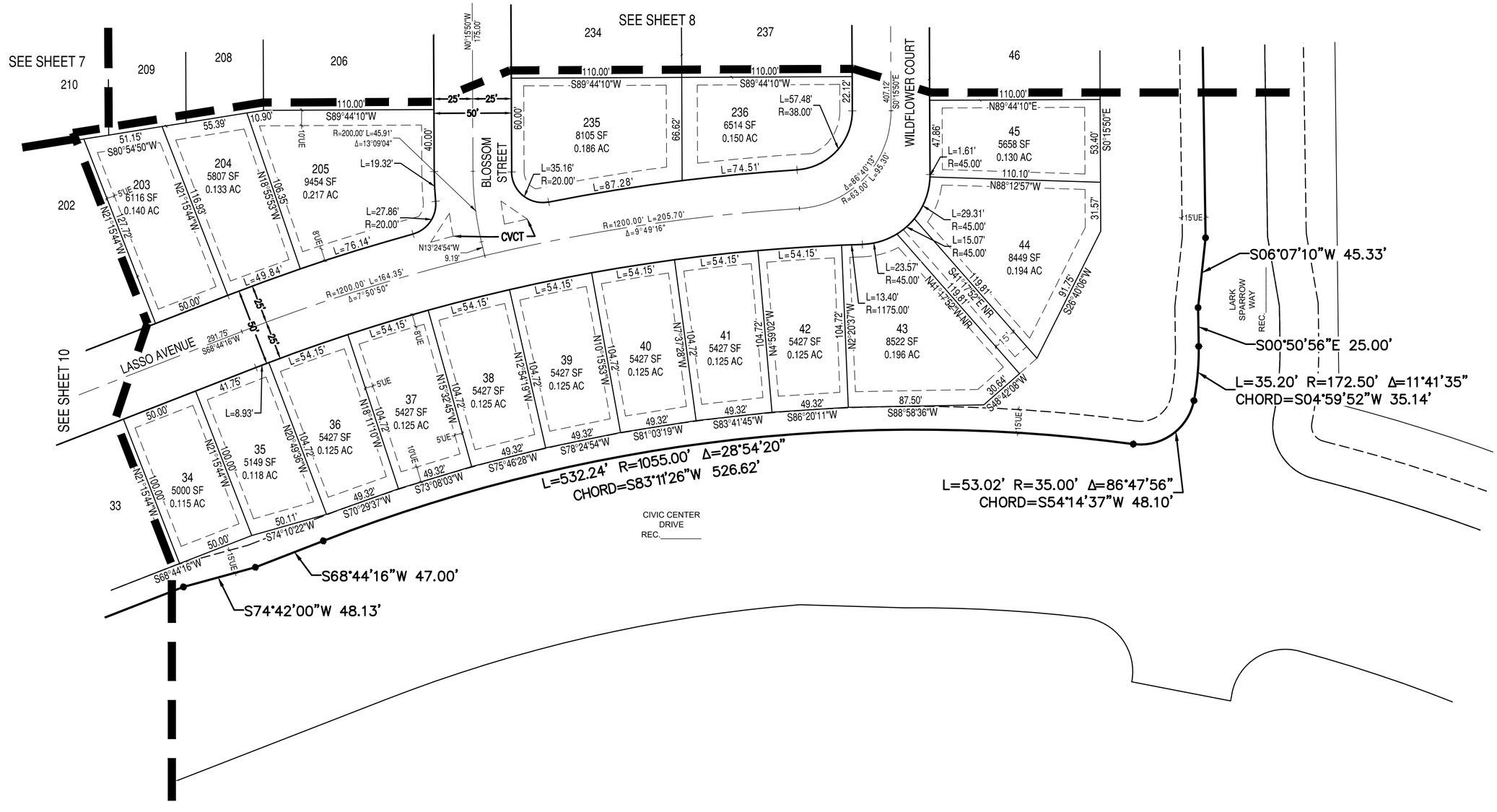
MUEGGE FARMS FILING NO. 7
FINAL PLAT
DATE PREPARED: OCTOBER 28, 2022
REVISED: JANUARY 3, 2023
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE, COLORADO 80155 ATTN: JOHN VITELLA

SHEET 10 OF 11

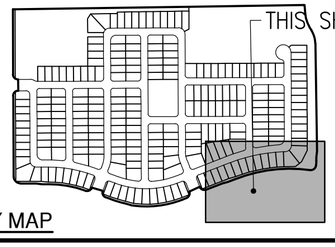
MUEGGE FARMS FILING NO. 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,568 SQ. FT. OR 60.596 ACRES MORE OR LESS

11 OF 11



KEY MAP



LEGEND

- SECTION/ALIQUOT CORNER FOUND AS NOTED.
- FOUND MONUMENT AS NOTED.
- SET NO. 5 REBAR WITH 1-1/2" ALUMINUM CAP "PLS 29040"
- UTILITY EASEMENT ("UE"), UNLESS OTHERWISE NOTED.
- CVCT CORNER VISION CLEARANCE TRIANGLE

GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com
JOB NO. 13301

MUEGGE FARMS FILING NO. 7
FINAL PLAT
DATE PREPARED: OCTOBER 28, 2022
REVISED: JANUARY 3, 2023
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

SHEET 11 OF 11

RECEPTION#: 2023000003068,
1/17/2023 at 10:41 AM, 1 OF 13,
REC: 5133.00
TD Pgs: 0 Josh Zygielbaum, Adams County, CO.

OUTLINE DEVELOPMENT PLAN
MUEGGE FARMS 3RD AMENDMENT
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
COVER
PAGE 1 OF 13

LEGAL DESCRIPTION

A PARCEL OF LAND BEING A PORTION OF SECTION 33 AND A PORTION OF THE SOUTHEAST QUARTER OF SECTION 32, ALL LYING IN TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN, COUNTY OF ADAMS, STATE OF COLORADO, BEING MORE PARTICULARLY DESCRIBED AS FOLLOWS:

BEGINNING AT THE NORTHWEST CORNER OF SAID SECTION 33 (#6 REBAR W/ 3 1/4" ALUMINUM CAP STAMPED BASIN SURVEYS LS 30086 - 1998); WHENCE THE WEST QUARTER CORNER OF SAID SECTION 33 (#6 REBAR W/ 3 1/4" ALUMINUM CAP STAMPED PLS 24942 - 2001) BEARS SOUTH 00 DEGREES 17 MINUTES 18 SECONDS EAST A DISTANCE OF 2677.44 FEET (BASIS OF BEARING - ASSUMED);

THENCE NORTH 89 DEGREES 08 MINUTES 57 SECONDS EAST ALONG THE NORTHERLY LINE OF THE NORTHWEST QUARTER OF SAID SECTION 33 A DISTANCE OF 2639.15 FEET;

THENCE NORTH 89 DEGREES 09 MINUTES 06 SECONDS EAST ALONG THE NORTHERLY LINE OF THE NORTHEAST QUARTER OF SAID SECTION 33 A DISTANCE OF 1937.20 FEET;

THENCE THE FOLLOWING TWO (2) COURSES ALONG THE WESTERLY AND SOUTHERLY LINES OF A PARCEL OF LAND DESCRIBED IN DEED RECORDED JANUARY 25, 1999 IN BOOK 5623 AT PAGE 641 RECORDED IN THE ADAMS COUNTY CLERK AND RECORDER'S OFFICE;
1) SOUTH 00 DEGREES 23 MINUTES 58 SECONDS EAST A DISTANCE OF 914.59 FEET;
2) THENCE NORTH 89 DEGREES 09 MINUTES 42 SECONDS EAST A DISTANCE OF 650.52 FEET;

THENCE SOUTH 00 DEGREES 25 MINUTES 43 SECONDS EAST ALONG THE WESTERLY LINE OF STATE HIGHWAY 79 AS DESCRIBED INSTRUMENT RECORDED DECEMBER 19, 1958 IN BOOK 751 AT PAGE 503 RECORDED IN SAID ADAMS COUNTY CLERK AND RECORDER'S OFFICE AND BEING 50.00 FEET WESTERLY OF AND PARALLEL WITH THE EASTERLY LINE OF SAID NORTHEAST QUARTER OF SECTION 33 A DISTANCE OF 1765.65 FEET;

THENCE SOUTH 00 DEGREES 15 MINUTES 00 SECONDS EAST ALONG THE WESTERLY LINE OF STATE HIGHWAY 79 AS DESCRIBED IN DEED RECORDED NOVEMBER 15, 1958 IN BOOK 745 AT PAGE 206 RECORDED IN SAID ADAMS COUNTY CLERK AND RECORDER'S OFFICE AND BEING 50.00 FEET WESTERLY OF AND PARALLEL WITH THE EASTERLY LINE OF THE SOUTHEAST QUARTER OF SAID SECTION 33 A DISTANCE OF 1441.68 FEET;

THENCE THE FOLLOWING TWO (2) COURSES ALONG THE NORTHERLY AND WESTERLY LINES OF MUEGGE SUBDIVISION RECORDED IN SAID ADAMS COUNTY CLERK AND RECORDER'S OFFICE ON NOVEMBER 15, 1972 UNDER RECEPTION NO. 980596;
1) SOUTH 89 DEGREES 47 MINUTES 07 SECONDS WEST A DISTANCE OF 400.69 FEET;
2) THENCE SOUTH 00 DEGREES 14 MINUTES 37 SECONDS EAST A DISTANCE OF 916.83 FEET;

THENCE THE FOLLOWING THREE (3) COURSES ALONG THE NORTHERLY LINE OF INTERSTATE 70 AS DESCRIBED IN SAID BOOK 745 AT PAGE 206;
1) SOUTH 75 DEGREES 45 MINUTES 06 SECONDS WEST A DISTANCE OF 377.08 FEET;
2) THENCE SOUTH 89 DEGREES 27 MINUTES 56 SECONDS WEST A DISTANCE OF 4464.44 FEET;
3) THENCE SOUTH 89 DEGREES 29 MINUTES 43 SECONDS WEST A DISTANCE OF 2642.07 FEET;

THENCE NORTH 00 DEGREES 13 MINUTES 37 SECONDS WEST ALONG THE WESTERLY LINE OF SAID SOUTHEAST QUARTER OF SECTION 32 A DISTANCE OF 2375.57 FEET;

THENCE NORTH 88 DEGREES 32 MINUTES 03 SECONDS EAST ALONG THE NORTHERLY LINE OF SAID SOUTHEAST QUARTER OF SECTION 32 A DISTANCE OF 2640.07 FEET;

THENCE NORTH 00 DEGREES 17 MINUTES 18 SECONDS WEST ALONG THE WESTERLY LINE OF SAID NORTHWEST QUARTER OF SECTION 33 A DISTANCE OF 2677.44 FEET TO THE POINT OF BEGINNING.

EXCEPT THAT PARCEL OF LAND CONVEYED TO DILLON COMPANIES, INC., A KANSAS CORPORATION BY DEED RECORDED DECEMBER 3, 2003 UNDER RECEPTION NO. C1247426.

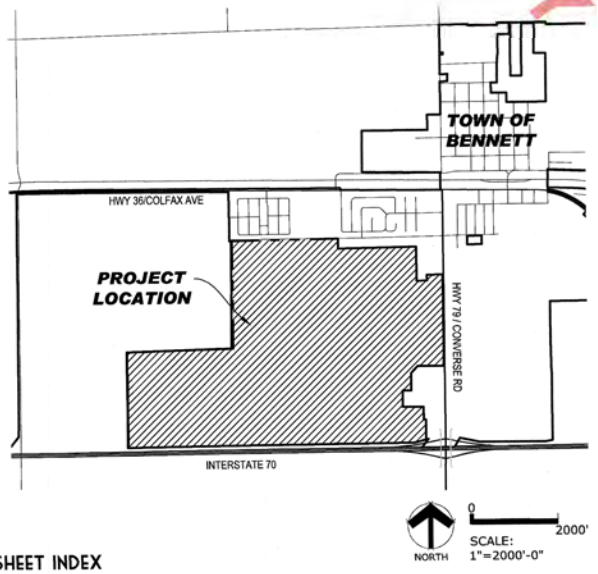
AND EXCEPT THAT PARCEL OF LAND CONVEYED TO LOVE'S TRAVEL STOPS & COUNTRY STORES, INC., AN OKLAHOMA CORPORATION BY DEED RECORDED SEPTEMBER 11, 2009 UNDER RECEPTION NO. 2009000067768.

AND EXCEPT THAT PARCEL OF LAND CONVEYED TO THE TOWN OF BENNETT, A COLORADO MUNICIPAL CORPORATION BY DEED RECORDED SEPTEMBER 28, 2012 UNDER RECEPTION NO. 2012000072794.

AND EXCEPT THAT PARCEL OF LAND PLATTED AS MUEGGE FARMS SUBDIVISION FILING NO. 3, RECORDED FEBRUARY 26, 2014 UNDER RECEPTION NO. 2014000011818.

AND EXCEPT THAT PARCEL OF LAND CONVEYED TO THE TOWN OF BENNETT, A COLORADO MUNICIPAL CORPORATION IN SPECIAL WARRANTY DEED RECORDED AUGUST 7, 2017 UNDER RECEPTION NO. 2017000068187.

VICINITY MAP



SHEET INDEX

THIS MUEGGE FARMS 3RD AMENDED OUTLINE DEVELOPMENT PLAN (ODP) AMENDS THE ORIGINAL ODP RECORED ON SEPTEMBER 30,2008 AT RECEPTION NO. 2008000077786 AND THE 2ND AMENDED ODP RECORED ON AUGUST 6, 2019 AT RECEPTION NO. 2019000062976. THERE IS NO 1ST AMENDMENT.

TOWN APPROVAL

This 3rd Amendment to the Muegge Farms Outline Development Plan was approved by the Zoning Administrator of theTown of Bennett, Colorado on this 17 day of January, 2023.

Zoning Administrator

ATTEST: Town Clerk

TOWN OF BENNETT SEAL COLORADO

OWNER APPROVAL

By signing this ODP, the owner acknowledges and accepts all of the requi... and intent set forth herein.

OWNER Muegge Farms, LLC

NOTARY

STATE OF COLORADO)SS
COUNTY OF Denver)

ROSE SANTISTEVAN
NOTARY PUBLIC
STATE OF COLORADO
NOTARY ID 20224032832
MY COMMISSION EXPIRES AUGUST 22, 2026

The above and foregoing signature of Dan Watts as Manager of Muegge Farms LLC was subscribed and sworn to before me this 9th day of January, 2023.

Witness my hand and official seal.

My commission expires on: 8/22/2026

(SEAL)

Notary Public:

OWNER :	APPLICANT	PLANNER/LANDSCAPE ARCHITECT :	CIVIL ENGINEER :	CIVIL ENGINEER :
Muegge Farms, LLC Attn: Dan Watts 2835 S Williams St Denver, CO 80210-6334 (303) 881-2242	MGV Investments, LLC Attn: John Vitella P.O. BOX 4701 Greenwood Village, CO 80155 (303) 210-4964	pcs group inc. Attn: Paul Shoukas P.O. Box 18287 Denver, CO - 80218 tel: 303.531.4905 www.pcsgroupco.com	CVL CONSULTANTS 10333 E. Dry Creek Road, Suite 240 Englewood, CO tel: 720.482.9526 www.cvlci.com	EMK 7006 S. Alton Way, Bldg F Centennia, CO 80112 tel: 303.694.1520 www.emkc.com

PREPARATION DATE:	FEBRUARY 3, 2003
REVISION DATE:	APRIL 10, 2003
REVISION DATE:	MAY 4, 2007
REVISION DATE:	SEPTEMBER 13, 2007
REVISION DATE:	OCTOBER 18, 2007
REVISION DATE:	APRIL 7, 2008
REVISION DATE:	JULY 23, 2008
REVISION DATE:	JANUARY 18, 2019
REVISION DATE:	JULY 24, 2019
REVISION DATE:	NOVEMBER 23, 2022

MUEGGE FARMS

RECEPTION#: 2023000003068,
1/17/2023 at 10:41 AM, 2 OF 13,
TD Pgs: 0 Josh Zygielbaum, Adams County, CO.

OUTLINE DEVELOPMENT PLAN
MUEGGE FARMS 3RD AMENDMENT
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
PROJECT INFORMATION

INTRODUCTION

Muegge Farms is approximately 702 acres of relatively flat terrain generally located in Section 33 and the Southeast Quarter of Section 32, of Township 3 South, Range 63 West of the 6th Principal Meridian, Adams County, Colorado. The site lies at the northwest corner of Interstate-70 and State Highway 79 - the gateway to the central business district of the Town of Bennett.

The parcel was annexed to the Town of Bennett in March of 2001 and was zoned Planned Development. The intent of the Outline Development Plan is to establish the general land uses for the parcel along with their associated bulk and dimension standards.

HISTORY

The Town of Bennett was named after Hiram Pitt Bennet, whose family homesteaded the land in 1862. The family went on to become the third postmaster of Denver in 1869 and began developing a method of delivering mail to all the new pioneers in rural areas. Through the years, the Town was referred to as Bennett, from the ranch the family originally settled.

The charm of Bennett lies within the rural feel of the community. This growing, high plains community lies in Eastern Adams and Arapahoe Counties. Residents enjoy the pleasures of small-town, western living, friendly neighbors and community while retaining the amenities of urban Denver only 25 miles away and the recreation opportunities of the Rocky Mountains just beyond.

Muegge Farms is committed to creating a quality planned development, with economic vitality and public service improvements. Its design will promote continued parks and trails expansions for residents to enjoy and strives to improve the quality of life for all who reside within the Town.

PROJECT PRINCIPLES

The proposed concept uses many of the principles outlined in the Town of Bennett 2015 Comprehensive Plan as a guide for development. The three guiding ideologies that carry through the site design include:

Complete – Muegge Farms has a host of uses that provide residents' daily needs to live, work, play, shop, communicate, recreate, and educate. The design concept for Muegge Farms incorporates a variety of housing types and densities, local commercial, regional employment, and parks and open space. Planned as an extension of the town, other complimentary, non-residential land uses, including school sites, Town Hall and Civic Park are intended to serve residents of the broader community. Connectivity with the town will be achieved through the incorporation of trail corridors and pedestrian-oriented streets.

Connected – Muegge Farms is a community that connects its residents through site planning principles which promote pedestrian interaction. The plan has been organized around a series of neighborhoods that are joined through a network of multi-modal connections such as streetscapes, bike paths and pedestrian trails. The land plan links individual neighborhoods within the property through open space corridors and trails that lead to pocket parks and other recreational amenities that socially connect residents to each other, and strengthen the community.

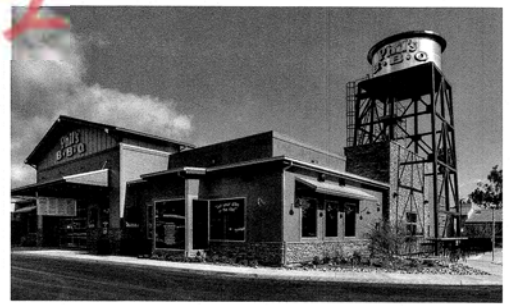
Diverse – Muegge Farms' neighborhoods have a variety of civic spaces, such as plazas, greens, recreational parks, and natural parks. Uses within neighborhoods will also vary, including residential and non-residential. Housing will range from single family detached homes to multifamily townhomes and condominiums giving buyers choices depending on their personal needs and economic position. Commercial uses will range from light industrial, to office/ employment and retail. Civic spaces will include school sites, potential fire station, and large community park. This diversity begins to shape the identity of the community.

DEVELOPMENT CONCEPT AND INTENT

The development concept outlines a variety of neighborhoods within the Town of Bennett that are connected and organized around a series of parks and trails. Embracing the general intent of the Town of Bennett Comprehensive Plan, the Muegge Farms Planned Development provides the Town with a coordinated and harmonious development which will best promote the health, safety, order, convenience, prosperity and general welfare of its residents. This ODP responds to the goals and policies of the Town of Bennett Comprehensive Plan and is designed to ensure high quality development compatible with the surrounding land uses and the natural environment.

Residential

The residential portion of the development plan defines six planning areas that will allow for a mix of housing types, including single-family attached, clustered homes and small and large lot single-family detached. The allowed use of multi-family homes (paired homes, townhouses, and condominiums) provides a true mix of housing types. It is generally anticipated that higher densities will transition from commercial and employment center uses to lower density residential. Flexibility in housing type will enable the development to be competitive in the market and attract a range of home buyers. While the actual mix of home types and lot sizes within individual neighborhoods may vary based on market conditions and economic factors at the time of development, a maximum number of units and density within each neighborhood will be maintained.



Commercial

The commercial portion of the development is designed to maximize the commercial, retail and employment center opportunities of the site. The prime location of the site, with approximately one mile of frontage on State Highway 79, one and one-half mile of frontage along 1-70, and the interchange at I-70 and Highway-79 at the southeast corner of the site, affords these opportunities. It is anticipated that primarily retail uses will locate along State Highway 79. A net 10.42 acre commercial site for Bennett Marketplace, including gas and ancillary commercial uses was approved by the Town January 14, 2003. These uses will be the catalyst to bring other retail uses to the Town. The intent is to provide goods and services to the existing and future residents which are not currently available within the Town.

PREPARED:	FEBRUARY 3, 2003
REVISED:	APRIL 10, 2003
REVISED:	MAY 4, 2007
REVISED:	SEPTEMBER 13, 2007
REVISED:	OCTOBER 18, 2007
REVISED:	APRIL 7, 2008
REVISED:	JULY 23, 2008
REVISED:	JANUARY 18, 2019
REVISED:	JULY 24, 2019
REVISED:	NOVEMBER 23, 2022

MUEGGE FARMS

RECEPTION#: 2023000003068,
1/17/2023 at 10:41 AM, 3 OF 13,
TD Pgs: 0 Josh Zygielbaum, Adams County, CO.

OUTLINE DEVELOPMENT PLAN
MUEGGE FARMS 3RD AMENDMENT
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
PROJECT INFORMATION

Employment

Employment, office and light industrial uses are planned along Interstate-70. The one and one half mile of frontage provides great visibility for the future uses. Anticipated employers may include light manufacturing, storage/warehousing, outdoor storage, distribution, high-tech indoor storage and assembly, office warehouses and office/showrooms. Access to the site from Interstate-70, which is a major truck shipping corridor makes this site ideal for these types of uses.

Parks and Open Space

The proposed parks and open space are intended to serve both neighborhood residents as well as those of the Town of Bennett. Through existing and proposed land dedications, including the Civic Park, Dent Hand, and Well & Water dedications, this plan meets the 10% requirement for PD Districts. The proposed plan includes a large central park intended to serve the broader community through space for active play and recreation.

Adjacent to the park, land has been dedicated to the town for potential use as a Town Hall. Proposed pedestrian walkways and trail corridors will connect neighborhoods, their amenities, the central park, commercial areas and the Town of Bennett, providing a key asset in promoting community health. This "interior" trail system will be composed of a hierarchy of trail types that will provide access to the Regional Trail and connect local neighborhoods to other communities.

SITE ACCESS AND CIRCULATION

Vehicular Circulation

Several entry locations will provide access to the site. Two arterial access locations will be provided from State Highway 79 and one from Colfax Avenue. The Southern most access point from Highway 79 was platted and permitted as part of Filing No. 1, per the 1st Amendment to this PD, and will follow from this existing alignment. The plan accommodates the future realignment of State Highway 79 to the east and incorporates an additional intersection to connect Civic Center Drive with South 1st Street. Two collector roads have been proposed to run north-south: a commercial collector which separates commercial and residential land uses and a local collector serving strictly residential uses. Roadways will provide a consistent streetscape character to the development by incorporating streetscape landscaping, sidewalks, fencing and signage. Roadway standards are intended to meet the standards and specifications as outlined in the Town of Bennett code.

Streets alignments within this document are intended to depict intent and their layout and design will be further defined at the time of Final Development Plan and Final Plat. Local streets within the Single Family neighborhoods will be a series of loop streets and cul-de-sacs. The streets are intended to provide inter-connectivity between neighborhoods and access to the public facilities.

Pedestrian Circulation

A proposed trail network within Muegge Farms is envisioned to connect the residents with commercial and public facilities. This system will be accomplished through a combination of sidewalks along the streets as well as through a comprehensive multi-use trail system through the open space and drainage corridors. The open space and drainage corridors will be designed to separate the pedestrians from drainage flows and detention facilities.

REGIONAL IMPACTS

The location and proposed uses for this development should have little if any impact on the region. Actual development of this site should only benefit the Town and surrounding area. The site is strategically located as a logical future expansion of Bennett. The proximity

of the site along I-70 at the State Highway 79 interchange promotes viable commercial uses that support the Town and future opportunities to maximize the growth of Bennett in a fiscally responsible way. Benefits to the Town include an increased tax base, sales tax revenue, new jobs, additional residents to support local retailers, and additional tax dollars to support local service providers. In addition to the economic benefits, development of this property will aid in the logical expansion of the Town's infrastructure system.

ENVIRONMENTAL INFORMATION

The land is currently farmed for wheat. The land does not currently accommodate sensitive habitiat and there exists no sensitive areas on the property that would be home to endangered species or specialized habitat. A Phase I Environmental Assessment for the entire property is included herein.

Natural and Manmade Hazards

There are no natural or man-made hazards on the site. The most significant features are drainage corridors that occasionally flood the fields.

Existing Vegetation

The native vegetation of the site has been disturbed by agriculture. No riparian vegetation exists on the site and there are no trees or shrubs.

Drainage

The site naturally drains to the low point along the northern property line. There are several defined drainage ways however, none have identified 100 year floodplains.

Wildlife

Habitat on the property is typical of the prairie grasslands of Eastern Colorado. The proximity of Interstate-70, and homes to the north, severely impacts the attraction of native wildlife to the site. However, wildlife typically associated with agricultural fields such as rodents, birds and ground dwellers live on or visit the site. The disturbed nature and lack of mature vegetation limits the value of the site for wildlife.

Topography

The site is gently rolling with a low point elevation of 5493 feet located at the northwest corner of the site. There are several knolls associated with the slight ridges running through the site. The high point elevation is 5529 located along the southern property at the center of the site. The slopes are generally in the zero - 4% range with approximately 36 feet of change in elevation across the site.

Grading

The intent of the proposed grading is to provide a balanced site with individual parcels of ground contoured to suit their final development needs while maintaining the historic drainage patterns throughout the site. The grading plan shall be accomplished in phases respecting the three existing drainage basins. A system of inlets shall intercept runoff and discharge to a series of open channels, constructed with the grading, to convey all offsite and onsite stormwater through the site. Several detention/ retention ponds shall be constructed to provide stormwater detention/retention and water quality. Erosion and sediment control shall be installed and maintained throughout the construction process.

RELATIONSHIP TO EXISTING USES

Adjacent Land Uses

North: Centennial Subdivision (Zoned R-1 Town of Bennett)
Penrith Park Subdivision (Zoned R-2 Town of Bennett)
Agriculture (Zoned A-1 Adams County)

West: Agriculture (Zoned A-1 Adams County)

East: State Highway 79
Vacant Land & Existing Commercial (Zoned PUD Town of Bennett)

South: Interstate - 70

PREPARED:	FEBRUARY 3, 2003
REVISIED:	APRIL 10, 2003
REVISED:	MAY 4, 2007
REVISED:	SEPTEMBER 13, 2007
REVISED:	OCTOBER 18, 2007
REVISED:	APRIL 7, 2008
REVISED:	JULY 23, 2008
REVISED:	JANUARY, 18, 2019
REVISED:	JULY 24, 2019
REVISED:	NOVEMBER 23, 2022

MUEGGE FARMS

UTILITIES

Storm Drainage

Proposed improvements to Muegge Farms will require the design and construction of storm drainage facilities to reduce site run-off and the impact to historic peak discharges. Drainage facilities such as water quality, infiltration, and detention ponds will be built to the Town of Bennett standards, and a preliminary drainage study has been completed as a part of this ODP.

Existing runoff generally flows from south to north. There are no existing stormwater quality and storage facilities on Site. The site accepts off-site flows from three different location along I-70 at a western, central and eastern location. Offsite flows enter the site from south through existing culverts and continue northerly towards State Highway 36. The project site has constraints along the northern edge of the site and there is no outfall for the central to eastern portion of the site because the railroad and Highway 36 do not have crossings provided and so the site acts as a closed basin. An existing drainage channel exists on the southwestern portion of the Site and is the only outfall on the site.

The existing site does not have irrigation ditches or canals within the Site. There are no major drainageways within the site. The Federal Emergency Management Agency (FEMA) Flood Insurance Rate Maps (FIRM) show that no regulated floodplains exist on the Muegge Farms property.
The southwestern outfall will use detention ponds to limit the runoff to at or below the historical discharge. Analysis of the downstream infrastructure will be reviewed to ensure no impact to these facilities will occur. During final design an infiltration analysis recommended to determine if any infiltration is available to reduce pond size.
The Penrith Park Subdivision is located central to the Site along the north edge which is downstream of a proposed detention pond. This pond has been designed to release in accordance with the offsite release rate identified in the Penrith Park Final Drainage Report.

The Centennial Subdivision is located northeast of the Site. The subdivision's storm infrastructure was not designed to accept offsite existing flows; therefore, Muegge Farm's proposes two infiltration Ponds to avoid flooding the downstream development. Overflow points should be defined for the infiltration Ponds to protect downstream property.
The project will incorporate several concepts in the design of drainage facilities for the site, including:

- Measures to reduce erosion effects of concentrated flows from developed storm water runoff to adjacent agricultural fields.
- Evaluation of detention facilities for multiple use, such as parks and open space, recreation facilities, trail corridors, and storm water storage for irrigation of common/ public open space areas.
- Detention and erosion control requirements for phased construction
- Storm water quality enhancement in accordance with the best management practices, particularly in the neighborhood commercial areas.

A Combination of utility systems shall be constructed to serve the entire development. Though development shall consist of phases, spanning several years, the infrastructure shall be designed to accommodate proposed final build out conditions.

Water and Sewer Service

A central water system shall be implemented throughout the site to supply adequate quantity and water pressure requirements. A half-million gallon storage tank, capable of future expansion to one million gallons, has been constructed in close proximity to the Dent Hand Dedication to accommodate peak water demands. The town's W-WW Master Plan uses 500 gallons of water tank storage of 500 gallons per single family residence, which would create the need for additional storage. A 12 inch water main is proposed to run along the northern border of the property and connects the Penrith site in lieu of the Colfax Anenue/US 36 main. The initial construction by Bennett Market Place includes the extension of a 16 inch water line within State Highway 79. It is anticipated that a connection will be made to the 12 inch main within State Highway 79 for service to the balance of Muegge Farms. Internal of the site, the project site will be served by a 12 inch perimeter water main grid.

The water system shall consist of numerous wells spaced throughout the site to supply adequate quantity. The current groundwater rights raw water dedication with the property is not adequate for the current ODP land uses. Verification of final water sources and availability will be provided on the FDP and site plans.

Sanitary Sewer System

A sanitary sewer system shall be sized to handle fully developed conditions. An existing sanitary sewer connection is constructed by Bennett Market Place and includes a twelve inch line that connects the King Soopers and the adjoining retail pads. It is assumed that a certain portion of the initial project phase will be allow to use this sanitary line. However, it is understood that a parallel system will need installed and downstream bottlenecking issue will need resolved.

As part of the Town's 2007 Water and Wastewater Master Plan (WWWMP), a 15 inch interceptor located in S 1st St. that combines with a 15 inch from Colfax. Most of the Muegge Farms site is expected to be tributary to the future lift station(s). In lieu of collection main or interceptor upgrades along First St and East 38th Ave, a west bypass interceptor west of McKinley and extending north to E 38th Avenue may be more feasible. Alteration from the WWWMP to best align with Muegge Farms road and utility corridor system should be considered. Also, a proposed sanitary sewer line is anticipated along the northern boundary of the site with the construction of Penrith Park to connect to. If the proposed sewer stub is not available prior to the construction of Phase 1, an alternate service point shall be as determined by the Town of Bennett.
The Bennett Wastewater Treatment Facility does not have the capacity for full build-out of the project site and will need to be expanded.

GENERAL DEVELOPMENT AND PHASING

Development is anticipated to proceed from the northeast portion of the site and move west and south. As indicated, the initial phase will be commercial uses along State Highway 79 and the adjacent residential neighborhood planning areas. Single Family Attached and Multi-Family residential will follow the Single Family Detached residential. Included in the initial phase are adequate roads, utility line extensions and provisions for adequate storm water management. Park development and associated dedications will keep pace with *residential development*. Public facilities/services, infrastructure, utilities, and amenities will be constructed to serve the residential neighborhoods in a reasonable and efficient manner as those areas are developed. Overall, the development phases will be based on demand, market conditions and the availability of water.

PLAN AMENDMENTS

The size of any Planning Area may increase or decrease by an administrative amendment by no more than 15% as determined by the Town's Zoning Administrator after final determination of internal street alignments, arterial street alignments, park and open space and buffer zone areas. The initial boundary of any Planning Area will be established with the final plat that is prepared for that area. Amendments to planning areas shall be subject to the Town of Bennett Municipal Code, as amended.

PARK DEVELOPMENT - PUBLIC LAND DEDICATION

Per the annexation agreement, a total of 10% of the land or 73 acres, shall be dedicated to the Town for general use, parks, trail corridors and open space. An additional 2.17 acres of public dedication is proposed to fulfill the Penrith Park open space requirement. The dedication shall be at a location and of a configuration and character acceptable to the Town and applicant. Park development will need to keep pace with residential development.

SERVICE REQUIREMENTS

Schools:

Muegge Farms is located within the Bennett School District 29J and development shall proceed pursuant to Town ordinances, policies and regulations.

Fire Protection Services:

Muegge Farms is located within the Bennett and Watkins Fire District and development will proceed pursuant to Town ordinances, policies and regulations. The property is located less than 1 mile West of Station 91 which is staffed 24 hours a day and is the primary response station for the fire district. In addition, a future station is being identified and may be incorporated within the Town Hall civic dedication.

Parks and Recreation:

Muegge Farms is located within the Bennett Park and Recreation District. A regional park is planned in the northeast corner of Muegge Farms adjacent to the Muegge House Historic Site, which was given to the Town by the owners of Muegge Farms, and the Town Hall site. This accumulation of land for public use will create a large civic amenity for the residents of the Town of Bennett. In addition, taxes paid by both residential and non-residential land owners will support the recreation district's ability to provide recreational facilities for its residents.

It is anticipated that pocket parks, tot lots and trail/open space corridors will be provided within the residential neighborhoods. The intent is that all homes within Muegge Farms be connected to the pocket parks, regional park, schools and commercial activities by a network of trails. Park development will keep pace with the residential development and will be indicated with each residential Final Plat and Final Development Plan.

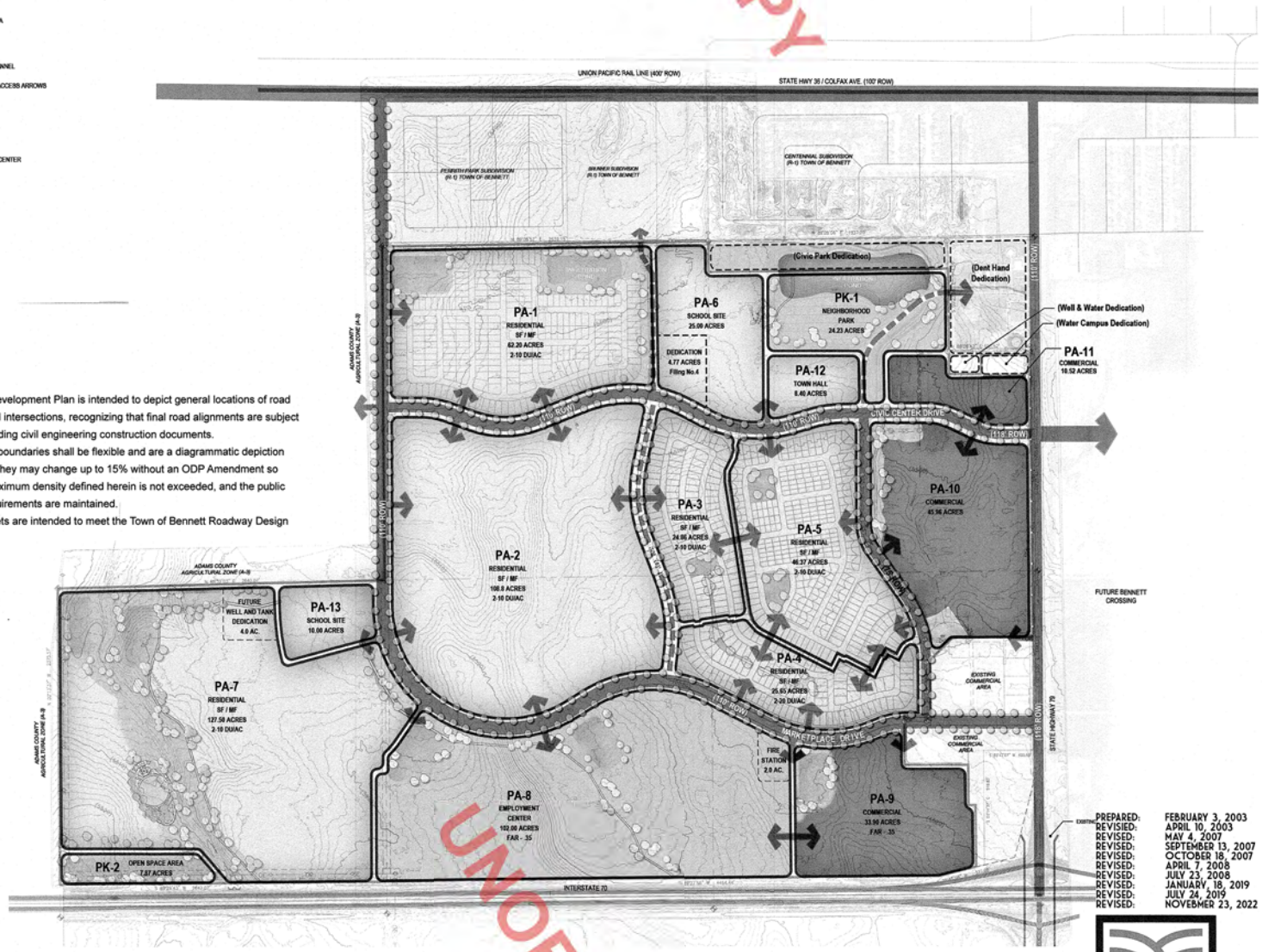
PREPARED: FEBRUARY 3, 2003
REVISIED: APRIL 10, 2003
REVISED: MAY 4, 2007
REVISED: SEPTEMBER 13, 2007
REVISED: OCTOBER 18, 2007
REVISED: APRIL 7, 2008
REVISED: JULY 23, 2008
REVISED: JANUARY, 18, 2019
REVISED: JULY 24, 2019
REVISED: NOVEMBER 23, 2022

RECEPTION#: 2023000003068,
1/17/2023 at 10:41 AM, 5 OF 13,
TD Pgs: 0 Josh Zygielbaum, Adams County, CO.

OUTLINE DEVELOPMENT PLAN
MUEGGE FARMS 3RD AMENDMENT
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
ZONING MAP
PAGE 5 OF 13

LEGEND

- ARTERIAL STREET SECTION (110' ROW)
- RESIDENTIAL COLLECTOR STREET SECTION (80' ROW)
- COMMERCIAL COLLECTOR STREET SECTION 70' ROW)
- PLANNING AREA
- DETENTION
- DRAINAGE CHANNEL
- CONCEPTUAL ACCESS ARROWS
- RESIDENTIAL
- EMPLOYMENT CENTER
- COMMERCIAL
- PUBLIC



NOTES

1. This Outline Development Plan is intended to depict general locations of road alignments and intersections, recognizing that final road alignments are subject to revision pending civil engineering construction documents.
2. Planning area boundaries shall be flexible and are a diagrammatic depiction of use areas. They may change up to 15% without an ODP Amendment so long as the maximum density defined herein is not exceeded, and the public dedication requirements are maintained.
3. Proposed streets are intended to meet the Town of Bennett Roadway Design Standards.

PREPARED:	FEBRUARY 3, 2003
REVISED:	APRIL 10, 2003
REVISED:	MAY 4, 2007
REVISED:	SEPTEMBER 13, 2007
REVISED:	OCTOBER 18, 2007
REVISED:	APRIL 7, 2008
REVISED:	JULY 23, 2008
REVISED:	JANUARY, 18, 2019
REVISED:	JULY 24, 2019
REVISED:	NOVEMBER 23, 2022

MUEGGE FARMS

OUTLINE DEVELOPMENT PLAN
MUEGGE FARMS 3RD AMENDMENT
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
LAND USE MATRIX & STANDARDS

MUEGGE FARMS - BENNETT, CO
MASTER PLAN DEVELOPMENT DENSITY ANALYSIS

MUEGGE FARMS	Planning Area Code	ODP Designated Use [1]	Gross Land Area (Acres)	Minimum Entitled Gross Density (DU/AC)	Maximum Entitled Gross Density (DU/AC)	Maximum Total # of Units [2]
1. Park & Recreation Areas	PK-1	Park	24.23			
	PK-2	Open Space	7.87			
2. Development Areas	PA-1	SF/ MF	62.20	2	10	
	PA-2	SF/ MF	108.80	2	10	
	PA-3	SF/ MF	24.86	2	10	
	PA-4	SF/ MF	25.65	2	20	
	PA-5	SF/ MF	46.37	2	10	
	PA-6	School	25.00			
	PA-7	SF/ MF	127.50	2	10	
	PA-8	Employment Center	102.00			
	PA-9	Commercial	33.90			
	PA-10 [3]	Commercial	45.96			
	PA-11	Commercial	10.52			
	PA-12	Town Hall	8.40			
	PA-13	School	10.00			
3. Major Roadways/ ROW			37.30			
4. Public Facilities	Part of PA-8	Fire Station (2 Acres)				
5. Total Map Acreage [1] (Total Figures Above)			*700.56*			*2800* [4]

Land Use Summary	Acres	Percentage
Residential	395.38	56.4%
Commercial [5]	192.38	27.5%
Right of Way	37.30	5.3%
Proposed Open Space [6]	40.50	5.8%
School	35.00	5.0%
Total	**700.56**	**100.0%**

Open Space Summary / Town Dedication	Area (in Acres)
Dent Hand Dedication [7]	13.00
Civic Center Park Dedication [7]	11.00
Well and Water Parcel Dedication [7]	1.34
Water Campus Dedication [7]	1.34
Park Dedication - Filing No. 4 [8]	1.99
(PK-1): Remaining Civic Center Park Dedication *(Acreage includes Penrith Park dedication)*	24.23
(PK-2): Open Space Area	7.87
(PA-12): Town Hall Dedication	8.40
Fire Station [5]	2.00
Well and Tank Dedication	4.00
PROVIDED DEDICATION [6]	**75.17**

Non-Residential Development Summary (@ 0.35 FAR)					
EC-Employment Center - 0.35 FAR	PA-8	Employment Center	1,555,092		S.F
C-General Commercial - 0.35 FAR	PA-9	Commercial	516,839		S.F
C-General Commercial - 0.35 FAR	PA-10	Commercial	700,706		S.F
C-General Commercial - 0.35 FAR	PA-11	Commercial	160,388		S.F
		Total:	**2,933,025**		**S.F**

[1] Permitted uses applied to this Outline Development Plan shall be those allowed in the Town of Bennett's Municipal Code for each comparable zoning district unless amended by this document.

[2] The total number of dwelling units approved within the established planning areas will be determined at the final development plan and final plat and shall not exceed the maximum gross density set forth in the Outline Development Plan.

[3] PA-10 ultimate size may vary in acreage due to State Highway 79 Right-Of-Way expansion, realignment and future dedication.

[4] Unit counts between Planning Areas may be transferrable so long as the Maximum Entitled Gross Density for each parcel is not exceeded and the Maximum Total # of Units for the project is not exceeded.

[5] Two acres from PA-8 Employment Center shall be dedicated to the Town of Bennett for a future fire station as part of the fullfillment of the Town's Open Space Dedication.

[6] The original Muegge Farms Outline Development Plan was approved for 730 acres of mixed use development of which ten percent (10%) of the general land dedication requirement equals 73 acres. Additionally, the Town has already accepted the Dent Hand Dedication, Civic Park Dedication, Well and Water Dedication, Filing No. 4 Park Dedication, and Water Campus Dedication as itemized above. Furthermore, a 2.17 acre deficit in Penrith Park's open space requirement is accounted for in Muegge Farms open space requirment which brings the total land dedication requirement to 75.17 acres.

[7] This real property was previously conveyed to the Town in partial satisfaction of public land dedication requirement.

[8] Per Town of Bennett Code, Section 16-5-530, credit for 75% of park area created withing Filing No.4.

BULK & DIMENSION STANDARDS

Land Use Category	Single-Family Detached		Single-Family Attached		Multi-Family [1]	Commercial [3]	Employment Center [3]	Open Space
	Single Lot	Clustered Lot	Two-Family Dwelling	Townhome [1]				
Minimum Lot Area					NA	NA	NA	NA
Front Loaded	No Minumum							
Alley Loaded								
Front Yard Setback (minimum) [2,3,4]								
Front Loaded	10'	10'	15'	10'	25'	0'	50'	
Alley Loaded	5'	5'	5'	5'				
Side Load	12'	10'	10'	10'				
Side Yard Setback (minimum) [3]								
Front Loaded	5' (7' on Corner Lots)	5' (10' on Corner Lots)	5' (7' on Corner Lots)	5' (7' on Corner Lots)	20'	10'	25'	NA
Alley Loaded	5' (7' on Corner Lots)	5' (7' on Corner Lots)	5' (7' on Corner Lots)	5' (7' on Corner Lots)	6' Between Buildings 10' on Corner Lots			
Rear Yard Setback (minimum) [2,3,4]						15'	25'	
Front Loaded	10'	5'	10'	5'	20'	0'	0'	0'
Alley Loaded	4'	4'	4'	4'	4'			
Building Separation (minimum)	Building Code or 10' [7]	Building Code or 10' [7]	Building Code or 10' [7]	Building Code or 10' [7]	Building Code or 10' [7]			
Maximum Building Height (Principal)	35'	35'	35'	35'	40'	50'	75'	35'
Maximum Building Height (Accessory)	20'	20'	20'	20'	20'	NA	NA	NA
Off-Street Parking Requirements	2 per Dwelling Unit	2 per Dwelling Unit	2 per Dwelling Unit	2 per Dwelling Unit	1.25 per Studio, 1.5 per 1 Bedroom, 2 per 2 & 3 Bedroom	In accordance with Town of Bennett Municipal Code for specific uses	In accordance with Town of Bennett Municipal Code for specific uses	In accordance with Town of Bennett Municipal Code for specific uses

[1] If fee simple lots are created within a building, there are no setback requirements between internal units.

[2] Incidental architectural features such as cornices, eaves, canopies, chimneys, window wells, bay or box windows, ornamental features, and other similar architectural features may project three (3) feet into any required setback provided these projections are at least two (2) feet from any side lot line and five (5) feet from front and rear lot lines.

[3] Awnings, blade signs and incidental architectural features such as cornices, eaves, canopies, bay windows, and other similar architectural features may project five (5) feet into any required setback.

[4] Decks and patios may encroach 50% into any rear setback.

[5] Porches may encroach five (5) feet into any front setback provided the porch is a minimum of five (5) feet from the front lot line.

[6] Front loaded garages shall be setback a minimum of eighteen (18) feet.

[7] Whichever is greater.

[8] Pop-outs, which are extensions of living areas on a second or third story are allowed to extend into a front or rear yard setback by no more than 2 feet.

Definitions
Alley Loaded - The garage is accessed from an alley instead of a street.
Building Code - The edition of the international building code adopted by the Town of Bennett and in effect at the time the building permit is requested.
Clustered Lot - A grouping of residential properties.
Front Loaded - The garage is accessed from a street or prodominant R.O.W.
Stepped Massing - Architectural buildings that vertically varry, typically in a graduated sequence.
Outdoor Commercial Recreation and Entertainment - any recreational / commercial use that utilizes the outdoors as a part of its point of business, such as mini-golf.

GENERAL NOTES

1. All setbacks shall be measured in a perpendicular direction from the lot or property line to the building foundation

2. Provisions of this Outline Development Plan shall prevail and govern the development of Muegge Farms provided, however, that where the provisions within this document do not address a particular subject, the relevant provisions in the Town of Bennett Land Use Code or Municipal Code, as applicable, shall prevail

3. All setback encroachments shall also be subject to the regulations of the International Building Code and the International Fire Code.

PREPARED: FEBRUARY 3, 2003
REVISED: APRIL 10, 2003
REVISED: MAY 4, 2007
REVISED: SEPTEMBER 13, 2007
REVISED: OCTOBER 18, 2007
REVISED: APRIL 7, 2008
REVISED: JULY 23, 2008
REVISED: JANUARY, 18, 2019
REVISED: JULY 24, 2019
REVISED: NOVEMBER 23, 2022

MUEGGE FARMS

RECEPTION#: 2023000003068,
1/17/2023 at 10:41 AM, 7 OF 13,
TD Pgs: 0 Josh Zygielbaum, Adams County, CO.

OUTLINE DEVELOPMENT PLAN
MUEGGE FARMS 3RD AMENDMENT
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
DEVELOPMENT USES & GUIDELINES

DEVELOPMENT STANDARDS & DESIGN GUIDELINES

The following Development Standards have been prepared to ensure a responsible site planning process which will help minimize potential land use conflicts, provide visual interest and diversity of homes, as well as enhance the small town, country character and open feeling of the Community. The standards also provide the flexibility necessary to support a range of single family-residential housing types and lot sizes, depending on market conditions at the time of development.

The Development Standards have been established for each major land use type within the Community. Projects permitted within each area and land use type shall be constructed in accordance with these Development Standards and permitted uses. These standards are considered preliminary guidelines which may require more specific information and detail at the time of Final Development Plan Review. The architectural character and intent for special/innovative residential solutions will also need to be established at Final Plan as determined by the Town. This may include prototypical site plans, and architectural character sketches and elevations.

Development Standards with respect to parking (including commercial off-street parking), sign control and landscape requirements shall be controlled by the provisions of the Town's Zoning Code and Subdivision Regulations.

ARCHITECTURAL STANDARDS

In order to create distinctive and valued communities, each neighborhood shall contain architectural diversity, high quality and attention to design detail in accordance with The Town of Bennett architectural design guidelines and standards. The following general standards shall apply to all residential neighborhoods and become the basis for more specific architectural design as set forth in this ODP.

1. Varied architectural styles are encouraged within each neighborhood. (Architectural building forms and elevations shall be varied but compatible along the streetscape, simple forms are preferred over complex forms)
2. Where floor plans are offered on a repeating basis, alternate elevations shall be developed. Identical floor plans with similar exterior elevations shall not be located adjacent to one another.
3. A variety of design elements and details shall contribute to the overall character of a home's elevation and its appearance from the street, including the use of front porches and covered entries, bay and box windows, and the handling of windows and door openings.
4. Careful consideration shall be given to the massing, proportions, and the overall scale of each design. A home's mass will be "broken up" to reduce its apparent scale, provide visual interest and depth, and achieve a more articulated building form. Builders are encouraged to develop floor plans that are responsive to architectural style objectives as well as energy efficient building objectives.
5. Large, flat, unbroken building planes on the front and rear elevations shall be prohibited. Side elevations without windows shall be discouraged.
6. Size, shapes, proportions, and trim of doors and windows shall be consistent with the architectural style of the home.
7. Garage-dominated homes and streetscenes shall be avoided through various design techniques, including providing varied garage orientations, locations and setbacks, as well as recessing garages into the main plane of front facades and providing design elements to help them blend with front architecture. Innovative / traditional design solutions, such as rear-yard and rear-loaded garages shall also be encouraged.
8. Heights of architecture should vary to create a more inviting residential streetscape and to accomodate a pedestrian scale.

(SF) SINGLE-FAMILY RESIDENTIAL INTENT

To provide for a variety of residential development of single-family homes on a mix of single-family lot types, including the potential for attached homes. Special residential housing types and lot configurations, including but not limited to, rear-load homes with alley access, will be allowed if consistent with the intent, standards, and residential character of this section.

PERMITTED USES (by Right)

1. Single-family dwelling units (SFD or Single Family Detached)
2. Two family dwelling units (SFA or Single Family Attached)
3. Community information centers and kiosks
4. Accessory structures and uses (see below)
5. Public and private open space and recreational facilities
6. Signage (including project identification signs and monuments)-subject to the sign standards and permit requirements in the Bennett Municipal Code.
7. Utilities and appurtenant facilities
8. Roads and parking
9. Consideration may be given to shared parking where appropriate in accordance with the Bennett Municipal Code requirements for parking regulations.
10. Drainage and detention/infiltration facilities
11. Elementary or secondary education school
12. Religious institutions
13. Group home for the elderly
14. Manufactured homes
15. Home occupations per Bennett Municipal Code.
16. All uses specified within the Residential zone districts R-1 and R-2 that are residentially compatible within the Town of Bennett's Municipal Code or any other uses consistent with this section as determined by the Zoning Administrator shall be permitted.

PREPARED:	FEBRUARY 3, 2003
REVISIED:	APRIL 10, 2003
REVISED:	MAY 4, 2007
REVISED:	SEPTEMBER 13, 2007
REVISED:	OCTOBER 18, 2007
REVISED:	APRIL 7, 2008
REVISED:	JULY 23, 2008
REVISED:	JANUARY 18, 2019
REVISED:	JULY 24, 2019
REVISED:	NOVEMBER 23, 2022

MUEGGE FARMS

RECEPTION#: 2023000003068,
1/17/2023 at 10:41 AM, 8 OF 13,
TD Pgs: 0 Josh Zygielbaum, Adams County, CO.

OUTLINE DEVELOPMENT PLAN
MUEGGE FARMS 3RD AMENDMENT
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
DEVELOPMENT USES & GUIDELINES

CONDITIONAL USES

(Conditional uses will be reviewed and processed in accordance with the Bennett Municipal Code)

1. Child care centers
2. Public and quasi-public facilities (such as, but not limited to clubs and/or lodges, community gardens, religious institutions, and fire stations)
3. Institutional facilities

4. Special community buildings/facilities
5. Cemetary
6. Assisted living/ nursing
7. All conditional uses within the Residential zone districts R-1 and R-2 in the Town of Bennett's Municipal Code or any other uses consistent with this section as determined by the Zoning Administrator shall be permitted.

TEMPORARY USES

(Temporary uses will be reviewed and processed in accordance with the Bennett Municipal Code)

1. Show home complexes and/or residential sales offices
2. Temporary construction yards and structures
3. All temporary uses specified within the Residential zone districts R-1 and R-2 in the Town of Bennett's Municipal Code or any other uses consistent with this section as determined by the Zoning Administrator shall be permitted.

(MF) MULTI-FAMILY RESIDENTIAL INTENT

Multi-family home parcels are much like small villages or communities. Each parcel must be designed for compatibility within itself, using a blend of building types, compatible architectural styles, and a tastefully balanced palette of colors and materials to achieve a restful dynamic within each parcel.

Site planning for the following general concepts should be considered when planning for and designing attached and multi-family housing.

1. Emphasize pedestrian access and connections to public sidewalks, trails, and open space systems when preparing site plans.
2. Keep parking internal to the project and not along streets, except for guest parking.
3. Solid walls/fences at the project periphery are to be set back five (5') feet or more behind the front facade, and are to be minimized as much as possible.
4. Each multi-family project within Muegge Farms shall be required to provide at least one amenity to serve as a focal point for that area. This amenity may be a playground, a community building, a pool, a sport court, or a playfield.

Similar to single family neighborhoods, multi-family neighborhoods shall include diversity in architecture to create interesting and attractive streetscenes. To this end, each multi-family neighborhood should provide the following:

1. At least two (2) different elevation styles for projects containing three or more of the same building type.
2. A minimum of two (2) individual unit plans per building.
3. Minimize blank, singular planes oriented toward public views. Provide some architectural elements on all sides of the building.
4. Consider intended architectural styles in conjunction with the development of building plans, massing forms, elements, details, and color.
5. Design buildings to define outdoor spaces, with floor plans that have a logical and functional relationship between indoor and outdoor spaces.
6. Provide front porches and balconies where style-appropriate and when possible for stepped massing.
7. Vary setbacks on building elements.

PERMITTED USES (by Right)

1. Single-family dwelling units (SFD or Single Family Detached)
2. Two family dwelling units (SFA or Single Family Attached)
3. Multi-family dwelling units (including town homes, condominiums or apartments)
4. Rooming, lodging or boarding houses
5. Community information centers and kiosks
6. Accessory structures and uses (see below)
7. Public and private open space and recreational facilities
8. Signage (including project identification signs and monuments)-subject to the sign permit requirements in the Bennett Municipal Code.
9. Utilities and appurtenant facilities
10. Roads and parking
11. Consideration may be given to shared parking where appropriate in accordance with the Bennett Municipal Code requirements for parking regulations.
12. Drainage and detention/infiltration facilities
13. Elementary or secondary education school
14. Religious institutions
15. Group home for the elderly
16. Manufactured homes
17. Home occupations
18. All uses specified within the R-3 zone district in the Town of Bennett's Municipal Code or any other uses consistent with this section as determined by the Zoning Administrator shall be permitted.

CONDITIONAL USES

(Conditional uses will be reviewed and processed in accordance with the Bennett Municipal Code)

1. Child care centers
2. Public and quasi-public facilities (such as, but not limited to fire and police stations and clubs and/ or lodges, events center, community gardens, religious institutions)

3. Institutional facilities
4. Special community buildings / facilities
5. Cemetery
6. Assisted living/ nursing.
7. All uses specified within the Residential zone districts R-1, R-2 and R-3 in the Town of Bennett's Municipal Code or any other uses consistent with this section as determined by the Zoning Administrator shall be permitted.

COMMERCIAL INTENT

To provide a broad range of retail goods and services, business, and professional services which can support local and regional uses, and complementary public community services and facilities.

PERMITTED USES (BY RIGHT)

1. Commercial retail sales
2. Commercial services
3. Food and beverage service (including bars, taverns, restaurants, fast food, nightclub)
4. Financial institutions
5. Day care centers
6. Indoor and outdoor commercial recreation and entertainment
7. Professional and medical offices
8. Printing and publishing offices
9. Public and quasi-public facilities (such as, but not limited to fire and police

PREPARED:	FEBRUARY 3, 2003
REVISIED:	APRIL 10, 2003
REVISED:	MAY 4, 2007
REVISED:	SEPTEMBER 13, 2007
REVISED:	OCTOBER 18, 2007
REVISED:	APRIL 7, 2008
REVISED:	JULY 23, 2008
REVISED:	JANUARY, 18, 2019
REVISED:	JULY 24, 2019
REVISED:	NOVEMBER 23, 2022

RECEPTION#: 2023000003068,
1/17/2023 at 10:41 AM, 9 OF 13,
TD Pgs: 0 Josh Zygielbaum, Adams County, CO.

OUTLINE DEVELOPMENT PLAN
MUEGGE FARMS 3RD AMENDMENT
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
DEVELOPMENT USES & GUIDELINES

stations)
10. Public and private membership clubs
11. Institutional and special community facilities and events (including educational facilities and churches)
12. Common areas and open space
13. Community information centers and kiosks
14. Accessory structures and uses (see below)
15. Signage (including project identification signs and monuments)-subject to the sign permit requirements in the Bennett Municipal Code.

16. Utilities and appurtenant facilities
17. Roads and parking
18. Consideration may be given to shared parking where appropriate in accordance with the Bennett Municipal Code requirements for parking regulations.
19. Drainage and detention/infiltration facilities
20. All uses specified within the C zone district in the Town of Bennett's Municipal Code or any other uses consistent with this section as determined by the Zoning Administrator shall be permitted.

CONDITIONAL USES

(Conditional uses will be reviewed and processed in accordance with the Bennett Municipal Code)

1. Restaurants with drive-thru facilities or breweries
2. Commercial storage areas (screened by solid fence or wall at least six feet in height)
3. All conditional uses within the C zone district in the Town of Bennett's Municipal Code or any other uses consistent with this section as determined by the Zoning Administrator shall be permitted.
4. Fire Stations

TEMPORARY USES

(Temporary uses will be reviewed and processed in accordance with the Bennett Municipal Code)

1. Temporary construction yards and structures.
2. All temporary uses specified within the C zone district in the Town of Bennett's Municipal Code or any other uses consistent with this section as determined by the Zoning Administrator shall be permitted.

EMPLOYMENT CENTER INTENT

To provide a range of commercial and industrial uses near Interstate 70 which can support local and regional uses.

PERMITTED USES (by Right)

1. Educational facilities (including business, trade, vocation, post-secondary and university)
2. Professional and medical laboratories
3. Professional and medical offices and facilities (including hospitals)

4. Light trade and technical uses
5. General research and development
6. Warehousing and distribution
7. Wholesale establishments (including accessory offices)
8. Institutional and *special community* facilities and events
9. Public and quasi-public facilities (such as libraries, museums, religious institutions, events center and other civic uses)
10. Common areas and open space
11. Commercial retail (< 5,000 sq. ft.)
12. Commercial recreation
13. Financial institutions
14. Repair facilities (including but not limited to auto, furniture, major household appliances)
15. Signage, (including project identification signs and monuments)-subject to the sign permit requirements in the Bennett Municipal Code.
16. Utilities and appurtenant facilities
17. Roads and parking
18. Consideration may be given to shared parking where appropriate in accordance with the Bennett Municipal Code requirements for parking regulations.
19. Drainage and detention/infiltration facilities
20. All uses specified within the EC zone district in the Town of Bennett's Municipal Code or any other uses consistent with this section as determined by the Zoning Administrator shall be permitted.

CONDITIONAL USES

(Conditional uses will be reviewed and processed in accordance with the Bennett Municipal Code)

1. Manufacturing, assembly, finishing or fabrication fully enclosed in a structure.
2. Outdoor material supply or storage (screened by solid fence or wall at least six feet in height).
3. All conditional uses within the EC zone district in the Town of Bennett's Municipal Code or any other uses consistent with this section as determined by the Zoning Administrator shall be permitted.
4. Fire Stations

OPEN SPACE INTENT & GUIDELINES

To provide active and passive open space uses, including potential recreational facilities, to serve the residents of the Town of Bennett.

PERMITTED USES (by Right)

1. Active public and private recreational uses, including but not limited to ballfields,

playgrounds, swimming pools, and court games.
2. Passive public and private recreational uses, including but not limited to picnic grounds, native, naturalized or landscaped fields, and visual buffer open space.
3. Public Recreation Buildings
4. Community Information/Sales Centers
5.
6. Accessory structures and uses
7. Temporary construction yards and structures
8. Signage, (including project identification signs and monuments)-subject to the sign permit requirements in the Bennett Municipal Code.
9. Utilities and appurtenant facilities
10. Roads and parking
11. Consideration may be given to shared

PREPARED:	FEBRUARY 3, 2003
REVISIED:	APRIL 10, 2003
REVISED:	MAY 4, 2007
REVISED:	SEPTEMBER 13, 2007
REVISED:	OCTOBER 18, 2007
REVISED:	APRIL 7, 2008
REVISED:	JULY 23, 2008
REVISED:	JANUARY, 18, 2019
REVISED:	JULY 24, 2019
REVISED:	NOVEMBER 23, 2022

RECEPTION#: 2023000003068,
1/17/2023 at 10:41 AM, 10 OF 13,
TD Pgs: 0 Josh Zygielbaum, Adams County, CO.

OUTLINE DEVELOPMENT PLAN
MUEGGE FARMS 3RD AMENDMENT
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
DEVELOPMENT USES & GUIDELINES

parking where appropriate in accordance with the Bennett Municipal Code requirements for parking regulations.

12. Drainage and detention/infiltration facilities
13. All uses specified within this zone district in the Town of Bennett's Municipal Code or any other uses consistent with this section as determined by the Zoning Administrator shall be permitted.

TEMPORARY USES

(Temporary uses will be reviewed and processed in accordance with the Bennett Municipal Code)

1. Special community events
2. All uses specified within the Open Space Intent and Guidelines consistent with this section as determined by the Zoning Administrator shall be permitted.
3. Real estate sales offices are not to exceed a 60 month time period with two (2) renewals of temporary use.

DETENTION / INFILTRATION AREAS AND DRAINAGE CHANNELS

The landscape for detention/infiltration areas and drainage channels will be designed in a manner that will reinforce the character of the Town of Bennett and the high plains prairie, as well as provide the greatest benefit to the community. All detention/infiltration areas and related conveyance facilities shall strive for a natural vs. an "engineered" look. The designs shall strive to create a landscape concept for detention/infiltration areas, and drainage channels that will be aesthetically pleasing as well as environmentally responsible in terms of water use. It is considered beneficial to allow for passive recreational activities near detention/infiltration areas.

1. Detention/infiltration facilities, manmade drainage channels other than those through residential front or side yards, and disturbed drainage channels, shall be planted with drought tolerant native grasses and plant materials. Front and side yard residential drainages shall be planted to match the front or side yard of the residence. Natural drainage channels containing existing vegetation and non-irrigated native grasses are exempt. Detention/infiltration areas or drainage channels shall be designed to blend with adjacent areas.
2. Natural drainage corridors containing existing native grasses and established vegetation may be supplemented with native trees, shrubs and ornamental grasses that could enhance wildlife habitat and the pedestrian environment. Areas of disturbance within the natural drainage corridors shall be re-vegetated with native plant materials.
3. Consideration should be given to locating pedestrian focal points along drainages including overlooks, and seating areas.
4. Plant materials should be used to strengthen the edge of drainage ways.
5. Landscape adjacent to drainage ways should be naturalistic and include riparian vegetation.

ACCESSORY STRUCTURES AND USES INTENT

To provide Development Standards applicable to all land use areas within the planned development (exclusive of Open Space areas). Accessory Structures or Uses shall refer to detached, subordinate buildings or structures, the use of which is customarily incidental to that of the principal building or to the main use of the land and which is located on the same lot with the main building or use.

1. Private parking garages (attached or detached from single-family homes)
2. Service structures (utility/storage, garden sheds and greenhouses)
3. Patio/privacy enclosures and walls
4. Patio shade structures and gazebos

ACCESSORY STRUCTURES DEVELOPMENT GUIDELINES

1. Permitted accessory uses shall conform to the setbacks and height restrictions outlined in the Bulk and Dimensions Standards Matrix.
2. Maximum number of accessory structures = 1 per lot as a use by right (with the exception of detached garages). Any additional structure would need to be submitted to the Governing Design Review Committee (which could be a Homeowner's Association or Metropolitan District), for review and approval.
3. Detached parking garages shall be architecturally compatible with the main building or house, including similar design styles, details, materials, and color.
4. Service structures, such as garden sheds, utility storage and greenhouses, are only permitted if attached to the main structure and successfully integrated into the residential architecture or detached if approved by Governing Design Review Committee.
5. Patio shade structures and gazebos should be compatible with the architectural styles of their related homes.
6. Patio/privacy enclosures and walls should be architecturally compatible and reflect details and materials consistent with the residential buildings they serve.

LANDSCAPE DESIGN GUIDELINES

In general, landscaped areas should help to reinforce the character and identity of the community. These areas help promote community health and mental well-being and every effort should be made to incorporate a variety and abundance of plant material. The following principles should be used when planning and designing landscaped areas:

1. Where possible layers of vegetation should be used to help define spaces (large trees, understory trees, shrubs, herbaceous plants, grass)
2. Use tree species that provide shade, color and variety
3. Use a diversity of species to limit loss from disease and insects
4. Use native and drought tolerant species when possible
5. Water intensive plantings, such as turf, should be restricted to active areas and used sparingly in other cases.
6. Irrigation systems that conserve water are encouraged

A list of suggested plant species can be found in the Town of Bennett's Development Design Gudelines.

RESIDENTIAL STREET DESIGN CONCEPT AND GUIDELINES

Residential streets contribute significantly to neighborhood quality. Street network will include a hierarchy of streets that reflect the different residential densities and traffic conditions within the community. The proposed street system is designed to provide a tree-lined streetscape, characteristic of traditional neighborhoods. This concept incorporates street sections in compliance with the Town of Bennett Road Design Standards with tree lawns where appropriate, and attached walks as an alternative, with both formal and informal street-tree plantings to enhance neighborhood quality, safety, livability and value.

PREPARED:	FEBRUARY 3, 2003
REVISIED:	APRIL 10, 2003
REVISED:	MAY 4, 2007
REVISED:	SEPTEMBER 13, 2007
REVISED:	OCTOBER 18, 2007
REVISED:	APRIL 7, 2008
REVISED:	JULY 23, 2008
REVISED:	JANUARY, 18, 2019
REVISED:	JULY 24, 2019
REVISED:	NOVEMBER 23, 2022

MUEGGE FARMS

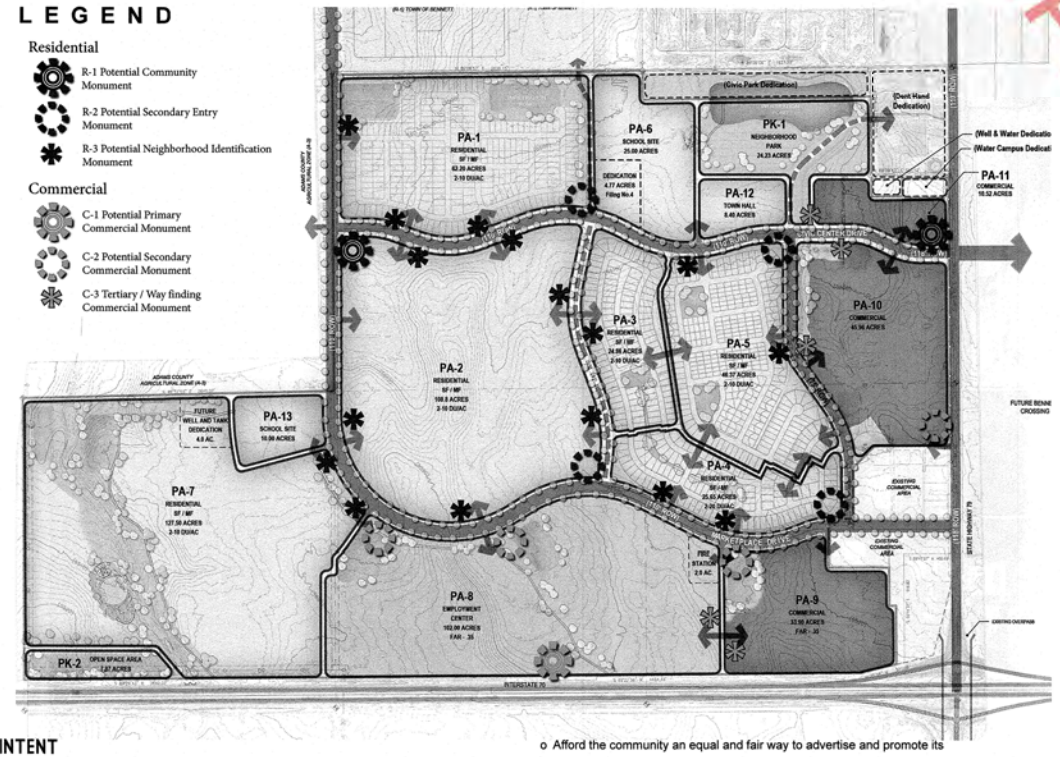
RECEPTION#: 2023000003068,
1/17/2023 at 10:41 AM, 11 OF 13,
TD Pgs: 0 Josh Zygielbaum, Adams County, CO.

OUTLINE DEVELOPMENT PLAN
MUEGGE FARMS 3RD AMENDMENT
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
SIGNAGE INTENT & TYPOLOGIES
PAGE 11 OF 13

LEGEND

Residential
- R-1 Potential Community Monument
- R-2 Potential Secondary Entry Monument
- R-3 Potential Neighborhood Identification Monument

Commercial
- C-1 Potential Primary Commercial Monument
- C-2 Potential Secondary Commercial Monument
- C-3 Tertiary / Way finding Commercial Monument



INTENT

The purpose of this Chapter is to promote the public health, safety and welfare by establishing standards and criteria for the construction, installation, maintenance and operation of signs in Muegge Farms, which are subject to the provisions of this ODP.

More specifically, this section is intended to:

- Enhance and protect the physical appearance of the Muegge Farms
- Compliment the values, goals and policies set forth in the Town's Master Plan;
- Protect property values;
- Promote and maintain visually attractive, high-value residential, retail, commercial and industrial areas;
- Promote the economic well-being of the community by creating a favorable physical image
- Ensure that signs are located and designed to:
  - o Provide an effective means of way-finding in the community
  - o Afford the community an equal and fair way to advertise and promote its products and services
  - o Reduce sign clutter and the distractions and confusion that may be contributing factors in traffic congestion and accidents, and maintain a safe and orderly pedestrian and vehicular environment;
  - o Minimize the disruption of the scenic views which when maintained protect important community values;
  - o Afford businesses, individuals and institutions a reasonable opportunity to use signs as an effective means of communication;
  - o All sign standards in the sign regulations of the Bennett Municipal Code not addressed in this ODP shall apply to signage in Muegge Farms.

EXEMPTIONS

The following signs and displays are exempted from this ODP within Muegge Farms:

- any sign required by a valid and applicable federal, state or local law, ordinance or regulation;
- Signs and other visual displays erected by, or at the direction of, federal, state or local governmental or quasi-governmental agencies;
- Decorative lighting displays, i.e., holiday lights, that do not display a commercial message;\
- Any sign smaller than two (2) square feet in area, if located on a residential parcel
- Signs conforming to or required by the Manual of Uniform Traffic Control Devices, as published by the Federal Highway Administration from time to time under 23 Code of Federal Regulations, Part 655, Subpart F;
- Signs on athletic fields and scoreboards intended for on-premises viewing;
- Signs located on any Town-owned property not specifically addressed in this ODP

CONSTRUCTION

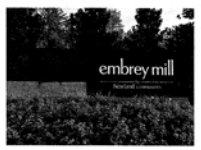
All signs shall be constructed in accordance with the following requirements:

- Compliance with building code. The construction, erection, safety and maintenance of signs shall comply with all building regulations of the Town of Bennett, including building permit requirements where necessary. Electric signs and all permanent signs involving structural requirements of the building code shall be installed, repaired, altered and serviced only by a contractor licensed to perform such tasks.
- Safety. Signs shall be structurally sound and located so as to pose no threat to pedestrian or vehicular traffic. No sign regulated by any of the provisions of this ODP shall be erected in proximity to railroad crossings or at the intersection of any streets in such a manner as to obstruct free and clear vision; at any location where, by reason of the position, shape or color, it may interfere with, obstruct the view of or be confused with any authorized traffic sign signal or device; or which makes use of any word, phrase, symbol or character in such a manner as to interfere with, mislead or confuse traffic.

MATERIALS

- Permanent signs shall be fabricated on and of materials that are of good quality, durable, weather-resistant, fastened or anchored sufficiently. Fabric or similar materials are not allowed for permanent signs. All wood sign components shall be stained or painted to ensure durability. Permanent freestanding signs shall complement the architectural style, character, materials, color and detail of adjacent buildings.
- Temporary signs shall be durable and weather-resistant and fastened or anchored sufficiently, whether attached to the building or positioned in the ground. If a lightweight fabric or similar material is being used as a freestanding temporary sign, it shall be mounted securely to a solid, hard-backed, rigid surface.

PREPARED:	FEBRUARY 3, 2003
REVISIED:	APRIL 10, 2003
REVISED:	MAY 4, 2007
REVISED:	SEPTEMBER 13, 2007
REVISED:	OCTOBER 18, 2007
REVISED:	APRIL 7, 2008
REVISED:	JULY 23, 2008
REVISED:	JANUARY, 18, 2019
REVISED:	JULY 24, 2019
REVISED:	NOVEMBER 23, 2022

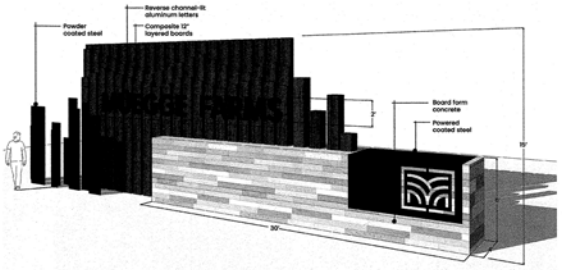


MUEGGE FARMS

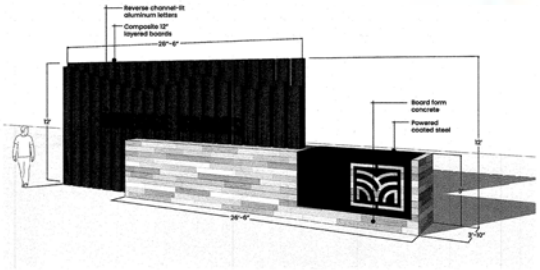
OUTLINE DEVELOPMENT PLAN
MUEGGE FARMS 3RD AMENDMENT
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
COMMUNITY SIGNAGE & GUIDELINES

STANDARDS & GUIDELINES

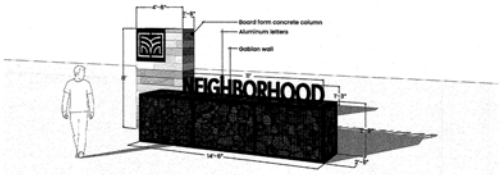
R-1 Primary Community Monument



R-2 Secondary Entry Monument



R-3 Neighborhood Identification Monument



Exhibits are for purposes of intent only and may be subject to revisions with subsequent submittals

Standards
- 2 signs per community within the Muegge Farms ODP
- Maximum area of 60 square feet of type face
- Maximum height of 15'

Guidelines
- Location: Community Monument signs are typically located at the entrance or prominent intersections of a community. They shall be located on a site frontage adjoining a public or private street, tract, easement or right-of-way. The setbacks should ensure that all sight lines are preserved. Upon approval of the zoning administrator, a monument sign can be integrated into a wall.
- Landscaping: Landscaping shall be provided at the base of the supporting structure equal to two times the area of one face of the sign. For example, twenty (20) square feet of sign area equals sixty (40) square feet of landscaped area. The Zoning Administrator may reduce or waive this requirement if it is determined that the additional landscaping would not contribute significantly to the overall aesthetic character of the project, or if physical conditions of the site would preclude all or a portion of the landscaping.
- Lighting: Monument signs may be illuminated consistent with the rules and regulations of the Bennett Municipal Code.

Standards
- 4 signs per community within the Muegge Farms ODP
- Maximum area of 40 square feet of type face
- Maximum height of 12'

Guidelines
- Location: Secondary Monument signs are typically located at prominent intersections of a community or at terminus view sheds. They shall be located on a site frontage adjoining a public or private street, tract, easement or right-of-way. The setbacks should ensure that all sight lines are preserved. Upon approval of the zoning administrator, a monument sign can be integrated into a wall.
- Landscaping: Landscaping shall be provided at the base of the supporting structure equal to two times the area of one face of the sign. For example, twenty (20) square feet of sign area equals sixty (40) square feet of landscaped area. The Zoning Administrator may reduce or waive this requirement if it is determined that the additional landscaping would not contribute significantly to the overall aesthetic character of the project, or if physical conditions of the site would preclude all or a portion of the landscaping.
- Lighting: Monument signs may be illuminated consistent with the rules and regulations of the Bennett Municipal Code.

Standards
- 3 signs per neighborhood within each filing or planning area
- Maximum area of 32 square feet of type face
- Maximum height of 8'

Guidelines
- Location: Neighborhood Identification Monument signs are typically located at prominent intersections of the entrance of an individual neighborhood. They shall be located on a site frontage adjoining a public or private street, tract, easement or right-of-way. The setbacks should ensure that all sight lines are preserved. Upon approval of the zoning administrator, a monument sign can be integrated into a fence or wall.
- Landscaping: Landscaping shall be provided at the base of the supporting structure equal to three times the area of one face of the sign. For example, twenty (20) square feet of sign area equals sixty (60) square feet of landscaped area. The Zoning Administrator may reduce or waive this requirement if it is determined that the additional landscaping would not contribute significantly to the overall aesthetic character of the project, or if physical conditions of the site would preclude all or a portion of the landscaping.
- Lighting: Monument signs may be illuminated consistent with the rules and regulations of the Bennett Municipal Code.

Inspiration images are for purposes of intent only and may be subject to revisions with subsequent submittals

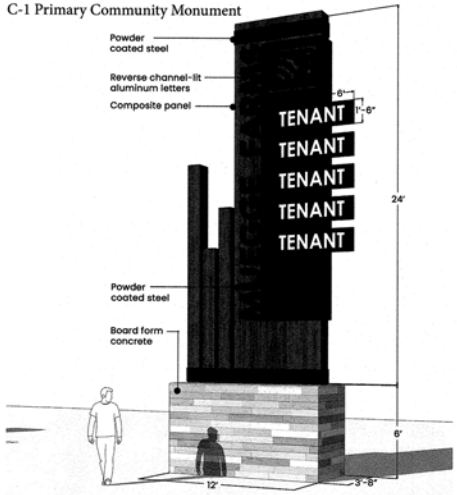
MUEGGE FARMS

RECEPTION#: 2023000003068,
1/17/2023 at 10:41 AM, 13 OF 13,
TD Pgs: 0 Josh Zygielbaum, Adams County, CO.

OUTLINE DEVELOPMENT PLAN
MUEGGE FARMS 3RD AMENDMENT
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
COMMERCIAL SIGNAGE & GUIDELINES

STANDARDS & GUIDELINES

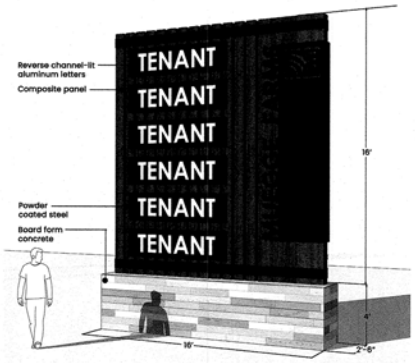
C-1 Primary Community Monument



Standards
- 1 sign within the community proximate to Highway I-70
- Maximum area of 380 square feet of type face
- Maximum height of 60'

Guidelines
- Location: Primary Commercial Monument signs are typically located along the Highway corridor for business areas shown within the Muegge Farms ODP which encompasses generally the area from Penrith Road to the I-70 Interchange. They are situated to encourage enhancement of the economic vitality of the downtown business community. The setbacks should ensure that all sight lines are preserved.
- Landscaping: Landscaping shall be provided at the base of the supporting structure equal to the area of one face of the sign. For example, twenty (20) square feet of sign area equals sixty (20) square feet of landscaped area. The Zoning Administrator may reduce or waive this requirement if it is determined that the additional landscaping would not contribute significantly to the overall aesthetic character of the project, or if physical conditions of the site would preclude all or a portion of the landscaping.
- Lighting: Signs shall be oriented or illuminated so as not to adversely affect the surrounding area or existing nearby residential uses or structures. Examples of adverse effects are glare from intense illumination and large signs or structures which visually dominate an area.

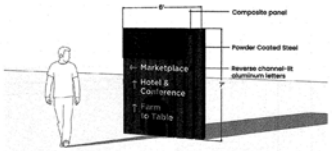
C-2 Commercial Secondary Monument



Standards
- 4 signs within the Muegge Farms ODP, non-residential planning areas, i.e. Commercial and Employment Center
- Maximum area of 250 square feet of type face
- Maximum height of 25'

Guidelines
- Location: Secondary Monument signs are typically located prominent intersections of a community or at terminus view sheds. They shall be located on a site frontage adjoining a public or private street, tract, easement or right-of-way. The setbacks should ensure that all sight lines are preserved. Upon approval of the zoning administrator, a monument sign can be integrated into a fence or wall.
- Landscaping: Landscaping shall be provided at the base of the supporting structure equal to the area of one face of the sign. For example, twenty (20) square feet of sign area equals sixty (20) square feet of landscaped area. The Zoning Administrator may reduce or waive this requirement if it is determined that the additional landscaping would not contribute significantly to the overall aesthetic character of the project, or if physical conditions of the site would preclude all or a portion of the landscaping.
- Lighting: Signs shall be oriented or illuminated so as not to adversely affect the surrounding area or existing nearby residential uses or structures.

C-3 Tertiary / Wayfinding Monument

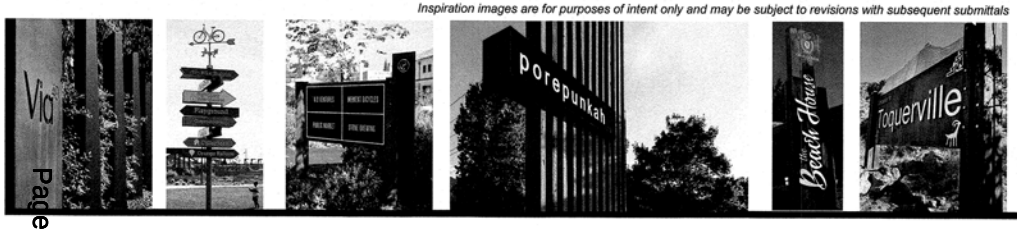


Standards
- no maximum limit to quantity
- Maximum area of 50 square feet of type face
- Maximum height of 8'

Guidelines
- Location: Tertiary Monument signs are typically located prominent intersections of a community or at terminus view sheds. They shall be located on a site frontage adjoining a public or private street, tract, easement or right-of-way. The setbacks should ensure that all sight lines are preserved. Upon approval of the zoning administrator, a monument sign can be integrated into a fence or wall.
- Landscaping: Landscaping shall be provided at the base of the supporting structure equal to two times the area of one face of the sign. For example, twenty (20) square feet of sign area equals sixty (40) square feet of landscaped area. The Zoning Administrator may reduce or waive this requirement if it is determined that the additional landscaping would not contribute significantly to the overall aesthetic character of the project, or if physical conditions of the site would preclude all or a portion of the landscaping.
- Lighting: Monument signs may be illuminated.

Exhibits are for purposes of intent only and may be subject to revisions with subsequent submittals

Inspiration images are for purposes of intent only and may be subject to revisions with subsequent submittals



MUEGGE FARMS

TERRAMAX, INC.
CONSULTING ◊ ENGINEERING

Engineering Review Memo

To:	Steve Hebert, Town Planning & Economic Development Director
	Sara Aragon, Community Development Manager
From:	Dan Giroux, PE, Engineering Consultant to the Town
Date:	Tuesday, September 6, 2022
Case:	Muegge Farms Planning Area 1 (PA-1) / Filing 7 Final Plat
	Town of Bennett Land Use Case 22.26
Subject:	Civil Engineering Review

Per the request of the Town of Bennett, Terramax, Inc. has reviewed the application materials for the proposed Muegge Farms Planning Area 1 (PA-1) / Filing 7 Final Plat.

This review does not constitute a contractual offer to the applicant, and does not relieve the applicant from meeting the Town's requirement that the development comply with all Town Codes and Standards. All comments on the development application are still in force until acceptably addressed.

Although every attempt has been made to be diligent, thorough and comprehensive, by the nature of review, and relative time invested versus design and plan development, the Town must reserve the right to make original comments and revision requests in subsequent submittals, even for information already submitted, until final application approval.

I have the following comments to offer on the application materials:

General

1. Will this Final Plat ***not*** be dedicating right-of-way (ROW) areas for Penrith Road, Civic Center Drive and Lark Sparrow Drive, surrounding this development?
    - Is that intended to be by separate instrument, or Plat?
    - As an observation, I do not believe nor understand the Major Roadway Planning accomplishes those ROW dedications.
    - Please clarify the justification/reasoning, and the plan for dedication.
2. Please provide a Land Use table, including at minimum Tract ownership, maintenance, and planned or known uses.
    - It's also proven very helpful to call out the Sheet or Page number of the Final Plat set for each of the Tracts.
3. A sheet index graphic page has also proven helpful for longer Final Plat sets.
    - This set is right at that 'longer' sheet number limit, but a sheet index graphic would be helpful, especially if the surrounding ROW's are included, lengthening the set.

DANGIROUX@TERRAMAX.US ◊ (303) 929-3194

4. Please provide additional Tract width dimensioning in all areas, and particularly where planned for other uses, including utilities, pedestrian, emergency access, or multiple of these uses.
5. A cross-section study for Penrith Road plus Tract F is needed, to ensure the 55-foot half ROW and 15-foot Tract width is sufficient to meet all needed purposes, both interim and final.
6. Typical or periodic utility easement call-out's are also helpful.
7. Please comment or clarify on the accuracy of the existing Penrith right-of-way area north of the section line, northwest property corner.
    - The Town has been working through a survey discrepancy in this area for some time, and a clarification would be helpful on how these rights-of-way will align.
    - It is the Town's understanding there is a jog or stagger offset expected north and south of the section line between the existing right-of-way and the ROW to be dedicated with this Final Plat.
    - This Plat obviously does not show that offset, please clarify.

Water Distribution System

1. The Town is working with the developer on off-site and on-site water improvements to serve the proposed development, including non-potable.
2. Per Town Code, the developer is required to extend the water system network to all adjacent properties to allow the efficient future extension of service.

Wastewater

1. The Town is working with the developer on off-site wastewater conveyance improvements to serve the proposed development.
2. Per Town Code, the developer is required to extend the wastewater collection system to all adjacent properties to allow the efficient future extension of service.
3. **The Town is currently evaluating a *"system capacity reservation"* program to support the planned and needed wastewater treatment capacity required for new development in the Town.**
    - **This is envisioned to be addressed via the Subdivision Agreement, and would be an up-front payment for all lots created with a subdivision, specifically for wastewater treatment expansion, that would then be credited against future Wastewater Impact Fees assessed at the time of building permit.**

Access

1. The Town is working with the developer on off-site transportation connections and improvements.
2. Per Town Code, the developer is required to extend the Town transportation systems to all adjacent properties to allow the efficient future extension of service.
3. A block break near Lots 42-44 would be useful for pedestrian/service/utility pass-through for this long 28-lot uninterrupted lot run along the southeast development area.
    - This connects to Civic Center Drive, and leverages the CC Drive stormwater channel crossing, so that no other culvert or specialty-bridge crossing is required to the north.
    - By my computations, this pass-through saves east-bound/southeast-bound pedestrians from the east side of the development over ¼ mile of out-&-back walking to get to Civic Center Drive eastbound.

DANGIROUX@TERRAMAX.US ◊ (303) 929-3194

Stormwater Management

1. The infiltration pond overflow route through property east of Lark Sparrow should be addressed with an off-site utility easement, to ensure this right isn't lost via sale or dedication of future properties currently under Muegge Farms' control and authority.
2. **The infiltration pond has received significant attention, design and review with the Brunner Subdivision to the northwest, which is one of the properties served by the pond.**
    - **The pond has received significant Town Board attention and interest, regarding function, effectiveness, sustainability, appearance & aesthetics, accessory uses, open space value & benefit, and ownership & maintenance.**
    - **The pond design and construction plans were approved.**
    - **The pond area final and permanent land use has *not* been approved by a formal Town Land Use action by the Town Board of Trustees.**
    - **This Final Plat will consummate that Town Land Use approval action.**
    - **In light of the Board interest and questions, and given that this is a first-time Board Land Use action on this land use, the applicant should be prepared to address a robust presentation to the Town Board regarding the infiltration pond.**

Steve and Sara, this concludes my engineering review of the application and supporting submittal materials for the proposed Muegge Farms PA-1 / Filing 7 Final Plat by the applicant. Please let me know if you have any questions, or require additional information pertaining to the submitted information, or my review.

DANGIROUX@TERRAMAX.US ◊ (303) 929-3194

There is another documents showing building elevations as part of the final plat. We do not want building elevations on a plat document.

MUEGGE FARMS FILING 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

LEGAL DESCRIPTION

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN, COUNTY OF ADAMS, STATE OF COLORADO, MORE PARTICULARLY DESCRIBED AS FOLLOWS:

COMMENCING AT THE NORTHWEST CORNER OF SAID SECTION 33, FROM WHICH THE NORTH LINE OF SAID NORTHWEST QUARTER BEARS N88°53'01"E, 2637.20 FEET; THENCE N89°09'04"E, A DISTANCE OF 55.00 FEET TO THE SOUTHWEST CORNER OF LOT 44, BLOCK 2, PENRITH PARK AMENDMENT #2 AS RECORDED AT RECEPTION NO. 2018000064291 OF THE ADAMS COUNTY RECORDS AND THE POINT OF BEGINNING;

THENCE ALONG THE SOUTH LINE OF SAID PENRITH PARK AMENDMENT #2 N89°09'04"E, 2,037.39 FEET;
THENCE S04°11'07"E, A DISTANCE OF 58.02 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE LEFT HAVING A RADIUS OF 222.00 FEET AND A CENTRAL ANGLE OF 27°14'45", 105.57 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT S31°25'52"E, A DISTANCE OF 25.00 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 178.00 FEET AND A CENTRAL ANGLE OF 30°34'57", 95.01 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT S00°50'56"E, A DISTANCE OF 750.88 FEET;
THENCE S06°07'10"W, A DISTANCE OF 45.33 FEET;
THENCE S00°50'56"E, A DISTANCE OF 25.00 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 172.50 FEET AND A CENTRAL ANGLE OF 11°41'35", 35.20 FEET TO A POINT OF COMPOUND CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 86°47'56", 53.02 FEET TO A POINT OF REVERSE CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE LEFT HAVING A RADIUS OF 1,055.00 FEET AND A CENTRAL ANGLE OF 28°54'20", 532.24 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT S68°44'16"W, A DISTANCE OF 56.13 FEET;
THENCE S76°05'27"W, A DISTANCE OF 39.07 FEET;
THENCE S68°44'16"W, A DISTANCE OF 121.88 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 90°00'00", 54.98 FEET;
THENCE ALONG A LINE NON-TANGENT TO SAID CURVE, S65°09'41"W, A DISTANCE OF 80.16 FEET TO A POINT ON A CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 90°00'00" (THE CHORD OF WHICH BEARS S23°44'16"W, 49.50 FEET), 54.98 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT S68°44'16"W, A DISTANCE OF 30.20 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 695.00 FEET AND A CENTRAL ANGLE OF 29°58'22", 363.57 FEET;
THENCE ALONG A LINE NON-TANGENT TO SAID CURVE, N73°35'56"W, A DISTANCE OF 51.47 FEET TO A POINT ON A CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 690.00 FEET AND A CENTRAL ANGLE OF 06°58'46" (THE CHORD OF WHICH BEARS N73°33'37"W, 84.00 FEET), 84.05 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT N70°04'14"W, A DISTANCE OF 50.60 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 90°00'00", 54.98 FEET;
THENCE ALONG A LINE NON-TANGENT TO SAID CURVE, N73°38'54"W, A DISTANCE OF 80.16 FEET TO A POINT ON A CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 89°52'11" (THE CHORD OF WHICH BEARS S64°51'51"W, 49.44 FEET), 54.90 FEET TO A POINT OF REVERSE CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE LEFT HAVING A RADIUS OF 755.00 FEET AND A CENTRAL ANGLE OF 19°47'56", 260.90 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT S90°00'00"W, A DISTANCE OF 46.89 FEET;
THENCE N83°06'35"W, A DISTANCE OF 41.68 FEET;
THENCE S90°00'00"W, A DISTANCE OF 108.92 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 48.50 FEET AND A CENTRAL ANGLE OF 89°44'10", 75.96 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT, BEING PARALLEL WITH AND 55.00 FEET EAST OF THE WEST LINE OF SAID NORTHWEST QUARTER N00°15'50"W, A DISTANCE OF 564.01 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 90°00'00" (THE CHORD OF WHICH BEARS N44°43'52"E, 49.49 FEET), 54.97 FEET;
THENCE ALONG A LINE NON-TANGENT TO SAID CURVE, N00°15'34"W, A DISTANCE OF 80.00 FEET TO A POINT ON A CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 90°00'00" (THE CHORD OF WHICH BEARS N45°15'50"W, 49.50 FEET), 54.98 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT, BEING PARALLEL WITH AND 55.00 FEET EAST OF SAID NORTHWEST QUARTER N00°15'50"W, A DISTANCE OF 454.58 FEET TO THE POINT OF BEGINNING, CONTAINING 2,639,606 SQUARE FEET OR 60.597 ACRES, MORE OR LESS.

OWNER

MUEGGE FARMS, LLC

BY: _____ BY: _____
NAME NAME

AS: _____ AS: _____
TITLE TITLE

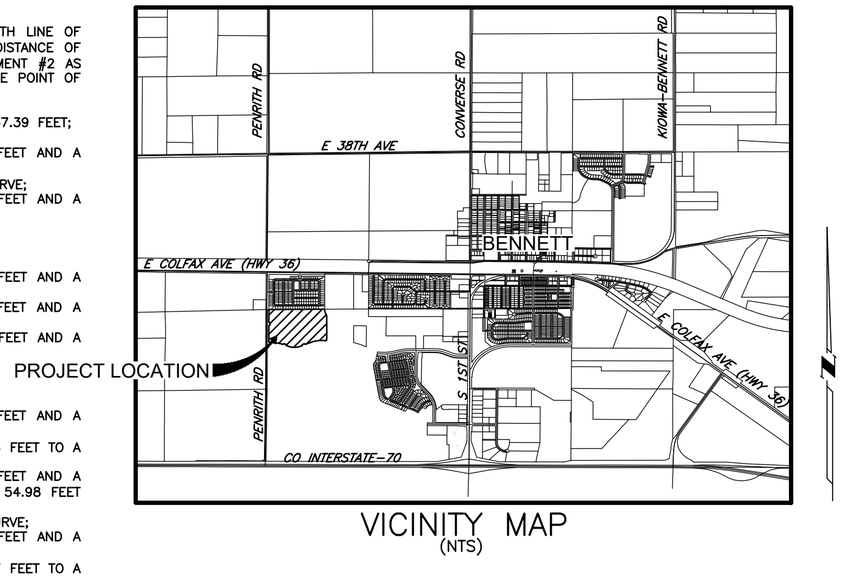
STATE OF COLORADO
}
}SS
}
COUNTY OF _____

THE FOREGOING DEDICATION WAS ACKNOWLEDGED BEFORE ME THIS _____ DAY OF

_____ _, 2022 A.D.

MY COMMISSION EXPIRES _____

NOTARY PUBLIC _____



VICINITY MAP
(NTS)

See Town Attorney memo re: dedication statement and signature blocks.

GENERAL NOTES

1. NOTICE: ACCORDING TO COLORADO LAW YOU MUST COMMENCE ANY LEGAL ACTION BASED UPON ANY DEFECT IN THIS SURVEY WITHIN THREE (3) 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 (10) YEARS FROM THE DATE OF THE CERTIFICATION SHOWN HEREON.

2. BASIS OF BEARINGS: BEARINGS SHOWN HEREON ARE BASED UPON THE THE NORTH LINE OF THE NORTHWEST QUARTER OF SECTION 33 WHICH IS ASSUMED TO BEAR N88°53'01"E, 2637.20 FEET, SAID LINE IS MONUMENTED AS SHOWN HEREIN.

3. THE LINEAL UNITS OF MEASURE SHOWN ON THIS SURVEY ARE BASED UPON THE U.S. SURVEY FOOT.

4. THIS SURVEY DOES NOT CONSTITUTE A TITLE SEARCH BY EMK CONSULTANTS, INC. TO DETERMINE RECORD TITLE, EASEMENTS OR RIGHTS-OF-WAY. LAND TITLE GUARANTEE COMPANY ALTA COMMITMENT ORDER NO. ABC70590329.4 WITH AN EFFECTIVE DATE OF JULY 8, 2022 AT 5:00 P.M. WAS RELIED UPON FOR ALL INFORMATION REGARDING RECORD TITLE, EASEMENTS OF RECORD AND RIGHTS-OF-WAY.

Add Town of Bennett Standard Plat Notes: See separate MS Word doc.

SURVEYOR'S CERTIFICATE

I, STEPHEN H. HARDING, A PROFESSIONAL LAND SURVEYOR LICENSED TO PRACTICE LAND SURVEYING IN THE STATE OF COLORADO, DO HEREBY CERTIFY THAT THERE ARE NO ROADS, PIPELINES, IRRIGATION DITCHES OR OTHER EASEMENTS IN EVIDENCE OR KNOWN BY ME TO EXIST ON OR ACROSS THE HEREINBEFORE DESCRIBED PROPERTY, EXCEPT AS SHOWN ON THIS PLAT. I FURTHER CERTIFY THE THE SURVEY WAS PERFORMED UNDER MY DIRECT RESPONSIBILITY, SUPERVISION AND CHECKING, AND THAT THIS PLAT ACCURATELY REPRESENTS SAID SURVEY, AND THAT ALL MONUMENTS EXIST AS SHOWN HEREON.

_____
STEPHEN H. HARDING, PLS 29040
COLORADO LICENSED PROFESSIONAL LAND SURVEYOR
FOR AND ON BEHALF OF EMK CONSULTANTS, INC.

OWNERSHIP AND TITLE VERIFICATION

I, _____ A DULY AUTHORIZED OFFICER OF LAND TITLE INSURANCE COMPANY, HEREBY CERTIFY THAT THE PARTIES EXECUTING THIS PLAT AS OWNERS OF THE ABOVE DESCRIBED PROPERTY ARE THE OWNERS THEREOF IN FEE SIMPLE, THAT ALL PUBLIC RIGHTS-OF-WAY, EASEMENTS OR IMPROVEMENTS, IF ANY, THAT ARE DEDICATED BY THIS PLAT ARE FREE AND CLEAR OF ALL LIENS AND ENCUMBRANCES, EXCEPT THOSE SHOWN ON COMMITMENT FOR TITLE INSURANCE ORDER NO. ABC70590329.4 WITH AN EFFECTIVE DATE OF 07/08/2022 AT 5:00 P.M.

_____ _____ DATE: _____
AUTHORIZED OFFICIAL

PREPARED BY

EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com

JOB NO. 13301

MUEGGE FARMS FILING NO 7 SUBDIVISION

DATE PREPARED: JULY 14, 2022

PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE, COLORADO 80155 ATTN: JOHN VITELLA

MUEGGE FARMS FILING 7
FINAL PLAT

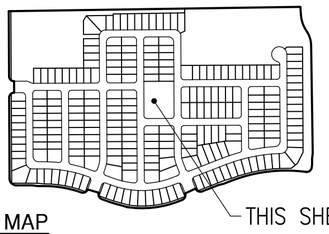
A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

2 OF 11

Add Tract Summary table, similar to what is on the FDP, including ownership and maintenance responsibilities.

MONUMENT LEGEND

- ❖ MONUMENT FOUND AS INDICATED
- ◉ FOUND NO. 4 REBAR WITH 1 1/2" ALUM CAP STAMPED AS INDICATED
- ● SET NO. 5 REBAR WITH 1–1/2" ALUMINUM CAP "PLS 29040"



KEY MAP

GRAPHIC SCALE
0 50 100 200 300
1 INCH = 100 FEET

PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112–2019
(303)694–1520 www.EMKC.com
JOB NO. 13301

MUEGGE FARMS FILING NO 7
SUBDIVISION
DATE PREPARED: JULY 14, 2022

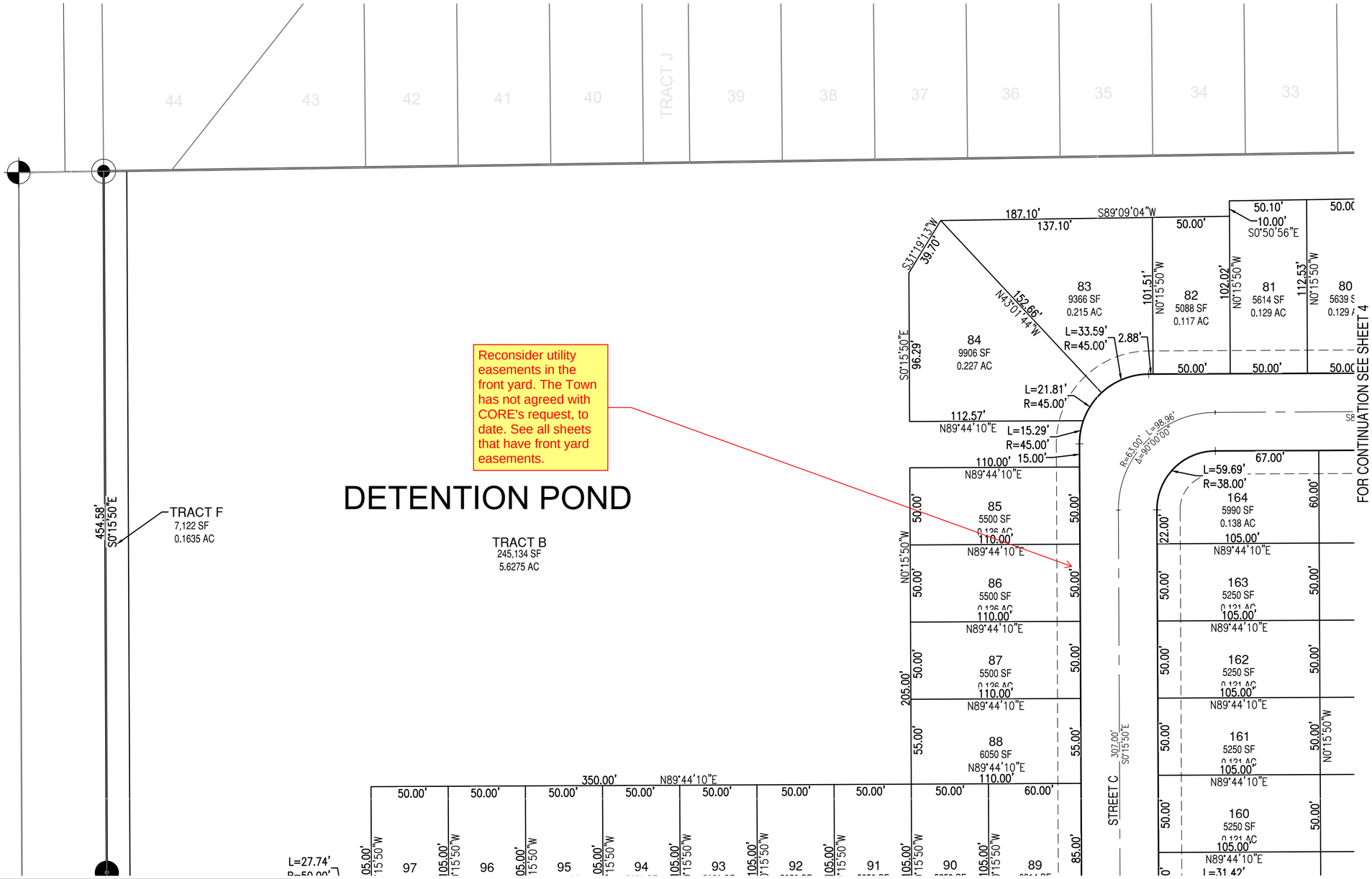
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

SHEET 2 OF 11

MUEGGE FARMS FILING 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

3 OF 11



KEY MAP

GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com
JOB NO. 13301

MUEGGE FARMS FILING NO 7
SUBDIVISION
DATE PREPARED: JULY 14, 2022

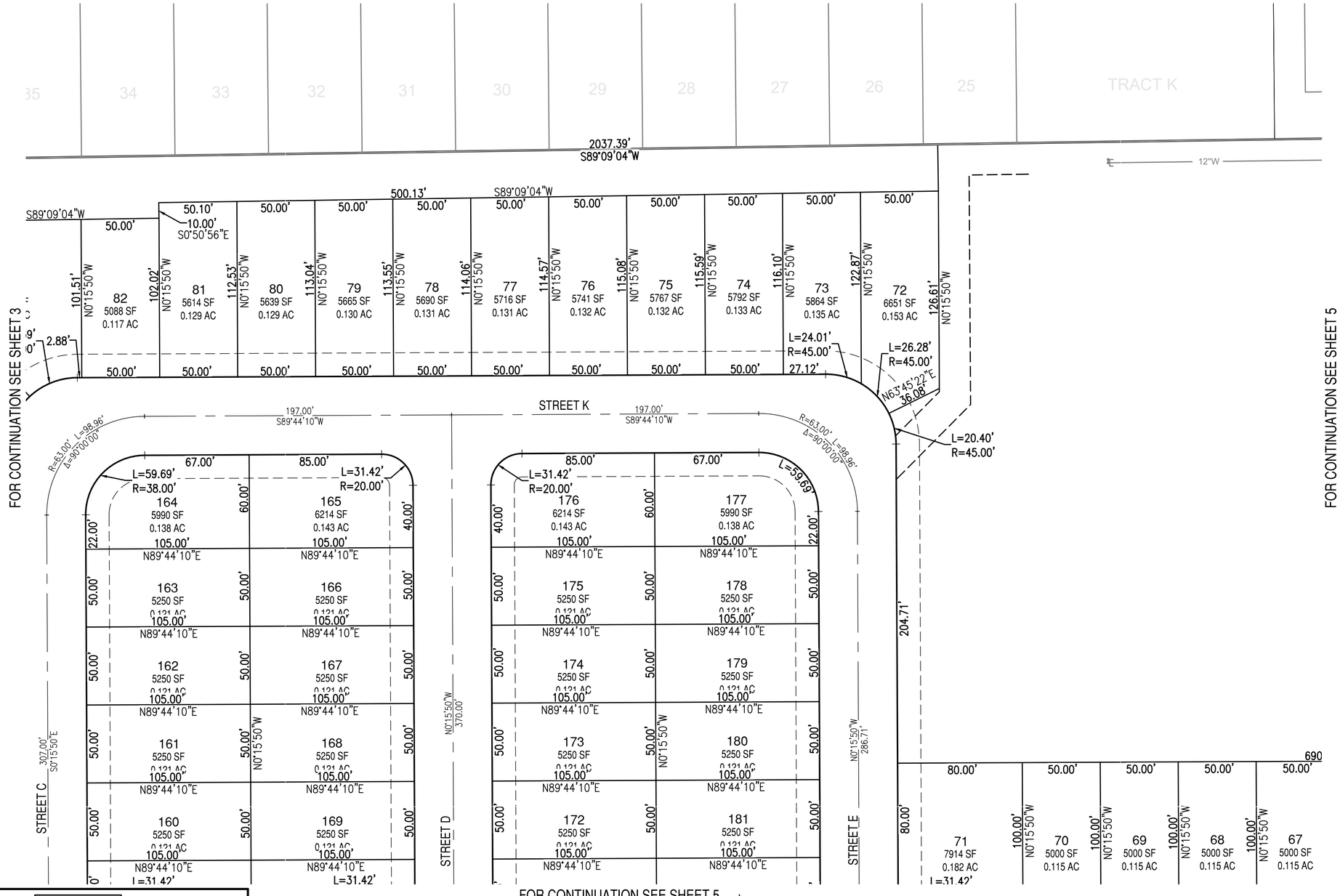
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

SHEET 3 OF 11

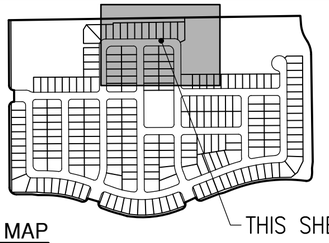
MUEGGE FARMS FILING 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

4 OF 11



FOR CONTINUATION SEE SHEET 5



KEY MAP

GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

PREPARED BY

EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com

JOB NO. 13301

MUEGGE FARMS FILING NO 7 SUBDIVISION

DATE PREPARED: JULY 14, 2022

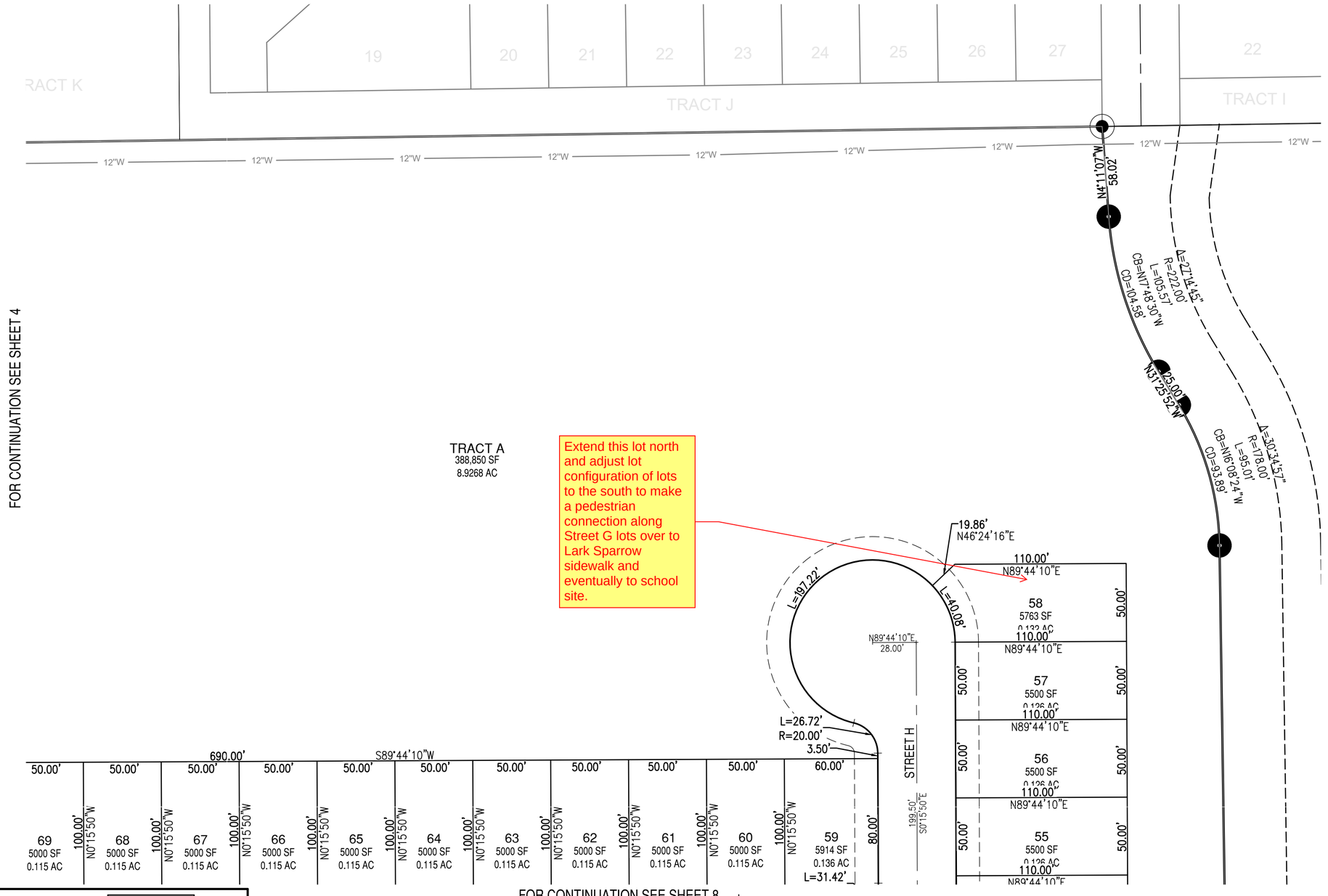
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

SHEET 4 OF 11

MUEGGE FARMS FILING 7
FINAL PLAT

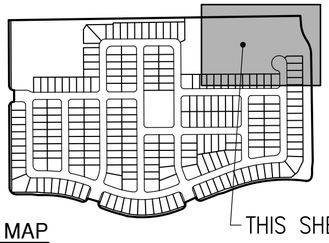
A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

5 OF 11



FOR CONTINUATION SEE SHEET 4

FOR CONTINUATION SEE SHEET 8



KEY MAP

GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com
JOB NO. 13301

MUEGGE FARMS FILING NO 7
SUBDIVISION
DATE PREPARED: JULY 14, 2022

PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

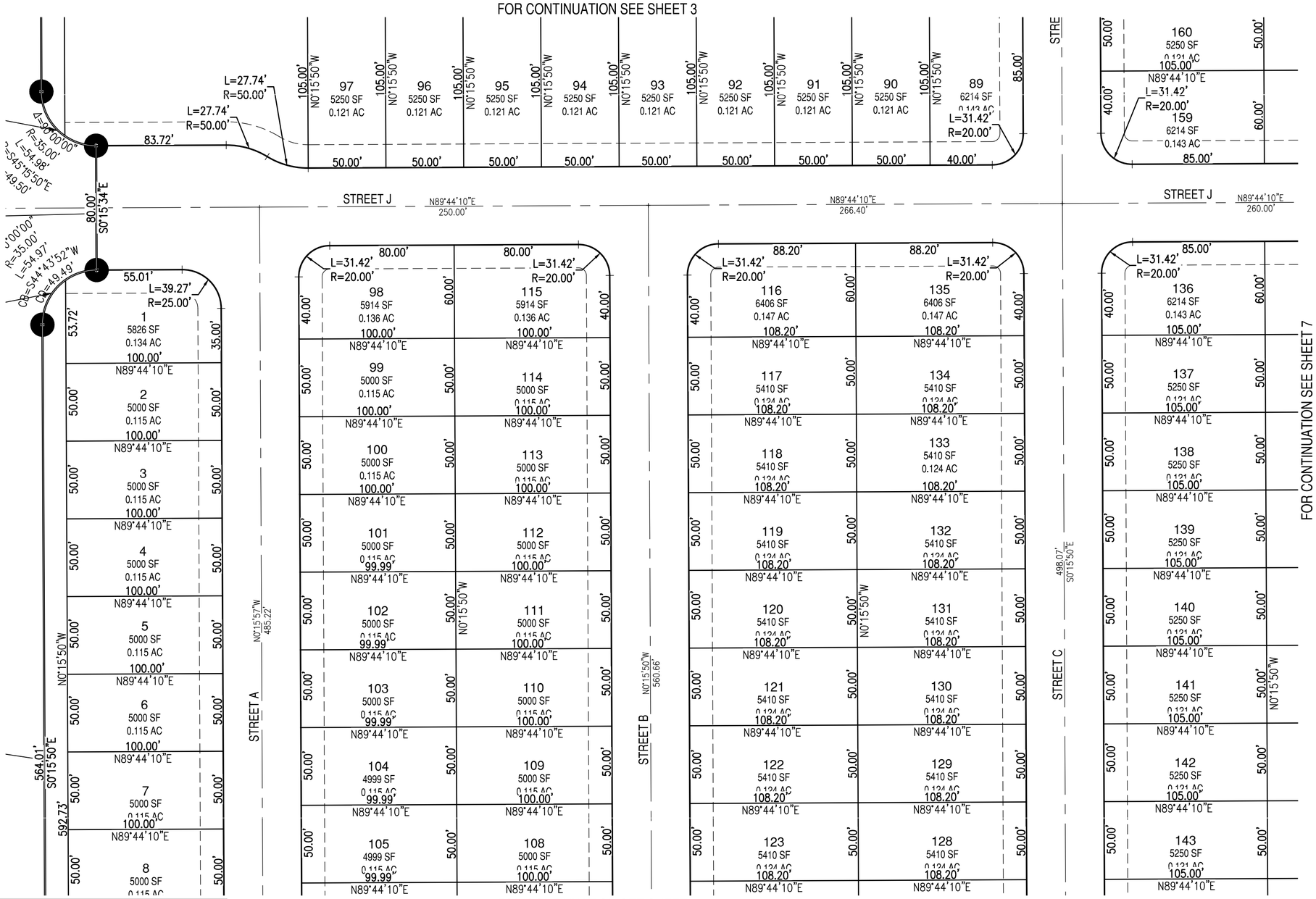
SHEET 5 OF 11

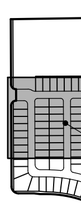
MUEGGE FARMS FILING 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

6 OF 11

FOR CONTINUATION SEE SHEET 3





KEY MAP — THIS SHEET

GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com
JOB NO. 13301

MUEGGE FARMS FILING NO 7
SUBDIVISION
DATE PREPARED: JULY 14, 2022

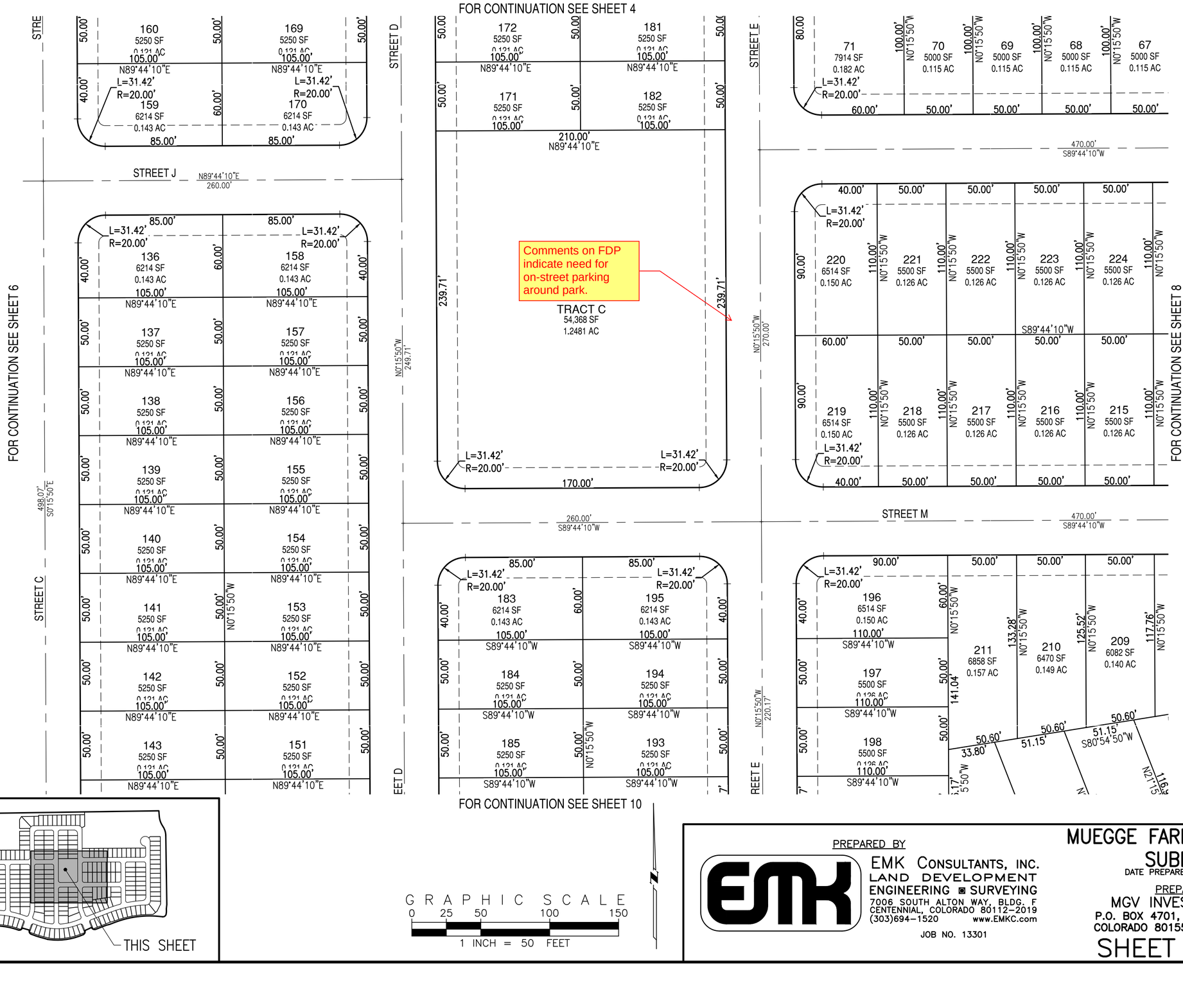
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

SHEET 6 OF 11

MUEGGE FARMS FILING 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

7 OF 11



GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com
JOB NO. 13301

MUEGGE FARMS FILING NO 7
SUBDIVISION
DATE PREPARED: JULY 14, 2022

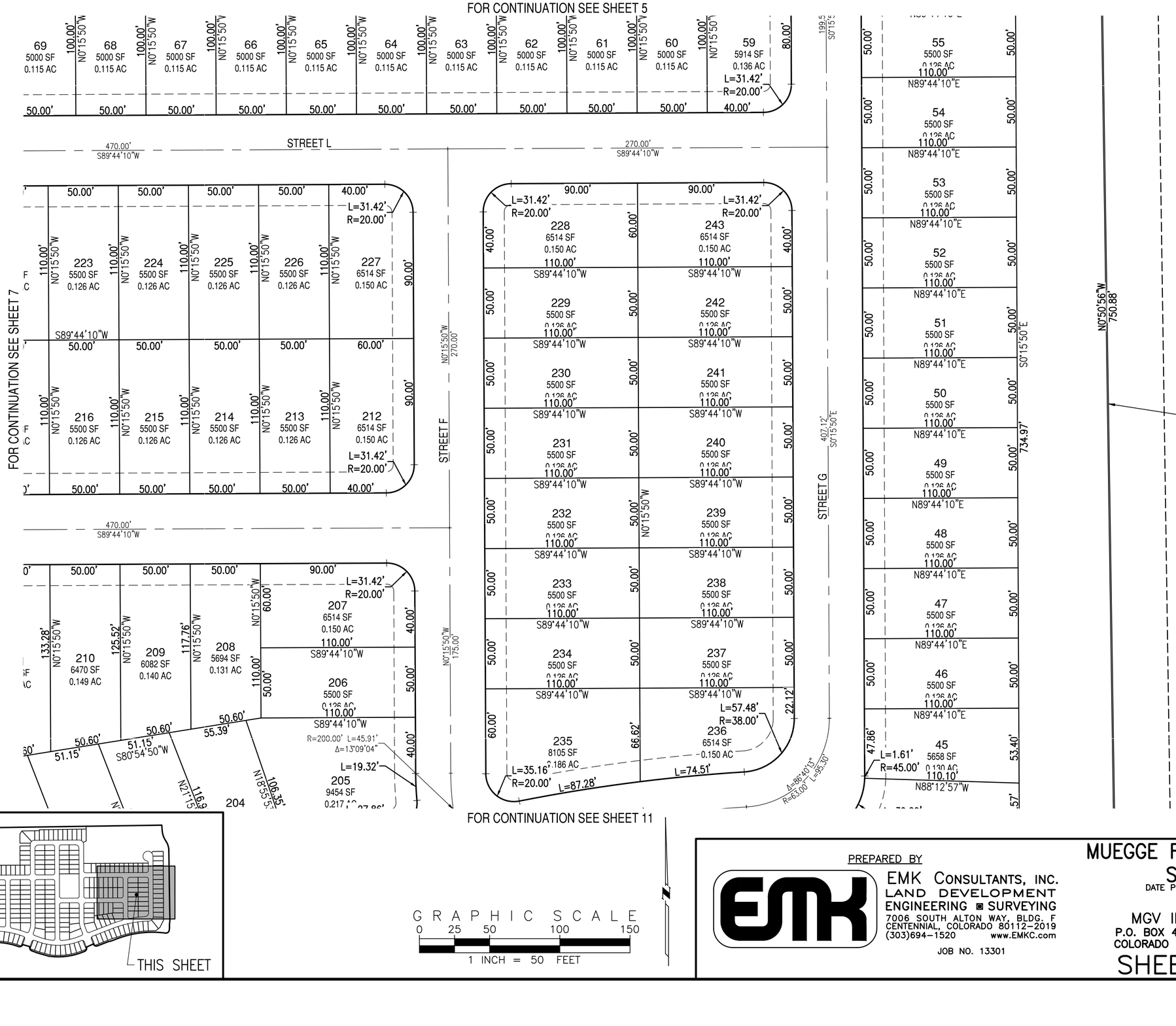
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

SHEET 7 OF 11

MUEGGE FARMS FILING 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

8 OF 11



GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com
JOB NO. 13301

MUEGGE FARMS FILING NO 7
SUBDIVISION
DATE PREPARED: JULY 14, 2022

PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

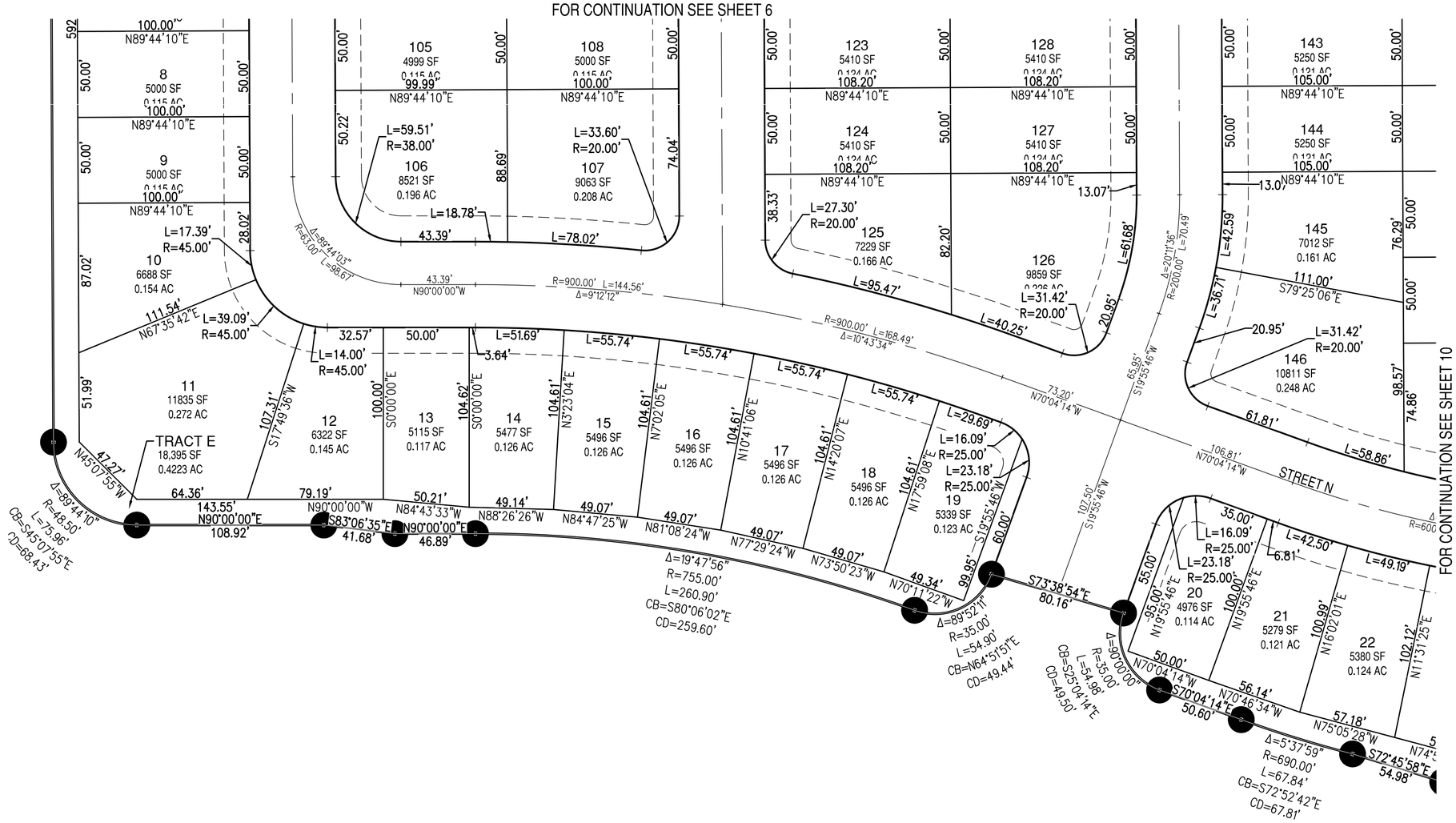
SHEET 8 OF 11

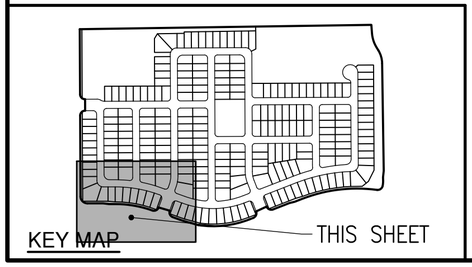
MUEGGE FARMS FILING 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

9 OF 11

FOR CONTINUATION SEE SHEET 6





GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112–2019
(303)694–1520 www.EMKC.com
JOB NO. 13301

MUEGGE FARMS FILING NO 7
SUBDIVISION
DATE PREPARED: JULY 14, 2022

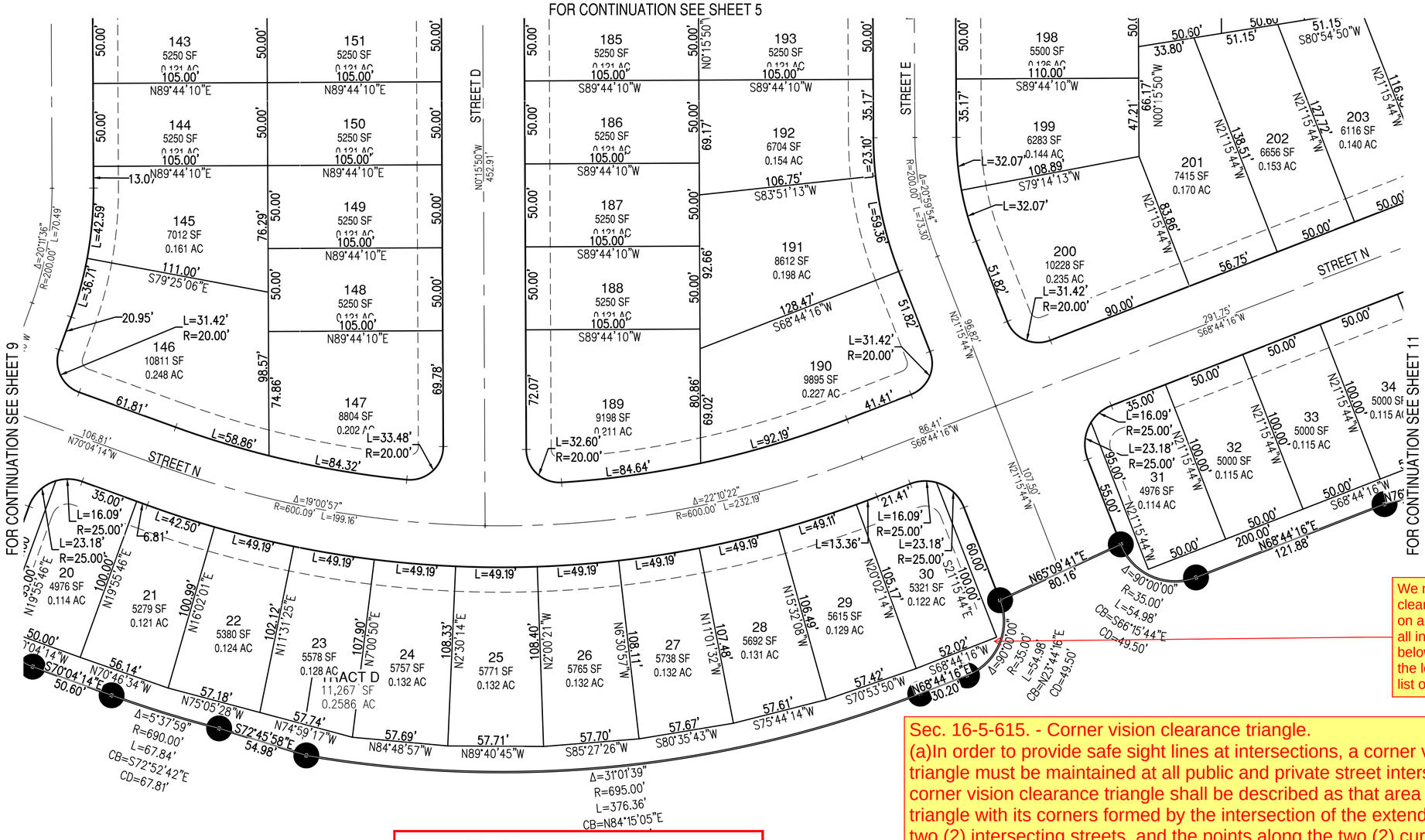
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

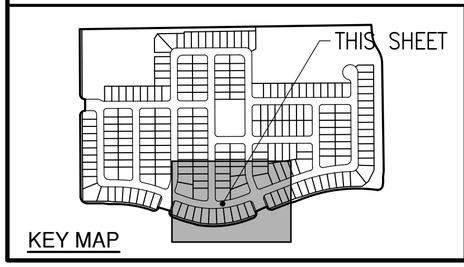
SHEET 9 OF 11

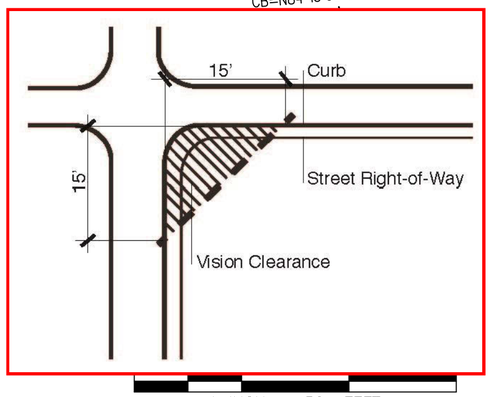
MUEGGE FARMS FILING 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

10 OF 11







We need vision clearance easements on all corner lots as all intersections. See below and image to the left. Add note in list of General Notes.

Sec. 16-5-615. - Corner vision clearance triangle.
(a)In order to provide safe sight lines at intersections, a corner vision clearance triangle must be maintained at all public and private street intersections.(b)The corner vision clearance triangle shall be described as that area lying within a triangle with its corners formed by the intersection of the extended curb lines of two (2) intersecting streets, and the points along the two (2) curb lines located fifteen (15) feet back from the point of intersection of the extended curb lines. See Figure 5-1.
Figure 5.1 Corner Vision Clearance Triangle
Figure 5.1 Corner Vision Clearance Triangle

(c)The corner vision clearance triangle shall be kept clear of all objects higher than twenty-four (24) inches that could obstruct view. The following exceptions are allowed:(1)Street signs, traffic lights, streetlights, fire hydrants and similar public facilities.(2)Street trees that are a deciduous variety, with the lowest branch and foliage at least eight (8) feet above the road surface.

ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112–2019
(303)694–1520 www.EMKC.com
JOB NO. 13301

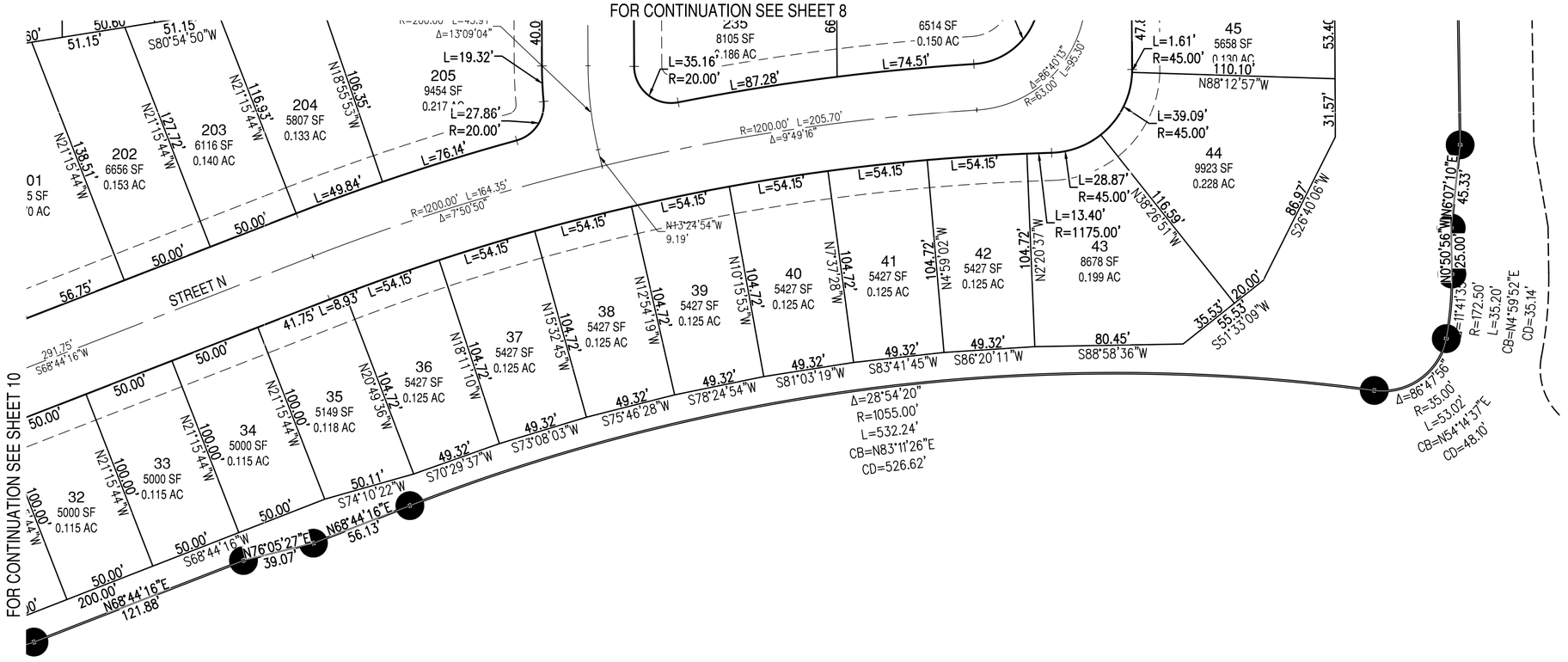
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE, COLORADO 80155 ATTN: JOHN VITELLA

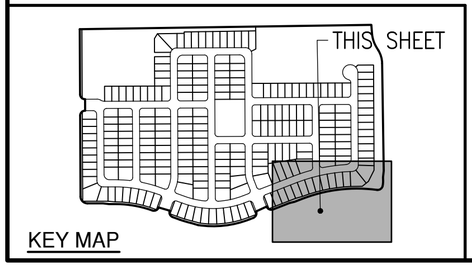
SHEET 10 OF 11

MUEGGE FARMS FILING 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

11 OF 11





KEY MAP

GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

PREPARED BY

EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112–2019
(303)694–1520 www.EMKC.com

JOB NO. 13301

MUEGGE FARMS FILING NO 7
SUBDIVISION
DATE PREPARED: JULY 14, 2022

PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

SHEET 11 OF 11

Jacobs

Memorandum

6312 S. Fiddlers Green Circle
Suite 300N
Greenwood Village, CO 80111
T +1.303.771.0900

www.jacobs.com

Subject	Muegge Farms PA-1 Filing 7 Final Plate Referral Package
Attention	Steve Hebert, AICP, Bennett Planning & Economic Development Manager
	Sara Aragon, Community Development Manager
From	Mike Heugh, PE
	Town Traffic Engineer
Date	August 11, 2022
Copies to	Dan Giroux, PE, Town Engineer

Muegge Farms PA-1 Traffic Impact Analysis (Mar 17, 2022) – Town Traffic Comments

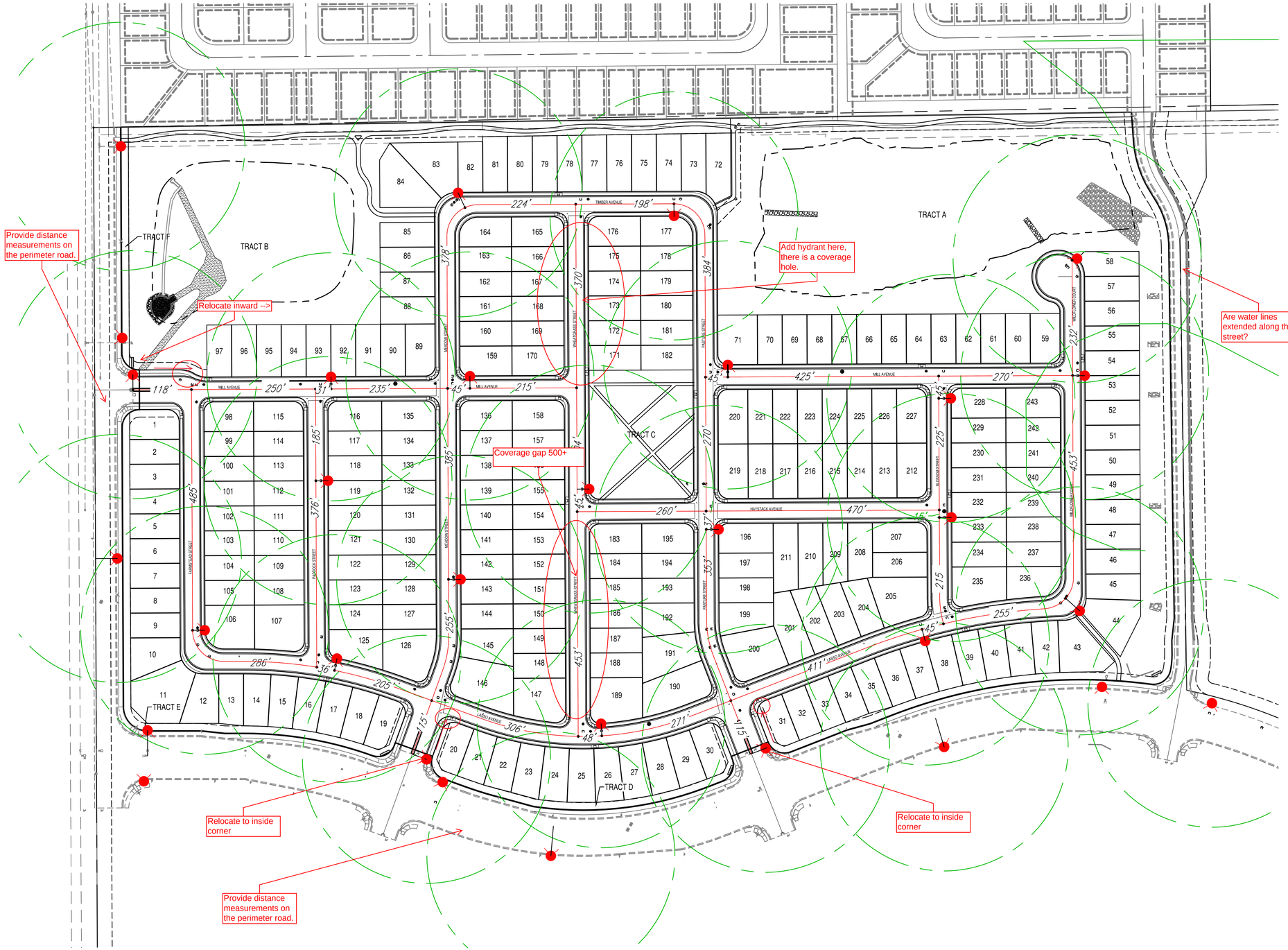
1. Traffic document that was submitted with this package is the same that was submitted with the FDP package and the sketch plan package. Please see comments from those submittals.

Final Plat Plan Set (July 14, 2022)

1. A comment was made in the FDP referral package that the pedestrian ramp design needs to be discussed further with the development team and town staff. Directional ramps that lead pedestrian perpendicular to the roadway are preferred. The ramps shown in the FDP are close to accomplishing that. I recognize there are several factors that go into the design, so a follow-up meeting should be scheduled to discuss details and if corner radius = 20’ is sufficient as it relates to this final plat.

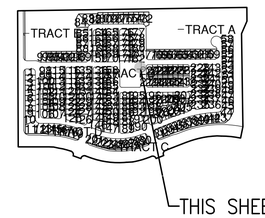
REVIEWED
By C. Connor at 11:07 am, Mar 09, 2023

NOT APPROVED



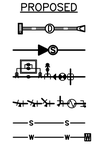
GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

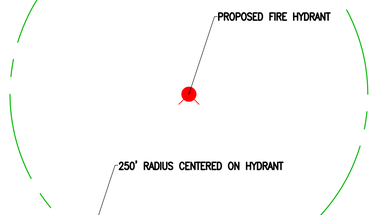
KEY MAP



UTILITY LEGEND

PROPOSED | MAIN LINE UNDERGROUND | EXISTING





BENCHMARK
NGS STATION B 374 (PID KK0053)

BEING A STANDARD BRASS BENCHMARK DISK SET IN TOP OF A 10" SQUARE CONCRETE MONUMENT, 4" ABOVE GRADE, STAMPED "B 374 1960" MONUMENT IS 104 FEET NORTH OF THE NORTH LANE OF INTERSTATE HIGHWAY 70, 3.1 FEET EAST OF A WITNESS POST AND 1 FOOT NORTH OF AN EAST-WEST FENCE LINE.

ELEVATION = 5522.74 FEET (NAVD 88 DATUM)

TOWN ENGINEER
DATE
THESE CONSTRUCTION PLANS HAVE BEEN REVIEWED BY THE TOWN OF BENNETT FOR STREET, DRAINAGE, SANITARY SEWER, AND WATER MAIN IMPROVEMENTS ONLY.
ENGINEERING DIVISION ACCEPTANCE BLOCK

EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520
www.EMKC.com

SCALE VERIFICATION BAR IS ONE INCH ON ORIGINAL DRAWING
0 1"
IF NOT ONE INCH ON THIS SHEET, ADJUST SCALES ACCORDINGLY

Know what's below. Call before you dig. 811

COLORADO LICENSED
GARY A. WALTER
32246
PROFESSIONAL ENGINEER
PRELIMINARY

REVISIONS

NO.	DESCRIPTION	DATE	BY

DESIGNED BY: GAW
DRAWN BY: DLL
CHECKED BY: GAW
APPROVED BY: ERM

MUEGGE FARMS - FILING 7

FIRE HYDRANT EXHIBIT

DATE: 01/19/2023
JOB NO: 13301.00
SCALE
HORIZONTAL 1"=100' VERTICAL N/A

1 of 1

MUEGGE FARMS FILING 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

LEGAL DESCRIPTION

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN, COUNTY OF ADAMS, STATE OF COLORADO, MORE PARTICULARLY DESCRIBED AS FOLLOWS:

COMMENCING AT THE NORTHWEST CORNER OF SAID SECTION 33, FROM WHICH THE NORTH LINE OF SAID NORTHWEST QUARTER BEARS N88°53'01"E, 2637.20 FEET; THENCE N89°09'04"E, A DISTANCE OF 55.00 FEET TO THE SOUTHWEST CORNER OF LOT 44, BLOCK 2, PENRITH PARK AMENDMENT #2 AS RECORDED AT RECEPTION NO. 2018000064291 OF THE ADAMS COUNTY RECORDS AND THE POINT OF BEGINNING;

THENCE ALONG THE SOUTH LINE OF SAID PENRITH PARK AMENDMENT #2 N89°09'04"E, 2,037.39 FEET;
THENCE S04°11'07"E, A DISTANCE OF 58.02 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE LEFT HAVING A RADIUS OF 222.00 FEET AND A CENTRAL ANGLE OF 27°14'45", 105.57 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT S31°25'52"E, A DISTANCE OF 25.00 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 178.00 FEET AND A CENTRAL ANGLE OF 30°34'57", 95.01 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT S00°50'56"E, A DISTANCE OF 750.88 FEET;
THENCE S06°07'10"W, A DISTANCE OF 45.33 FEET;
THENCE S00°50'56"E, A DISTANCE OF 25.00 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 172.50 FEET AND A CENTRAL ANGLE OF 11°41'35", 35.20 FEET TO A POINT OF COMPOUND CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 86°47'56", 53.02 FEET TO A POINT OF REVERSE CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE LEFT HAVING A RADIUS OF 1,055.00 FEET AND A CENTRAL ANGLE OF 28°54'20", 532.24 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT S68°44'16"W, A DISTANCE OF 56.13 FEET;
THENCE S76°05'27"W, A DISTANCE OF 39.07 FEET;
THENCE S68°44'16"W, A DISTANCE OF 121.88 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 90°00'00", 54.98 FEET;
THENCE ALONG A LINE NON-TANGENT TO SAID CURVE, S65°09'41"W, A DISTANCE OF 80.16 FEET TO A POINT ON A CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 90°00'00" (THE CHORD OF WHICH BEARS S23°44'16"W, 49.50 FEET), 54.98 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT S68°44'16"W, A DISTANCE OF 30.20 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 695.00 FEET AND A CENTRAL ANGLE OF 29°58'22", 363.57 FEET;
THENCE ALONG A LINE NON-TANGENT TO SAID CURVE, N73°35'56"W, A DISTANCE OF 51.47 FEET TO A POINT ON A CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 690.00 FEET AND A CENTRAL ANGLE OF 06°58'46" (THE CHORD OF WHICH BEARS N73°33'37"W, 84.00 FEET), 84.05 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT N70°04'14"W, A DISTANCE OF 50.60 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 90°00'00", 54.98 FEET;
THENCE ALONG A LINE NON-TANGENT TO SAID CURVE, N73°38'54"W, A DISTANCE OF 80.16 FEET TO A POINT ON A CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 89°52'11" (THE CHORD OF WHICH BEARS S64°51'51"W, 49.44 FEET), 54.90 FEET TO A POINT OF REVERSE CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE LEFT HAVING A RADIUS OF 755.00 FEET AND A CENTRAL ANGLE OF 19°47'56", 260.90 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT S90°00'00"W, A DISTANCE OF 46.89 FEET;
THENCE N83°06'35"W, A DISTANCE OF 41.68 FEET;
THENCE S90°00'00"W, A DISTANCE OF 108.92 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 48.50 FEET AND A CENTRAL ANGLE OF 89°44'10", 75.96 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT, BEING PARALLEL WITH AND 55.00 FEET EAST OF THE WEST LINE OF SAID NORTHWEST QUARTER N00°15'50"W, A DISTANCE OF 564.01 FEET TO A POINT OF CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 90°00'00" (THE CHORD OF WHICH BEARS N44°43'52"E, 49.49 FEET), 54.97 FEET;
THENCE ALONG A LINE NON-TANGENT TO SAID CURVE, N00°15'34"W, A DISTANCE OF 80.00 FEET TO A POINT ON A CURVE;
THENCE ALONG THE ARC OF SAID CURVE TO THE RIGHT HAVING A RADIUS OF 35.00 FEET AND A CENTRAL ANGLE OF 90°00'00" (THE CHORD OF WHICH BEARS N45°15'50"W, 49.50 FEET), 54.98 FEET TO A POINT OF TANGENT;
THENCE ALONG SAID TANGENT, BEING PARALLEL WITH AND 55.00 FEET EAST OF SAID NORTHWEST QUARTER N00°15'50"W, A DISTANCE OF 454.58 FEET TO THE POINT OF BEGINNING, CONTAINING 2,639,606 SQUARE FEET OR 60.597 ACRES, MORE OR LESS.

OWNER

MUEGGE FARMS, LLC

BY: _____ BY: _____
NAME NAME

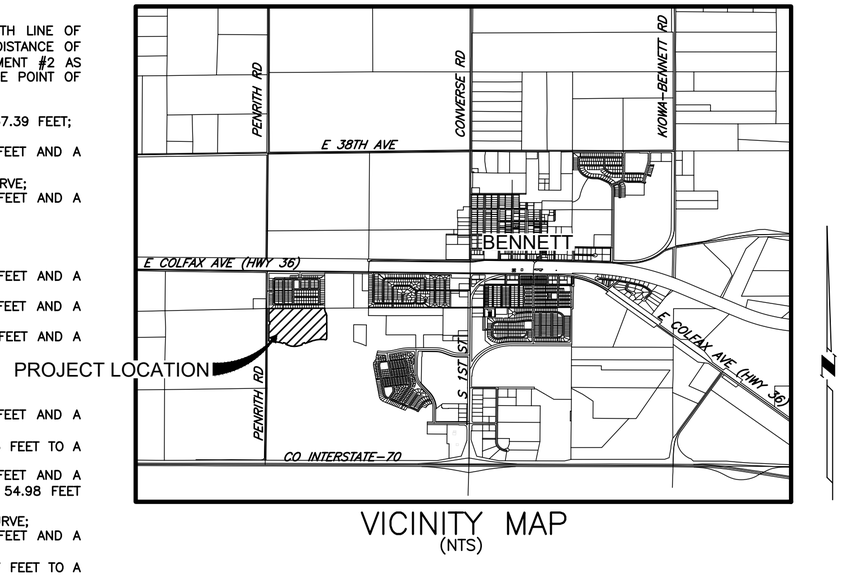
AS: _____ AS: _____
TITLE TITLE

STATE OF COLORADO
}
}SS
}
COUNTY OF _____

THE FOREGOING DEDICATION WAS ACKNOWLEDGED BEFORE ME THIS _____ DAY OF _____ _, 2022 A.D.

MY COMMISSION EXPIRES _____

NOTARY PUBLIC _____



VICINITY MAP
(NTS)

GENERAL NOTES

1. NOTICE: ACCORDING TO COLORADO LAW YOU MUST COMMENCE ANY LEGAL ACTION BASED UPON ANY DEFECT IN THIS SURVEY WITHIN THREE (3) 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 (10) YEARS FROM THE DATE OF THE CERTIFICATION SHOWN HEREON.
2. BASIS OF BEARINGS: BEARINGS SHOWN HEREON ARE BASED UPON THE THE NORTH LINE OF THE NORTHWEST QUARTER OF SECTION 33 WHICH IS ASSUMED TO BEAR N88°53'01"E, 2637.20 FEET, SAID LINE IS MONUMENTED AS SHOWN HEREIN.
3. THE LINEAL UNITS OF MEASURE SHOWN ON THIS SURVEY ARE BASED UPON THE U.S. SURVEY FOOT.
4. THIS SURVEY DOES NOT CONSTITUTE A TITLE SEARCH BY EMK CONSULTANTS, INC. TO DETERMINE RECORD TITLE, EASEMENTS OR RIGHTS-OF-WAY. LAND TITLE GUARANTEE COMPANY ALTA COMMITMENT ORDER NO. ABC70590329.4 WITH AN EFFECTIVE DATE OF JULY 8, 2022 AT 5:00 P.M. WAS RELIED UPON FOR ALL INFORMATION REGARDING RECORD TITLE, EASEMENTS OF RECORD AND RIGHTS-OF-WAY.

ADD DEDICATION OF UTILITY EASEMENTS - UTILITY EASEMENTS LOCATED AS SHOWN ARE HEREBY GRANTED FOR THE INSTALLATION, MAINTENANCE, AND OPERATION OF UTILITIES AND DRAINAGE FACILITIES, INCLUDING, BUT NOT LIMITED TO STREET LIGHTS, ELECTRIC LINES, GAS LINES, CABLE TELEVISION LINES, FIBER OPTIC LINES, AND TELEPHONE LINES, AS WELL AS PERPETUAL RIGHT FOR INGRESS AND EGRESS FOR INSTALLATION, MAINTENANCE, AND REPLACEMENT OF SUCH LINES

ADD NOTE: MONUMENTS,ORNAMENTAL COLUMNS, WINDOW WELLS, COUNTERFORTS, PATIOS, DECKS, RETAINING WALLS AND THEIR COMPONENTS ARE NOT PERMITTED TO ENCROACH INTO UTILITY EASEMENTS

ADD DEDICATION OF TRACTS AND PERMITTED USE IN THE TRACTS

SURVEYOR'S CERTIFICATE

I, STEPHEN H. HARDING, A PROFESSIONAL LAND SURVEYOR LICENSED TO PRACTICE LAND SURVEYING IN THE STATE OF COLORADO, DO HEREBY CERTIFY THAT THERE ARE NO ROADS, PIPELINES, IRRIGATION DITCHES OR OTHER EASEMENTS IN EVIDENCE OR KNOWN BY ME TO EXIST ON OR ACROSS THE HEREINBEFORE DESCRIBED PROPERTY, EXCEPT AS SHOWN ON THIS PLAT. I FURTHER CERTIFY THE THE SURVEY WAS PERFORMED UNDER MY DIRECT RESPONSIBILITY, SUPERVISION AND CHECKING, AND THAT THIS PLAT ACCURATELY REPRESENTS SAID SURVEY, AND THAT ALL MONUMENTS EXIST AS SHOWN HEREON.

_____
STEPHEN H. HARDING, PLS 29040
COLORADO LICENSED PROFESSIONAL LAND SURVEYOR
FOR AND ON BEHALF OF EMK CONSULTANTS, INC.

OWNERSHIP AND TITLE VERIFICATION

I, _____ A DULY AUTHORIZED OFFICER OF LAND TITLE INSURANCE COMPANY, HEREBY CERTIFY THAT THE PARTIES EXECUTING THIS PLAT AS OWNERS OF THE ABOVE DESCRIBED PROPERTY ARE THE OWNERS THEREOF IN FEE SIMPLE, THAT ALL PUBLIC RIGHTS-OF-WAY, EASEMENTS OR IMPROVEMENTS, IF ANY, THAT ARE DEDICATED BY THIS PLAT ARE FREE AND CLEAR OF ALL LIENS AND ENCUMBRANCES, EXCEPT THOSE SHOWN ON COMMITMENT FOR TITLE INSURANCE ORDER NO. ABC70590329.4 WITH AN EFFECTIVE DATE OF 07/08/2022 AT 5:00 P.M.

_____ _____ DATE: _____
AUTHORIZED OFFICIAL

PREPARED BY

EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com

JOB NO. 13301

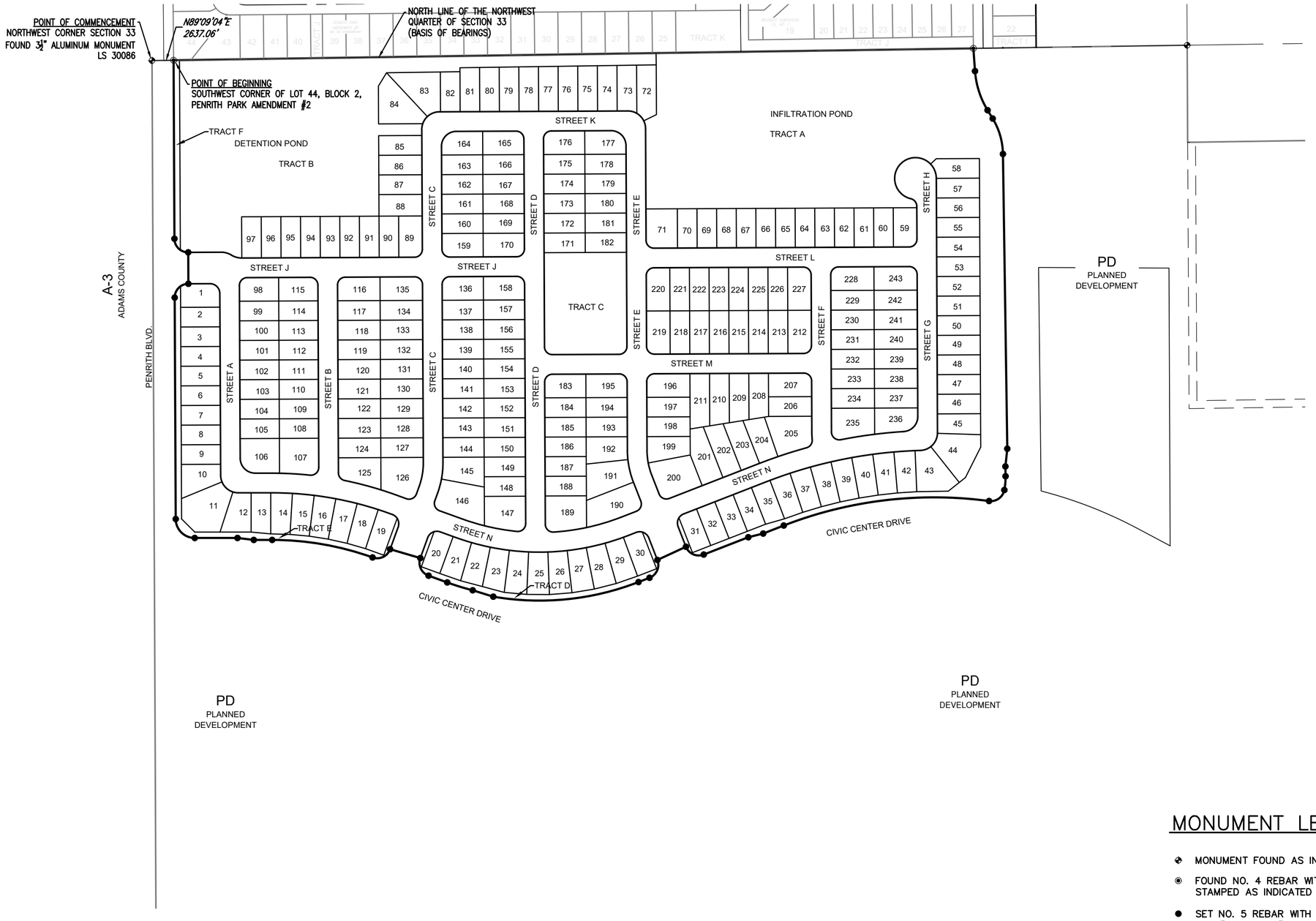
MUEGGE FARMS FILING NO 7 SUBDIVISION

DATE PREPARED: JULY 14, 2022

PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

MUEGGE FARMS FILING 7
FINAL PLAT

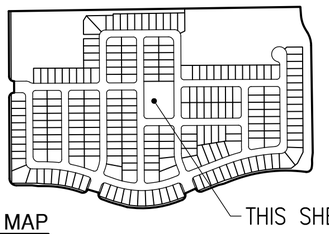
A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS



MONUMENT LEGEND

- ◆ MONUMENT FOUND AS INDICATED
- ◉ FOUND NO. 4 REBAR WITH 1 1/2" ALUM CAP STAMPED AS INDICATED
- ● SET NO. 5 REBAR WITH 1–1/2" ALUMINUM CAP "PLS 29040"

KEY MAP



GRAPHIC SCALE
0 50 100 200 300
1 INCH = 100 FEET

N

PREPARED BY

EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112–2019
(303)694–1520 www.EMKC.com

JOB NO. 13301

MUEGGE FARMS FILING NO 7 SUBDIVISION

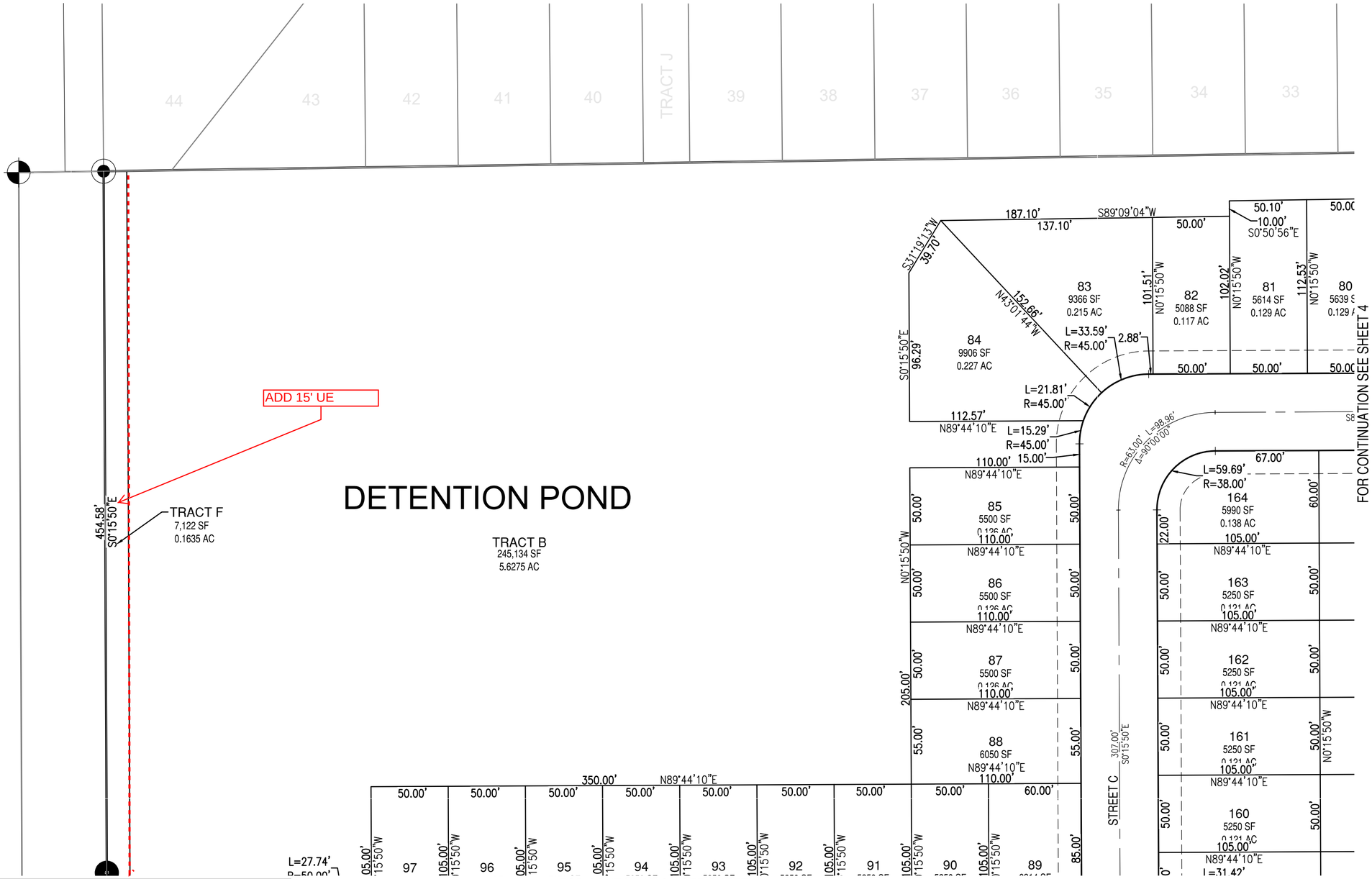
DATE PREPARED: JULY 14, 2022

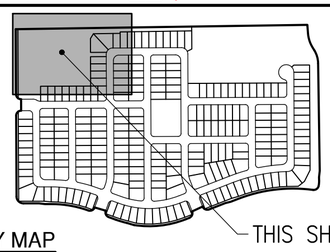
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

MUEGGE FARMS FILING 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

3 OF 11





KEY MAP

GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com
JOB NO. 13301

MUEGGE FARMS FILING NO 7
SUBDIVISION
DATE PREPARED: JULY 14, 2022

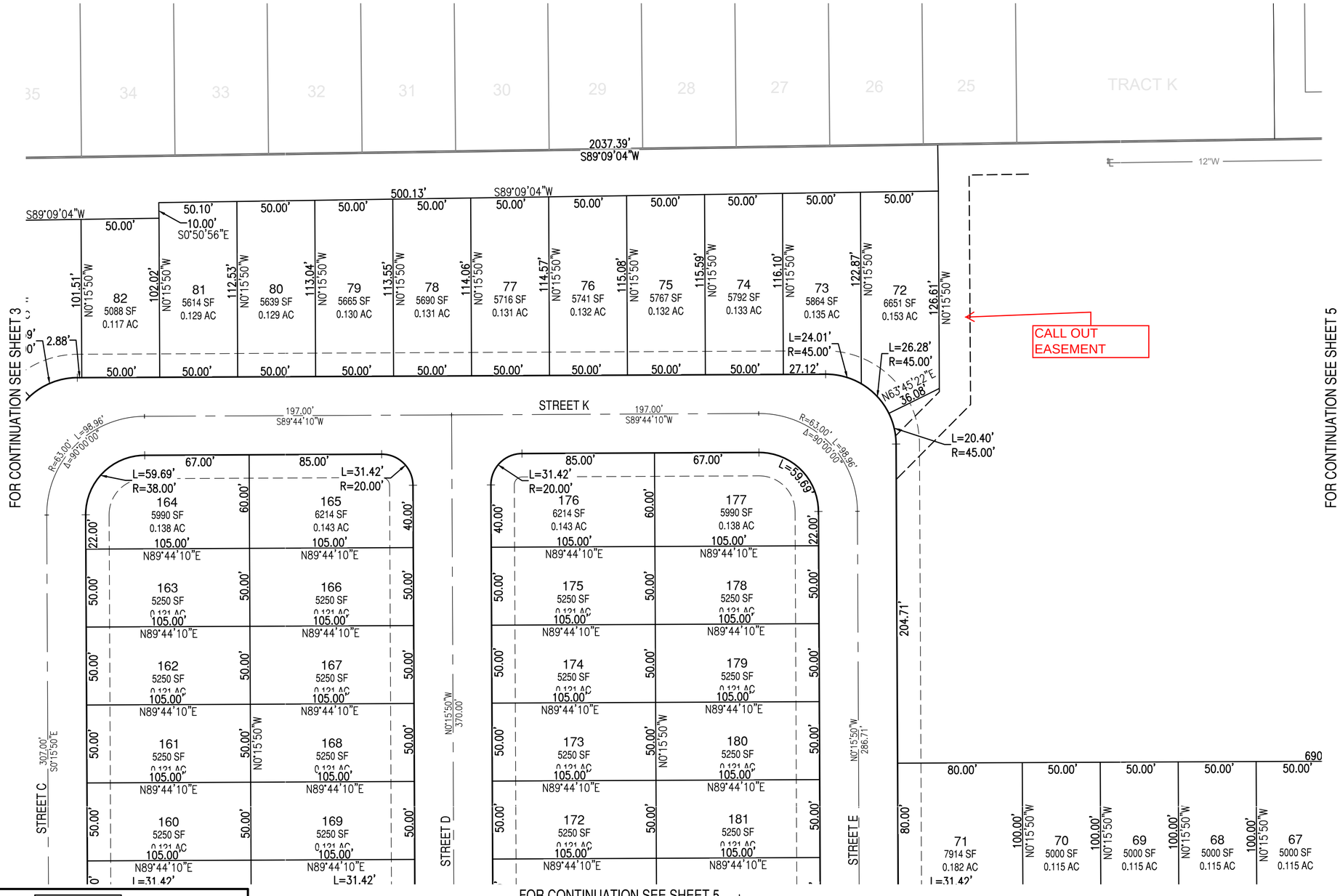
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

SHEET 3 OF 11

MUEGGE FARMS FILING 7
FINAL PLAT

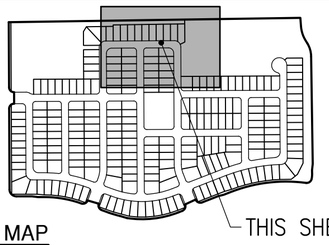
A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

4 OF 11



FOR CONTINUATION SEE SHEET 5

KEY MAP



GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

PREPARED BY

EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com

JOB NO. 13301

MUEGGE FARMS FILING NO 7 SUBDIVISION

DATE PREPARED: JULY 14, 2022

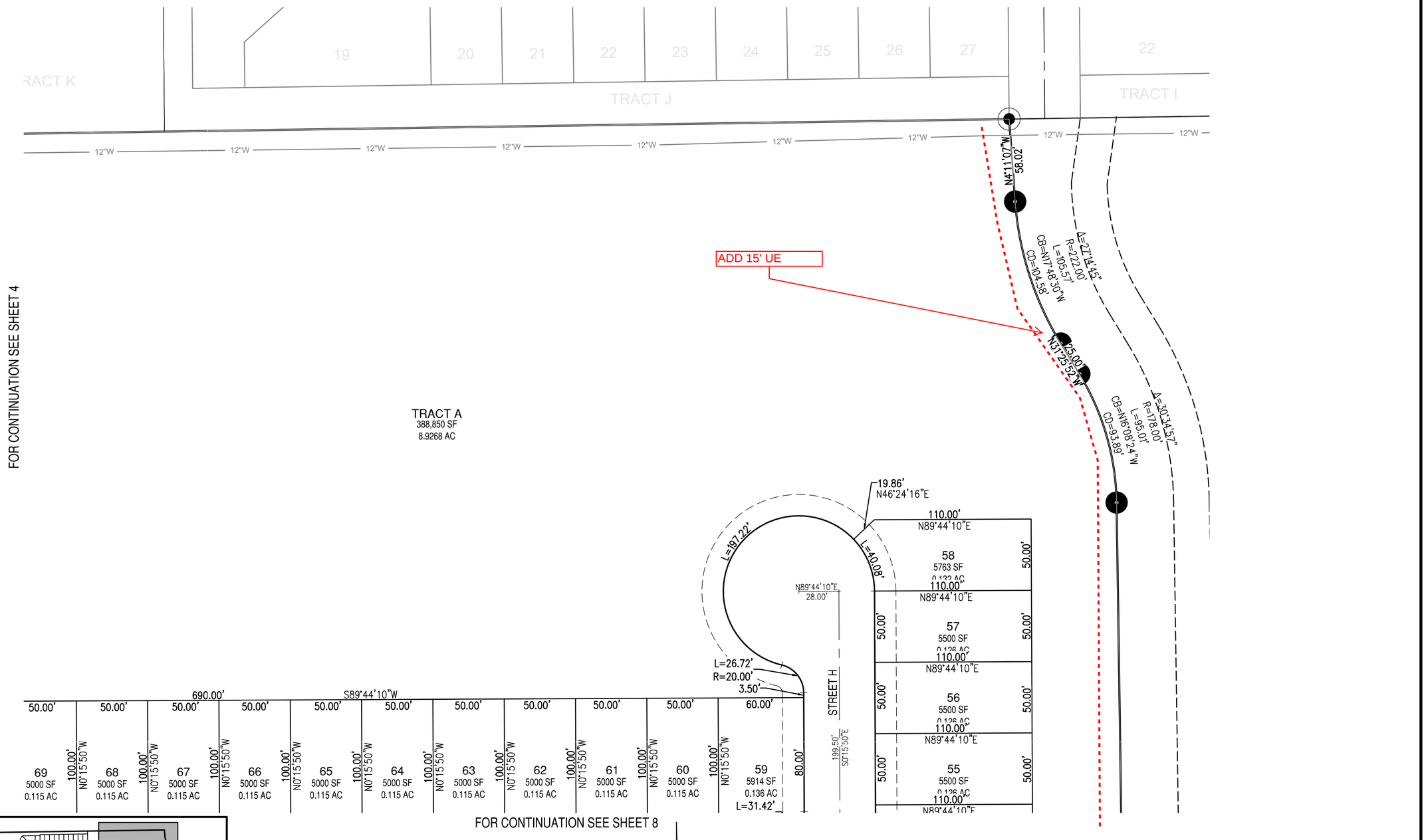
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

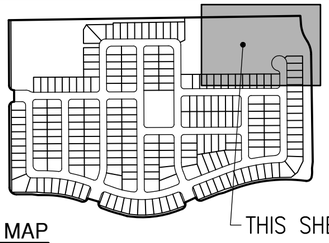
SHEET 4 OF 11

MUEGGE FARMS FILING 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

5 OF 11





KEY MAP

GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

PREPARED BY

EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com

JOB NO. 13301

MUEGGE FARMS FILING NO 7 SUBDIVISION

DATE PREPARED: JULY 14, 2022

PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

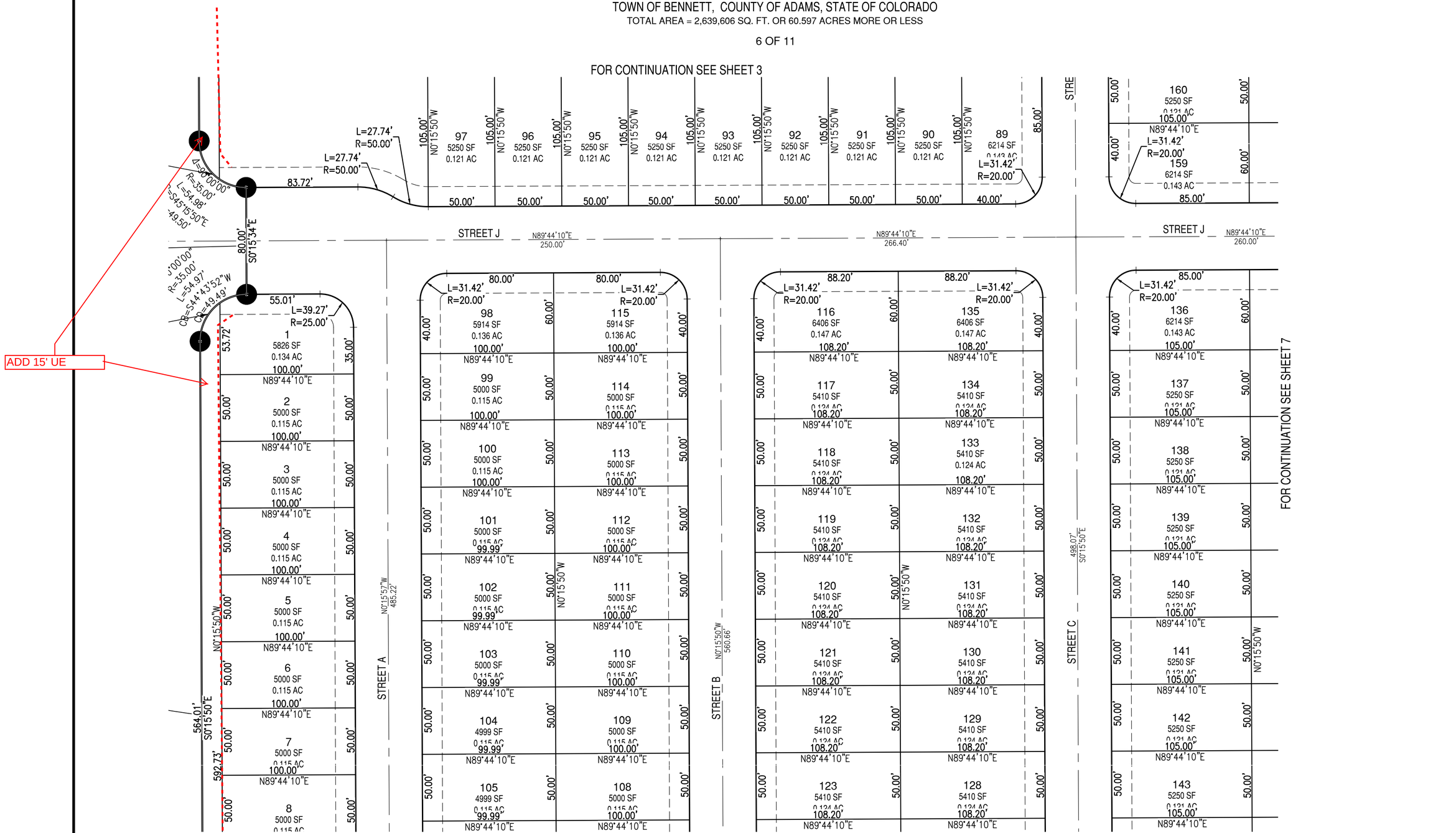
SHEET 5 OF 11

MUEGGE FARMS FILING 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

6 OF 11

FOR CONTINUATION SEE SHEET 3



GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com
JOB NO. 13301

MUEGGE FARMS FILING NO 7
SUBDIVISION
DATE PREPARED: JULY 14, 2022

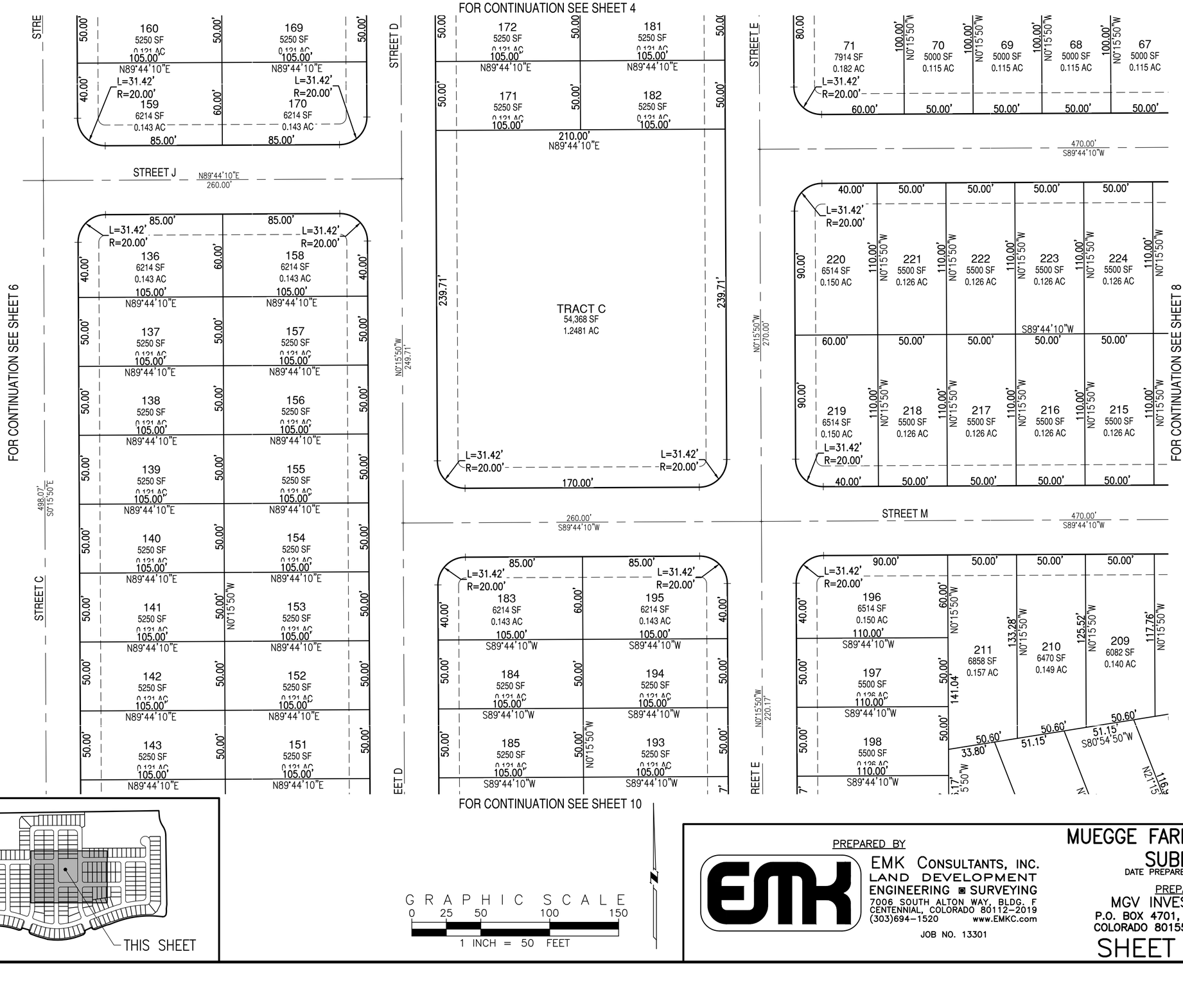
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

SHEET 6 OF 11

MUEGGE FARMS FILING 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

7 OF 11



KEY MAP

GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com
JOB NO. 13301

MUEGGE FARMS FILING NO 7
SUBDIVISION
DATE PREPARED: JULY 14, 2022

PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

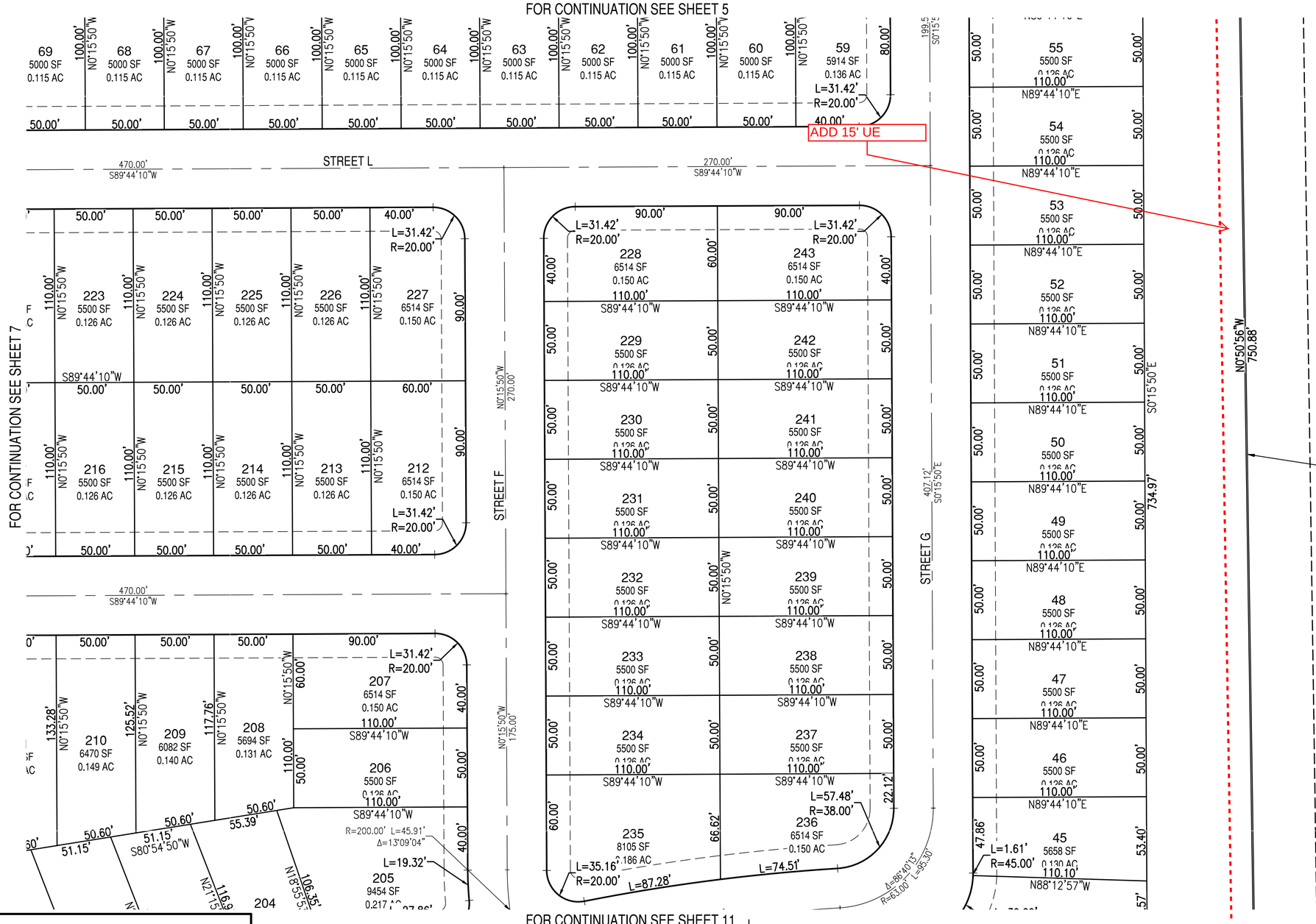
SHEET 7 OF 11

MUEGGE FARMS FILING 7
FINAL PLAT

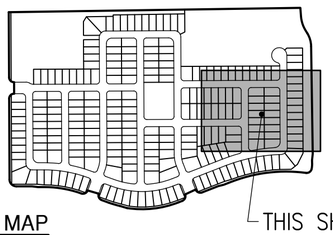
A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

8 OF 11

FOR CONTINUATION SEE SHEET 5



KEY MAP



GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com
JOB NO. 13301

MUEGGE FARMS FILING NO 7
SUBDIVISION
DATE PREPARED: JULY 14, 2022

PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

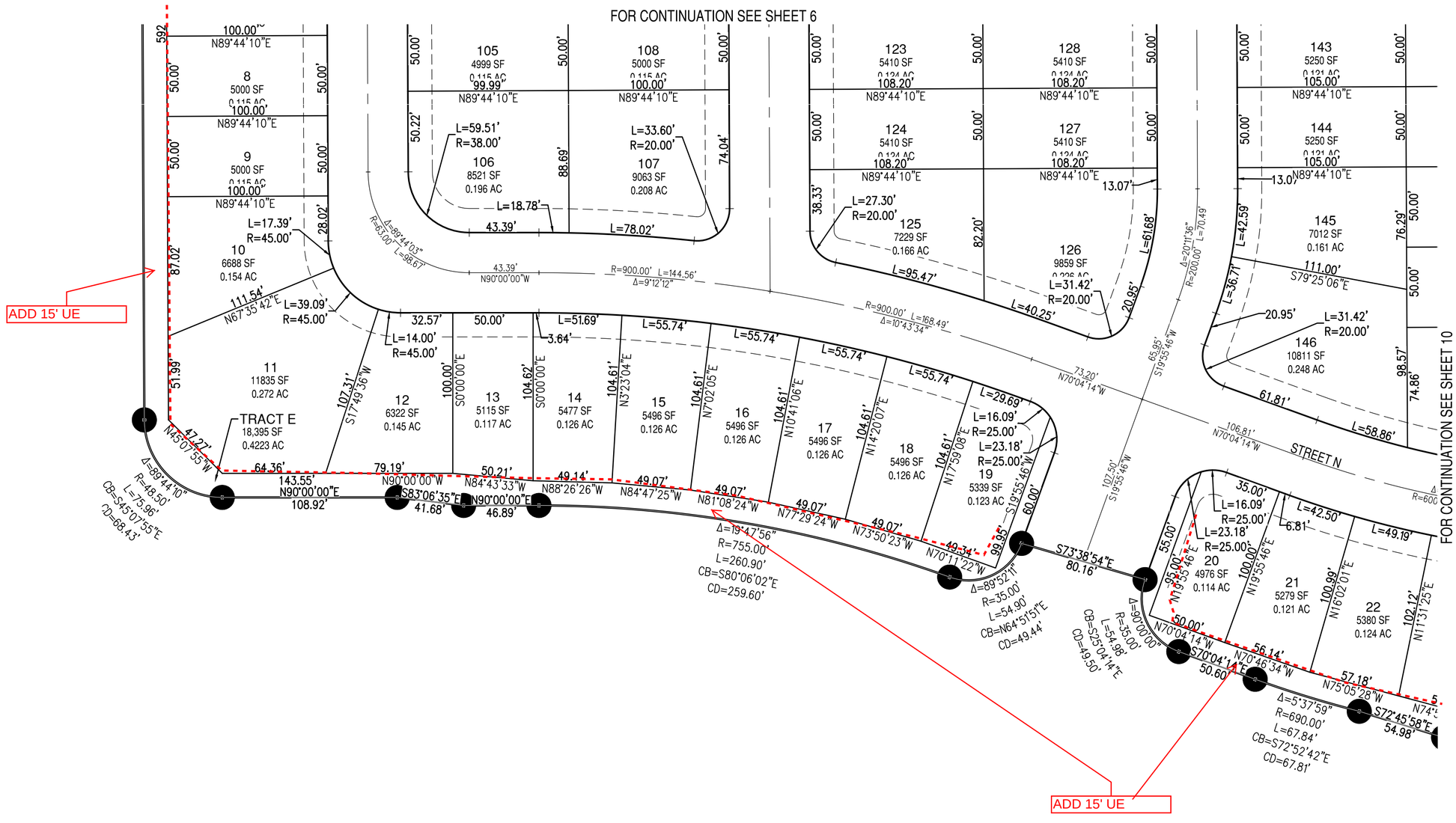
SHEET 8 OF 11

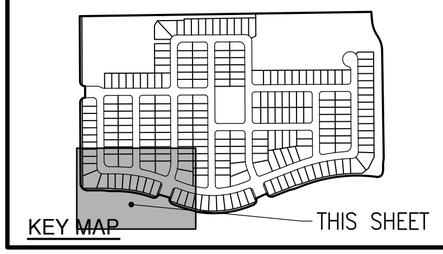
MUEGGE FARMS FILING 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

9 OF 11

FOR CONTINUATION SEE SHEET 6





GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112-2019
(303)694-1520 www.EMKC.com
JOB NO. 13301

MUEGGE FARMS FILING NO 7
SUBDIVISION
DATE PREPARED: JULY 14, 2022

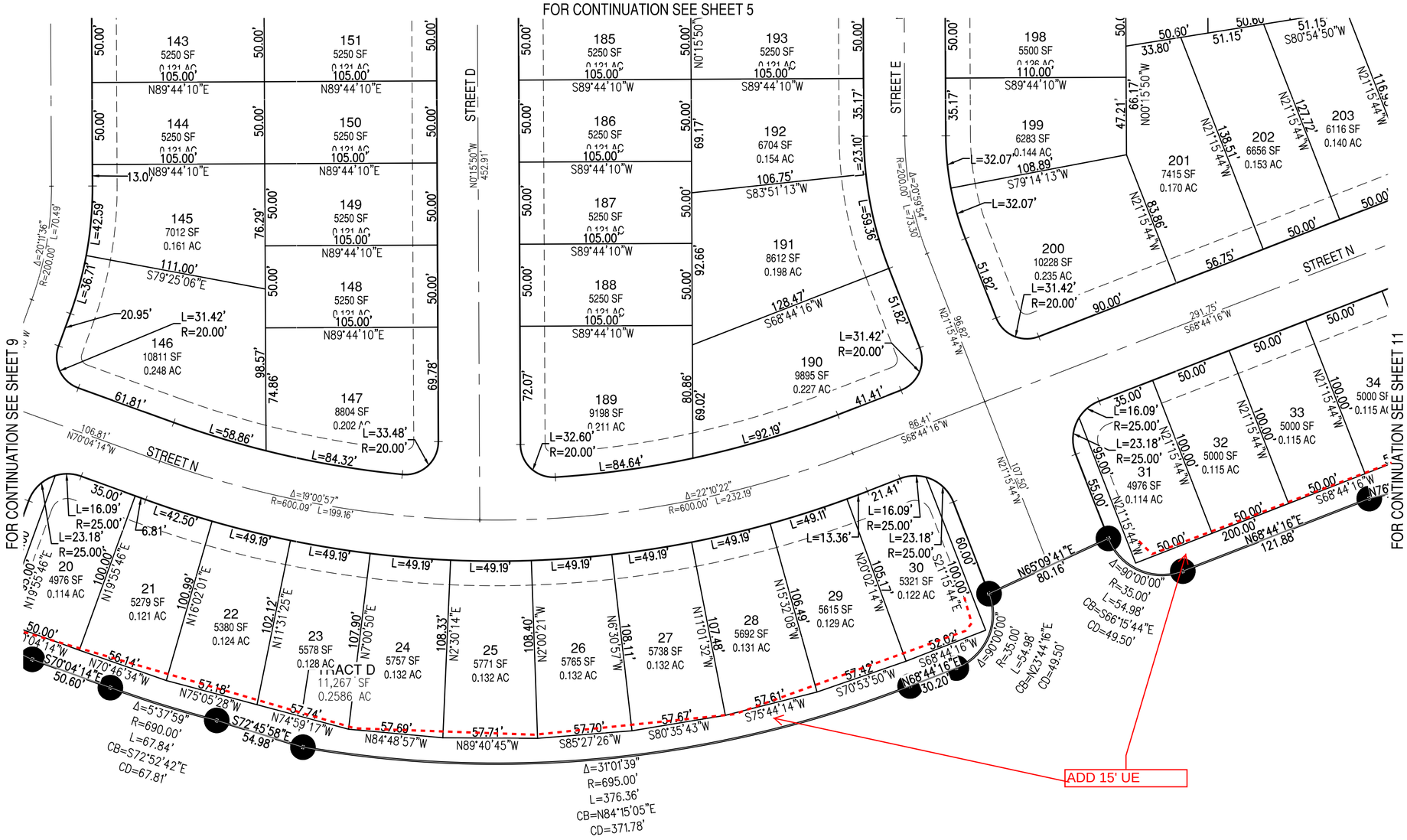
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

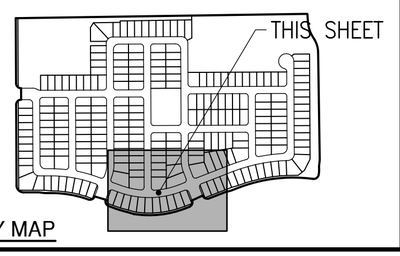
SHEET 9 OF 11

MUEGGE FARMS FILING 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

FOR CONTINUATION SEE SHEET 5





KEY MAP

GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

PREPARED BY
EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112–2019
(303)694–1520 www.EMKC.com
JOB NO. 13301

MUEGGE FARMS FILING NO 7
SUBDIVISION
DATE PREPARED: JULY 14, 2022

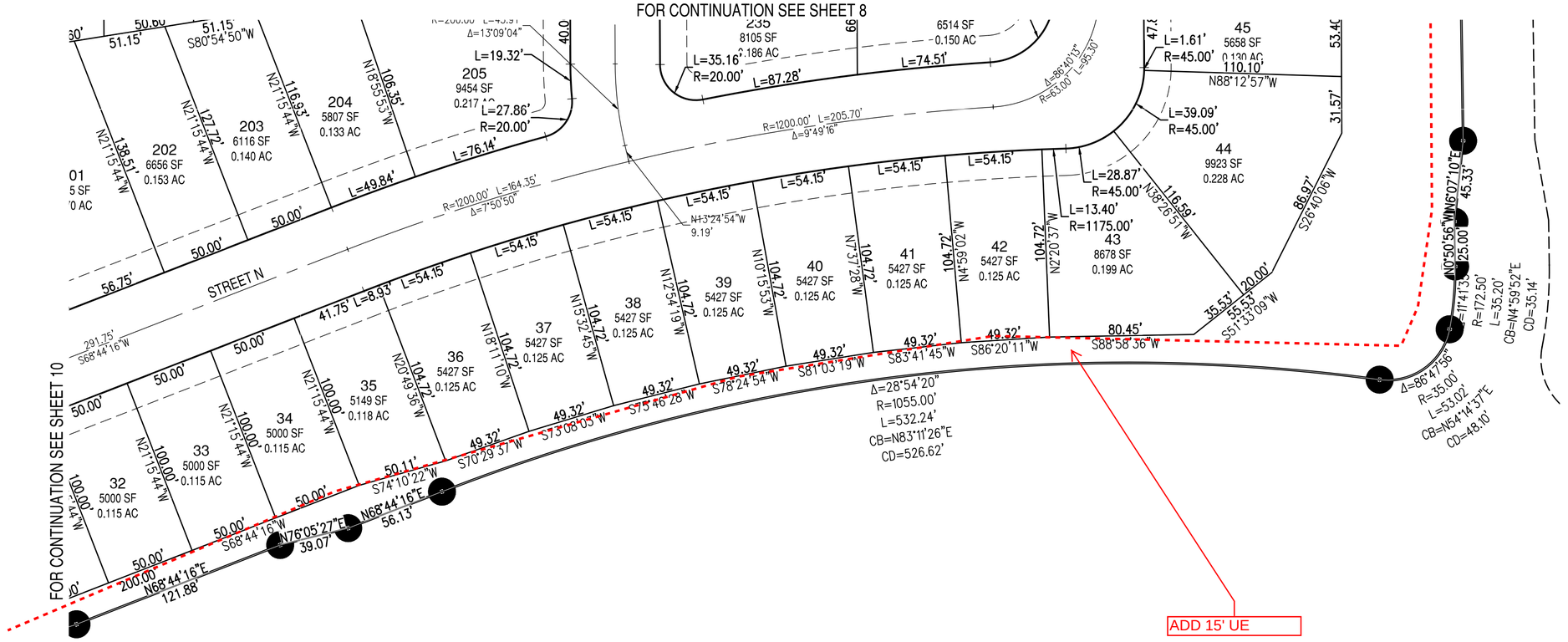
PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

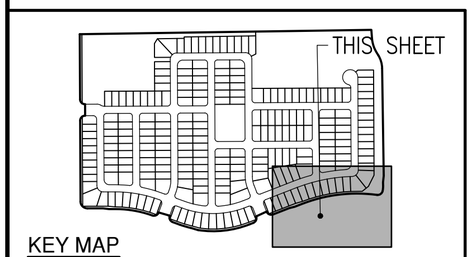
SHEET 10 OF 11

MUEGGE FARMS FILING 7
FINAL PLAT

A PARCEL OF LAND LYING IN THE NORTHWEST QUARTER OF SECTION 33, TOWNSHIP 3 SOUTH, RANGE 63 WEST OF THE 6TH PRINCIPAL MERIDIAN,
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
TOTAL AREA = 2,639,606 SQ. FT. OR 60.597 ACRES MORE OR LESS

11 OF 11





KEY MAP

GRAPHIC SCALE
0 25 50 100 150
1 INCH = 50 FEET

PREPARED BY

EMK CONSULTANTS, INC.
LAND DEVELOPMENT
ENGINEERING ◙ SURVEYING
7006 SOUTH ALTON WAY, BLDG. F
CENTENNIAL, COLORADO 80112–2019
(303)694–1520 www.EMKC.com

JOB NO. 13301

MUEGGE FARMS FILING NO 7
SUBDIVISION
DATE PREPARED: JULY 14, 2022

PREPARED FOR:
MGV INVESTMENTS, LLC
P.O. BOX 4701, GREENWOOD VILLAGE,
COLORADO 80155 ATTN: JOHN VITELLA

SHEET 11 OF 11

Bennett School District 29J

DISTRICT OFFICES
615 Seventh Street • Bennett, Colorado 80102 8015
(303) 644 3234 • (303) 5711104 • FAX (303) 644 4121

Muegge Filing 7

July 26, 2022

This letter is being written to highlight discussions between Bennett School District 29J and the developers for Muegge Farms. We have met with Jim Marshall and John Vitella on several occasions to discuss district needs, district policy on land dedication and cash-in-lieu, and expectations for land dedication. Bennett School District has policy in place that address the expectations for land dedications, cash-in-lieu, and land use impact statements. We have shared those policies with these gentlemen. This letter is only for Filing/Phase #7.

We are asking for the full $505,218.87 Cash-in-lieu for filing #7. We will ask for the land dedication as well as any additional Cash-in-lieu in the upcoming filings.

Please see our mutually agreed upon calculations attached that are in our IGA.

Sincerely,

Robin Purdy

Mrs. Robin Purdy
Superintendent of Schools

Mr. Keith Yaich
Chief Financial Officer

Muegge Filing # 7 PA-1 - 7/25/2022

Student Yield Calculator			Elementary		Middle		High		Total	
Housing Unit Type	Density	Dwelling Units	Generation Rate	Students	Generation Rate	Students	Generation Rate	Students	Generation Rate	Students
Single Family Detached	1 - 7.99	243	0.29	70	0.15	36.45	0.16	39	0.6	***145.8***
Single Family Attached (Condo, Townhome, Plex)	8 - 14.99	0	0.14	0	0.06	0	0.08	0	0.28	***0***
Multifamily (Apartments)	15+	0	0.07	0	0.03	0	0.04	0	0.14	***0***
Totals		***243***								***145.8***

Acreage Calculator	Units	Acreage Multiplier	Acreage Owed		Fee Multiplier	Fee Owed
Single Family Detached Units (SFD)	243	0.0162	3.9366		$2,079.09	$ 505,218.87
Single Family Attached Units (SFA)	0	0.0075	0		$964.84	$ -
Multifamily Units (MF)	0	0.0038	0		$482.42	$ -
Totals			**3.9366**		***Or***	**$ 505,218.87**

Melinda A. Culley
(303) 298-1601 tel
(303) 298-1627 fax
melinda@kellypc.com

MEMORANDUM

TO: Steve Hebert, Planning Manager
Town of Bennett

FROM: Melinda Culley /s/

DATE: August 16, 2022

RE: Muegge Farms Filing No. 7 Final Plat and FDP

I have reviewed the Final Plat and Final Development Plan (FDP) for Muegge Farms Filing No. 7 and have the following comments:

Final Plat

1. Add the following Ownership and Dedication block to the first page of the plat:

> **OWNERSHIP AND DEDICATION**
> Known by all people by these presents, that the undersigned ___insert owner name being the owner of the land shown in this Final Plat and described as follows:
>
> (LEGAL DESCRIPTION)
>
> Have laid out, subdivided and platted said land as per drawing hereon contained under the name and style of ___insert subdivision name , a subdivision of a part of the Town of Bennett, County of [Adams/Arapahoe], State of Colorado, and by these presents does hereby dedicate to the Town of Bennett the streets, avenues (and other public places, tracts/outlots) as shown on the accompanying plat for the public use thereof forever and does further dedicate to the use of the Town of Bennett and all serving public utilities (and other appropriate entities) those portions of said real property which are so designated as easements as shown.

It is expressly understood and agreed by the undersigned that all expenses and costs involved in constructing and installing sanitary sewer system works and lines, storm drainage works and lines, water system works and lines, gas service lines, electrical service works and lines, landscaping, curbs, gutters, street pavement, sidewalks, and other utilities and services shall be guaranteed and paid for by the Subdivider or arrangements made by the Subdivider thereof which are approved by the Town of Bennett, Colorado, and such sums shall not be paid by the Town of Bennett, and that any item so constructed or installed when accepted by the Town of Bennett shall become the sole property of said Town of Bennett, Colorado, except private roadway curbs, gutter and pavement and items owned by municipality franchised utilities, other serving public entities, which when constructed or installed shall remain and/or become the property of such municipality franchised utilities, other serving public entities and shall not become the property of the Town of Bennett, Colorado.

2. Add the following Town Approval block to the first page:

TOWN APPROVAL BLOCK
This is to certify that the Plat of ___insert subdivision name__was approved on the _____ day of _____, 20___ by Resolution No. ____ and that the Mayor of the Town of Bennett on behalf of the Town of Bennett, hereby acknowledges said Plat upon which this certificate is endorsed for all purposes indicated thereon.

_____ ATTEST: _____
Mayor Town Clerk

3. Add the following Clerk and Recorder's Certificate block to the first page:

CLERK AND RECORDER'S CERTIFICATE
I hereby certify that this instrument was filed in my office at_____ o'clock ___.m., this _____ day of , 20__, and is recorded under Reception No. _____,

_____
Clerk and Recorder

_____
Deputy

Final Development Plan

1. Remove the note titled "Vested Property Right Note."

Please contact me if you have any questions. Thanks.

Kelly PC
999 18th Street, Suite 1450S, Denver, CO 80202

LSC TRANSPORTATION CONSULTANTS, INC.

1889 York Street
Denver, CO 80206
(303) 333-1105
FAX (303) 333-1107
E-mail: lsc@lscdenver.com

March 17, 2022

Mr. John Vitella
MGV 36 South Land Investments, LLC
PO Box 4701
Greenwood Village, CO 80155

Re: Muegge Farms PA -1
Bennett, CO
LSC #170934

Dear Mr. Vitella:

Per your request, we have completed this compliance letter for the Muegge Farms Filings PA-1 development in Bennett, Colorado. The purpose of this letter is to show compliance with the January, 2019 *Muegge Farms Master Traffic Impact Analysis* (2019 MTIA) by LSC and to provide feedback on the proposed turn lane lengths recommended adjacent to the site.

TRIP GENERATION COMPLIANCE

Planning Area 1 in the 2019 MTIA included 276 dwelling units (Table 2 from the 2019 MTIA is attached). The currently proposed land use for PA-1 is 243 dwelling units. As shown in Table 1, the site is projected to generate about 314 fewer vehicle-trips on the average weekday, with about half entering and half exiting during a 24-hour period. During the morning peak-hour, which generally occurs for one hour between 6:30 and 8:30 a.m., about 7 fewer vehicles would enter and about 27 fewer vehicles would exit the site. During the afternoon peak-hour, which generally occurs for one hour between 4:00 and 6:00 p.m., about 28 fewer vehicles would enter and about 16 fewer vehicles would exit.

TURN LANE RECOMMENDATIONS

The attached site plan shows the turn lane lengths for the future turn lanes recommended adjacent to the site.

* * * * *

We trust our findings will assist you in gaining approval of the proposed Muegge Farms PA-1 development. Please contact me if you have any questions or need further assistance.

Sincerely,

LSC TRANSPORTATION CONSULTANTS, INC.

By_____
Christopher S. McGranahan, PE, PTOE
Principal

CSM/wc

3-17-22

Enclosures: Table 2 from 2019 MTIA
Table 1
Site Plan with Turn Lane Details

W:\LSC\Projects\2017\170934-MueggeFarmsPA-1\March 2022\MueggeFarms-PA-1-Compliance-031722.wpd

Table 2
Trip Generation Estimate
Muegge Farms

Phase	Planning Area	Land Use Description		Area	Density (DU/Acre) or F.A.R.	Trip Generation Units	Trip Generation Rates [1] Average Weekday Traffic	Morning Peak Hour In	Morning Peak Hour Out	Afternoon Peak Hour In	Afternoon Peak Hour Out	Total Trips Generated Average Weekday Traffic	Morning Peak Hour In	Morning Peak Hour Out	Afternoon Peak Hour In	Afternoon Peak Hour Out
Residential Land Uses																
1	3, 4 & 5	Residential SF/MF[2]		96.7	6-20	847 DU[3]	9.44	0.19	0.56	0.62	0.37	7,996	157	470	528	310
2	2	Residential SF/MF		108.8	4-10	1009 DU	9.44	0.19	0.56	0.62	0.37	9,525	187	560	629	370
			Total Phases 1 & 2			**1,856 DU**						**17,521**	**343**	**1,029**	**1,158**	**680**
3	1	Residential SF/MF		62.2	4-10	276 DU	9.44	0.19	0.56	0.62	0.37	2,605	51	153	172	101
			Total Phases 1-3			**2,132 DU**						**20,126**	**394**	**1,182**	**1,330**	**781**
4	7	Residential SF/MF		121.54	4-10	668 DU	9.44	0.19	0.56	0.62	0.37	6,306	124	371	417	245
			Total Phases 1-4 (Buildout of Residential)			**2,800 DU**						**26,432**	**518**	**1,553**	**1,747**	**1,026**
Non-Residential Land Uses																
- - -	6	School Site	Elementary School[4]	25	- - -	328 Students	1.89	0.36	0.31	0.08	0.09	620	119	101	27	29
			Middle School[5]		- - -	318 Students	2.13	0.31	0.27	0.08	0.09	677	100	85	26	28
- - -	13	School Site	Elementary School	10	- - -	327 Students	1.89	0.36	0.31	0.08	0.09	618	118	101	27	29
- - -	8	Employment Center[6]	General Office Building	100	0.35	762 KSF[7]	9.79	0.82	0.13	0.16	0.52	7,466	628	102	122	395
			Warehousing			762 KSF	1.64	0.12	0.04	0.04	0.11	1,250	90	27	32	87
- - -	9	Commercial[8]	Shopping Center	33.9	0.35	258 KSF	32.51	0.45	0.27	1.58	1.71	8,401	116	71	409	443
			General Office Building			258 KSF	9.79	0.82	0.13	0.16	0.52	2,531	213	35	41	134
- - -	10	Commercial	Shopping Center	48.1	0.35	367 KSF	32.51	0.45	0.27	1.58	1.71	11,920	164	101	580	629
			General Office Building			367 KSF	9.79	0.82	0.13	0.16	0.52	3,591	302	49	58	190
- - -	11A	Commercial	Shopping Center	5.3	0.35	40 KSF	32.51	0.45	0.27	1.58	1.71	1,313	18	11	64	69
			General Office Building			40 KSF	9.79	0.82	0.13	0.16	0.52	396	33	5	6	21
- - -	11B	Commercial	Shopping Center	2.3	0.35	18 KSF	32.51	0.45	0.27	1.58	1.71	570	8	5	28	30
			General Office Building			18 KSF	9.79	0.82	0.13	0.16	0.52	172	14	2	3	9
- - -	12	Town Hall[9]		12.5	0.2	109 KSF	33.98	1.90	0.23	0.87	1.95	3,704	207	26	95	212
											Total	**69,661**	**2,649**	**2,275**	**3,264**	**3,331**
											Internal Trips					
											School to Residential[10]	958	168	143	40	43
											Residential to School	958	143	168	43	40
											Office/Warehouse to Residential[11]	382	30	6	8	21
											Residential to Office/Warehouse	382	6	30	21	8
											Retail to Residential[12]	444	6	4	22	23
											Residential to Retail	444	4	6	23	22
											Retail to Office/Warehouse[12]	1,110	15	9	54	59
											Office/Warehouse to Retail	1,110	9	15	59	54
											Total Internal Trips	**5,788**	**381**	**381**	**270**	**270**
											Pass-By Trips[13]	**7,021**	**79**	**79**	**356**	**356**
											Primary Trips	**56,852**	**2,189**	**1,815**	**2,638**	**2,705**

Notes:
(1) Source: "Trip Generation, 10th Edition, 2017" by the Institute of Transportation Engineers (ITE)
(2) ITE Land Use No. 210 Single Family Detached Housing
(3) DU = dwelling unit
(4) ITE Land Use No. 520 Elementary School
(5) ITE Land Use No. 520 Middle School/Junior High School
(6) The "Employment Center" was assumed to be developed with 50% ITE Land Use No. 710 General Office Building and 50% ITE Land Use No. 150 Warehousing
(7) KSF = one thousand square feet of floor space
(8) The "Commercial" areas were assumed to be developed with 50% ITE Land Use No. 820 Shopping Center and 50% ITE Land Use No. 710 General Office Building
(9) ITE Land Use No. 733 Government Office Complex
(10) 50% of the school trips were assumed to be internal to the site. The school internal trips were balanced with trips to and from the residential areas.
(11) 2% of the office and warehouse trips were assumed to be internal to the site. The internal office and warehouse trips were balanced with trips to and from the residential areas.
(12) 7% of the retail trips were assumed to be internal to the site. About 2% of the internal retail trips were balanced with trips to and from the residential areas and 5% were balanced with trips to and from the office and warehouse areas.
(13) 34% of the Shopping Center trips were assumed to be pass-by trips based on the percentages shown in the *Trip Generation Handbook - An ITE Proposed Recommended Practice, Third Edition 2014* by ITE
Source: LSC Transportation Consultants, Inc.

Table 1
ESTIMATED TRAFFIC GENERATION
Muegge Farms PA-1
Bennett, CO
LSC #170934; March, 2022

		Trip Generation Rates[1]					Vehicle - Trips Generated				
		Average	AM Peak Hour		PM Peak Hour		Average	AM Peak Hour		PM Peak Hour	
Trip Generating Category	Quantity	Weekday	In	Out	In	Out	Weekday	In	Out	In	Out
Previously Approved Land Use (January 23, 2019 *Muegge Farms Master TIA* by LSC)											
Phase 3											
Single Family Detached [2]	276 DU [3]	9.44	0.185	0.555	0.624	0.366	2,605	51	153	172	101
Currently Proposed Land Use											
Phase 3											
Single Family Detached [2]	243 DU	9.43	0.182	0.518	0.592	0.348	2,291	44	126	144	85
					Net Increase =		**-314**	**-7**	**-27**	**-28**	**-16**
								AM = -34		**PM = -44**	

Notes:
(1) Source: *Trip Generation*, Institute of Transportation Engineers (ITE), 10th Edition, 2017 for previously approved land use and 11th Edition, 2021 for currently proposed land use
(2) ITE Land Use No. 210 - Single-Family Detached Housing
(3) DU = Dwelling Unit

PENRITH ROAD

LARK SPARROW WAY

CIVIC CENTER DRIVE

CIVIC CENTER DRIVE

TRACT A

TRACT B

TRACT C

TRACT D

TRACT E

100' TAPER

150' STORAGE

300' STORAGE

Potential WB RT lane may be needed depending on future school site plan details.

BENNETT PLANNING AND ZONING COMMISSION

RESOLUTION NO. 2023-02

A RESOLUTION RECOMMENDING APPROVAL OF THE FINAL PLAT FOR MUEGGE FARMS FILING NO. 7 SUBDIVISION

WHEREAS, there has been submitted to the Planning and Zoning Commission of the Town of Bennett a request for approval of a Final Plat for the Muegge Farms Filing No. 7 Subdivision; and

WHEREAS, all materials related to the proposed Final Plat have been reviewed by Town Staff and found with conditions to be in compliance with Town of Bennett subdivision and zoning ordinances; and

WHEREAS, after a noticed public hearing, at which evidence and testimony were entered into the record, the Planning and Zoning Commission finds that the proposed Final Plat should be approved subject to certain conditions.

NOW, THEREFORE, BE IT RESOLVED BY THE PLANNING AND ZONING COMMISSION OF THE TOWN OF BENNETT, COLORADO:

Section 1. The Planning and Zoning Commission hereby recommends approval of the proposed Final Plat for the Muegge Farms Filing No. 7 Subdivision, subject to the conditions set forth on Exhibit A, attached hereto and incorporated herein by reference.

PASSED AND ADOPTED THIS 27th DAY OF MARCH 2023.

_____
Chairperson

ATTEST:

_____
Savannah Vickery, Secretary

EXHIBIT A
Muegge Farms Filing No. 7 Subdivision Final Plat
Conditions of Approval

1. Before recording the plat, the applicant shall update plat notes related to tracts, easements and maintenance in a manner directed by the Town Engineer and make other minor modifications as directed by Town Staff, Engineer and Town Attorney.

Suggested Motion

I move to approve Resolution No. 2023-02 - A Resolution Recommending Approval of the Final Plat for Muegge Farms Filing No. 7 Subdivision.

QUASI-JUDICIAL PUBLIC HEARING SCRIPT
(PLANNING COMMISSION)

CHAIR: I will now open the public hearing on the following application: Updates to Chapter 16, Article III of the Bennett Municipal Code.

The purpose of the hearing is to provide a public forum for all interested parties who wish to comment on an application before the Commission. If you wish to speak please write your name and address on the sign-up sheet or in the chat box and you will be called on.

The Procedure for the public hearing will be as follows:

FIRST, there will be a presentation by the Town staff.

NEXT, we will have a presentation by the applicant.

After these two presentations we will allow people who signed up to speak for up to 3 minutes each. Please DO NOT REPEAT points made by others. It is fine to say, "I agree with the previous speaker's comments". Please direct your comments to the Commission, not the applicant or Town staff.

After receiving public comments, we will allow the applicant an opportunity to respond.

NEXT, the Planning Commission members may ask questions of anyone who testified.

I will then close the public hearing and no further testimony or other evidence will be received. The Planning Commission will discuss the matter and may take some kind of action.

Public hearings are recorded for the public record. All testimony must be presented, after you give your full name and address.

CHAIR: Do we have proper notification?

[Secretary to confirm on record notice has been provided]

Do any Commission members have any disclosures?

[Commissioners to disclose conflicts of interests, ex parte contacts, etc]

Town staff, please introduce the applicant and provide your staff report.

[Staff presentation]

Will the applicant or the applicant's representative present the application?

[Applicant presentation]

Do any of the Commissioners have questions of the applicant or Town staff?
[Question and Answer]

CHAIR: I will now open the public comment portion of the public hearing. For those wishing to speak, please clearly state your name and address for the record.

Has anyone signed up to speak at this public hearing?

[If more than one person has signed in, call them in order.]

Is there any interested party in the audience that has not signed up but who wishes to speak regarding the application?

[Additional public comment]

If there is no more public comment, I will now close the public comment portion of the public hearing.

CHAIR: Does the applicant wish to respond to any of the comments?

[Opportunity for applicant to provide any rebuttal evidence]

CHAIR: Before we turn to Commissioner questions and deliberation, I want to state that the documents included within the record for this public hearing include all application materials submitted by the applicant; all materials included in the Planning Commission packets; any PowerPoint or other presentations given tonight; all written referral and public comments received regarding the application; the public comment sign-up sheet; the public posting log and photographs of the notice, and the Town's subdivision and zoning ordinances and other applicable regulations. Does anyone have any objection to inclusion of these items in the record?

CHAIR: I will now close the public hearing and the Planning Commission members will deliberate on the evidence presented. During deliberations, Commission members may ask questions of Town staff, but no further public comment or other testimony or evidence will be received.

Who would like to begin?
Who is next?
Any other questions or comments

[If anyone believes the applicable criteria have not been met, then please explain why so we have those reasons for the record.]

STAFF REPORT

TO: Members of the Bennett Planning and Zoning Commission

FROM: Steve Hebert, Planning Manager

DATE: February 27, 2023

SUBJECT: Updates to Chapter 16, Article III of the Bennett Municipal Code Re: Sign Regulations

Background

Below is a summary of the most recent proposed updates to the Town of Bennett sign code. We appreciate your insight and comments. Following discussion during the February 27, 2023 meeting, Staff recommends the hearing be continued to March 27 for consideration of a formal draft ordinance incorporating all of the recommended changes. (See the PowerPoint presentation in the packet for images of some of the concepts discussed below.)

1. General cleanup to remove redundancies, correct errors, improve definitions, etc.
2. Increasing percent of window area for window signs from 10% to 25%. Most codes vary from 25%-50%.
3. Allow for a master sign plan for master planned residential projects, e.g. Muegge Farms, Bennett Ranch, etc.
4. Allow for larger temporary signs on undeveloped or property under development on both residential and non-residential properties. This will accommodate homebuilders and developers, consistent with what most other communities allow.
5. A proposed approach to allow for off-site home builder signs. See photos below. Most communities allow these.
6. New standards for menu and message boards for a restaurant with a drive-thru, e.g. Sonic. Our code doesn't specifically accommodate these.
7. More accommodating standards for wall signs on non-residential buildings. Current code limits total wall sign area to 100 sq. ft. for an entire building. Most codes allow 100 sq. ft. per building facade.
8. Minor changes to wall sign lighting to be consistent with intent of the new lighting ordinance.
9. Minor design standard upgrade to require wall sign raceways be painted the same color as the color of the building wall behind it.

A formal ordinance will be prepared and available for review at the March 27, 2023 Planning and Zoning Commission hearing.

Attachments

1. Staff PowerPoint Presentation
2. Chapter 16, Article III, Sign Regulations Redlined Working Draft Update

Proposed Sign Code Update
Chapter 16, Article III

Planning and Zoning Commission

February 27, 2023

Steve Hebert, Planning Manager

Sign Code Update

- General cleanup to remove redundancies, correct errors, improve definitions, etc.
- Maintain consistency with U.S. Supreme Court rulings re: free speech.

Sec. 16-3-320. Permit approval criteria.

(a) Applications for sign permits and sign plans (when required by this Article) shall be submitted in accordance with the Applicant Guide.

(b) The Zoning Administrator shall review the sign permit application in light of the approval criteria in this Article and shall either approve, approve with conditions or deny such application.

(c) An application for a sign permit may be approved if it complies with the applicable standards set forth in this Article or a final development plan, and all applicable building code requirements. In cases where there is a conflict between this Article and the final development plan, the final development plan shall control.

(d) An application for a revocable permit may be approved if it complies with the following criteria:

(1) The applicant agrees to the terms of a revocable permit agreement, including, but not limited to, any provisions that require compensation to the Town for use of public property or public right-of-way and that indemnify the Town and hold the Town harmless from future damages or liability claims.

(2) The proposed sign complies with all applicable use, development and design standards set forth in this Article, and all applicable building code requirements.

(3) The proposed sign shall not interfere with street intersection visibility or in any other way adversely affect the public health, safety or welfare.

(4) The proposed sign shall not be located over any existing or future utilities and may be removed by the Town if necessary for reconstruction of a street, sidewalk, utilities or to protect the health, safety and welfare of the citizens of the Town, with no liability to the Town for replacement or repair.

(5) The proposed sign has been approved by the Town Engineer based on the Town Engineer's review of the proposal under all Town ordinances, resolutions, rules, regulations and policies governing the use of public property and public rights-of-way.

(e) A sign permit shall lapse and have no further effect unless a sign has been erected in compliance with the terms and conditions of the permit within six (6) months ~~one (1) year~~ after the date of the sign permit approval.

(Ord. 646-14 §1(Exh. A), 12-9-2014 ; Ord. No. 660-16, §2(Exh. A), 2-23-2016)

Sign Code Update

- Increasing percent of window area for window signs from 10% to 25%. Most codes vary from 25%-50%.

Sign Code Update

- Allow for a master sign plan for master planned residential projects, e.g. Muegge Farms, Bennett Ranch, etc.
- Currently allowed for commercial and industrial.

OUTLINE DEVELOPMENT PLAN
MUEGGE FARMS 3RD AMENDMENT
TOWN OF BENNETT, COUNTY OF ADAMS, STATE OF COLORADO
COMMUNITY SIGNAGE & GUIDELINES
PAGE 12 OF 13

STANDARDS & GUIDELINES

R-1 Primary Community Monument

R-2 Secondary Entry Monument

R-3 Neighborhood Identification Monument

Exhibits are for purposes of intent only and may be subject to revisions with subsequent submittals

Standards
- 2 signs per community within the subdivision
- Maximum area of 60 square feet of type face
- Maximum height of 15'

Guidelines
- Location: Community Monument signs are typically located at the entrance or prominent intersections of a community. They shall be located on a site frontage adjoining a public or private street, tract, easement or right-of-way. The setbacks should ensure that all sight lines are preserved. Upon approval of the zoning administrator, a monument sign can be integrated into a wall.
- Landscaping: Landscaping shall be provided at the base of the supporting structure equal to two times the area of one face of the sign. For example, twenty (20) square feet of sign area equals sixty (40) square feet of landscaped area. The Zoning Administrator may reduce or waive this requirement if it is determined that the additional landscaping would not contribute significantly to the overall aesthetic character of the project, or if physical conditions of the site would preclude all or a portion of the landscaping.
- Lighting: Monument signs may be illuminated.

Standards
- 4 signs per community within the subdivision
- Maximum area of 40 square feet of type face
- Maximum height of 12'

Guidelines
- Location: Secondary Monument signs are typically located at prominent intersections of a community or at terminus view sheds. They shall be located on a site frontage adjoining a public or private street, tract, easement or right-of-way. The setbacks should ensure that all sight lines are preserved. Upon approval of the zoning administrator, a monument sign can be integrated into a wall.
- Landscaping: Landscaping shall be provided at the base of the supporting structure equal to two times the area of one face of the sign. For example, twenty (20) square feet of sign area equals sixty (40) square feet of landscaped area. The Zoning Administrator may reduce or waive this requirement if it is determined that the additional landscaping would not contribute significantly to the overall aesthetic character of the project, or if physical conditions of the site would preclude all or a portion of the landscaping.
- Lighting: Monument signs may be illuminated.

Standards
- 3 signs per neighborhood within each filing or planning area
- Maximum area of 32 square feet of type face
- Maximum height of 8'

Guidelines
- Location: Neighborhood Identification Monument signs are typically located at prominent intersections of the entrance of an individual neighborhood. They shall be located on a site frontage adjoining a public or private street, tract, easement or right-of-way. The setbacks should ensure that all sight lines are preserved. Upon approval of the zoning administrator, a monument sign can be integrated into a fence or wall.
- Landscaping: Landscaping shall be provided at the base of the supporting structure equal to three times the area of one face of the sign. For example, twenty (20) square feet of sign area equals sixty (60) square feet of landscaped area. The Zoning Administrator may reduce or waive this requirement if it is determined that the additional landscaping would not contribute significantly to the overall aesthetic character of the project, or if physical conditions of the site would preclude all or a portion of the landscaping.
- Lighting: Monument signs may be illuminated.

Sign Code Update

- Allow for larger temporary signs on undeveloped or property under development on both residential and non-residential properties.
- This will accommodate homebuilders and developers, consistent with what most other communities allow.

Sign Code Update

- Specifically allow changeable copy menu board signs.

Sign Code Update

- Formal ordinance to be prepare with all proposed amendments.
- Staff will present the ordinance to the Commission at the March 27, 2023 meeting.
- After this evening's discussion, please continue this hearing to March 27, 2023.

Questions/Comments?

ARTICLE III Sign Regulations

Commented [SH1]: Melinda reviewed on June 29, 2021 and confirmed overall the code is consistent with Reed v. Gilbert

Division 1 Purpose and Applicability

Sec. 16-3-10. Authority and purpose.

Pursuant to authority found in state law, the sign regulations in this Article are adopted for the purpose of promoting the health, safety and general welfare of the Town.

(Ord. 646-14 §1(Exh. A), 12-9-2014 ; Ord. No. 660-16, §2(Exh. A), 2-23-2016)

Sec. 16-3-20. Application.

A sign may be displayed, erected, placed, established, painted, created, altered or maintained in the Town only in conformance with the standards, procedures, exemptions, and other requirements of this Article.

(1) If any provision of this Article conflicts with any other adopted Town code that regulates signs, the more restrictive standards shall control and apply.

(2) Signs shall be permitted in the various zoning districts as accessory structures in accordance with the regulations contained in this Article.

(Ord. 646-14 §1(Exh. A), 12-9-2014 ; Ord. No. 660-16, §2(Exh. A), 2-23-2016)

Sec. 16-3-30. Intent.

The intent of these regulations is to provide a balanced and fair legal framework for the design, construction, and placement of signs that:

(1) Promote the efficient communication of messages, and ensure that persons exposed to signs are not overwhelmed by the number of messages presented;

(2) Encourage the innovative use of sign design;

(3) Promote both renovation and proper maintenance of signs;

(4) Reduce administrative burdens;

(5) Enable fair and consistent permitting and enforcement;

(6) Ensure that signs are compatible with their surroundings, and prevent the construction of signs that are a nuisance to occupants of adjacent and contiguous property due to brightness, reflectivity, bulk, or height;

(7) Enhance property values and business opportunities;

(8) Promote the safety of persons and property by ensuring that signs do not create a hazard by:

a. Confusing or distracting motorists; or

b. Impairing drivers' ability to see pedestrians, obstacles or other vehicles, or to read traffic signs;

(9) Protect the public welfare and enhance the appearance and economic value of the landscape by avoiding sign clutter that can compromise the character, quality, and viability of commercial corridors; and

(10) Assist in wayfinding.

(Ord. 646-14 §1(Exh. A), 12-9-2014 ; Ord. No. 660-16, §2(Exh. A), 2-23-2016)

Division 2 Definitions

Sec. 16-3-210. Definitions.

The words and phrases used in this Article shall have the meanings defined below:

Banner means a temporary sign having characters, letters illustrations or ornamentations applied to flexible material (e.g. vinyl, plastic, canvas, cloth, fabric or other lightweight non-rigid material) with only such material for a backing, which projects from, hangs from or is affixed to a building or structure. Banners include building pennants, cable-hung banners and wave banners.

Billboard means a large sign which directs attention to a business, activity, commodity, service, entertainment or communication which is not conducted, sold, or offered at the premises on which the sign is located, or which does not pertain to the premises upon which the sign is located.

Electronic message center means a sign that is capable of displaying words, symbols, figures or images that can be electronically or mechanically changed by remote or automatic means.

Message hold time means the time interval a static message must remain on the display before transitioning to another message.

~~*Mural* means a picture or graphic illustration applied directly to a wall of a building that does not advertise or promote a particular business, service or product.~~

Sign means any advertisement, identification, announcement, direction or communication produced in whole or in part by the construction, erection, affixing or placing of a structure on any land or on any other structure or produced by painting on or posting or placing any printed, lettered, pictured, figured or colored material on any building, structure or surface.

Sign, abandoned means a sign for a business that no longer exists at that address, building or property.

Sign, awning means a sign permanently affixed to a sheet of canvas or other material stretched on a frame and used to keep the sun or rain off a ~~storefront~~, window, doorway, or deck.

Sign, canopy means a sign permanently affixed to a roofed shelter supported by a building, or combination of building and columns.

Sign, directional means any sign on a lot that directs the movement or placement of pedestrian or vehicular traffic with or without reference to, or inclusion of, the name of a

product sold or service performed on the lot or in a building, structure or business enterprise occupying the same.

Sign, external accessory use means a sign located outside of a principal commercial use affixed to accessory commercial structures.

Commented [SH2]: This is for miscellaneous accessory structures, e.g. car wash, canopies, etc.

Sign, freestanding means any sign supported by structures or supports that are placed on or anchored in the ground and are not attached to any building or structure. Sign, inflatable means a balloon, blimp or other inflated object used for attracting attention.

Sign, monument means a permanent freestanding sign supported by, or integrated into, a base or pedestal at least ~~seventy-five~~seventy-five percent (75%) of the sign width.

Sign, notification means a sign that dictates actions on private property.

Sign, off-premises means any sign normally used for promoting an interest other than that of a business, individual, products, or service available on the premises where the sign is located.

Sign, permanent means any sign constructed of permanent materials and permanently attached to the ground, a building, or another structure by direct attachment to a rigid wall, frame, or structure.

Sign, pole means a permanent freestanding sign supported by one (1) or more poles or pylons.

Sign, portable means a moveable sign that is not permanently affixed to a building, structure, or the ground. For purposes of this Article, portable signs are specific to signs mounted on trailers, wheeled carriers, or A-frames that are designed to be placed onto a surface without being secured to it.

Sign, projecting means a sign which is attached perpendicular to the wall of a building or structure.

Sign, site means a temporary freestanding sign constructed of vinyl, plastic, wood or metal and designed or intended to be displayed for a short period of time.

Sign, swing means a temporary freestanding sign that is suspended from a horizontal support (a swing post) that is attached to a vertical support mounted in the ground. A swing sign may also include riders.

Sign, temporary means any banner, blimp, wind or fan-driven sign, or other sign constructed of light fabric, cardboard, wallboard, plywood, sheet metal, paper or other ~~light~~ materials, with or without a frame, intended or designed to be displayed for a limited period of time.

Sign, traffic control means a sign erected in a public right-of way by an authorized governmental agency for the purposes of traffic regulation and safety.

Sign, wall means any sign painted on or affixed to the building wall, or any sign consisting of cut-out letters or devices affixed to the building wall with no background defined on the building wall in such a manner that the wall forms the background surface of the sign.

Sign, wayfinding means a sign authorized by a governmental body for placement in the public right-of-way that is designed to orient and navigate the general public from place to place.

Sign, window means a sign which is applied or attached to the exterior or interior of a window, or applied to, attached to, or located within one (1) foot of the interior of a window, which can be seen through the window from the exterior of the structure.

Sign, yard means a temporary sign constructed of paper, vinyl, plastic, wood, metal or other comparable material, and designed or intended to be displayed for a limited period of time.

Sign face means an exterior display surface of a sign including nonstructural trim, yet exclusive of the supporting structure.

Transition duration means the time interval it takes the display to change from one (1) complete static message to another complete static message.

Transition method means a visual effect applied to a message to transition from one (1) message to the next. Transition methods include:

a. Dissolve - a frame effect accomplished by varying the light intensity or pattern, where the first frame gradually appears to dissipate and lose legibility simultaneously with the gradual appearance and legibility of the second frame.

b. Fade - a frame effect accomplished by varying the light intensity, where the first frame gradually reduces intensity to the point of not being legible (i.e. fading to black) and the subsequent frame gradually increases intensity to the point of legibility.

Work of art means art which in no way identifies a product, business, or enterprise and which is not displayed in conjunction with a commercial enterprise that would realize direct commercial gain from such a display.

(Ord. No. 660-16, §2(Exh. A), 2-23-2016)

Division 3 Administration and Procedures

Sec. 16-3-310. Permits required.

(a) Prior to the erection or installation of any permitted permanent or temporary sign, but not including exempt signs under Section 16-3-350, a sign permit shall be obtained pursuant to this Article.

(b) Sign permits shall be required for master sign plans, and/or sign programs specified in an approved final development plan.

(c) A revocable permit shall be required whenever a person seeks to erect a sign on public property or within a public right-of-way.

(d) No sign permit shall be issued for any sign on private property without written consent of the property owner or the owners authorized agent.

(e) A building permit shall be required where applicable to ensure the structural integrity of the type of sign requested.

(f) It shall be unlawful to erect or install any sign without having first obtained the permits required by this Article and the Town's building code.

(Ord. 646-14 §1(Exh. A), 12-9-2014 ; Ord. No. 660-16, §2(Exh. A), 2-23-2016)

Sec. 16-3-320. Permit approval criteria.

(a) Applications for sign permits and sign plans (when required by this Article) shall be submitted in accordance with the Applicant Guide.

(b) The Zoning Administrator shall review the sign permit application in light of the approval criteria in this Article and shall either approve, approve with conditions or deny such application.

(c) An application for a sign permit may be approved if it complies with the applicable standards set forth in this Article or a final development plan, and all applicable building code requirements. In cases where there is a conflict between this Article and the final development plan, the final development plan shall control.

(d) An application for a revocable permit may be approved if it complies with the following criteria:

(1) The applicant agrees to the terms of a revocable permit agreement, including, but not limited to, any provisions that require compensation to the Town for use of public property or public right-of-way and that indemnify the Town and hold the Town harmless from future damages or liability claims.

(2) The proposed sign complies with all applicable use, development and design standards set forth in this Article, and all applicable building code requirements.

(3) The proposed sign shall not interfere with street intersection visibility or in any other way adversely affect the public health, safety or welfare.

(4) The proposed sign shall not be located over any existing or future utilities and may be removed by the Town if necessary for reconstruction of a street, sidewalk, utilities or to protect the health, safety and welfare of the citizens of the Town, with no liability to the Town for replacement or repair.

(5) The proposed sign has been approved by the Town Engineer based on the Town Engineer's review of the proposal under all Town ordinances, resolutions, rules, regulations and policies governing the use of public property and public rights-of-way.

(e) A sign permit shall lapse and have no further effect unless a sign has been erected in compliance with the terms and conditions of the permit within six (6) months ~~one (1) year~~ after the date of the sign permit approval.

(Ord. 646-14 §1(Exh. A), 12-9-2014 ; Ord. No. 660-16, §2(Exh. A), 2-23-2016)

Sec. 16-3-330. Minor modifications to sign standards.

(a) The Zoning Administrator shall be authorized to grant minor modifications of any sign standard, including, but not limited to, sign area modifications of twenty percent (20%) or less, subject to the approval criteria noted in Subsection (c) below. Such actions may be taken in order to encourage the implementation of alternative or innovative practices that provide equivalent benefits to the public.

(b) An applicant requesting a modification to the sign standards that does not qualify as a minor modification must obtain a variance per Section 16-2-370 of this Chapter.

(c) Approval criteria. Minor modifications may be approved by the Zoning Administrator only upon a finding that all of the following criteria have been met:

(1) The requested modification eliminates an unnecessary inconvenience to the applicant and will have no significant adverse impact on the health, safety or general welfare of surrounding property owners or the general public;

(2) Any adverse impacts resulting from the minor modification will be mitigated to the maximum extent practical; and

(3) The requested minor modification is either:

a. Of a technical nature and is required to compensate for some practical difficulty or unusual aspect of the site or the proposed sign; or

b. An alternative or innovative design practice that achieves to the same or better degree the objective of the existing design standard sought to be modified.

(Ord. 646-14 §1(Exh. A), 12-9-2014 ; Ord. No. 660-16, §2(Exh. A), 2-23-2016)

Sec. 16-3-340. Master sign plan.

For any master planned residential community, multi-tenant retail center, industrial park or other unified form of commercial site development or redevelopment, the applicant shall submit a master sign plan that consists of coordinated and/or shared signage for the entire development.

(1) In general, signs shall have mutually unifying elements which may include uniformity in materials, color, size, height, letter style, sign type, shape, lighting, location on buildings, and design motif.

(2) Materials and textures of signs shall be compatible with the architectural character of the site and building. Supporting sign structures of freestanding signs shall match the primary finish and colors of the associated building(s).

(3) Where possible, freestanding signs shall integrate tenant signs into a single sign structure.

(4) Wayfinding signage systems shall be of a unified graphical system. Such signage shall be placed in consistent locations near site entries, key points on the internal automobile and pedestrian circulation system, building entries, seating areas, and sidewalk intersections.

(5) In reviewing an applicant's submittal of a master sign plan conforming to the provisions of this Section, the Zoning Administrator may vary standards for area, height and number of individual signs.

(6) The Zoning Administrator may approve up to a twenty-percent change in one (1) or more dimensional standards (area and/or height) based on the applicant demonstrating that the change is warranted by a master sign plan that represents exceptional design.

(Ord. No. 660-16, §2(Exh. A), 2-23-2016)

Sec. 16-3-350. Signs allowed without permit.

(a) Generally, the following types of signs are allowed in all zoning districts without a sign permit, subject to the provisions of this Section.

(b) Exempt signs shall otherwise be in conformance with all applicable requirements of this Article, and the construction and safety standards of the Town.

(c) Changing or replacing the copy on an existing lawful sign shall also not require a permit, provided the copy change does not change the nature of the sign or render the sign in violation of this Article.

~~(a)~~(d) All signs not listed in this Section (and that are not prohibited under Section 16-3-360) require a sign permit pursuant to Section 16-3-310 above.

(1) Flags, provided that the following restrictions are met:

a. For residential uses, the height of the pole on which the flag is mounted does not exceed the height of the principal structure on the lot or the distance from the flagpole to the lot line, whichever is less.

b. For nonresidential uses, the height of the pole on which the flag is mounted does not exceed the height of the principal structure on the lot or forty (40) feet, whichever is less.

c. The location of the flagpole is set back a distance from a property line that is at least equal to its height.

(2) Banners and inflatable signs shall be allowed without a sign permit provided that the following requirements are met:

a. ~~Either~~ O~~o~~ne (1) banner per business may be displayed on a building wall, not to exceed one-half (½) square foot for each linear foot of exterior wall up to a maximum area of one hundred (100) square feet;

b. T~~t~~wo (2) freestanding wave banners are permitted per business, up to a maximum height of twelve (12) feet and a maximum square footage of fifty (50) square feet each;

c~~b~~. No banner shall be illuminated, animated or constructed of reflective materials;

d~~c~~. Inflatable signs shall be securely anchored or tethered to the ground, building or structure; and

e~~d~~. Banners and inflatable signs shall comply with the sign design and maintenance standards in Sections 16-3-510 and 16-3-530.

Figure : Banner Sign Detail

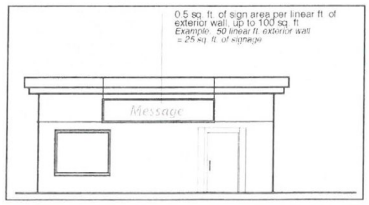
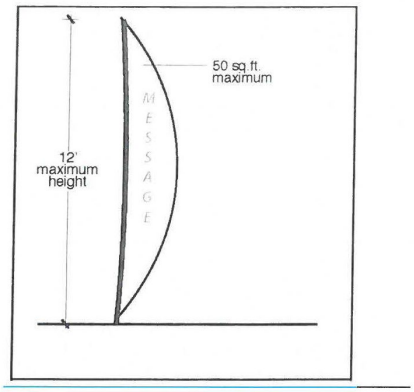


Figure : Wave Banner Detail



(3) Signs erected by any governmental or quasi-governmental agency, including, but not limited to, traffic control, legal notice, community events and wayfinding signs.

(4) Signs erected by public utility companies, oil and gas companies, or construction companies to warn of danger or hazardous conditions, including signs indicating the presence of underground cables, gas lines and similar devices.

(5) Any sign displayed on a window or inside a residential building~~, and any sign inside a nonresidential building that is not visible through a window.~~

(6) Permanent window signs, provided that such signs are limited to ~~ten percent (10%)~~ twenty-five percent (25%) of the total window area of an establishment in a commercial zoning district, and are illuminated only during the times the establishment is in operation.

(7) Temporary window signs, provided that such signs are limited to seventy percent (70%) of the total window area in a commercial zoning district.

(8) Posting of addresses on buildings in locations that are visible from the street as necessary for the effective delivery of postal and public safety services, provided that such signs:

a. Are attached to the building identified;

Commented [TS3]: What is the justification for the change? Similar to other communities, feedback from business? Just want context to be noted.

b. Are limited to two (2) per building;

c. Are not more than six (6) square feet in total area for each sign; and

d. May be illuminated.

(9) Temporary decorations or displays, if they are clearly incidental to, customarily, and commonly associated with any national, state, or local holiday or religious celebration; such signs may be of any type, number, area, height, location, illumination or animation.

(10) Portable A-frame signs, provided that the following restrictions are met:

a. One (1) portable A-frame sign shall be allowed for each business in commercial zoning districts, under the following conditions:

1. The maximum area of each face of a portable A-frame sign shall be six (6) square feet.

2. The maximum height of a portable A-frame sign shall be four (4) feet.

3. No portable A-frame sign shall be placed within twenty-five (25) feet of another portable sign.

4. A portable A-frame sign may be in place only during the business hours of the business to which it relates.

5. A minimum three-foot unobstructed walkway shall be maintained at all times on any sidewalk where a portable A-frame sign is located. Such sign shall not impede pedestrian movement and must be removed immediately upon the request of the Zoning Administrator upon a determination that it is in violation of this Article or unsafe.

6. Portable A-frame signs are permitted in the public right-of-way only if the adjacent business or building is built to the front property line and has a zero setback. No portable A-frame sign may be placed on any public right-of-way or public property unless a revocable permit to occupy such space has been obtained pursuant to Section 16-3-310(c).

(11) Yard signs, as defined in Section 16-3-210, and subject to the standards in Division 4.

(12) Site signs, as defined in Section 16-3-210 and subject to the standards in Division 4.

(13) Swing signs, as defined in Section 16-3-210 and subject to the standards in Division 4.

(14) Notification signs, as defined in Section 16-3-210 and which do not exceed two (2) square feet in area.

(15) ~~Murals or w~~Works of art, as defined in Section 16-3-210.

(16) Inflatable signs, as defined in Section 16-3-210 and limited to one (1) per nonresidential property.

(17) External accessory use signs limited to an aggregate sign area of forty (40) square feet in area, as defined in Section 16-3-210.

(18) Signs carried by a person that are not set on or affixed to the ground, or propped on objects.

(19) Vehicular signs, such as a sign attached to a truck or motor vehicle, where the vehicle is primarily used for business purposes other than advertising. Signs may be placed on motorized vehicles, provided that:

a. The vehicle upon which the sign is affixed must be used for the daily operation of the business and not primarily to display signage; and

b. No sign shall project more than one (1) foot above the roofline of the vehicle to which it is attached. When not in use, any vehicle with an attached sign must be parked on the business premises of the business that it advertises and not closer than fifty (50) feet to the public right-of-way (or, if there is no parking on the business premises, it must be legally parked). No signage may be painted or affixed in any manner to trailers.

(Ord. 646-14 §1(Exh. A), 12-9-2014 ; Ord. No. 660-16, §2(Exh. A), 2-23-2016 ; Ord. 679-17 , §21, 12-12-2017; Ord. 696-19 §14, 2019)

Sec. 16-3-360. Prohibited signs.

The following types of signs are prohibited except as noted:

(1) All signs not expressly permitted under this Article, or exempt from regulation in accordance with Section 16-3-350.

(2) Signs attached to trees or other plant materials.

(3) Any revolving or rotating sign.

(4) Any sign displaying flashing or intermittent lights, or lights of varying intensity of illumination. All lighted signs shall comply with the lighting standards set forth in Division 9 of Article 2 of this Chapter.

(5) Any sign with direct or indirect lighting that causes direct glare into or upon any lot, tract or public right-of-way that is adjacent to the lot, tract or public right-of-way where the sign is located. The light from any light source intended to illuminate a sign shall be so shaded, shielded or directed so that the light intensity or brightness shall not cause glare to affect surrounding properties, or cause glare to affect safe vision of pedestrians or operators of vehicles moving on public or private streets, driveways or parking areas.

(6) Signs contributing to confusion of traffic control devices or emergency service vehicles, or which hide or interfere with the effectiveness of such devices or vehicles.

(7) Any sign that obstructs access to or impedes operation of any window, door, fire escape, stairway, ladder or opening intended to provide light, air, ingress or egress for any building as may be required by law.

(8) Any sign that impedes safe pedestrian or vehicular movement.

(9) Any sign that obstructs the view of a person operating a motor vehicle in any direction at the intersection of a street or with an alley or driveway (see corner vision clearance provisions in Section 16-5-615).

(10) Any sign that emits a sound which is intended to attract attention.

(11) Any off-premises sign, as defined in Section 16-3-210, not otherwise explicitly permitted in this Article.

(12) Any sign attached to a building that projects above the top of the building, unless explicitly permitted in this Article as a roof sign.

(Ord. 646-14 §1(Exh. A), 12-9-2014 ; Ord. No. 660-16, §2(Exh. A), 2-23-2016 ; Ord. 679-17 , §22, 12-12-2017)

Division 4 Standards

Sec. 16-3-410. Sign standards by zoning district.

Signs in all zoning districts shall be subject to the standards set forth in this Section. The number, location and size of signs set forth in Tables 3-1 and 3-2 shall also comply with the standards by sign type listed in Section 16-3-420.

(1) Standards for Residential Zoning Districts. Signs in the RE, R-1, R-2, R-3, and MH zoning districts, and residential land use designations within an agricultural or residential PD zoning district, shall be subject to the following standards:

Table 3.1
Standards for Residential Zoning Districts

Sign Type	Maximum Number	Maximum Area	Maximum/Minimum Height
Awning or Canopy Sign	1 per door or window~~Unlimited~~	0.5 square feet of signage for each linear foot of awning or canopy	No higher than roof or parapet line; 9 feet minimum pedestrian clearance; 14 feet minimum vehicular clearance
Directional Sign	Per approved sign plan	6 square feet	~~No higher than~~ 4 feet
Monument sign	1 per public, quasi- public or institutional use; 2 per main entrance to a subdivision, multi- family housing complex or mobile home park	32 square feet	~~No higher than~~ 6 feet
Site Sign	1 per street frontage	16 square feet	~~No higher than~~ 6 feet
Swing Sign	1 per street frontage	6 square feet, inclusive of riders	~~No higher than~~ 6 feet
Temporary sign (located on	1 per street frontage	<5 ac. = 32 square feet	6 feet

undeveloped property or property under development)	2 per street frontage	>5 ac. = 48 square feet	12 feet
Wall Sign	1 per single-family or two-family dwelling with a home-based business	2 square feet	~~No higher than~~ 8 feet
	1 per principal multifamily family building, per street frontage	32 square feet	No higher than 1 foot below roof or parapet line
	1 per public, quasi- public or institutional use	32 square feet.	No higher than 1 foot below roof or parapet line
Yard Sign	Unlimited, within maximum area requirements	6 square feet per sign/24 square feet total	~~No higher than~~ 4 feet

(2) Standards for Nonresidential Zoning Districts. Signs in the C, EC, 1-1, 1-2 and P zoning districts, and nonresidential land use designations within an agricultural, residential or PD zoning district, shall be subject to the following standards:

Table 3.2
Standards for Nonresidential Zoning Districts

Sign Type	Maximum Number	Maximum Area	Maximum/Minimum Height
Awning or Canopy Sign	Unlimited	0.5 square feet of signage for each linear foot of awning or canopy	No higher than roof or parapet line; 9 feet minimum height pedestrian clearance; 14 feet minimum height vehicular clearance
Directional Sign	Per approved sign plan	6 square feet	~~No higher than~~ 4 feet, except when used on a vehicular clearance structure: minimum of 14 feet
Monument Sign	1 per legal lot of record, except within a ~~unified site development~~master sign plan	75 square feet	~~No higher than~~ 8 feet for lots < 150 lineal feet of frontage; 10 feet for lots > 150 lineal feet of frontage
	1 per multi-tenant retail center, industrial park or	150 square feet	~~No higher than~~ 25 feet

Commented [SH4]: See table and photos at the end of this document. It begins to address off-site homebuilder signs.

	other form of unified site development		
Drive-through Changeable Copy Sign	2 per drive-through lane	75 sq. ft. per drive-through lane	7 feet
Pole Sign	1 per legal lot of record proximate to I-70/SH79 intersection (Figure 3.8(b): Pole Sign Location Detail)	380 square feet	~~No higher than~~ 60 feet
Projecting Sign	1 per building entrance	15 square feet	No higher than roof or parapet line; 9 feet minimum height
Roof Sign	1 per principal building	100 square feet	No higher than 4 feet above the roofline, parapet or fascia wall on a flat roof; no higher than roofline on a peaked or mansard roof
Site Sign	1 per street frontage	32 square feet	~~No higher than~~ 8 feet
Swing Sign	1 per street frontage	6 square feet, inclusive of riders	~~No higher than~~ 6 feet
Temporary sign (located on developed property)	1 per street frontage	32 square feet	8 feet
Temporary sign (located on developed property) or property under development.	1 per street frontage	<5 ac. = 32 square feet	8 feet
	2 per street frontage	>5 ac. = 64 square feet	12 ft.
Wall Sign	~~Unlimited. Within allowed maximum area~~ Office buildings or buildings with similar use where multiple tenants exist or may be planned, and where	1.5 square feet of area per lineal foot of exterior wall frontage, up to a maximum of 100 square feet ~~for entire building~~ per building façade.	~~No higher than 25 feet and n~~Not higher than the eave line of the principal building

Commented [SH5]: We need a definition of this.

Formatted Table

Formatted: Font: (Default) Arial, 11 pt

Commented [SH6]: Souir

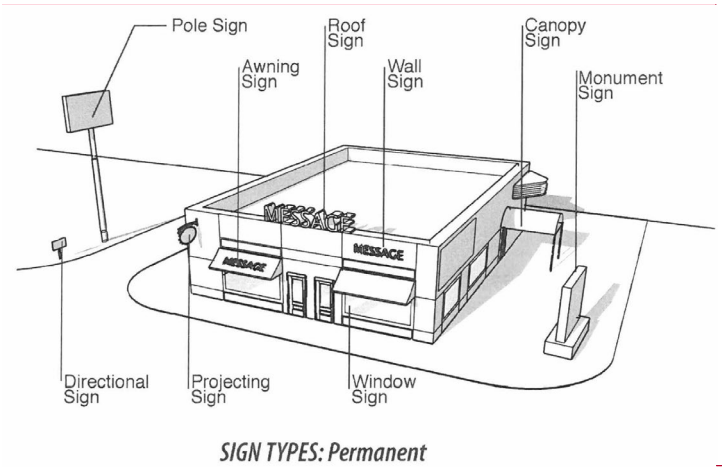
Commented [SH7]:

	public entrance is predominantly interior are limited to 1 wall sign per building side. Additional signs may be approved where retail or other uses have separate exterior public entries.		
Yard Sign	Unlimited, within maximum area requirements	6 square feet per sign/24 square feet total	~~No higher than~~ 4 feet

(Ord. 646-14 §1(Exh. A), 12-9-2014 ; Ord. No. 660-16, §2(Exh. A), 2-23-2016)

Sec. 16-3-420. Standards by sign type.

Figure 3.1: Sign Type Examples: Permanent



SIGN TYPES: Permanent

Commented [SH9]: To be moved to definition section.

The following types of permanent signs shall be allowed, subject to the standards set forth in this Section:

(1) Awning signs.

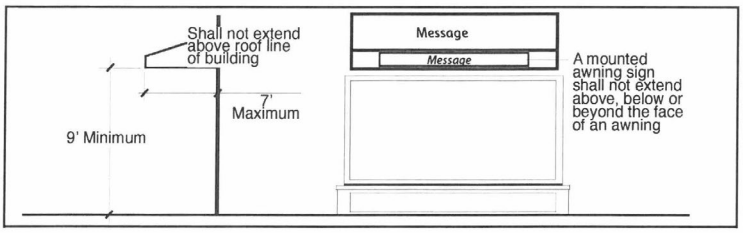
a. Location. Signs may be placed only on awnings that are located on first- and second-story building frontages, including those fronting a parking lot or

pedestrian way. An awning may include a printed or mounted sign. No sign mounted to an awning shall project beyond, above or below the face of an awning.

b. Quantity, Area and Height. Sign quantity and area shall comply with the requirements established in Section 16-3-410. No structural element of an awning shall be located less than nine (9) feet above finished grade. Awnings on which signs are printed or mounted shall not extend over a public right-of-way more than seven (7) feet from the face of a supporting building. No awning, with or without signage, shall extend above the roofline of any building.

c. Lighting. Awnings may be internally illuminated in nonresidential zones only.

Figure 3.2: Awning Sign Detail

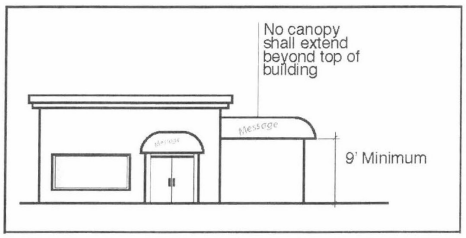


(2) Canopy signs.

a. Quantity, Area and Height. Sign quantity and area shall comply with the requirements established in Section 16-3-410. No structural element of a canopy sign shall be located less than nine (9) feet above finished grade. Canopies on which signs are printed or mounted shall not extend over a public right-of-way more than seven (7) feet from the face of a supporting building. No canopy, with or without signage, shall extend above the roofline of any building. No canopy sign shall project above the top of the canopy upon which it is mounted. However, a sign may project horizontally from the face of a canopy the distance necessary to accommodate the letter thickness and required electrical equipment, but not more than twelve (12) inches.

b. Lighting. Canopies may be internally illuminated in nonresidential zones only.

Figure 3.3: Canopy Sign Detail



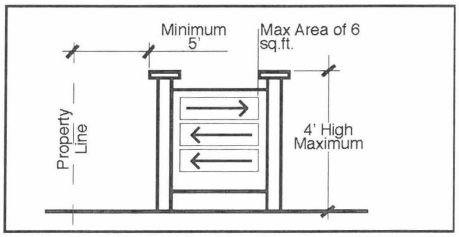
(3) Directional signs.

a. Location. Directional signs shall be allowed per a sign plan approved by the Zoning Administrator. Directional signs shall be no closer than five (5) feet from any property line.

b. Quantity, Area and Height. Directional signs shall comply with the quantity, area and height requirements established in Section 16-3-410.

c. Lighting. Directional signs may be internally illuminated.

Figure 3.4: Directional Sign Detail



(4) Electronic message centers.

a. Location. An electronic message center may be integrated up to fifty percent (50%) of the allowed sign area of a nonresidential freestanding pole or monument sign. Existing signage proposed for conversion to the use of an electronic message center shall conform to the sign standards in this Article prior to issuance of a sign permit. Nonconforming signs shall not be eligible for conversion to an electronic message center.

b. Quantity, Area and Height. An electronic message center shall comply with the quantity, area and height requirements established for pole or monument signs in Section 16-3-410.

c. Lighting. Lighting from the electronic message center shall not exceed 0.3 foot candles between dusk to dawn as measured from the sign's face. The electronic

message center shall have automatic dimmer software or solar sensors to control brightness for nighttime viewing. The intensity of the light source shall not produce glare, the effect of which constitutes a traffic hazard. Documentation shall be provided from the sign manufacturer which verifies compliance with auto dimming and brightness requirements.

d. Transition Method. The electronic message center shall be limited to static messages, changed only through either dissolve or fade transitions, which may otherwise not have movement, or the appearance or optical illusion of movement, of any part of the sign structure, design, or pictorial segment of the sign, including the movement of any illumination or the flashing scintillating or varying of light intensity.

e. Transition Duration. The transition duration between messages shall not exceed one (1) second.

f. Message Hold Time. The message hold time shall be a minimum of three (3) seconds.

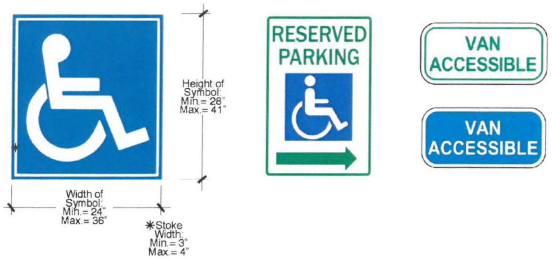
Figure 3.5: Electronic Message Center Detail

(5) Handicap parking signs.

a. Location. Handicap parking space signage shall be installed as required by Section 16-2-640(f) and show the symbol of accessibility (see Figure 3-6).

b. Quantity, Area and Height. A handicap parking sign shall be a minimum twelve (12) inches wide and eighteen (18) inches high centered between three (3) feet and five (5) feet above the ground at the head of the required space and may be mounted on a pole or structure. The sign shall have a white background with green lettering stating "Reserved Parking" and the white international symbol of accessibility on blue background. Van accessible spaces shall have an additional sign, "Van Accessible", mounted below the symbol of accessibility. The accessibility parking space shall be striped in white on the pavement and marked with the international symbol of accessibility. The symbol shall be a minimum twenty-eight (28) inches in height and twenty-four (24) inches in width with the blue background symbol and optional white border.

Figure 3.6: Handicap Parking Sign Detail



(6) Monument signs.

a. Location. A monument sign shall be located on a site frontage adjoining a public or private street, easement or right-of-way. The minimum setback from any property line shall be equal to the height of the sign. Upon approval of the Zoning Administrator, a monument sign can be integrated into a fence or wall. With the exception of entry signs on a single lot, no new monument sign shall be placed within fifty (50) lineal feet of an existing monument sign.

b. Quantity, Area and Height. A monument sign shall comply with the quantity, area and height requirements established in Section 16-3-410.

c. Landscaping. Landscaping shall be provided at the base of the supporting structure equal to twice the area of one face of the sign. For example, twenty (20) square feet of sign area equals forty (40) square feet of landscaped area. The Zoning Administrator may reduce or waive this requirement if it is determined that the additional landscaping would not contribute significantly to the overall aesthetic character of the project, or if physical conditions of the site would preclude all or a portion of the landscaping.

d. Lighting. Monument signs may be illuminated.

Figure 3.7(a): Monument Sign Detail

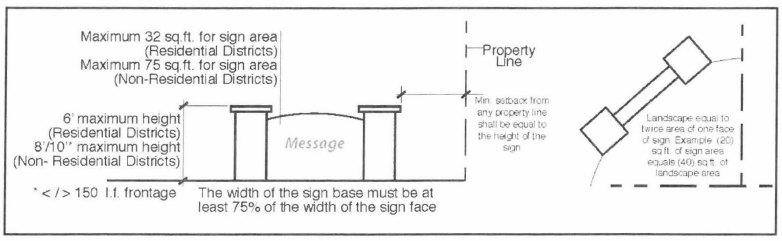
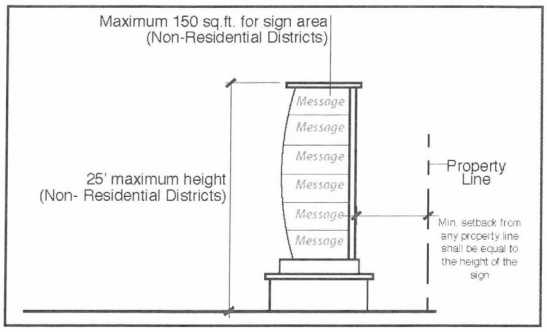


Figure 3.7(b): Multi-Tenant Monument Sign Detail



(7) Pole signs.

a. Location. A pole sign shall be located on a site frontage adjoining a public or private street, easement or right-of-way. No freestanding pole sign in any zoning district shall be erected closer than ten (10) feet from any property line, or closer than four (4) feet to any building (See Figure 3-8(a)). Pole signs shall not be located within one hundred (100) feet of any residential zoned property. No new pole sign shall be located outside of a fifteen hundred-foot wide strip greater than fifteen hundred (1,500) feet north or south, or three thousand (3,000) feet east or west, from the center point of the intersection of State Highway 79 and 1-70 (see Figure 3-8(b)). No new pole sign shall be placed within one thousand (1,000) lineal feet of an existing pole sign.

b. Quantity, Area and Height. A pole sign shall comply with the quantity, area and height requirements established in Section 16-3-410.

c. Landscaping. Landscaping shall be provided at the base of the supporting structure in an appropriate amount to be determined by the Zoning Administrator during review of a sign plan. The Zoning Administrator may waive this requirement if it is determined that the landscaping would not contribute significantly to the overall aesthetic character of the project, or if physical conditions of the site would preclude all or a portion of the landscaping.

d. Lighting. Pole signs may be internally illuminated.

Figure 3.8(a): Pole Sign Detail

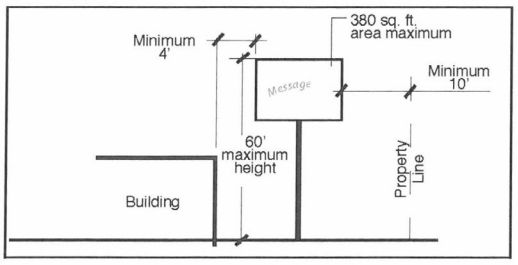
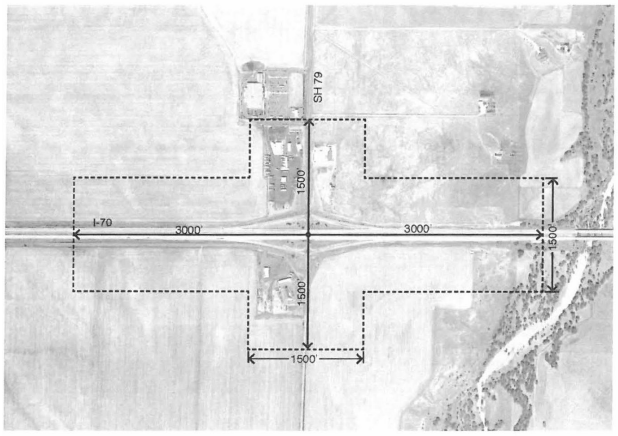


Figure 3.8(b): Pole Sign Location Detail



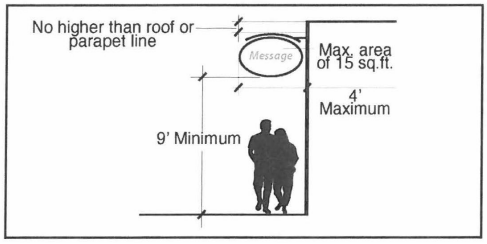
(8) Projecting signs.

a. Location. Projecting signs shall be placed on a ground floor facade, except for businesses located above the ground level with direct exterior pedestrian access.

b. Quantity, Area and Height. A projecting sign shall comply with the quantity, area and height requirements established in Section 16-3-410. No structural element of a projecting sign shall be located less than nine (9) feet above finished grade. Projecting signs shall not be higher than the wall from which the sign projects if attached to a single story building, or the height of the bottom of any second story window if attached to a multi-story building. Projecting signs shall not extend more than four (4) feet from the face of a supporting building.

c. Lighting. Projecting signs shall not be illuminated.

Figure 3.9: Projecting Sign Detail



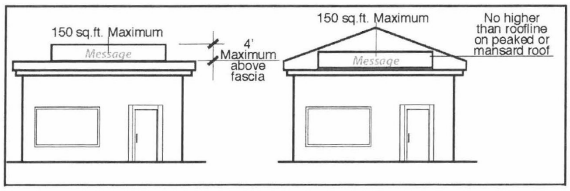
(9) Roof signs.

a. Location. A permanent nonresidential roof sign may be permitted, subject to approval by the Zoning Administrator, where the nature of the use, the size of the site or other physical constraints result in a situation where either a wall or freestanding sign cannot be installed without practical difficulties. The negative impact on the visual character of the site or surrounding area resulting from the installation of a roof sign shall be minimized through the use of quality materials and compatible colors. A roof sign shall not include an electronic message board.

b. Quantity, Area and Height. A roof sign shall comply with the quantity, area and height requirements established in Section 16-3-410.

c. Lighting. Roof signs shall not be illuminated.

Figure 3.10: Roof Sign Detail



(10) Wall signs.

a. Location. A wall sign shall not be placed to obstruct any portion of a window, doorway or other architectural detail.

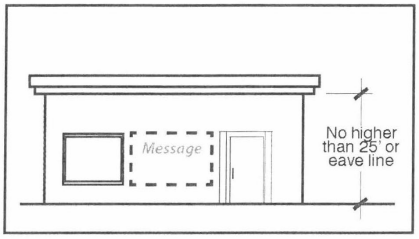
b. Quantity, Area and Height. A wall sign shall comply with the quantity, area and height requirements established in Section 16-3-410. Wall signs shall not be higher than the eave line of the principal building. No sign part, including cut-out letters, may project from the building wall more than required for construction purposes and in no case more than twelve (12) inches.

c. Lighting. Wall signs may be illuminated in nonresidential zoning districts only. All lighting must be internal or by way of a full-cutoff light fixture so the source of the light is not directly visible.

d. If individual letters are mounted on a raceway, the raceway shall be the same color as the color of the background of the building façade upon which the raceway is mounted.

Commented [TS10]: Is that feasible?

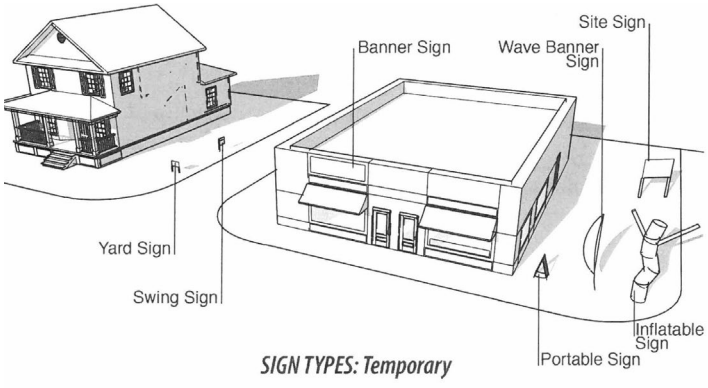
Figure 3.11: Wall Sign Detail



(Ord. 646-14 §1(Exh. A), 12-9-2014 ; Ord. No. 660-16, §2(Exh. A), 2-23-2016)

Sec. 16-3-430. Temporary signs.

Figure 3.12: Sign Type Examples: Temporary



Commented [SH11]: Move to definition section.

The following types of temporary signs shall be allowed, subject to the approval of a temporary sign permit and the standards set forth in this Section:

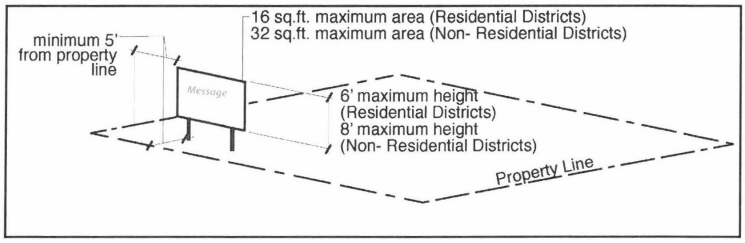
(1) Site Signs shall be permitted as follows:

a. Location. Site signs shall be setback a minimum of five (5) feet from any property line. Site signs are not permitted on parcels with existing residential uses.

b. Quantity, area and height. A site sign shall comply with the quantity, area and height requirements established in Section 16-3-410.

Figure 3.14: Site Sign Detail

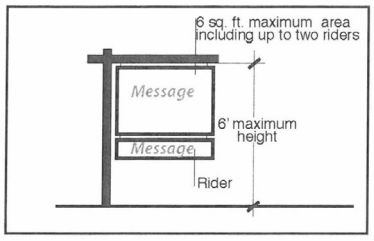
Commented [SH12]: Update if we change max. size.



(2) Swing Signs shall be permitted as follows:

a. Quantity, Area and Height. A swing sign shall comply with the quantity, area and height requirements established in Section 16-3-410. No more than two riders are to be attached to a swing sign, and shall be included in the maximum area of the sign.

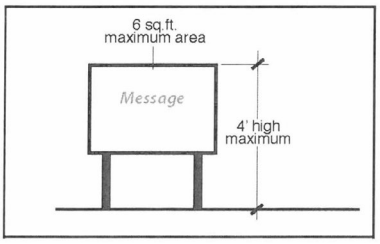
Figure 3.15: Swing Sign Detail



(3) Yard Signs shall be permitted as follows:

a. Quantity, Area and Height. A yard sign shall comply with the quantity, area and height requirements established in Section 16-3-410.

Figure 3.16: Yard Sign Detail



(4) Portable trailer or wheeled carrier signs parked on public right-of-way, public property, or on private property shall be permitted as follows:

a. Within nonresidential zoning districts only;

b. Only one (1) such sign per property is allowed;

c. Such sign shall not exceed thirty-two (32) square feet in area and shall be no higher than eight (8) feet.

(5) Prohibited signs. No sign listed as a prohibited sign in Section 16-3-360 shall be permitted, even on a temporary basis.

(6) Permits. Each sign permit issued for a temporary sign pursuant to Division 3 of this Article and this Section shall include the dates upon which the sign shall be erected and removed.

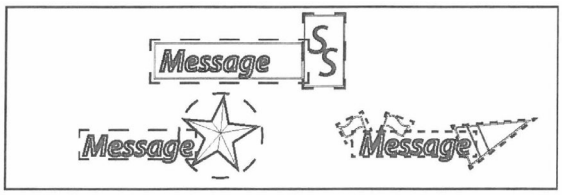
(Ord. 646-14 §1(Exh. A), 12-9-2014 ; Ord. No. 660-16, §2(Exh. A), 2-23-2016 ; Ord. 679-17 , §23, 12-12-2017; Ord. 696-19 §15, 2019)

Sec. 16-3-440. Sign measurement.

(a) Computation of Sign Area.

(1) The area of a sign face shall be computed by means of the smallest square, circle, rectangle, triangle, or combination thereof that will encompass the extreme limits of the message, logo, symbol, name, photograph, writing, representation, emblem, artwork, figure or other display used to differentiate the sign from the backdrop or structure against which it is placed (See Figure 3-17).

Figure 3.17: Sign Measurement Detail



(2) Any supporting framework, bracing, poles, fence or wall, or architectural feature or landscape element that is clearly incidental to the sign display shall not be computed as sign area.

(3) Architectural treatments that aid in integrating the signage with the building design are encouraged, but any such treatment shall not be created for the purpose of visually enlarging the size of the sign. If more than ten percent (10%) of any wall or roof surface of any nonresidential building or any accessory structure to a nonresidential use is painted, finished or surfaced in a distinctive color scheme that includes some or all of the same colors, shapes, symbols, images, patterns or textures used on any sign identifying an owner, tenant or user of the building, and the Zoning Administrator determines that such wall or roof surfaces serve as a sign for an owner, tenant or user of the building, such wall or roof area shall be counted as signage and shall be subject to the limitations on signage area in Table 3-2.

(4) All sign faces visible from one (1) point shall be counted and considered part of the maximum total sign area allowance for a sign.

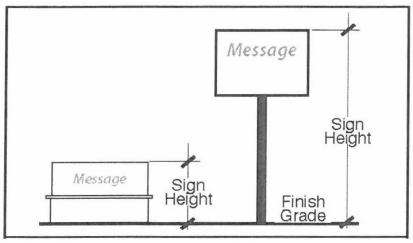
a. When two (2) identical sign faces are placed back to back so that both faces cannot be viewed from any point at the same time, and are part of the same sign structure, the sign area shall be computed by the measurement of one (1) of the two (2) sign faces.

b. When the sign has more than two (2) display surfaces, the area of the sign shall be the area of largest display surfaces that are visible from any single direction.

(5) For the purpose of determining sign area and the allowable number of wall signs, a wall shall be considered the entire building side or elevation, and not each articulated wall face per building side or elevation.

(b) Computation of Sign Height. The height of any sign shall be determined by the distance between the topmost portion of the sign structure and the ground elevation at the base of the sign (See Figure 3-18). The grade shall not be artificially changed solely to affect the sign height measurement.

Figure 3.18: Sign Height Detail



(Ord. 646-14 §1(Exh. A), 12-9-2014 ; Ord. No. 660-16, §2(Exh. A), 2-23-2016)

Division 5 Sign Design, Installation and Maintenance

Sec. 16-3-510. Sign design.

(a) The design of a sign including copy, lettering size and style, and colors shall logically relate to the average speed of the motorists who will see it. Signs shall legibly convey their messages without being distracting or unsafe to motorists reading them.

(b) All signs shall be designed to complement or enhance the other signs for a building or development.

  (1) In general, signs shall have mutually unifying elements which may include uniformity in materials, color, size, height, letter style, sign type, shape, lighting, location on buildings, and design motif.

  (2) Freestanding monument and pole signs shall have a sign face that is an integrally framed structure.

  (3) The negative impact on the visual character of the site or surrounding area resulting from the installation of a pole sign shall be minimized through the use of wide pylons.

(c) All signs shall be constructed in accordance with the following requirements:

  (1) Permanent signs shall be fabricated on and of materials that are of good quality are durable and weather-resistant and are fastened or anchored sufficiently. All wood sign components shall be stained or painted to ensure durability.

  (2) Temporary signs shall be durable and weather-resistant and fastened or anchored sufficiently, whether attached to the building or positioned in the ground.

(d) Prohibited sign elements.

  (1) The following elements shall not be incorporated as an element of any sign or sign structure, whether temporary or permanent:

    a. Animated, flashing or moving parts, including any moving, swinging, rotating or spinning parts or animated lights except electronic message centers.

b. Non-durable cardboard, card stock or paper except as used as a window sign.

c. No raw, unpainted plywood. No spray painted signs unless produced by a professional sign company or equivalent and approved by the Zoning Administrator.

(Ord. 646-14 §1(Exh. A), 12-9-2014 ; Ord. No. 660-16, §2(Exh. A), 2-23-2016 ; Ord. 679-17 , §24, 12-12-2017)

Sec. 16-3-520. Sign installation.

(a) All permanent signs and all components thereof, including sign structures and sign faces, shall be installed in compliance with all building and electrical codes.

(b) Except for flags, window signs, portable A-frame signs and temporary signs conforming to the requirements of this Article, all signs shall be permanently attached to the ground, a building, or another structure by direct attachment to a rigid wall, frame, or structure.

(Ord. 646-14 §1(Exh. A), 12-9-2014 ; Ord. No. 660-16, §2(Exh. A), 2-23-2016 ; Ord. 679-17 , §25, 12-12-2017)

Sec. 16-3-530. Sign maintenance.

All signs, both currently existing and constructed in the future, and all parts and components thereof, shall be maintained in a safe condition in compliance with all building and electrical codes, and in conformance with this Article.

(1) All signs, including sign structures and sign faces, shall be kept neatly painted, including all metal parts and supports that are not galvanized or of rust-resistant metals, and in a general state of good repair. For the purposes of this section, good repair shall mean that there are no loose, broken, tom or severely weathered portions of the sign structure or sign face.

(2) All electronic message center displays shall be equipped with a malfunction display and the ability to automatically shut off if a malfunction occurs. An electronic message center under repair shall be shut off.

(3) The Zoning Administrator may order any sign to be repaired whenever needed to keep the sign in a safe condition and in compliance with these regulations.

(Ord. 646-14 §1(Exh. A), 12-9-2014 ; Ord. No. 660-16, §2(Exh. A), 2-23-2016 ; Ord. 679-17 , §26, 12-12-2017)

Sec. 16-3-540. Sign removal and alteration.

(a) Inspection. The Zoning Administrator may inspect any sign and shall have authority to order the painting, repair, alteration or removal of a sign and/or sign structure that constitutes a hazard to safety, health or public welfare by reason of abandonment or inadequate maintenance, dilapidation or obsolescence.

(b) Sign Removal or Repair. In addition to any other remedies available under this Chapter, the Zoning Administrator may issue a written notice to sign owners of the need to remove or repair a sign, as follows:

(1) Any sign that does not meet the requirements set forth in this Chapter and does not qualify as a nonconforming structure.

(2) Any sign that has not been used in a bona fide manner as a sign for a consecutive period of one hundred and eighty (180) days and deemed abandoned by the Zoning Administrator.

(3) Any sign that is in disrepair or unsafe and deemed hazardous by the Zoning Administrator.

(4) Any sign identifying a business, professional or industrial establishment that has moved from the premises.

(5) Signs or supporting structures that are the subject of a written notice shall be removed or repaired within fifteen (15) days after the date on which the Town issues the notice. If the sign is not repaired or removed within that time, the Town may remove the sign from the premises on which it is located and store the sign. Costs incurred by the Town for removal, storage and disposition of the sign will be assessed to the owner of the sign, supporting structure or property to which the notice was sent.

(c) Altering or Moving Existing Signs.

(1) Any alteration to an existing sign shall require a new permit pursuant to Division 3 of this Article before the sign may be altered. Alterations shall include, without limitation:

a. Changing the size of the sign;

b. Changing the shape of the sign;

c. Changing the material of which the sign is constructed;

d. Changing or adding lighting to the sign;

e. Changing the location of the sign; or

f. Changing the height of the sign.

(2) Existing conforming or nonconforming signs may be altered in any way that does not change the size, height, background, shape or location of the sign without bringing the entire sign into conformance, provided that the cost of the alteration is less than fifty percent (50%) of the sign's replacement cost.

(3) Signs may be removed for maintenance and replaced on the same support, without obtaining a new permit.

(4) Whenever a business, industry, service or other use is discontinued, any sign or sign copy pertaining to the use shall be removed by the person or entity owning or having possession of the property within one hundred and eighty (180) days after the discontinuance of such use, except a sign advertising the lease or sale of the building.

(Ord. 646-14 §1(Exh. A), 12-9-2014 ; Ord. No. 660-16, §2(Exh. A), 2-23-2016)

Off-site ~~Homebuilder~~ Signs – needs review, rework and reformatting. This is similar to Aurora's code.

Sign Type	Standards	Size/Quantity
Additional Ground-Mounted Temporary Sign, Off-Site	Must be located within 2 miles, measured along the shortest public street right-of-way, of a property for which at least 1 active building permit for construction of buildings for residential uses is in effect. Allowed for up to 12 consecutive calendar months, which may be extended.	Maximum 8 signs per applicant. Each sign shall be a minimum of 600 ft. from another additional temporary off-site sign. Allowed in public right-of-way if at least 120 ft., from an intersection. Total sign area per sign shall not exceed 16 sf. or 32 sf. for a 2 sided sign. Sign height shall not exceed 12 ft.

Commented [SH13]: Do we want to accommodate these type of signs?

PLANNING COMMISSION SCRIPT
(Continue Hearing)

CHAIR: I will open the public hearing on proposed amendments to Chapter 16 of the Bennett Municipal Code concerning sign regulations.

CHAIR: I understand there has been a request to continue the hearing to April 17, 2023 in order to give Town staff additional time to finalize the draft ordinance. Do I have a motion to continue this hearing?

MOTION

I move we continue the public hearing on the proposed amendments to Chapter 16 of the Bennett Municipal Code concerning sign regulations until April 17, 2023 at 6:00 p.m. at Bennett Town Hall.